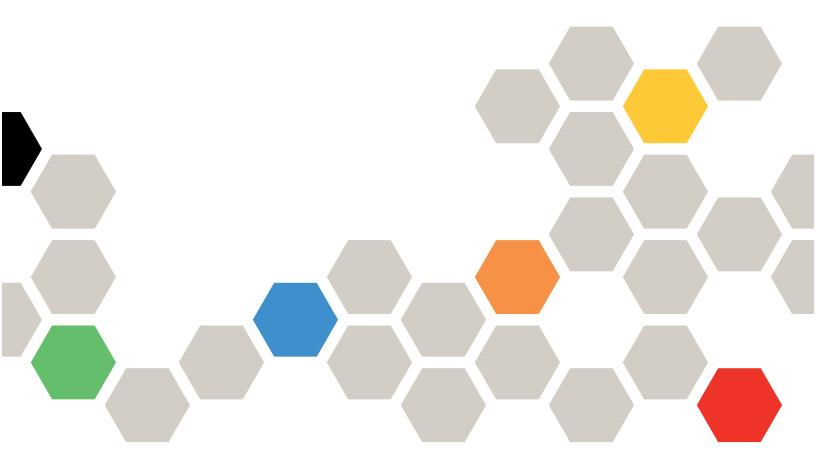


## Lenovo Flex System x240 M5 Compute Node Installation and Service Guide



Machine Types: 9532, 2591

#### Note

Before using this information and the product it supports, read the general information in , the *Warranty Information* document, and the *Safety Information* and the *Environmental Notices and User Guide* documents on the documentation CD that comes with your product.

#### **Eighteenth Edition (October 2020)**

#### © Copyright Lenovo 2014, 2020.

LIMITED AND RESTRICTED RIGHTS NOTICE: If data or software is delivered pursuant to a General Services Administration (GSA) contract, use, reproduction, or disclosure is subject to restrictions set forth in Contract No. GS-35F-05925.

## Contents

Safety	.iii
Guidelines for trained service technicians	. iv
Inspecting for unsafe conditions	. iv
Guidelines for servicing electrical equipment	. v
Safety statements	. vi
Chapter 1. Introduction	. 1
Related documentation	. 2
Brocade documentation	. 3
Notices and statements in this document	. 3
Features and specifications	. 4
What your compute node offers	. 6
Lenovo XClarity Administrator	. 9
Reliability, availability, and serviceability features	11
Major components of the compute node	11
Power, controls, and indicators	12
Compute node controls, connectors, and LEDs	12
Console breakout cable	16
Turning on the compute node	16
Turning off the compute node	17
System-board layouts	18
System-board connectors	18
System-board LEDs	18
System-board switches	19
	10
Chapter 2. Configuring	21
Updating firmware and device drivers	21
Recovering a UEFI image	22
Configuring the compute node	23
Using the Setup utility	24
Nx boot failure	30
Setting the boot protocol to boot from legacy devices using the Setup utility	30
Using the Boot Selection Menu program	31
Updating the Universally Unique Identifier (UUID) and DMI/SMBIOS data with vital	01
product data	32
Configuring a RAID array	35
Using the LSI Logic Configuration Utility	35
Features on Demand	36
Chapter 3. Installing the operating	
system	37
using the ServerGuide Setup and Installation	38
CD	38 38

Typical operating-system installation Installing the operating system without using				
ServerGuide	. 39			
Using Lenovo ServerGuide Scripting Toolkit	. 39			
Chapter 4. Accessing the IMM2	. 41			
Accessing the IMM2 remotely	. 41			
Viewing the network access tag	. 41			
Logging on to the IMM2 web interface	. 42			
IMM2 action descriptions	. 43			
Accessing the IMM2 using the LAN over USB	47			
Potential conflicts with the LAN over USB	. 47			
interface	. 47			
Resolving conflicts with the IMM2 LAN over				
USB interface.	. 47			
Configuring the LAN over USB interface manually	. 47			
	/			
Chapter 5. Parts listing, Types 9532				
and 2951	. 51			
Chapter 6. Troubleshooting	. 63			
Service bulletins	. 63			
Diagnostic tools.	. 63			
Light path diagnostics	. 63			
	. 66			
Lenovo Dynamic System Analysis	. 68			
DSA diagnostic test results	. 70			
Event messages	. 203			
IMM messages	. 203			
UEFI diagnostic codes	. 649			
Troubleshooting by symptom	. 669			
Compute node start problems	. 669			
Connectivity problems	. 670			
Hard disk drive problems	. 683			
Intermittent problems.				
Intermittent connectivity problems.	. 684			
Memory problems	. 684			
Observable problems.	. 685			
Optional device and replaceable component				
installation problems	. 686			
Performance problems	. 687			
Power-on problems	. 687			
Software problems.	. 688			
Undetermined problems	. 689			
Collecting service data	. 689			

# Chapter 7. Installing, removing, and replacing compute node

components
Installing an optional device
Installation guidelines
System reliability guidelines 691
Handling static-sensitive devices 692
Returning a device or component 692
Updating the compute node configuration 692
Removing a compute node from a chassis 692
Installing a compute node in a chassis
Removing and replacing consumable and structural parts
Removing the front panel
Installing the front panel
Removing the chassis bulkhead
Installing the chassis bulkhead 699
Removing the compute node cover 699
Installing the compute node cover 701
Removing the front handle
Installing the front handle
Removing the hard disk drive cage 703
Installing the hard disk drive cage
Removing and replacing Tier 1 customer replaceable units (CRUs)
Removing the adapter-retention assembly 705
Installing the adapter-retention assembly 706
Removing the bezel
Installing the bezel
Removing the ID label plate
Installing the ID label plate
Removing the CMOS battery
Installing the CMOS battery
Removing a DIMM
Installing a DIMM
Removing a hard disk drive backplane 724
Installing a hard disk drive backplane 725
Removing a hot-swap hard disk drive 726
Installing a hot-swap hard disk drive

Removing a solid state drive mounting sleeve	727
Installing a solid state drive mounting sleeve	729
Removing a 1.8-inch solid state drive	730
-	
Installing a 1.8-inch solid state drive	732
Removing a ServeRAID M5215 controller	734
Installing a ServeRAID M5215 controller	736
Removing an interposer cable	738
Installing an interposer cable	739
Removing an I/O expansion adapter	740
Installing an I/O expansion adapter	741
Removing the RFID tag	742
Installing the RFID tag	743
Removing the SD Media Adapter for System	
x	744
Installing the SD Media Adapter for System	
X	745
Removing an SD card	747
Installing an SD card	748
Removing and replacing Tier 2 customer	
replaceable units (CRUs)	749
Removing a microprocessor and heat sink	749
Installing a microprocessor and heat sink	753
Thermal grease	760
Removing and replacing the system-board assembly	761
Appendix A. Getting help and	

technical assistance	-	-		-	.773
Before you call					. 773
Using the documentation					. 774
Getting help and information from the Wo	rld	V	Vic	de	
Web	•				. 774
How to send DSA data					. 774
Creating a personalized support web pag	е				. 774
Software service and support					. 774
Hardware service and support					. 775
Taiwan product service			•	•	. 775
Index	-	-			.777

## Safety

Before installing this product, read the Safety Information.

```
قبل تركيب هذا المنتج، يجب قراءة الملاحظات الأمنية
```

Antes de instalar este produto, leia as Informações de Segurança.

# 在安装本产品之前,请仔细阅读 Safety Information (安全信息)。

安裝本產品之前,請先閱讀「安全資訊」。

Prije instalacije ovog produkta obavezno pročitajte Sigurnosne Upute.

Před instalací tohoto produktu si přečtěte příručku bezpečnostních instrukcí.

Læs sikkerhedsforskrifterne, før du installerer dette produkt.

Lees voordat u dit product installeert eerst de veiligheidsvoorschriften.

Ennen kuin asennat tämän tuotteen, lue turvaohjeet kohdasta Safety Information.

Avant d'installer ce produit, lisez les consignes de sécurité.

Vor der Installation dieses Produkts die Sicherheitshinweise lesen.

Πριν εγκαταστήσετε το προϊόν αυτό, διαθάστε τις πληροφορίες ασφάλειας (safety information).

לפני שתתקינו מוצר זה, קראו את הוראות הבטיחות.

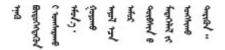
A termék telepítése előtt olvassa el a Biztonsági előírásokat!

Prima di installare questo prodotto, leggere le Informazioni sulla Sicurezza.

製品の設置の前に、安全情報をお読みください。

본 제품을 설치하기 전에 안전 정보를 읽으십시오.

Пред да се инсталира овој продукт, прочитајте информацијата за безбедност.



#### Les sikkerhetsinformasjonen (Safety Information) før du installerer dette produktet.

Przed zainstalowaniem tego produktu, należy zapoznać się z książką "Informacje dotyczące bezpieczeństwa" (Safety Information).

Antes de instalar este produto, leia as Informações sobre Segurança.

Перед установкой продукта прочтите инструкции по технике безопасности.

Pred inštaláciou tohto zariadenia si pečítaje Bezpečnostné predpisy.

Pred namestitvijo tega proizvoda preberite Varnostne informacije.

Antes de instalar este producto, lea la información de seguridad.

Läs säkerhetsinformationen innan du installerar den här produkten.

Bu ürünü kurmadan önce güvenlik bilgilerini okuyun.

مەزكۇر مەھسۇلاتنى ئورنىتىشتىن بۇرۇن بىخەتەرلىك ئۇچۇرلىرىنى ئوقۇپ چىقىڭ.

Youq mwngz yungh canjbinj neix gaxgonq, itdingh aeu doeg aen canjbinj soengq cungj vahgangj ancien siusik.

## **Guidelines for trained service technicians**

This section contains information for trained service technicians.

## Inspecting for unsafe conditions

Use this information to help you identify potential unsafe conditions in a device that you are working on.

Each device, as it was designed and manufactured, has required safety items to protect users and service technicians from injury. The information in this section addresses only those items. Use good judgment to identify potential unsafe conditions that might be caused by unsupported alterations or attachment of unsupported features or optional devices that are not addressed in this section. If you identify an unsafe condition, you must determine how serious the hazard is and whether you must correct the problem before you work on the product.

Consider the following conditions and the safety hazards that they present:

- Electrical hazards, especially primary power. Primary voltage on the frame can cause serious or fatal electrical shock.
- Explosive hazards, such as a damaged CRT face or a bulging capacitor.
- Mechanical hazards, such as loose or missing hardware.

To inspect the product for potential unsafe conditions, complete the following steps:

- 1. Make sure that the power is off and the power cords are disconnected.
- 2. Make sure that the exterior cover is not damaged, loose, or broken, and observe any sharp edges.
- 3. Check the power cords:
  - Make sure that the third-wire ground connector is in good condition. Use a meter to measure thirdwire ground continuity for 0.1 ohm or less between the external ground pin and the frame ground.
  - Make sure that the power cords are the correct type.

- Make sure that the insulation is not frayed or worn.
- 4. Remove the cover.
- 5. Check for any obvious unsupported alterations. Use good judgment as to the safety of any unsupported alterations.
- 6. Check inside the system for any obvious unsafe conditions, such as metal filings, contamination, water or other liquid, or signs of fire or smoke damage.
- 7. Check for worn, frayed, or pinched cables.
- 8. Make sure that the power-supply cover fasteners (screws or rivets) have not been removed or tampered with.

## **Guidelines for servicing electrical equipment**

Observe these guidelines when you service electrical equipment.

- Check the area for electrical hazards such as moist floors, nongrounded power extension cords, and missing safety grounds.
- Use only approved tools and test equipment. Some hand tools have handles that are covered with a soft material that does not provide insulation from live electrical current.
- Regularly inspect and maintain your electrical hand tools for safe operational condition. Do not use worn or broken tools or testers.
- Do not touch the reflective surface of a dental mirror to a live electrical circuit. The surface is conductive and can cause personal injury or equipment damage if it touches a live electrical circuit.
- Some rubber floor mats contain small conductive fibers to decrease electrostatic discharge. Do not use this type of mat to protect yourself from electrical shock.
- Do not work alone under hazardous conditions or near equipment that has hazardous voltages.
- Locate the emergency power-off (EPO) switch, disconnecting switch, or electrical outlet so that you can turn off the power quickly in the event of an electrical accident.
- Disconnect all power before you perform a mechanical inspection, work near power supplies, or remove or install main units.
- Before you work on the equipment, disconnect the power cord. If you cannot disconnect the power cord, have the customer power-off the wall box that supplies power to the equipment and lock the wall box in the off position.
- Never assume that power has been disconnected from a circuit. Check it to make sure that it has been disconnected.
- If you have to work on equipment that has exposed electrical circuits, observe the following precautions:
  - Make sure that another person who is familiar with the power-off controls is near you and is available to turn off the power if necessary.
  - When you work with powered-on electrical equipment, use only one hand. Keep the other hand in your pocket or behind your back to avoid creating a complete circuit that could cause an electrical shock.
  - When you use a tester, set the controls correctly and use the approved probe leads and accessories for that tester.
  - Stand on a suitable rubber mat to insulate you from grounds such as metal floor strips and equipment frames.
- Use extreme care when you measure high voltages.
- To ensure proper grounding of components such as power supplies, pumps, blowers, fans, and motor generators, do not service these components outside of their normal operating locations.

• If an electrical accident occurs, use caution, turn off the power, and send another person to get medical aid.

## Safety statements

These statements provide the caution and danger information that is used in this documentation.

**Important:** Each caution and danger statement in this documentation is labeled with a number. This number is used to cross reference an English-language caution or danger statement with translated versions of the caution or danger statement in the *Safety Information* document.

For example, if a caution statement is labeled Statement 1, translations for that caution statement are in the *Safety Information* document under Statement 1.

Be sure to read all caution and danger statements in this documentation before you perform the procedures. Read any additional safety information that comes with your system or optional device before you install the device.

#### Statement 1





Electrical current from power, telephone, and communication cables is hazardous.

To avoid a shock hazard:

- Do not connect or disconnect any cables or perform installation, maintenance, or reconfiguration of this product during an electrical storm.
- Connect all power cords to a properly wired and grounded electrical outlet.
- Connect to properly wired outlets any equipment that will be attached to this product.
- When possible, use one hand only to connect or disconnect signal cables.
- Never turn on any equipment when there is evidence of fire, water, or structural damage.
- Disconnect the attached power cords, telecommunications systems, networks, and modems before you open the device covers, unless instructed otherwise in the installation and configuration procedures.
- Connect and disconnect cables as described in the following table when installing, moving, or opening covers on this product or attached devices.

#### To Connect:

- 1. Turn everything OFF.
- 2. First, attach all cables to devices.
- 3. Attach signal cables to connectors.
- 4. Attach power cords to outlet.
- 5. Turn device ON.

#### To Disconnect:

- 1. Turn everything OFF.
- 2. First, remove power cords from outlet.
- 3. Remove signal cables from connectors.
- 4. Remove all cables from devices.

#### Statement 2



#### CAUTION:

When replacing the lithium battery, use only Part Number 33F8354 or an equivalent type battery recommended by the manufacturer. If your system has a module containing a lithium battery, replace it only with the same module type made by the same manufacturer. The battery contains lithium and can explode if not properly used, handled, or disposed of. *Do not:* 

- Throw or immerse into water
- Heat to more than 100°C (212°F)
- Repair or disassemble

Dispose of the battery as required by local ordinances or regulations.

Statement 12



CAUTION: The following label indicates a hot surface nearby.



Statement 21



#### CAUTION:

Hazardous energy is present when the blade is connected to the power source. Always replace the blade cover before installing the blade.

#### **UL** regulatory information

This device is for use only with Listed chassis.

## Chapter 1. Introduction

The Lenovo Flex System<sup>™</sup> x240 M5 Compute Node Types 9532 and 2591 is a high-availability, scalable compute node that is optimized to support the next-generation microprocessor technology and is ideally suited for medium and large businesses.

The Lenovo Flex System x240 M5 compute node is supported in the Lenovo Flex System Enterprise Chassis only.

This documentation provides the following information about setting up and troubleshooting the compute node:

- Starting and configuring the compute node
- Installing the operating system
- Diagnosing problems
- Installing, removing, and replacing components

Packaged with the compute node are software CDs that help you configure hardware, install device drivers, and install the operating system.

To download the latest firmware and device drivers, go to <u>http://datacentersupport.lenovo.com/products/</u> <u>servers/flex/x240-m5-compute-node/9532/downloads</u> and select **Lenovo Flex System** and **Lenovo Flex System x240 M5.** 

The compute node comes with a limited warranty. For information about the terms of the warranty and getting service and assistance, see *Warranty Information* document for your compute node. This document is available on the documentation CD that comes with your product.

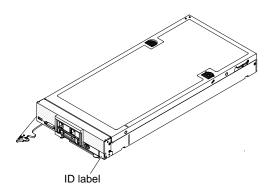
You can obtain up-to-date information about the compute node at <u>http://datacentersupport.lenovo.com</u>.

The compute node might have features that are not described in the documentation that comes with the compute node. The documentation might be updated occasionally to include information about those features. Technical updates might also be available to provide additional information that is not included in the compute node documentation. To obtain the most up-to-date documentation for this product, go to <a href="http://flexsystem.lenovofiles.com/help/index.jsp">http://flexsystem.lenovofiles.com/help/index.jsp</a>.

You can subscribe to information updates that are specific to your compute node at <u>https://support.lenovo.com</u>.

The model number and serial number are on the ID label on the bezel on the front of the compute node, and on a label on the bottom of the compute node that is visible when the compute node is not in the Lenovo Flex System chassis. If the compute node comes with an RFID tag, the RFID tag covers the ID label on the bezel on the front of the compute node, but you can open the RFID tag to see ID label behind it.

Note: The illustrations in this document might differ slightly from your hardware.



The system service label, which is on the cover of the server, provides a quick response (QR) code for mobile access to service information. You can scan the QR code using a QR code reader and scanner with a mobile device and get quick access to the Lenovo® Service Information website. The Lenovo Service Information website provides additional information for parts installation and replacement videos, and error codes for server support.

The following illustration shows the QR code for the Lenovo Flex System x240 M5 compute node.



## **Related documentation**

Use this information to identify and locate related compute node documentation.

This *Installation and Service Guide* contains general information about the compute node, including how to install supported optional devices and how to configure the compute node. It also contains information to help you solve problems yourself and instructions for removing and installing components, and it contains information for service technicians. Documents that are in Portable Document Format (PDF) are on the documentation CD that comes with your product. The following documentation is also available:

Safety Information

This document is in PDF. It contains translated caution and danger statements. Each caution and danger statement that appears in the documentation has a number that you can use to locate the corresponding statement in your language in the *Safety Information* document.

Lenovo Warranty Information

This printed document contains the warranty terms and a pointer to the Lenovo Statement of Limited Warranty.

• Environmental Notices and User Guide

This document is in PDF. It contains translated environmental notices.

• License Agreement for Machine Code

This document provides translated versions of the License Agreement for Machine code for your compute node.

• Licenses and Attributions Document

This document is in PDF. It provides information about the open-source notices.

In addition to the documentation in this library, be sure to review the *Installation and Service Guide* for your Lenovo Flex System chassis for information to help you prepare for system installation and configuration.

To check for updated documentation, go to <u>https://support.lenovo.com</u>.

You can also find documentation that is related to Lenovo Flex System products at <u>http://</u><u>flexsystem.lenovofiles.com/help/index.jsp</u>.

## Brocade documentation

Use this information to identify and locate related Brocade documentation.

The following section introduces Brocade documents that you might find useful for the installation and administration.

- EN4023 User Guide
  - Network OS Layer 2 Switching Configuration Guide <u>http://www.brocade.com/content/html/en/</u> configuration-guide/nos-601a-l2guide/
  - Network OS Command Reference Guide <u>http://www.brocade.com/content/html/en/command-</u> reference-guide/nos-601a-commandref/index.html
  - Network OS Message Reference <u>http://www.brocade.com/content/html/en/message-reference-guides/</u> nos-601a-messageref/wwhelp/ wwhimpl/js/html/wwhelp.htm
- FC5022 User Guide
  - Fabric OS Administrator's Guide <u>http://www.brocade.com/content/html/en/administration-guide/fos-</u> 740-adminguide/
  - Fabric OS Command Reference <u>http://www.brocade.com/content/html/en/command-reference-guide/</u> <u>fos-741-commandref/wwhelp/wwhimpl/js/html/wwhelp.htm</u>
  - Fabric OS Message Reference <u>http://www.brocade.com/content/html/en/message-reference-guides/</u> FOS\_740\_MESSAGES/wwhelp/ wwhimpl/js/html/wwhelp.htm#href=Title.1.2.html
  - Access Gateway Administrator's Guide <u>http://www.brocade.com/content/html/en/administration-guide/</u> <u>fos-740-accessgateway/index.html</u>

## Notices and statements in this document

Use this information to understand the most common documentation notices and statements and how they are used.

The caution and danger statements in this document are also in the multilingual *Safety Information* document, which is on the documentation CD that comes with your product. Each statement is numbered for reference to the corresponding statement in the *Safety Information* document.

The following notices and statements are used in this document:

- Note: These notices provide important tips, guidance, or advice.
- Important: These notices provide information or advice that might help you avoid inconvenient or problem situations.
- Attention: These notices indicate possible damage to programs, devices, or data. An attention notice is placed just before the instruction or situation in which damage might occur.

- **Caution:** These statements indicate situations that can be potentially hazardous to you. A caution statement is placed just before the description of a potentially hazardous procedure step or situation.
- **Danger:** These statements indicate situations that can be potentially lethal or hazardous to you. A danger statement is placed just before the description of a potentially lethal or hazardous procedure step or situation.

## **Features and specifications**

Use this information to view specific information about the compute node, such as compute node hardware features and the dimensions of the compute node.

The following table is a summary of the features and specifications of the Lenovo Flex System x240 M5 compute node.

#### Notes:

- 1. Power, cooling, and chassis systems management are provided by the Lenovo Flex System chassis.
- 2. The operating system in the compute node must provide USB support for the compute node to recognize and use USB media drives and devices. The Lenovo Flex System chassis uses USB for internal communication with these devices.

- 1. Chassis is powered on.
- 2. A3 Derate maximum allowable temperature 1°C/175 m above 950 m.
- 3. The minimum humidity level for class A3 is the higher (more moisture) of the -12 °C dew point and the 8% relative humidity. These intersect at approximately 25°C. Below this intersection (~25C), the dew point (-12 °C) represents the minimum moisture level; above the intersection, relative humidity (8%) is the minimum.

- 4. Moisture levels lower than 0.5°C DP, but not lower -10 °C DP or 8% relative humidity, can be accepted if appropriate control measures are implemented to limit the generation of static electricity on personnel and equipment in the data center. All personnel and mobile furnishings and equipment must be connected to ground via an appropriate static control system. The following items are considered the minimum requirements:
  - a. Conductive materials (conductive flooring, conductive footwear on all personnel who go into the datacenter; all mobile furnishings and equipment will be made of conductive or static dissipative materials).
  - b. During maintenance on any hardware, a properly functioning wrist strap must be used by any personnel who contacts IT equipment.
- 5. 5°C/hr for data centers employing tape drives and 20°C/hr for data centers employing disk drives.
- 6. Chassis is removed from original shipping container and is installed but not in use, for example, during repair, maintenance, or upgrade.
- 7. The equipment acclimation period is 1 hour per 20°C of temperature change from the shipping environment to the operating environment.
- 8. Condensation, but not rain, is acceptable.

## What your compute node offers

Your compute node offers features such as the integrated management module II (IMM2), hard disk drive support, systems-management support, Lenovo X-Architecture®, microprocessor technology, integrated network support, large system-memory capacity, light path diagnostics LEDs, PCI Express, and power throttling.

#### • Features on Demand

If a Features on Demand feature is integrated in the compute node or in an optional device that is installed in the compute node, you can purchase an activation key to activate the feature. For information about Features on Demand, see "Features on Demand" on page 36.

#### • Flexible network support

The compute node has connectors on the system board for optional expansion adapters for adding network communication capabilities to the compute node. You can install up to two I/O expansion adapters for network support. This provides the flexibility to install expansion adapters that support a variety of network communication technologies.

#### • Hard disk drive support

The compute node supports up to two hot-swap hard disk drives. You can implement RAID 0 or RAID 1 for the drives. Additional hard disk drive types and RAID levels are supported when an optional hard disk drive backplane and RAID controller are installed.

#### • LenovoServerGuide Setup and Installation CD

The ServerGuide Setup and Installation CD, which you can download from the web, provides programs to help you set up the compute node and install a Windows operating system. The ServerGuide program detects installed optional hardware devices and provides the correct configuration programs and device drivers. For more information, see "Using the ServerGuide Setup and Installation CD" on page 38.

#### • Lenovo X-Architecture

Lenovo X-Architecture systems combine proven, innovative designs to make your x86-processor-based compute node powerful, scalable, and reliable.

#### • Integrated management module II (IMM2)

The integrated management module II combines systems-management functions, video controller, the remote presence, and blue-screen capture features in a single chip. The IMM2 provides advanced systems-management control, monitoring, and alerting function. If an environmental condition exceeds a threshold or if a system component fails, the IMM2 lights LEDs to help you diagnose the problem, records

the error in the IMM event log, and alerts you to the problem. In addition, IMM2 S3 (Sleep Mode) is supported (see <u>http://systemx.lenovofiles.com/help/topic/com.lenovo.sysx.imm2.doc/NN1ia\_c\_controlserverpower.html</u> and <u>http://systemx.lenovofiles.com/help/topic/com.lenovo.sysx.imm2.doc/aj1camst04.html</u> for more details).

Optionally, the IMM2 also provides a virtual presence capability for remote systems-management capabilities. The IMM2 provides remote systems management through industry-standard interfaces:

- Common Information Model (CIM)
- Intelligent Platform Management Interface (IPMI) version 2.0
- Simple Network Management Protocol (SNMP) version 3.0
- Web browser

For more information, see <u>https://download.lenovo.com/ibmdl/pub/pc/pccbbs/thinkservers/imm\_userguide.pdf</u>.

#### • Large system-memory capacity

The compute node supports up to 1536 GB of system memory. The memory controller provides support for up to 24 industry-standard registered ECC DDR4 low-profile (LP) DIMMs on the system board. For the most current list of supported DIMMs, see <u>http://www.lenovo.com/serverproven/</u>.

The compute node supports up to 768 GB of system memory. The memory controller provides support for up to 24 industry-standard registered ECC DDR4 low-profile (LP) DIMMs on the system board. For the most current list of supported DIMMs, see <a href="http://www.lenovo.com/serverproven/">http://www.lenovo.com/serverproven/</a>.

#### • Light path diagnostics

Light path diagnostics provides light-emitting diodes (LEDs) to help you diagnose problems. For more information, see "Light path diagnostics" on page 63.

#### Mobile access to Lenovo Service Information website

The server provides a quick response (QR) code on the system service label, which is on the cover of the server, that you can scan using a QR code reader and scanner with a mobile device to get quick access to the Lenovo Service Information website. The Lenovo Service Information website provides additional information for parts installation and replacement videos, and error codes for server support. For the Lenovo Flex System x240 M5 compute node QR code, see QR code information in Chapter 1 "Introduction" on page 1 or Chapter 5 "Parts listing, Types 9532 and 2951" on page 51.

#### Microprocessor technology

The compute node supports up to two multi-core Intel Xeon microprocessors. For more information about supported microprocessors, see <u>http://www.lenovo.com/serverproven/</u>.

**Note:** The optional microprocessors that Lenovo supports are limited by the capacity and capability of the compute node. Any microprocessor that you install must have the same specifications as the microprocessor that came with the compute node.

#### PCI Express

PCI Express is a serial interface that is used for chip-to-chip interconnect and expansion adapter interconnect. You can add optional I/O and storage devices.

The optional Flex System PCIe Expansion Node supports additional PCIe adapters and I/O expansion adapters to provide a cost-effective way for you to increase and customize the capabilities of the compute node. For additional information, see .

#### • Power throttling

By enforcing a power policy known as power-domain oversubscription, the Lenovo Flex System chassis can share the power load between two or more power supply modules to ensure sufficient power for each

device in the Lenovo Flex System chassis. This policy is enforced when the initial power is applied to the Lenovo Flex System chassis or when a compute node is inserted into the Lenovo Flex System chassis.

The following settings for this policy are available:

- Basic power management
- Power module redundancy
- Power module redundancy with compute node throttling allowed

You can configure and monitor the power environment by using the Chassis Management Module. For more information, see <u>http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.cmm.doc/dw1kt\_cmm\_cli\_book.pdf</u>.

#### Systems-management support

The compute node IMM2 provides a web interface for remote systems-management support. You can use the interface to view system status and to control systems-management functions and IMM management settings.

The IMM2 communicates with the Lenovo Flex System Chassis Management Module 2 (CMM) and the Lenovo XClarity Administrator application (if installed) or Flex System Manager management software (if installed).

- The CMM is a hot-swap module that provides systems-management functions for all components in an Lenovo Flex System chassis. It controls a serial port for remote connection and a 1 Gbps Ethernet remote-management connection. For more information, see <u>http://flexsystem.lenovofiles.com/help/topic/ com.lenovo.acc.cmm.doc/dw1kt\_cmm\_cli\_book.pdf</u>.
- The Lenovo XClarity Administrator is a virtual appliance that you can use to manage Lenovo Flex System chassis in a secure environment. The Lenovo XClarity Administrator provides a central interface to perform the following functions for all managed endpoints:
  - User management
  - Hardware monitoring and management
  - Configuration management
  - Operating system deployment
  - Firmware management

For more information, see <u>http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html</u>.

 The Flex System Manager management software is a platform-management foundation that streamlines the way you manage physical and virtual systems in a heterogeneous environment. By using industry standards, Flex System Manager management software supports multiple operating systems and virtualization technologies. For more information, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html">http://flexsystem.lenovofiles.com/ help/topic/com.lenovo.acc.8731.doc/product\_page.html</a>.

#### Lenovo XClarity Administrator

Lenovo XClarity Administrator is a centralized resource-management solution that enables administrators to deploy infrastructure faster and with less effort. The solution seamlessly integrates into System x, ThinkServer, and NeXtScale servers, as well as the Flex System converged infrastructure platform.

Lenovo XClarity Administrator provides:

- Automated discovery
- Agent-free hardware management
- Monitoring
- Firmware updates and compliance

- Pattern-based configuration management
- Deployment of operating systems and hypervisors

Administrators are able to find the right information and accomplish critical tasks faster through an uncluttered, dashboard-driven graphical user interface (GUI). Centralizing and automating foundational infrastructure deployment and lifecycle management tasks across large pools of systems frees up administrator time, and makes resources available to end-users faster.

Lenovo XClarity is easily extended into the leading virtualization management platforms from Microsoft and VMware using software plug-ins, called Lenovo XClarity Integrators. The solution improves workload uptime and service-level assurance by dynamically relocating workloads from affected hosts in the cluster during rolling server reboots or firmware updates, or during predicted hardware failures.

For more information about Lenovo XClarity Administrator, see <u>http://flexsystem.lenovofiles.com/help/topic/</u> <u>com.lenovo.lxca.doc/aug\_product\_page.html</u>.

#### Installing Lenovo XClarity Administrator

#### - Installing Lenovo XClarity Administrator for the first time

The initial setup of Lenovo XClarity Administrator involves preparing the network, installing and configuring the Lenovo XClarity Administrator virtual appliance, managing systems, and optionally setting up automatic problem notification.

There are a number of different ways to connect manageable systems to the network and to set up the Lenovo XClarity Administrator to manage those systems based on the network topology that is implemented in your environment. For guidance for installing the Lenovo XClarity Administrator in VMware ESXi-based and Hyper-V environments, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/setup.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/setup.html</a>.

#### - Free 90-day trial

Lenovo XClarity Administrator offers a free, 90-day trial license that enables you to use all available features (including operating-system deployment, firmware maintenance, and configuration management) for a limited time.

After 90 days, you can continue to use Lenovo XClarity Administrator to manage and monitor your hardware for free; however, you must purchase a full-function-enablement license to continue using Lenovo XClarity Administrator to configure your hardware using Configuration Patterns and to deploy operating systems. You can purchase Lenovo XClarity Administrator licenses from your Lenovo seller or business partner.

For information about installing the license, see <u>http://flexsystem.lenovofiles.com/help/topic/</u> <u>com.lenovo.lxca.doc/update\_lxcasw.html</u>.

#### - Updating Lenovo XClarity Administrator

You can download or import Lenovo XClarity Administrator updates and install the updates from the Lenovo XClarity Administrator web interface. For information about updating a Lenovo XClarity Administrator, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/update\_lxcasw.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/update\_lxcasw.html</a>. Ensure that you carefully read the Installation and Setup Instructions in the Invgy\_sw\_lxca\_\*\*\*\_anyos\_ noarch.txt file that is provided in the update package .zip file.

#### Lenovo XClarity Administrator

Lenovo XClarity Administrator is a centralized, resource-management solution that simplifies infrastructure management, speeds responses, and enhances the availability of Lenovo® server systems and solutions. It runs as a virtual appliance that automates discovery, inventory, tracking, monitoring, and provisioning for Lenovo servers, Flex System servers, and RackSwitch switches in a secure environment.

Lenovo XClarity Administrator provides a central interface to perform the following functions for all managed endpoints.

#### • Hardware management

Lenovo XClarity Administrator provides agent-free hardware management. It can automatically discover manageable endpoints, including Flex System chassis and components, System x, NeXtScale, and ThinkServer servers, and RackSwitch switches. Inventory of the discovered endpoints is also gathered, so an at-a-glance view of the managed hardware inventory and status is possible.

#### Hardware monitoring

Lenovo XClarity Administrator provides a centralized view of all events and alerts that are generated from the managed endpoints. When a CMM or IMM detects an issue, an alert or event is passed to the Lenovo XClarity Administrator and is displayed in the events or alerts log. A summary of all alerts and events is visible from the Dashboard and the Status bar. Events and alerts for a specific endpoint are available from the Alerts and Events detail page for that endpoint.

#### • Operating-system deployment

You can use Lenovo XClarity Administrator to manage the repository of operating-system images and deploy operating-system images to managed servers.

#### Configuration management

You can quickly provision and pre-provision all of your servers using a consistent configuration. Configuration settings (such as local storage, I/O adapters, boot settings, firmware, ports, and IMM and UEFI settings) are saved as a server pattern that can be applied to one or more managed servers. When the server patterns are updated, the changes are automatically deployed to the applied servers.

#### • Firmware compliance and updates

Firmware management is simplified by assigning firmware-compliance policies to managed endpoints. When you create and assign a compliance policy to managed endpoints,Lenovo XClarity Administrator monitors changes to the inventory for those endpoints and flags any endpoints that are out of compliance.

#### User management

Lenovo XClarity Administrator provides a centralized authentication server to create and manage user accounts and to manage and authenticate user credentials. The authentication server is created automatically when you start the management server for the first time. The user accounts that you create for Lenovo XClarity Administrator are also used to log in to managed chassis and servers.

#### • Security

If your environment must comply with either NIST SP 800-131A or FIPS 140-2 standards, Lenovo XClarity Administrator can help you achieve a fully compliant environment. It supports self-signed SSL certificates (which are issued by an internal certificate authority) and external SSL certificates (which are issued by a private or commercial CA). Firewalls on chassis and servers can be configured to accept incoming requests from only Lenovo XClarity Administrator.

#### • Service and support

Lenovo XClarity Administrator can be set up to collect and send diagnostic files automatically to your preferred service provider when certain serviceable events occur in Lenovo XClarity Administrator and the managed endpoints. You can choose to send diagnostic files to Lenovo Support using call home or to another service provider using SFTP. You can also manually collect diagnostic files, open a problem record, and send diagnostic files to the Lenovo Support Center.

#### • Task automation using scripts

Lenovo XClarity Administrator can be integrated into external, higher-level management and automation platforms through open REST application programming interfaces (APIs). Using the REST APIs, Lenovo XClarity Administrator can easily integrate with your existing management infrastructure. You can also run

Lenovo XClarity *cmdlets* in a Microsoft PowerShell session to automate certain management functions. The cmdlets use Lenovo XClarity Administrator REST APIs and can automate functions

#### Integration with other management software

Lenovo XClarity Administrator is available stand-alone or as a bundled offering that is known asLenovo XClarity Pro. Lenovo XClarity Pro is composed of the base Administrator product plus two Lenovo XClarity Integrator modules that provide integration into Microsoft Systems Center or VMware vCenter. Together, these tools provide discovery, monitoring, configuration, and management functions to reduce the cost and complexity of routine system administration for System x, NeXtScale, and Flex System endpoints.

More information about Lenovo XClarity Administrator is available at <u>http://flexsystem.lenovofiles.com/help/</u>topic/com.lenovo.lxca.doc/aug\_product\_page.html.

## Reliability, availability, and serviceability features

Three of the most important features in compute node design are reliability, availability, and serviceability (RAS). These RAS features help to ensure the integrity of the data that is stored in the compute node, the availability of the compute node when you need it, and the ease with which you can diagnose and correct problems.

The compute node has the following RAS features:

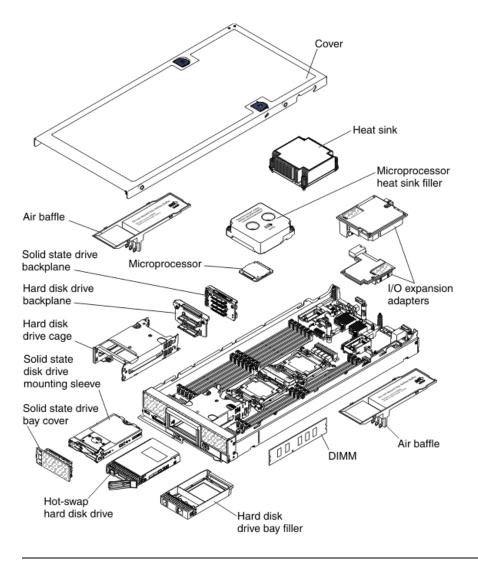
- Advanced Configuration and Power Interface (ACPI)
- Automatic server restart (ASR)
- Built-in diagnostics using DSA Preboot
- Built-in monitoring for temperature, voltage, and hard disk drives
- Customer support center 24 hours per day, 7 days a week<sup>1</sup>
- Customer upgrade of flash ROM-resident code and diagnostics
- Customer-upgradeable Unified Extensible Firmware Interface (UEFI) code and diagnostics
- ECC protected DDR4 DIMMs
- ECC protection on the L2 cache
- Error codes and messages
- Integrated management module II (IMM2) that communicates with the Chassis Management Module to enable remote systems management
- Light path diagnostics
- Memory parity testing
- Microprocessor built-in self-test (BIST) during power-on self-test (POST)
- Microprocessor serial number access
- Processor presence detection
- ROM-resident diagnostics
- System-error logging
- Vital product data (VPD) on memory
- Wake on LAN (WOL) capability when an optional I/O adapter with WOL capability is installed
- Wake on PCI (PME) capability

## Major components of the compute node

Use this information to locate the major components on the compute node.

The following illustration shows the major components of the compute node.

<sup>1.</sup> Service availability varies by country. Response time varies depending on the number and nature of incoming calls.



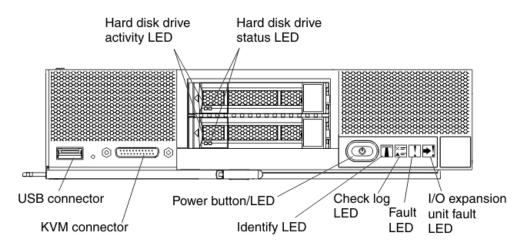
## Power, controls, and indicators

Use this information to view power features, turn on and turn off the compute node, and view the functions of the controls and indicators.

## Compute node controls, connectors, and LEDs

Use this information for details about the controls, connectors, and LEDs.

The following illustration identifies the buttons, connectors, and LEDs on the control panel.



#### Power button/LED (green)

When the compute node is connected to power through the Lenovo Flex System chassis, press this button to turn on or turn off the compute node.

**Note:** The power button works only if local power control is enabled for the compute node. Local power control is enabled and disabled through the CMM **power** command and the CMM web interface.

- For more information about the CMM **power** command, see <u>http://flexsystem.lenovofiles.com/help/</u> topic/com.lenovo.acc.cmm.doc/cli\_command\_power.html.
- From the CMM web interface, select Compute Nodes from the Chassis Management menu. For more information, see <u>"Flex System Chassis Management Module: User's Guide" at http:// pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_user \_guide.html. All fields and options are described in the CMM web interface online help.
  </u>

After the compute node is removed from the chassis, press and hold this button to activate the systemboard LEDs (light path diagnostics). See "Compute node controls, connectors, and LEDs" on page 12 for more information.

This button is also the power LED. This green LED indicates the power status of the compute node:

- Flashing rapidly: The LED flashes rapidly for one of the following reasons:
  - The compute node has been installed in a powered chassis. When you install the compute node, the LED flashes rapidly while the integrated management module II (IMM2) in the compute node is initializing and synchronizing with the Chassis Management Module. The time required for a compute node to initialize varies by system configuration.
  - Power permissions have not been assigned to the compute node through the Chassis Management Module.
  - The Lenovo Flex System chassis does not have enough power to turn on the compute node.
  - The IMM2 in the compute node is not communicating with the Chassis Management Module.

The power LED blink rate slows when the compute node is ready to be turned on.

- Flashing slowly: The compute node is connected to power through the Lenovo Flex System chassis and is ready to be turned on.
- Lit continuously: The compute node is connected to power through the Lenovo Flex System chassis and is turned on.

When the compute node is on, pressing this button causes an orderly shutdown of the compute node so that it can be removed safely from the chassis. This includes shutting down the operating system (if possible) and removing power from the compute node.

If an operating system is running, you might have to press the button for approximately 4 seconds to initiate the shutdown.

**Attention:** Pressing the button for 4 seconds forces the operating system to shut down immediately. Data loss is possible.

#### Identify LED (blue)

The system administrator can remotely light this blue LED to aid in visually locating the compute node. When this LED is lit, the identify LED on the Lenovo Flex System chassis is also lit. The identify LED can be lit and turned off through the CMM **led** command, the CMM web interface and the Lenovo XClarity Administrator application (if installed) or Flex System Manager management software (if installed).

- For more information about the CMM led command, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.cmm.doc/cli\_command\_led.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.cmm.doc/cli\_command\_led.html</a>.
- From the CMM web interface, select Compute Nodes from the Chassis Management menu. For more information, see <u>"Flex System Chassis Management Module: User's Guide" at http://</u> pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_user\_guide.html. All fields and options are described in the CMM web interface online help.
- For more information about the Lenovo XClarity Administrator application, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html</a>.
- For more information about Flex System Manager management software, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html</a>.

#### Check log LED (yellow)

When this yellow LED is lit, it indicates that a condition that causes an event to be logged in the IMM event log has occurred.

The check log LED can be turned off through the CMM **led** command, the CMM web interface and the Lenovo XClarity Administrator application (if installed) or Flex System Manager management software (if installed).

- For more information about the CMM led command, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.cmm.doc/cli\_command\_led.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.cmm.doc/cli\_command\_led.html</a>.
- From the CMM web interface, select Compute Nodes from the Chassis Management menu. For more information, see <u>"Flex System Chassis Management Module: User's Guide" at http://</u> pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_user \_guide.html. All fields and options are described in the CMM web interface online help.
- For more information about the Lenovo XClarity Administrator application, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html</a>.
- For more information about Flex System Manager management software, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html</a>.

#### Notes:

- 1. Alternatively, you can use the **CMM\_INDICATES\_ITE\_ERROR\_N** command to light the check log LED. See the <u>http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.cmm.doc/dw1kt\_cmm\_cli\_book.pdf</u> for more information.
- 2. You can check the CMM event log to determine the source of the condition. For more information, see Viewing event logs without restarting the compute node.

#### Fault LED (yellow)

When this yellow LED is lit, it indicates that a system error has occurred in the compute node. In addition, the fault LED on the chassis system LED panel is lit. You can check the CMM event log and the light path diagnostics LEDs to determine the source of the condition. For more information, see Viewing event logs without restarting the compute node. See "Light path diagnostics LEDs" on page 65 for more information about the LEDs on the compute node.

The fault LED turns off only after the error is corrected.

**Note:** When the fault LED turns off, you should also clear the IMM event log. Use the Setup utility to clear the IMM event log.

#### I/O expansion unit fault LED (yellow)

When this yellow LED is lit, it indicates that an error has occurred in an I/O expansion unit that is installed in the compute node. In addition, the compute node fault LED and the fault LED on the chassis system LED panel are lit. You can check the CMM event log and the light path diagnostics LEDs to determine the source of the condition. For more information, see Viewing event logs without restarting the compute node. See "Light path diagnostics LEDs" on page 65 for more information about the LEDs on the compute node.

The fault LED turns off only after the error is corrected.

**Note:** When the fault LED turns off, you should also clear the IMM event log. Use the Setup utility to clear the IMM event log.

#### Hard disk drive activity LED (green)

Green LEDs are on all hot swap drives. When this green LED is lit, it indicates that there is activity on the associated hard disk or solid state drive.

- When this LED is flashing, it indicates that the drive is actively reading or writing data.
- For SAS and SATA drives, this LED is off when the drive is powered but not active.
- For NVMe (PCIe SSD) solid state drives, this LED is on solid when the drive is powered but not active.

**Note:** The hard disk drive activity LED might be in a different location on the front of the hard disk drive, depending on the drive type that is installed.

#### Hard disk drive status LED (yellow)

The state of this yellow LED indicates an error condition or the RAID status of the associated hard disk or solid state drive:

- When the yellow LED is lit continuously, it indicates that an error has occurred with the associated drive. The LED turns off only after the error is corrected. You can check the CMM event log to determine the source of the condition. For more information, see "Viewing event logs without restarting the compute node" on page 67.
- When the yellow LED flashes slowly, it indicates that the associated drive is being rebuilt.
- When the yellow LED flashes rapidly, it indicates that the associated drive is being located.

**Note:** The hard disk drive status LED might be in a different location on the front of the hard disk drive, depending on the drive type that is installed.

#### **KVM** connector

Connect the console breakout cable to this connector (see "Console breakout cable" on page 16 for more information).

**Attention:** Use only the console breakout cable that comes with the compute node. Attempting to connect other console breakout cable types might damage the console breakout cable and the compute node.

**Note:** It is best practice to connect the console breakout cable to only one compute node at a time in each Lenovo Flex System chassis.

#### **USB** connector

Connect a USB device to this USB 3.0 connector.

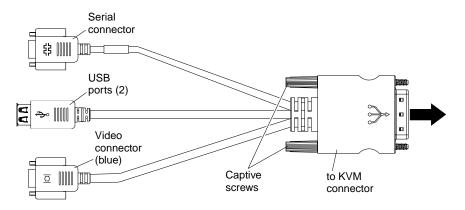
**Note:** It is best practice to connect a USB device to the front of only one compute node at a time in each Lenovo Flex System chassis.

## Console breakout cable

Use this information for details about the console breakout cable.

Use the console breakout cable to connect external I/O devices to the compute node. The console breakout cable connects through the KVM connector (see "Compute node controls, connectors, and LEDs" on page 12). The console breakout cable has connectors for a display device (video), two USB 2.0 connectors for a USB keyboard and mouse, and a serial interface connector.

The following illustration identifies the connectors and components on the console breakout cable.



## Turning on the compute node

Use this information for details about turning on the compute node.

After you connect the compute node to power through the Lenovo Flex System chassis, the compute node can be started in any of the following ways.

**Important:** If an Attention label is on the front panel of the compute node above the power button, read it; then, remove the label and discard it before turning on the compute node.

- You can press the power button on the front of the compute node (see "Compute node controls, connectors, and LEDs" on page 12) to start the compute node. The power button works only if local power control is enabled for the compute node. Local power control is enabled and disabled through the CMM **power** command and the CMM web interface.
  - For more information about the CMM **power** command, see <u>http://flexsystem.lenovofiles.com/help/topic/</u> <u>com.lenovo.acc.cmm.doc/cli\_command\_power.html</u>.
  - From the CMM web interface, select Compute Nodes from the Chassis Management menu in <u>"Flex</u> System Chassis Management Module: User's Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/ information/topic/com.lenovo.acc.cmm.doc/cmm\_user\_guide.html. All fields and options are described in the CMM web interface online help.

#### Notes:

1. Wait until the power LED on the compute node flashes slowly before you press the power button. While the IMM2 in the compute node is initializing and synchronizing with the Chassis Management Module, the power LED flashes rapidly, and the power button on the compute node does not respond. The time required for a compute node to initialize varies by system configuration; however, the power LED blink rate slows when the compute node is ready to be turned on.

- 2. While the compute node is starting, the power LED on the front of the compute node is lit and does not flash. See "Compute node controls, connectors, and LEDs" on page 12 for the power LED states.
- If a power failure occurs, the Lenovo Flex System chassis and the compute node can be configured through the CMM **power** command and the CMM web interface to start automatically when power is restored.
  - For more information about the CMM **power** command, see <u>http://flexsystem.lenovofiles.com/help/topic/</u> <u>com.lenovo.acc.cmm.doc/cli\_command\_power.html</u>.
  - From the CMM web interface, select Compute Nodes from the Chassis Management menu. For more information, see <u>"Flex System Chassis Management Module: User's Guide" at http://</u> pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_user\_guide.html. All fields and options are described in the CMM web interface online help.
- You can turn on the compute node through the CMM **power** command, the CMM web interface and the Lenovo XClarity Administrator application (if installed) or Flex System Manager management software (if installed).
  - For more information about the CMM **power** command, see <u>http://flexsystem.lenovofiles.com/help/topic/</u> <u>com.lenovo.acc.cmm.doc/cli\_command\_power.html</u>.
  - From the CMM web interface, select Compute Nodes from the Chassis Management menu. For more information, see <u>"Flex System Chassis Management Module: User's Guide" at http://</u> pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_user\_guide.html. All fields and options are described in the CMM web interface online help.
  - For more information about the Lenovo XClarity Administrator application, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html</a>.
  - For more information about Flex System Manager management software, see <u>http://</u><u>flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html</u>.
- You can turn on the compute node through the Wake on LAN (WOL) feature when an optional I/O adapter with WOL capability is installed. The compute node must be connected to power (the power LED is flashing slowly) and must be communicating with the Chassis Management Module. The operating system must support the Wake on LAN feature, and the Wake on LAN feature must be enabled through the Chassis Management Module interface.

## Turning off the compute node

Use this information for details about turning off the compute node.

When you turn off the compute node, it is still connected to power through the Lenovo Flex System chassis. The compute node can respond to requests from the IMM2, such as a remote request to turn on the compute node. To remove all power from the compute node, you must remove it from the Lenovo Flex System chassis.

Before you turn off the compute node, shut down the operating system. See the operating-system documentation for information about shutting down the operating system.

The compute node can be turned off in any of the following ways:

- You can press the power button on the compute node (see "Compute node controls, connectors, and LEDs" on page 12). This starts an orderly shutdown of the operating system, if this feature is supported by the operating system.
- If the operating system stops functioning, you can press and hold the power button for more than 4 seconds to turn off the compute node.

**Attention:** Pressing the power button for 4 seconds forces the operating system to shut down immediately. Data loss is possible.

- You can turn off the compute node through the CMM power command, the CMM web interface and the Lenovo XClarity Administrator application (if installed) or Flex System Manager management software (if installed).
  - For more information about the CMM **power** command, see <u>http://flexsystem.lenovofiles.com/help/topic/</u> <u>com.lenovo.acc.cmm.doc/cli\_command\_power.html</u>.
  - From the CMM web interface, select Compute Nodes from the Chassis Management menu in <u>"Flex System Chassis Management Module: User's Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/</u> information/topic/com.lenovo.acc.cmm.doc/cmm\_user \_guide.html. All fields and options are described in the CMM web interface online help.
  - For more information about the Lenovo XClarity Administrator application, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html</a>.
  - For more information about Flex System Manager management software, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html</a>.

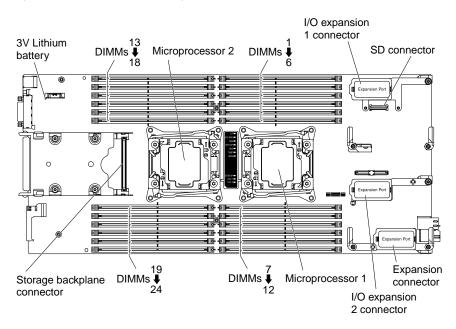
## System-board layouts

Use this information to locate the connectors, LEDs, and switches on the system board.

## System-board connectors

Use this information to locate compute node system-board components and connectors for optional devices.

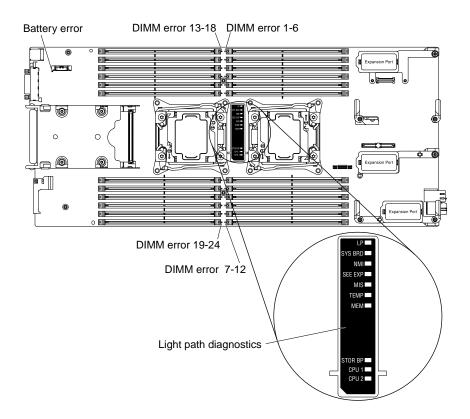
The following illustration shows the system-board components, including connectors for user-installable optional devices, in the compute node.



## System-board LEDs

Use this information to locate the system-board LEDs.

The following illustration shows the locations of the LEDs on the system board.

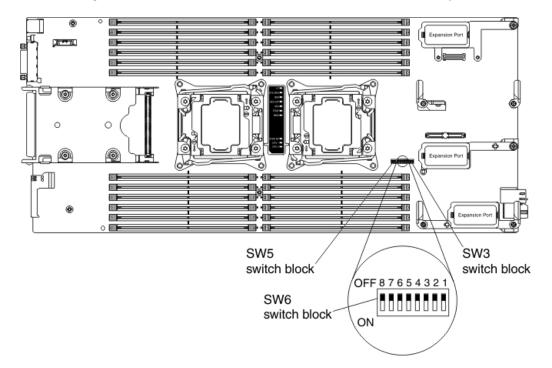


See "Light path diagnostics LEDs" on page 65 for information about how to interpret the system-board LEDs.

## System-board switches

Use this information to locate the system-board switches.

The following illustration shows the location of the switch blocks on the system board.



Note: Any system-board switches or jumpers that are not described in this section are reserved.

Switch and jumper functions are as follows:

- All jumpers on the system board are reserved and should be removed.
- All switches on switch block SW3 are reserved and should be in the Off position.
- All switches on switch block SW5 are reserved. Switches SW5-1, SW5-3, and SW5-4 should be in the Off position. Switch SW5-2 should be in the On position.
- The following table describes the functions of the switches on switch block SW6.

Switch number	Description	Definition
SW6-1	Password override	The default position is Off. Changing this switch to the On position overrides the power-on password.
SW6-2	Trusted Platform Module (TPM) physical presence	The default position is Off. Changing this switch to the On position indicates a physical presence to the TPM.
SW6-3	Real time clock (RTC) reset	The default position is Off. Changing this switch to the On position resets the RTC. A momentary toggle is all that is required. To avoid excessive CMOS battery drain, do not leave this switch in the On position.
SW6-4	Boot backup IMM2	When the switch is in the default Off position, the compute node will boot by using the primary IMM2 firmware. When the switch is in the On position, the compute node will boot by using a backup of the IMM2 firmware.
SW6-5	Boot backup UEFI	The default position is Off. Changing this switch to the On position forces the compute node to boot from the backup UEFI image.
SW6-6	iBMC force update	The default position is Off. Changing this switch to the On position bypasses the operational firmware image and performs a BMC firmware update, if the normal firmware update procedure results in an inoperative BMC. <b>Note:</b> Use this switch only if the normal firmware update procedure fails and the operational firmware image is corrupted. Use of this switch disables normal baseboard management controller operation.
SW6-7	Reserved	The default position is Off.
SW6-8	IMM Trusted Platform Module (TPM) physical presence	The default position is Off. Changing this switch to the On position indicates a physical presence to the IMM TPM.

Table 2. System-board switch block SW6

## Chapter 2. Configuring

Use this information to update the firmware and use the configuration utilities.

## Updating firmware and device drivers

Lenovo periodically makes UEFI code, IMM2 firmware, diagnostic firmware updates, and device-driver updates available for the compute node. Provisioning is the set of actions that you take to update the firmware and device drivers and install the operating system. Several tools are available to help you update the firmware and device drivers in the provisioning process.

**Attention:** Installing the wrong firmware or device-driver update might cause the compute node to malfunction. Before you install a firmware or device-driver update, read any readme and change history files that are provided with the downloaded update. These files contain important information about the update and the procedure for installing the update, including any special procedure for updating from an early firmware or device-driver version to the latest version.

Note: Follow the instructions in the readme file that comes with the firmware update.

#### Lenovo XClarity Administrator

If a Lenovo XClarity Administrator is available, you can download, install, and manage firmware updates for managed endpoints, including chassis, compute nodes, and I/O modules. You can assign compliance policies to the managed endpoints to ensure that firmware on those endpoints remains compliant.

**Note:** Firmware updates can be applied to the hardware only. You cannot update device drivers using the Lenovo XClarity Administrator.

For more information about the Lenovo XClarity Administrator application, see <u>http://</u>flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html.

#### Flex System Manager Update Manager

Flex System Manager Update Manager (if installed) acquires, installs, and manages firmware and device driver updates and monitors your compute nodes to ensure that they remain current. For more information about Flex System Manager Update Manager, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html</a>.

#### UpdateXpress System Packs

UpdateXpress System Packs (UXSP) contain an integration-tested bundle of online, updateable firmware and device drivers for your compute node. The Lenovo ToolsCenter Bootable Media Creator uses UpdateXpress System Packs to update the firmware and device drivers.

Typically, use UpdateXpress System Packs to update firmware and devices drivers for a compute node that has previously been provisioned. For more information about UpdateXpress System Packs, see <a href="https://support.lenovo.com/solutions/HT505070">https://support.lenovo.com/solutions/HT505070</a>.

#### Lenovo ToolsCenter Bootable Media Creator

You can use Lenovo ToolsCenter Bootable Media Creator to create bootable media that is suitable for applying firmware updates and running preboot diagnostics. Using Lenovo ToolsCenter Bootable Media Creator, you can create a single bootable image on supported media (such as CD, DVD, ISO image, USB flash drive, or set of PXE files) that bundles multiple Lenovo Flex System tools and updates from UpdateXpress System Packs, which contain Windows and Linux firmware updates.

Typically, use Lenovo ToolsCenter Bootable Media Creator for the initial setup of a compute node. For more information about the Lenovo Bootable Media Creator, see <u>http://support.lenovo.com/downloads/DS117986</u>.

To provision a compute node with updated firmware and device drivers by using Lenovo ToolsCenter Bootable Media Creator, complete the following steps:

- 1. Download Lenovo ToolsCenter Bootable Media Creator to a computer that is connected over the management network to the Flex System Manager management software (if installed) that is managing the compute node.
- 2. Create the bootable media of firmware and device-driver updates.
- 3. Connect to the Flex System Manager management software that is managing the Lenovo Flex System chassis in which the compute node is installed.
- 4. From Flex System Manager Chassis Manager, select the compute node. In the Actions column, select **Remote Control**.

**Note:** The user ID that you use to log in to Flex System Manager management software must have sufficient user permissions to manage the compute node.

- 5. From the Remote Control session, mount the bootable media (using Remote Media).
- 6. Start the compute node to boot the media and install the updates.

**Important:** To avoid problems and to maintain system performance, always make sure that the UEFI code, IMM2 firmware, and diagnostic firmware levels are consistent in all compute nodes in the Lenovo Flex System chassis.

For additional information about updating firmware and device drivers, see <a href="http://download.lenovo.com/servers/mig/systems/support/system\_x/introducing\_uefi-compliant\_firmware\_on\_ibm\_system\_x.1.2.pdf">http://download.lenovo.com/servers/mig/systems/support/system\_x/introducing\_uefi-compliant\_firmware\_on\_ibm\_system\_x.1.2.pdf</a>, the <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.commontasks.doc/commontasks\_intro.html">http://flexsystem.support/system\_x/introducing\_uefi-compliant\_firmware\_on\_ibm\_system\_x.1.2.pdf</a>, the <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.commontasks.doc/commontasks\_intro.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.commontasks.doc/commontasks\_intro.html</a>, and the *Firmware Update Guides* at <a href="https://support.lenovo.com/solutions/HT116912">https://support.lenovo.com/solutions/HT116912</a> (you might need to register to access this content).

## **Recovering a UEFI image**

Use this information to recover a UEFI image.

The compute node has an advanced recovery feature that automatically switches to a backup UEFI page if the UEFI code in the compute node has become damaged, such as from a power failure during an update. The flash memory of the compute node consists of a primary page and a backup page. If the UEFI code in the primary page is damaged, the integrated management module II detects the error and automatically switches to the backup page to start the compute node. If this happens, a POST message Booted from backup UEFI image is displayed, the check log LED is lit, and an automatic BIOS recovery (ABR) condition occurs. The backup page version might not be the same as the primary page version. You can then recover or restore the original primary page UEFI.

**Note:** Changes are made periodically to the Lenovo website. The actual procedure might vary slightly from what is described in this document.

To recover the UEFI code and restore the compute node operation to the primary page, complete the following steps:

- Step 1. Update the UEFI code (see "Updating firmware and device drivers" on page 21).
- Step 2. Restart the compute node.
- Step 3. At the firmware splash screen, press F3 when prompted to restore to the primary bank. The compute node boots from the primary bank.

**Note:** The prompt to press F3 is displayed only if the compute node boots from the backup page because of an ABR condition.

If the attempt to flash the primary page results in the compute node not booting and the check log LED is not lit, you can manually restore the UEFI code. To manually restore the UEFI code, complete the following steps.

**Note:** If the check log LED is lit, the compute node is booting from the backup image, and changing the boot backup UEFI switch to the On position changes nothing.

- 1. Before you begin, read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. Turn off the compute node (see "Turning off the compute node" on page 17).
- 3. Remove the compute node from the Lenovo Flex System chassis (see "Removing a compute node from a chassis" on page 692).
- 4. Remove the cover (see "Removing the compute node cover" on page 699).
- 5. Locate the boot backup UEFI switch on the switch block and change the switch to the On position (see "System-board switches" on page 19).
- 6. Replace the cover and reinstall the compute node in the Lenovo Flex System chassis (see "Installing the compute node cover" on page 701 and "Installing a compute node in a chassis" on page 693).
- 7. Update the UEFI code (see "Updating firmware and device drivers" on page 21).
- 8. Turn off the compute node and remove it from the Lenovo Flex System chassis (see "Turning off the compute node" on page 17 and "Removing a compute node from a chassis" on page 692).
- 9. Remove the cover of the compute node (see "Removing the compute node cover" on page 699).
- 10. Locate the boot backup UEFI switch on the switch block and change the switch to the Off position (see "System-board switches" on page 19).
- 11. Replace the cover and reinstall the compute node in the Lenovo Flex System chassis (see "Installing the compute node cover" on page 701 and "Installing a compute node in a chassis" on page 693).
- 12. Restart the compute node (see "Turning on the compute node" on page 16).

**Important:** If you are unable to manually restore the UEFI code after several attempts, replace the systemboard assembly (see "Removing and replacing the system-board assembly" on page 761).

## Configuring the compute node

Use this information to configure the compute node.

To perform a typical initial configuration, complete the following steps.

**Note:** To configure a compute node, you configure the IP address of the IMM through the CMM web interface. For more information, see <u>"Flex System Chassis Management Module: User's Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_ui\_config\_chassis\_components.html.</u>

Step 1. Configure the Unified Extensible Firmware Interface (UEFI) firmware for the compute node by using the Setup utility (see "Using the Setup utility" on page 24) or the Advanced Setup Utility (ASU) (see <a href="https://support.lenovo.com/solutions/Invo-asu">https://support.lenovo.com/solutions/Invo-asu</a>).

For more information about firmware configuration options, see <u>http://download.lenovo.com/servers/</u> mig/systems/support/system\_x/introducing\_uefi-compliant\_firmware\_on\_ibm\_system\_x.1.2.pdf.

Step 2. Set the boot protocol by using the Setup utility (see "Setting the boot protocol to boot from legacy devices using the Setup utility" on page 30).

You can temporarily redefine the boot order by using the Boot Selection menu program (see "Using the Boot Selection Menu program" on page 31).

Step 3. Configure the RAID array.

You can install up to two hard disk drives in the compute node and implement RAID level-0 (striping) or RAID level-1 (mirroring) arrays in operating systems that are listed on the ServerProven list at <a href="http://www.lenovo.com/serverproven/">http://www.lenovo.com/serverproven/</a>. For the compute node, you must configure the RAID by using the LSI Configuration Utility program (see "Using the LSI Logic Configuration Utility" on page 35).

If an optional RAID expansion adapter is installed, you can use it to control all the hard disk drives that are installed in the compute node. See the documentation that comes with the expansion adapter for information about how to configure the RAID array.

**Important:** You must create the RAID array *before* you install the operating system on the compute node.

- Step 4. Configure the integrated management module II (IMM2), using the Setup utility or the Advanced Settings Utility (ASU).
- Step 5. Update the compute node firmware (see "Updating firmware and device drivers" on page 21).

#### Notes:

- 1. If you use Flex System Manager Update Manager to update the firmware, you can optionally start the operating-system installation while the firmware updates are installed. It is normal operation for the initial firmware updates to take an unusual length of time.
- 2. If the Chassis Management Module (CMM) and the compute nodes are set up to use DHCP and the CMM loses connectivity to the network, the CMM attempts to acquire a new IP address when network connectivity is restored. The compute nodes will not attempt to acquire an IP address again; they will continue to use their original IP addresses. Therefore, if you experience network problems on compute nodes after connectivity between the CMM and the network is restored, you might have to reset the system-management processor in each of the compute nodes in the chassis (including the management node). See "Connectivity problems" on page 670 for more information.

After you configure the compute node, you can install the operating system and update device drivers (see Chapter 3 "Installing the operating system" on page 37 for more information).

## Using the Setup utility

Use these instructions to start the Setup utility.

You can access the Setup utility remotely through the CMM web interface. From the CMM web interface, select **Launch Compute Node Console**. For more information, see <u>"Flex System Chassis Management</u> <u>Module: User's Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_user\_guide.html</u>. All fields and options are described in the CMM web interface online help.

To start the Setup utility locally, complete the following steps:

- Step 1. If the compute node is turned on, turn off the compute node (see "Turning off the compute node" on page 17).
- Step 2. If necessary, connect a keyboard, monitor, and mouse to the console breakout cable and connect the console breakout cable to the compute node.
- Step 3. Turn on the compute node (see "Turning on the compute node" on page 16).

- Step 4. When the prompt Press <F1> Setup is displayed, press F1. If you have set an administrator password, you must type the administrator password to access the full Setup utility menu. If you do not type the administrator password, a limited Setup utility menu is available.
- Step 5. Follow the instructions on the screen.

The following menu items are on the Setup utility main menu. Depending on the version of the Unified Extensible Firmware Interface (UEFI), some menu items might differ slightly from these descriptions.

#### • System Information

Select this choice to view information about the compute node. When you make changes through other choices in the Setup utility, some of those changes are reflected in the system information; you cannot change settings directly in the system information. This choice is on the full Setup utility menu only.

#### - System Summary

Select this choice to view configuration information, including the ID, speed, and cache size of the microprocessors, machine type and model of the compute node, the serial number, the system Universally Unique Identifier (UUID), and the amount of installed memory.

#### Product Data

Select this choice to view the system-board identifier, the revision level or issue date of the firmware, the integrated management module II and diagnostics code, and the version and date.

This choice is on the full UEFI Setup utility menu only.

#### • System Settings

Select this choice to view or change the compute node component settings.

#### - Adapters and UEFI Drivers

Select this choice to view information about the adapters and UEFI device drivers in the compute node.

**Note:** Before you configure a UEFI-compatible device, update the firmware for your compute node. See "Updating firmware and device drivers" on page 21 for information about how to update the firmware for your compute node.

To configure a UEFI-compatible expansion adapter, complete the following steps:

- 1. Select Please refresh this page first and press Enter.
- 2. Select the device driver that you want to configure, and press Enter.
- 3. When you have finished changing settings, press Esc to exit from the program; select **Save** to save the settings that you have changed.

#### Processors

Select this choice to view or change the microprocessor settings.

#### - Memory

Select this choice to view or change the memory settings.

If a memory error is detected during POST or memory configuration, the compute node automatically disables the failing pair of memory connectors and continues operating with reduced memory. After the problem is corrected, you must manually enable the memory connectors. Select **System Memory Details** and use the arrow keys to highlight the pair of memory connectors that you want to enable; then, set the connectors to **Enable**.

#### - Devices and I/O Ports

Select this choice to view or change assignments for devices and input/output (I/O) ports. You can configure the remote console redirection and enable or disable integrated Ethernet controllers. If you

disable a device, it cannot be configured, and the operating system cannot detect it (disabling a device is equivalent to disconnecting the device).

You can also choose to enable or disable adapter option ROM support. Disabling support can potentially improve the time it takes the compute node to start.

- Power

Select this choice to view or change the power scheme settings.

#### - Operating Modes

Select this choice to determine operational settings, such as operating mode (acoustic, efficiency, or performance) and memory speed.

- Legacy Support

Select this choice to view or set legacy support.

#### Notes:

- Legacy mode is not supported under Microsoft Windows Server 2012 and Microsoft Windows Server 2012 R2
- In the legacy mode, the system has limited ROM space for installed options. Legacy PXE boot supports up to four network interface card (NIC) ports. If more than four NIC ports are occupied, legacy PXE boot will not be attempted on the fifth NIC port and following ports. There are two ways to enable legacy PXE boot on the desired NIC ports:
  - 1. Prioritize the desired NIC connectors by changing the **ROM execution Order**.
    - The path to ROM execution Order: Main menu>System Settings>Devices and I/O Ports>Set Option ROM Execution Order>ROM execution Order
  - 2. Disable the NIC connector's legacy option ROM that you do not use from the **Enable/Disable Adapter Option ROM Support** menu to prioritize the desired NIC port to be functional 4 ports.
    - The path to Enable/Disable Adapter Option ROM Support: Main menu>System Settings>Devices and I/O Ports>Enable/Disable Adapter Option ROM support
- Force Legacy Video on Boot

Select this choice to enable or disable force INT video support, if the operating system does not support UEFI video output standards. The default is **Enable**.

Rehook INT

Select this choice to enable or disable devices from taking control of the boot process. The default is **Disable**.

Legacy Thunk Support

Select this choice to enable or disable UEFI to interact with PCI mass storage devices that are not UEFI compliant. The default is **Enable**.

- Infinite Boot Retry

Select this choice to enable or disable UEFI to infinitely retry the legacy boot order.

Non-Planar PXE

Select this choice to enable or disable non-system-board PXE for legacy mode.

#### System Security

Select this option to view or change the following system security configuration.

#### - Physical Presence Policy Configuration

Select this choice to choose from the following Physical Presence Policy options.

- Enable/Disable: select this option to enable/disable Physical Presence Policy. Default is Enable.
- Asserted: select this option to set Physical Presence for a duration (in minutes) or turn it off. Default is De-asserted.
- Input minutes for assertion: select this option to input a number from 0~100 which stands for the number of minutes Remote Physical Presence is asserted. Physical Presence Policy has to be enabled before this option is available.
- Refresh assert status: select this option to view the current status of asserting.

#### - Rollback Configuration

Select this choice to allow (enable)/forbid(disable) rolling back to an older version of UEFI. Default is **Enable**.

#### - Secure Boot Configuration

Select this choice to choose from the following Secure Boot options.

- Enable/Disable: select this option to enable/disable Secure Boot. Default is Disable.
- Secure Boot Mode: select this option to choose a mode of Secure Boot. Default is Standard Mode.
  - Standard Mode: standard mode of Secure Boot.
  - Custom Secured Boot Mode: the following options are available in this mode:
    - Display Secure Boot Option ROM error: to show a list of devices in the server that are not signed for Secure Boot.
    - PK (platform key) options: to enroll/delete PK
    - KEK (Key Enrollment Key) options: to enroll/delete KEK
    - DB (Signatures Database) options: to enroll/delete DB
    - DBX (Revoked Signatures Database) options: to enroll/delete DBX
- Trusted Platform Module (TPM 1.2/2.0)

The node supports both TPM 1.2 and 2.0. Select this choice to view, change the settings of TPM 1.2/ 2.0, or update TPM firmware from 1.2 to 2.0/2.0 to 1.2.

- Update to TPM 2.0 Complaint (TPM 1.2)/Update to TPM 1.2 Complaint (TPM 2.0): to update TPM from 1.2 to 2.0 or from 2.0 to 1.2. System reboot is required to complete this procedure.

#### CAUTION:

- 1. Due to security consideration, do not boot a legacy OS when upgrading TPM chip firmware from 1.2 to 2.0.
- 2. The maximal number of TPM firmware updates is 128, and TPM version cannot be updated any more after the limit is reached.
- **TPM Firmware Version:** to view current TPM firmware version.
- TPM Physical Presence: to view TPM physical presence.
- **TPM Device State (TPM1.2 only):** to activate/deactivate TPM.
- Refresh TPM status: to get the current status of TPM.
- TPM Force Clear (TPM 1.2)/TPM2 Operation (TPM 2.0): to force clearing TPM data.
- Integrated Management Module

Select this choice to view or change the settings for the integrated management module II (IMM2).

- Commands on USB Interface

Select this choice to specify whether the Ethernet over USB interface is enabled or disabled.

**Note:** This option is primarily for older operating systems that have problems with USB communications device class (CDC) Ethernet interfaces. Disabling this option will cause the following issues:

- Online update packages will not work.
- Updates that use Bootable Media Creator (BoMC) will not work because BoMC uses the LAN over USB interface.
- You must install the IPMI device driver to use the Advanced Settings Utility (ASU) to change the IMM2 or UEFI configuration.
- You cannot set the IMM2 OS loader watchdog.

#### - Network Configuration

Select this choice to view the system-management network interface port, IMM2 MAC address, current IMM2 IP address, and host name; define the static IMM2 IP address, subnet mask, and gateway address; specify whether to use the static IP address or have DHCP assign the IMM2 IP address; save the network changes; and reset the IMM2.

#### - Reset IMM to Defaults

Select this choice to restore the IMM2 to the manufacturing default settings. The IMM2 controller restarts after you restore the settings.

- Reset IMM

Select this choice to restart the IMM2 controller.

#### Recovery

Select this choice to view or change the system recovery parameters.

POST Attempts

Select this choice to define the number of times to attempt POST before invoking the recovery procedures. For more information, see "Nx boot failure" on page 30.

- System Recovery

Select this choice to configure the recovery settings.

#### - POST Watchdog Timer

Select this choice to view or enable the POST watchdog timer.

- POST Watchdog Timer Value

Select this choice to view or set the POST loader watchdog timer value.

- Reboot System on NMI

Select this choice to enable or disable restarting the system whenever a nonmaskable interrupt (NMI) occurs. The default is **Disable**.

• Storage

Select this choice to view or change the storage device settings.

Network

Select this choice to view or change the network device options, such as iSCSI.

• Driver Health

Select this choice to view the health status of the controllers as reported by the device drivers. You can select to perform a repair action on a device driver.

#### • Date and Time

Select this choice to set the date and time for the compute node. The date is set in *month/day/year* format. The time is set in 24-hour format (*hour:minute:second*).

This choice is on the full UEFI Setup utility menu only.

#### • Start Options

Select this choice to view or change the startup sequence. The startup sequence specifies the order in which the compute node checks devices to find a boot record. The compute node starts from the first boot record that it finds. If the compute node has an optional I/O adapter with Wake on LAN (WOL) installed, WOL software, and the operating system supports Wake on LAN functions, you can specify a startup sequence for the Wake on LAN functions. For example, you can define a startup sequence that checks for a disc in the CD or DVD drive, then checks the hard disk drive, and then checks a network adapter.

This choice is on the full UEFI Setup utility menu only.

#### Boot Manager

Select this choice to view, add, delete, or change the device boot priority, boot from a file, select a onetime boot, or reset the boot order to the default setting.

Select **Boot Modes** to view or change the boot settings. You can set the boot mode and choose UEFI operating-system support only, legacy operating-system support only, or UEFI and legacy operating-system support.

**Note:** If you select the legacy-only boot mode (which makes boot time much faster), you will not be able to activate any Features on Demand (FoD) keys.

#### • System Event Logs

Select this choice to access the System Event Manager, where you can view the POST event log and the system-event log.

The POST event log contains the three most recent error codes and messages that were generated during POST.

The system-event log contains POST and system management interrupt (SMI) events and all events that are generated by the baseboard management controller that is embedded in the integrated management module II.

**Important:** If the system-error LED on the front of the compute node is lit but there are no other error indications, clear the system-event log. Also, after you complete a repair or correct an error, clear the system-event log to turn off the system-error LED on the front of the compute node.

#### - POST Event Viewer

Select this choice to enter the POST event viewer to view the UEFI diagnostic codes.

#### - System Event Log

Select this choice to view the system-event log.

#### - Clear System Event Log

Select this choice to clear the system-event log.

• User Security

Select this choice to set, change, or clear passwords.

You can set, change, and delete a power-on password and an administrator password through this selection. If you set a power-on password, you must type the power-on password to complete the system startup and to have access to the Configuration/Setup utility menu.

You can use any combination of up to from 6 to 20 characters (A - Z, a - z, and 0 - 9) for passwords. Keep a record of your password in a secure place.

If you forget the power-on password, you can regain access to the compute node by using the power-on password override switch (see "System-board switches" on page 19).

**Attention:** If you set an administrator password and then forget it, there is no way to change, override, or remove it. You must replace the system board.

You can also regain access to the compute node by removing the CMOS battery and then reinstalling it (see "Removing the CMOS battery" on page 711 and "Installing the CMOS battery" on page 712).

Important: Removing the CMOS battery clears the settings in CMOS memory.

#### Save Settings

Select this choice to save the changes that you have made in the settings.

#### • Restore Settings

Select this choice to cancel the changes that you have made in the settings and restore the previous settings.

#### Load Default Settings

Select this choice to cancel the changes that you have made in the settings and restore the manufacturing default settings.

• Exit Setup

Select this choice to exit from the Setup utility. If you have not saved the changes that you have made in the settings, you are asked whether you want to save the changes or exit without saving them.

### Nx boot failure

Configuration changes, such as added devices or adapter firmware updates, and firmware or application code problems can cause the compute node to fail the power-on self-test (POST).

If the compute node fails POST, it responds in either of the following ways:

- The compute node restarts automatically and attempts POST again.
- The compute node hangs and you must manually restart the compute node for the compute node to attempt POST again.

After a specified number of consecutive attempts (automatic or manual), the Nx boot failure feature causes the compute node to revert to the default UEFI configuration and start the Setup utility, so that you can make the necessary corrections to the configuration and restart the compute node. If the compute node is unable to successfully complete POST with the default configuration, there might be a problem with the system board.

To specify the number of consecutive restart attempts that will trigger the Nx boot failure feature in the Setup utility, click **System Settings**  $\rightarrow$  **Recovery**  $\rightarrow$  **Post Attempts**. The available options are 3, 6, 9 and Disable.

# Setting the boot protocol to boot from legacy devices using the Setup utility

To use the Setup utility to configure the boot protocol to boot from a non-UEFI legacy network device for all PXE boot attempts, complete the following steps:

**Note:** This option disables UEFI ROMs from loading and enables the compute node to boot in legacy mode only.

- Step 1. Connect a keyboard, monitor, and mouse to the console breakout cable and connect the console breakout cable to the compute node.
- Step 2. Turn on the compute node (see "Turning on the compute node" on page 16).
- Step 3. When the prompt Press <F1> Setup is displayed, press F1. If you have set an administrator password, you must type the administrator password to access the full Setup utility menu. If you do not type the administrator password, a limited Setup utility menu is available.
- Step 4. From the Setup utility main menu, select **Boot Manager**.
- Step 5. Select Boot Modes; then select Legacy Only.
- Step 6. Press Esc twice to return to the Boot Manager menu.
- Step 7. Select **Change Boot Order** and move the non-UEFI legacy network device to the top of the boot order.
- Step 8. Press Esc twice to return to the Setup utility main menu.
- Step 9. Select Save Settings and then select Exit Setup.

To use the Setup utility to configure the boot protocol to boot from a non-UEFI legacy network device for the next boot only, complete the following steps:

- Step 1. Connect a keyboard, monitor, and mouse to the console breakout cable and connect the console breakout cable to the compute node.
- Step 2. Turn on the compute node (see "Turning on the compute node" on page 16).
- Step 3. When the prompt Press <F1> Setup is displayed, press F1. If you have set an administrator password, you must type the administrator password to access the full Setup utility menu. If you do not type the administrator password, a limited Setup utility menu is available.
- Step 4. From the Setup utility main menu, select **Boot Manager**.
- Step 5. Select Add Boot Option; then select Generic Boot Option.
- Step 6. Select Legacy Only.
- Step 7. Press Esc three times to return to the Setup utility main menu.
- Step 8. Select **Save Settings** and then select **Exit Setup**.

### Using the Boot Selection Menu program

The Boot Selection Menu program is a built-in, menu-driven configuration utility program that you can use to temporarily redefine the first startup device without changing settings in the Setup utility.

To use the Boot Selection Menu program, complete the following steps:

- Step 1. Connect a keyboard, monitor, and mouse to the console breakout cable, and connect the console breakout cable to the compute node.
- Step 2. Turn on the compute node (see "Turning on the compute node" on page 16).
- Step 3. Press F12 (Select Boot Device). If a bootable USB mass storage device is installed, a submenu item (USB Key/Disk) is displayed.
- Step 4. Use the Up Arrow and Down Arrow keys to select an item from the Boot Selection Menu and press **Enter**.

The next time the compute node starts, it returns to the startup sequence that is set in the Setup utility.

**Note:** If no functioning boot device is available, the system would shut down automatically after 50 failed booting attempts.

# Updating the Universally Unique Identifier (UUID) and DMI/SMBIOS data with vital product data

After the system board is replaced, you must update the Universally Unique Identifier (UUID) and DMI/ SMBIOS data with vital product data (VPD).

You can use the Advanced Settings Utility (ASU) and any of the following access methods:

- Locally (in-band)
  - Through the Keyboard Controller Style (KCS) interface
  - Through the LAN over USB interface
- Remotely over a LAN

You can use the ASU under any supported operating system, or you can use the Bootable Media Creator or a Windows- or Linux-based toolkit to create bootable media that contains the ASU. For information about the ASU and instructions for downloading and unpacking the ASU code, see <a href="https://support.lenovo.com/solutions/lnvo-asu">https://support.lenovo.com/solutions/lnvo-asu</a> and the Advanced Settings Utility User's Guide.

The following sections provide instructions for updating the UUID and DMI/SMBIOS data, using the different methods for accessing the IMM2. The following conventions apply to the command syntax:

- Variables are shown in *italics*.
- Optional parameters are enclosed in brackets ([]). Do not type the brackets in the commands. If you omit an optional parameter, the default is used.
- Although the command syntax is shown in mixed case, the commands are not case sensitive.

#### Locally: Keyboard Controller Style (KCS)

This access method uses the IPMI/KCS interface. The IPMI driver must be installed; with some operating systems, the IPMI driver is installed by default. The ASU provides the corresponding mapping layer.

To update the UUID, in the ASU command-line interface, enter the following command:

asu set SYSTEM\_PROD\_DATA.SysInfoUUID uuid

where *uuid* is the user-assigned hexadecimal value, up to 16 bytes, that identifies the compute node.

To update the DMI/SMBIOS data, complete the following steps:

Step 1. In the ASU command-line interface, enter the following command:

asu set SYSTEM\_PROD\_DATA.SysInfoProdName xxxxyyy

**Important:** The default machine type and model number in the system-board firmware might not be the machine type and model number of the compute node. Make sure that you enter the correct machine type and model number.

where:

хххх

is the 4-digit machine type of the compute node.

ууу

is the 3-digit model number of the compute node.

Step 2. Enter the following command:

asu set SYSTEM\_PROD\_DATA.SysInfoSerialNum zzzzzzz

where zzzzzzz is the 7-character serial number of the compute node.

- Step 3. Enter the following command:

Step 4. Restart the IMM.

Step 5. Restart the server.

#### Locally: LAN over USB

If you omit any optional parameter, the default value is used. If one or more default values are used and the ASU cannot access the IMM2 by using the LAN over USB access method, the ASU automatically uses the KCS access method.

To update the UUID, in the ASU command-line interface, enter the following command:

asu set SYSTEM\_PROD\_DATA.SysInfoUUID uuid [--user userid][--password password]

where:

uuid

is the user-assigned hexadecimal value, up to 16 bytes, that identifies the compute node.

userid

is the IMM2 account name (1 of 12 accounts). The default is USERID.

password

is the IMM2 account password (1 of 12 accounts). The default is PASSW0RD (with a zero, not the letter O).

To update the DMI/SMBIOS data, complete the following steps:

Step 1. In the ASU command-line interface, enter the following command:

asu set SYSTEM\_PROD\_DATA.SysInfoProdName xxxxyyy [--user userid][--password password]

**Important:** The default machine type and model number in the system-board firmware might not be the machine type and model number of the compute node. Make sure that you enter the correct machine type and model number.

where:

xxxx

is the 4-digit machine type of the compute node.

ууу

is the 3-digit model number of the compute node.

userid

is the IMM2 account name (1 of 12 accounts). The default is USERID.

password

is the IMM2 account password (1 of 12 accounts). The default is PASSW0RD (with a zero, not the letter O).

Step 2. Enter the following command:

asu set SYSTEM\_PROD\_DATA.SysInfoSerialNum zzzzzz [--user userid][--password password]

where zzzzzzz is the 7-character serial number of the compute node.

- Step 3. Enter the following command:

Step 4. Restart the IMM.

Step 5. Restart the server.

#### **Remotely over a LAN**

If you omit any optional parameter, the default value is used.

To update the UUID, in the ASU command-line interface, enter the following command:

```
asu set SYSTEM_PROD_DATA.SysInfoUUID uuid --host ipaddress
[--user userid][--password password
```

#### where:

#### uuid

is the user-assigned hexadecimal value, up to 16 bytes, that identifies the compute node.

ipaddress

is the external LAN IP address of the IMM2.

userid

is the IMM2 account name (1 of 12 accounts). The default is USERID.

#### password

is the IMM2 account password (1 of 12 accounts). The default is PASSW0RD (with a zero, not the letter O).

To update the DMI/SMBIOS data, complete the following steps:

Step 1. In the ASU command-line interface, enter the following command:

asu set SYSTEM\_PROD\_DATA.SysInfoProdName xxxxyyy --host ipaddress [--user userid][--password password]

**Important:** The default machine type and model number in the system-board firmware might not be the machine type and model number of the compute node. Make sure that you enter the correct machine type and model number.

where:

хххх

is the 4-digit machine type of the compute node.

ууу

is the 3-digit model number of the compute node.

ipaddress

is the external LAN IP address of the IMM2.

userid

is the IMM2 account name (1 of 12 accounts). The default is USERID.

password

is the IMM2 account password (1 or 12 accounts). The default is PASSW0RD (with a zero, not the letter O).

Step 2. Enter the following command:

asu set SYSTEM\_PROD\_DATA.SysInfoSerialNum zzzzzzz --host ipaddress [--user userid][--password password]

where zzzzzz is the 7-character serial number of the compute node.

Step 3. Enter the following command:

- Step 4. Restart the IMM.
- Step 5. Restart the server.

### **Configuring a RAID array**

Use this information to configure a RAID array.

Configuring a RAID array applies only to a compute node in which two or more hard disk drives are installed.

**Note:** When you configure a RAID array, the hard disk drives must use the same type of interface and must have identical capacity and speed.

RAID level-0 (striping) can be configured on a compute node with a single hard disk drive installed. A minimum of two disk drives must be installed to implement and manage RAID level-1 (mirroring) arrays in operating systems that are listed on the ServerProven list at <u>http://www.lenovo.com/serverproven/</u>. For the compute node, you must configure the RAID by using the LSI Configuration Utility program.

If an optional RAID expansion adapter is installed, you can use it to control all of the hard disk drives that are installed in the compute node. See the documentation that comes with the expansion adapter for information about how to configure the RAID array.

Important: You must create the RAID array before you install the operating system on the compute node.

You can use the LSI Logic Configuration Utility program to configure the hard disk drives and the SAS controller. To start the LSI Logic Configuration Utility, see "Using the LSI Logic Configuration Utility" on page 35.

### Using the LSI Logic Configuration Utility

Use these instructions to start the LSI Logic Configuration Utility.

You can use the LSI Logic Configuration Utility to perform the following tasks:

Set the device boot order

- · Add or remove devices from the boot list
- Manage the RAID configuration

**Note:** The hard disk drives in the RAID configuration must use the same type of interface and must have identical capacity and speed.

To start the LSI Logic Configuration Utility, complete the following steps:

- Step 1. Connect a keyboard, monitor, and mouse to the console breakout cable and connect the console breakout cable to the compute node.
- Step 2. Turn on the compute node (see "Turning on the compute node" on page 16).
- Step 3. When the prompt Press <F1> Setup is displayed, press F1. If you have set an administrator password, you must type the administrator password to access the full Setup utility menu. If you do not type the administrator password, a limited Setup utility menu is available.
- Step 4. From the Setup utility main menu, select **System Settings**; then select **Storage**.
- Step 5. Use the arrow keys to select the controller from the list of adapters; then, press Enter.
- Step 6. Follow the instructions on the screen to change the settings of the selected items; then, press Enter. If you select **SAS Topology** or **Advanced Adapter Properties**, additional screens are displayed.

### **Features on Demand**

This topic provides information about Features on Demand.

Features on Demand provides optional software that is available for the compute node and other Lenovo Flex System resources. Features on Demand provides a convenient way for you to activate optional software through the Flex System Manager management software (if installed), the IMM2 interface, or the CMM web interface. Any Features on Demand software that you ordered with your compute node is preactivated and does not require manual activation.

If you did not order Features on Demand software when you ordered the compute node, you can purchase Features on Demand as you would any other optional software or hardware. Instructions for obtaining an activation key are provided with your purchase of a Features on Demand authorization code.

For information about Features on Demand, see https://fod.lenovo.com/lkms.

#### Important:

- 1. If the compute node is configured in the Setup utility to boot in legacy mode, you must leave UEFI option ROM initialization enabled for devices for which Features on Demand feature keys are installed.
- 2. After you install an activation key for the first time, you might have to restart the compute node for the Feature on Demand to become active. See the documentation that comes with the software for specific activation instructions.
- 3. Make sure that the UEFI code, IMM2 firmware, and all other firmware in the compute node is at the level that supports the Feature on Demand software.

## Chapter 3. Installing the operating system

Use these instructions to install the operating system on the compute node.

To determine which operating systems are supported, see http://www.lenovo.com/serverproven/.

Provisioning is the set of actions that you take to install the operating system. To install the operating system on a compute node, you can use any of the following methods:

#### • Lenovo ServerGuide Setup and Installation CD

Use the *ServerGuide Setup and Installation* CD to install a supported Microsoft Windows operating system only. To provision a compute node with an operating system by using the *ServerGuide Setup and Installation* CD, complete the following steps:

- 1. Download the *ServerGuide Setup and Installation* CD ISO image to a computer that is connected over the management network to the Flex System Manager management software (if installed) that is managing the compute node.
- 2. Connect to the Flex System Manager management software that is managing the Lenovo Flex System chassis in which the compute node is installed.
- 3. From Flex System Manager Chassis Manager, select the compute node. In the Actions column, select **Remote Control**.

**Note:** The user ID that you use to log in to Flex System Manager management software must have sufficient user permissions to manage the compute node.

- 4. From the Remote Control session, mount the ServerGuide Setup and Installation CD bootable media (using Remote Media). When the ServerGuide program prompts you to mount the operating-system image, unmount the ServerGuide Setup and Installation CD and mount the operating-system image. You can also install an ISO image of the operating system from an external or portable storage device, such as a USB device, by using Remote Media. For more information, see <a href="https://www.ibm.com/support/knowledgecenter/en/HW94A/com.ibm.acc.8731.doc/remote\_control\_installing\_an\_operating\_system\_on\_an\_x-architecture\_compute\_node.html">https://www.ibm.com/support/knowledgecenter/en/HW94A/com.ibm.acc.8731.doc/remote\_control\_installing\_an\_operating\_system\_on\_an\_x-architecture\_compute\_node.html</a>.
- 5. Start the compute node to boot the media and install the operating system.

#### Lenovo ToolsCenter Bootable Media Creator

Use Lenovo ToolsCenter Bootable Media Creator to create an Lenovo ServerGuide Setup and Installation CD for deploying Windows operating systems and updates from UpdateXpress System Packs. For more information about the Lenovo Bootable Media Creator, see <u>http://support.lenovo.com/downloads/DS117986</u>.

To provision a compute node with an operating system by using Lenovo ToolsCenter Bootable Media Creator, complete the following steps:

- 1. Download Lenovo ToolsCenter Bootable Media Creator to a computer that is connected over the management network to the Flex System Manager management software (if installed) that is managing the compute node.
- 2. Connect to the Flex System Manager management software that is managing the Lenovo Flex System chassis in which the compute node is installed.
- 3. From Flex System Manager Chassis Manager, select the compute node. In the Actions column, select **Remote Control**.

**Note:** The user ID that you use to log in to Flex System Manager management software must have sufficient user permissions to manage the compute node.

- 4. From the Remote Control session, mount the ServerGuide Setup and Installation CD bootable media (using Remote Media). When the ServerGuide program prompts you to mount the operating-system image, unmount the ServerGuide Setup and Installation CD and mount the operating-system image. You can also install an ISO image of the operating system from an external or portable storage device, such as a USB device, by using Remote Media. For more information, see <a href="https://www.ibm.com/support/knowledgecenter/en/HW94A/com.ibm.acc.8731.doc/remote\_control\_installing\_an\_operating\_system\_on\_an\_x-architecture\_compute\_node.html">https://www.ibm.com/support/knowledgecenter/en/HW94A/com.ibm.acc.8731.doc/remote\_control\_installing\_an\_operating\_system\_on\_an\_x-architecture\_compute\_node.html</a>.
- 5. Start the compute node to boot the media and install the operating system.

#### Lenovo XClarity Administrator

You can use the Lenovo XClarity Administrator (if available) to deploy operating systems and virtual images to multiple compute nodes that do not already have an operating system installed. This function allows you to deploy Red Hat Enterprise Linux (RHEL) including Kernel-based Virtual Machine (KVM), VMware vSphere Hypervisor (ESXi) with Lenovo Customization, and Microsoft Windows 2012. For more information, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html</a>.

#### Flex System Manager management software

You can use Flex System Manager management software (if installed) to deploy operating system and virtual images to multiple compute nodes that do not already have an operating system installed. This function is limited to deploying VMware ESXi and RHEL Kernel-based Virtual Machine (KVM) hypervisors to X-Architecture compute nodes. For more information, see <a href="https://forums.lenovo.com/t5/XClarity-Ideation/Automated-Provisioning-Deployment-of-a-Flex-Compute-Node/idi-p/3638635">https://forums.lenovo.com/t5/XClarity-Ideation/Automated-Provisioning-Deployment-of-a-Flex-Compute-Node/idi-p/3638635</a>.

#### • Lenovo ServerGuide Scripting Toolkit

The ServerGuide Scripting Toolkit is a collection of system-configuration tools and installation scripts that you can use to deploy software to your compute node in a repeatable, predictable manner (see "Using Lenovo ServerGuide Scripting Toolkit" on page 39).

#### · Operating-system installation instructions

Download the latest operating-system installation instructions and install the operating system.

**Important:** The operating system in the compute node must provide USB support for the compute node to recognize and use the keyboard, mouse, and removable-media drives.

### Using the ServerGuide Setup and Installation CD

The ServerGuide Setup and Installation CD provides software setup tools and installation tools that are designed for your compute node. The ServerGuide program detects the compute node model and optional hardware devices that are installed and uses that information during setup to configure the hardware. The ServerGuide program simplifies operating-system installations by providing updated device drivers and, in some cases, installing them automatically.

You can download a free image of the ServerGuide Setup and Installation CD from <u>https://</u>support.lenovo.com/solutions/Invo-guide.

In addition to the *ServerGuide Setup and Installation* CD, you must have your operating-system CD to install the operating system.

### ServerGuide features

This information provides an overview of the ServerGuide features.

Features and functions can vary slightly with different versions of the ServerGuide program. To learn more about the version that you have, start the *ServerGuide Setup and Installation* CD and view the online overview. Not all features are supported on all compute node models.

The ServerGuide program has the following features:

- An easy-to-use interface
- Diskette-free setup, and configuration programs that are based on detected hardware
- Device drivers that are provided for the compute node model and detected hardware
- Operating-system partition size and file-system type that are selectable during setup

The ServerGuide program performs the following tasks:

- Sets system date and time
- Detects installed optional hardware devices and provides updated device drivers for most adapters and devices
- Provides diskette-free installation for supported Windows operating systems
- Includes an online readme file with links to tips for hardware and operating-system installation

### **Typical operating-system installation**

This topic provides information about a typical ServerGuide operating-system installation.

The ServerGuide program can reduce the time it takes to install an operating system. It provides the device drivers that are required for your hardware and for the operating system that you are installing. This section describes a typical ServerGuide operating-system installation.

**Note:** Features and functions can vary slightly with different versions of the ServerGuide program.

- 1. After you have completed the setup process, the operating-system installation program starts. (You will need your operating-system CD to complete the installation.)
- 2. The ServerGuide program stores information about the compute node model, IMM2, hard disk drive controllers, and network adapters. Then, the program checks the CD for newer device drivers. This information is stored and then passed to the operating-system installation program.
- 3. The ServerGuide program presents operating-system partition options that are based on your operatingsystem selection and the installed hard disk drives.
- 4. The ServerGuide program prompts you to insert your operating-system CD and restart the compute node. At this point, the installation program for the operating system takes control to complete the installation.

### Installing the operating system without using ServerGuide

Use this information to install the operating system on the compute node without using ServerGuide.

If you have already configured the compute node hardware and you are not using the ServerGuide program to install your operating system, you can download operating-system installation instructions for the compute node from <a href="https://support.lenovo.com">https://support.lenovo.com</a>.

### Using Lenovo ServerGuide Scripting Toolkit

The ServerGuide Scripting Toolkit is a collection of system-configuration tools and installation scripts that you can use to deploy software to your Lenovo Flex System compute node in a repeatable, predictable manner. When the ServerGuide Scripting Toolkit is used with Lenovo ServerGuide, it provides a total solution for deploying Lenovo Flex System compute nodes in an unattended mode.

For more information about using the Lenovo ServerGuide Scripting Toolkit, see <u>https://</u>datacentersupport.lenovo.com/us/en/ documents/LNVO-CENTER.

## Chapter 4. Accessing the IMM2

Use this information to access the IMM2 remotely using the command-line interface, serial over LAN, or web interface; or locally through the LAN over USB interface.

The integrated management module II (IMM2) is a second generation hardware control device that provides enhanced systems-management processor functions, video controller, and remote presence function in a single chip.

For more information about the IMM2, see <u>https://download.lenovo.com/ibmdl/pub/pc/pccbbs/thinkservers/</u> <u>imm\_userguide.pdf</u>.

### Accessing the IMM2 remotely

This topic provides information about the remote systems-management capabilities.

The integrated management module II (IMM2) provides the following remote systems-management capabilities:

#### Command-line interface

The command-line interface provides direct access to systems-management functions through the IPMI 2.0 protocol. Use the command-line interface to issue commands to control the compute node power, view system information, and identify the compute node. You can also save one or more commands as a text file and run the file as a script.

For more information about the command-line interface, see <u>https://download.lenovo.com/ibmdl/pub/pc/pccbbs/thinkservers/imm\_userguide.pdf</u>.

**Note:** Remote IPMI and SNMP are disabled by default. To get IPMI access so that CMM can manage IPMI/SNMP, create a local IMM user account (separate from the CMM accounts). When this local account is created, the IPMI and SNMP ports are automatically opened.

Serial over LAN

Establish a Serial over LAN (SOL) connection to manage compute nodes from a remote location. You can remotely view and change the UEFI settings, restart the compute node, identify the compute node, and perform other management functions. Any standard Telnet client application can access the SOL connection.

See your operating-system documentation for information about SOL commands that you can enter by using the command-line interface.

• Web interface

Use the secure IMM2 web interface to perform systems-management activities within a web browser. For information about accessing the web interface, see "Logging on to the IMM2 web interface" on page 42.

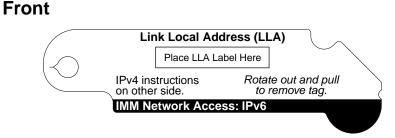
### Viewing the network access tag

Use information on the network access tag to access the IMM2, or by using the Setup utility or systemsmanagement software.

To access the web interface, you need the IP address of the IMM2. You can determine the IP address from information shown on the network access tag. The network access tag is attached to the front of the compute node and can be pulled to remove it from the compute node.

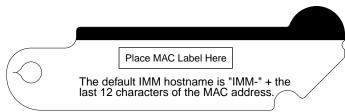
**Note:** If the network access tag is missing from the front of the compute node, you can also locate the MAC address on a label located on the bottom of the compute node.

The front (top) of the network access tag lists the IPv6 link local address (LLA), as shown in the following illustration.



The rear (bottom) of the network access tag lists the first of four MAC addresses assigned to the compute node IMM (used for IPv4 access), as shown in the following illustration.

### Rear



The MAC address is also available through the Setup utility, the CMM **cinstatus** command, and the CMM web interface.

- For more information about the Setup utility, see "Using the Setup utility" on page 24.
- For more information about the CMM cinstatus command, see the <u>"Flex System Chassis Management Module: Command-Line Interface Reference Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cli\_command\_cinstatus.html.</u>
- From the CMM web interface, select **Compute Nodes** from the Chassis Management menu. For more information, see <u>"Flex System Chassis Management Module: User's Guide" at http://pic.dhe.ibm.com/</u> <u>infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_user\_guide.html</u>. All fields and options are described in the CMM web interface online help.

Your network administrator can use the LLA or MAC address to determine the IP address assigned to the IMM by the DHCP server.

### Logging on to the IMM2 web interface

To log on to the IMM2 web interface, complete the following steps.

#### Notes:

- The IMM2 user name and password must be provisioned through the CMM before being set up on the IMM. See the User Accounts page (click Mgt Module Management > User Accounts) in the CMM web interface or the CMM users command (see <u>"Flex System Chassis Management Module: Command-Line Interface Reference Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/information/topic/ com.lenovo.acc.cmm.doc/cli\_command\_ifconfig.html) for information
  </u>
- To use tools such as Advanced Settings Utility (ASU) for out-of-band communications, you must define local user accounts from the IMM web interface. To define local user accounts from the IMM web

interface, click **IMM Management**  $\rightarrow$  **Users**. The local user accounts are valid only for accessing the IMM web interface on this compute node. However, if you back up the IMM configuration, that backup will not contain the local user accounts that were created from the IMM user interface.

- If you are logging on to the IMM2 for the first time after installation, the IMM2 defaults to Dynamic Host Configuration Protocol (DHCP). If a DHCP host is not available, the IMM2 assigns a static IP address between 192.168.70.101 and 192.168.70.114, depending on the bay in which the compute node is installed. You can also assign IP addresses using the CMM:
  - To assign IP addresses using the CMM web interface, click Mgt Module Management → Network → Ethernet.
  - To assign IP addresses using the CMM command-line interface, use the ifconfig command. For more information about the CMM ifconfig command, see <u>"Flex System Chassis Management Module:</u> <u>Command-Line Interface Reference Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/information/topic/ com.lenovo.acc.cmm.doc/cli\_command\_ifconfig.html.</u>
- If the CMM and compute nodes are set to use DHCP, and the CMM loses connectivity to the network, the CMM attempts to acquire a new IP address when network connectivity is restored. The compute nodes will not attempt to acquire an IP address again and the compute node continues to use their existing IP addresses. Therefore, if you experience network problems on compute nodes after connectivity between the CMM and the network has been restored, you might need to reset the system-management processor on each of the compute nodes in the chassis (including Flex System Manager management software, if it is installed).
- The IMM2 logs you out of the web interface if your browser is inactive for the number of minutes that you
  have specified for the timeout period. To modify the timeout period, from the IMM web interface, click
  IMM Management > User > Global Login Settings > General.
  - 1. Open a web browser and in the **Address** or **URL** field, type the IP address or host name of the IMM2 to which you want to connect.
  - 2. On the Login page, type the CMM user name and CMM password. You are then directed to the main page of the IMM2 web interface. If you are using the IMM2 for the first time, you can obtain the user name and password from your system administrator. All login attempts are documented in the IMM event log.

### **IMM2** action descriptions

This topic provides information about the IMM2 functions available from the web interface.

Navigate to the top of the IMM2 window to perform activities with the IMM2. The title bar identifies the user name that is logged in. The title bar allows you to configure **Settings** for the status screen refresh rate and a custom trespass message, and **Log out** of the IMM2 web interface as shown in the following illustration. Beneath the title bar are tabs that allow you to access various IMM2 functions, as listed in Table 3 "IMM2 actions" on page 44.

For more information about the IMM2 actions, see <u>https://download.lenovo.com/ibmdl/pub/pc/pccbbs/</u> <u>thinkservers/imm\_userguide.pdf</u>.



Table 3. IMM2 actions

Tab	Selection	Description
System Status		The System Status page allows you to view system status, active system events, and hardware health information. It provides quick links to the System Information, Server Power Actions, and Remote Control functions of the Server Management tab, and allows you to view an image of the last operating-system-failure screen capture.
Events	Event Log	The Event Log page displays entries that are currently stored in the IMM2 event log. The log includes a text description of system events that are reported, including information about all remote access attempts and configuration changes. All events in the log are time stamped, using the IMM2 date and time settings. Some events also generate alerts, if they are configured to do so. You can sort and filter events in the event log and export them to a text file.
	Event Recipients	The Event Recipients page allows you to manage who will be notified of system events. It allows you to configure each recipient, and manage settings that apply to all event recipients. You can also generate a test event to verify notification feature operation.
Service and Support	Problems	The Problems page allows you to view current unresolved problems that are serviceable by the Support Center. You can also view the status of each problem as related to its resolution.
	Settings	The Settings page configures your server to monitor and report service events.
	Download Service Data	The Download Service Data page creates a compressed file of information that can be used by Lenovo Support to assist you.
Server Management	Server Firmware	The Server Firmware page displays firmware levels and allows you to update the IMM2 firmware, server firmware, and DSA firmware.
(continued on next page)	Remote Control	The Remote Control page allows you to control the server at the operating system level. It provides access to both Remote Disk and Remote Console functionality. You can view and operate the server console from your computer, and you can mount one of your computer disk drives, such as the CD-ROM drive or the diskette drive, on the server. When you have mounted a disk, you can use it to restart the server and to update firmware on the server. The mounted disk appears as a USB disk drive that is attached to the server.
	Server Properties	The Server Properties page provides access to various properties, status conditions, and settings for your server. The following options are available from the Server Properties page:
		<ul> <li>The General Settings tab displays information that identifies the system to operations and support personnel.</li> </ul>
		<ul> <li>The LEDs tab displays the status of all system LEDs. It also allows you to change the state of the location LED.</li> </ul>
		<ul> <li>The Hardware Information tab displays server vital product data (VPD). The IMM2 collects server information, server component information, and network hardware information.</li> </ul>
		• The Environmentals tab displays voltage and temperature information for the server and its components.
		<ul> <li>The Hardware Activity tab displays a history of Field Replaceable Unit (FRU) components that have been added to or removed from the system.</li> </ul>
	Server Power Actions	The Server Power Actions page provides full remote power control over your server with power-on, power-off, and restart actions.

Table 3. IMM2 actions (continued)

Tab	Selection	Description
	Cooling Devices	The Cooling Devices page displays the current speed and status of cooling fans in the server.
	Power Modules	The Power Modules page displays power modules in the system with status and power ratings.
	Local Storage	The Local Storage page displays the physical structure and storage configuration of a storage device.
	Memory	The Memory page displays the memory modules available in the system, along with their status, type, and capacity. You can click on a module name to display an event and additional hardware information for the memory module. If you remove or replace a dual inline memory module (DIMM), the server needs to be powered on at least once after the removal or replacement to display the correct memory information.
Server Management (continued)	Processors	The CPUs page displays the microprocessors in the system, along with their status and clock speed. You can click on a microprocessor name to display events and additional hardware information for the microprocessor.
	Adapters	The Adapters page displays the hardware, firmware, and network adapter information for adapters installed in the server.
	Server Timeouts	The Server Timeouts page allows you to manage server start timeouts to detect and recover from server hang occurrences.
	PXE Network Boot	The PXE Network Boot page allows you to change the host server startup (boot) sequence for the next restart to attempt a Preboot Execution Environment (PXE)/Dynamic Host Configuration Protocol (DHCP) network startup. The host startup sequence will be altered only if the host is not under Privileged Access Protection (PAP).
	Latest OS Failure Screen	The Latest OS Failure Screen page displays a screen image (when available), of the most recent operating system failure on the server. For your IMM2 to capture operating system failure screens, the operating system watchdog must be enabled.
	Power Management	The Server Power Management page allows you to manage power related policies and hardware and contains the history of the amount of power used by the server.
	Scalable Complex	The Scalable Complex page allows you to view and manage a scalable complex.
IMM Management (continued on next page)	IMM Properties	The IMM Properties page provides access to various properties and settings for your IMM2. The following options are available from the IMM Properties page:
		<ul> <li>The Firmware tab provides a link to the Server Firmware section of Server Management. You can also enable automated promotion of the IMM2 backup firmware from this tab.</li> </ul>
		<ul> <li>The IMM Date and Time Settings tab allows you to view and configure date and time settings for the IMM2.</li> </ul>
		<ul> <li>The Serial Port tab configures the IMM2 serial port settings. These settings include the serial port baud rate used by the serial port redirection function and the key sequence to switch between the serial redirection and CLI modes.</li> </ul>

#### Table 3. IMM2 actions (continued)

Tab	Selection	Description
	Users	The Users page configures the IMM2 login profiles and global login settings. You can also view user accounts that are currently logged in to the IMM2. Global login settings include enabling Lightweight Directory Access Protocol (LDAP) server authentication, setting the web inactivity timeout, and customizing the account security settings.
IMM Management (continued)	Network	The Network Protocol Properties page provides access to networking properties, status, and settings for your IMM2:
		• The Ethernet tab manages how the IMM2 communicates using Ethernet.
		<ul> <li>The SNMP tab configures the SNMPv1 and SNMPv3 agents.</li> </ul>
		The DNS tab displays the DNS servers that the IMM2 interacts with.
		<ul> <li>The DDNS tab enables or disables and configures Dynamic DNS for the IMM2.</li> </ul>
		<ul> <li>The SMTP tab configures SMTP server information used for alerts sent via email.</li> </ul>
		<ul> <li>The LDAP tab configures user authentication for use with one or more LDAP servers.</li> </ul>
		<ul> <li>The Telnet tab manages Telnet access to the IMM2.</li> </ul>
		• The USB tab controls the USB interface used for in-band communication between the server and the IMM2. These settings do not affect the USB remote control functions (keyboard, mouse, and mass storage).
		<ul> <li>The Port Assignments tab allows you to change the port numbers used by some services on the IMM2.</li> </ul>
	Security	The IMM Security page provides access to security properties, status, and settings for your IMM2:
		<ul> <li>The HTTPS Server tab allows you to enable or disable the HTTPS server and manage its certificates.</li> </ul>
		<ul> <li>The CIM Over HTTPS tab allows you to enable or disable CIM over HTTPS and manage its certificates.</li> </ul>
		<ul> <li>The LDAP Client tab allows you to enable or disable LDAP security and manage its certificates.</li> </ul>
		<ul> <li>The SSH Server tab allows you to enable or disable the SSH server and manage its certificates.</li> </ul>
		<ul> <li>The Cryptography Management tab allows you to configure the IMM2 firmware to comply with the requirements of SP 800-131A.</li> </ul>
	IMM Configuration	The IMM Configuration page displays a summary of the current IMM2 configuration settings.
	Restart IMM	The Restart IMM page allows you to reset the IMM2.
	Reset IMM to factory defaults	The Reset IMM to factory defaults page allows you to reset the configuration of the IMM2 to the factory defaults. Attention: When you click <b>Reset IMM to factory defaults</b> , all modifications that you have made to the IMM2 are lost.
	Activation Key Management	The Activation Key Management page allows you to manage activation keys for optional IMM2 or server Features on Demand (FoD) features.

### Accessing the IMM2 using the LAN over USB interface

Unlike a baseboard management controller, the IMM2 does not require IPMI device drivers or USB daemons for in-band IMM2 communication. Instead, a LAN over USB interface enables in-band communication to the IMM2; the IMM2 hardware on the system board presents an internal Ethernet interface from the IMM2 to the operating system. LAN over USB is also called the *USB in-band interface* in the IMM2 web interface.

The following table shows the IP addresses for the IMM2 and the host.

Table 4. LAN over USB addresses

IMM2 IP address	IMM2 IP subnet mask	Host address	Host subnet	Host subnet mask	Keyboard Controller Style (KCS) address
169.254.95.118	255.255.255.0	169.254.95.120	169.254.95.0/24	255.255.255.0	0x0CC0

### Potential conflicts with the LAN over USB interface

In some situations, the LAN over USB interface can conflict with certain network configurations, applications, or both. For example, Open MPI attempts to use all the available network interfaces on a server or compute node. Open MPI detects the IMM2 LAN over USB interface and attempts to use it to communicate with other systems in a clustered environment. The LAN over USB interface is an internal interface, so this interface does not work for external communication with other systems in the cluster.

### Resolving conflicts with the IMM2 LAN over USB interface

Use any of the following actions to resolve LAN over USB conflicts with network configurations and applications.

Use one of the following methods to resolve LAN over USB conflicts.

Note: For conflicts with Open MPI, configure the application so that it does not attempt to use this interface.

- Take down the interface (run ifdown under Linux).
- Remove the device driver (run **rmmod** under Linux).
- Disable the LAN over USB interface from the CMM web interface.

**Note:** You cannot update the firmware for a compute node while the LAN over USB interface is disabled. Before updating the firmware, you must re-enable the interface. After updating the firmware, you can disable the interface again.

To disable the LAN over USB interface from the CMM web interface, complete the following steps.

- 1. Log in to the CMM web interface.
- 2. From the CMM web interface homepage click **Chassis Management**  $\rightarrow$  **Compute Nodes**.
- 3. Click the compute node ID.
- 4. Click the **General** tab.
- 5. Uncheck **Enable Ethernet Over USB** to disable the LAN over USB interface.

### Configuring the LAN over USB interface manually

An IMM2 must be configured to use the LAN over USB interface. The firmware update package or Advanced Settings Utility attempts to perform the setup automatically, if needed. If the automatic setup fails or if you prefer to set up the LAN over USB manually, use one of the following processes.

For more information about LAN over USB configuration on different operating systems, see <u>http://</u> <u>download.lenovo.com/servers/mig/systems/support/system\_x/introducing\_uefi-compliant\_firmware\_on\_ibm\_</u> <u>system\_x.1.2.pdf</u>.

#### Installing the LAN over USB Windows device driver

When you install a Windows operating system, there might be an unknown RNDIS device in the Device Manager. Lenovo provides a Windows INF file that identifies this device. The signed version of the INF file is included in all of the Windows versions of the IMM2, UEFI, and DSA update packages. Complete the following steps to install ibm\_rndis\_server\_os.inf.

To install the LAN over USB device driver for Windows, complete the following steps.

**Note:** You only have to perform these steps if the compute node is running a Windows operating system and the ibm\_rndis\_server\_os.inf file has not been previously installed. The file only has to be installed once. It is required by Windows operating systems to detect and use the LAN over USB functionality.

- Step 1. Obtain a Windows version of the server or compute node UEFI code package (see "Updating firmware and device drivers" on page 21 for more information).
- Step 2. Extract the ibm\_rndis\_server\_os.inf and device.cat files from the firmware update package and copy them to the \WINDOWS\inf subdirectory.

**Note:** You can use the -x *path* command-line interface option to extract the files. For more information about this option, see readme file that comes with the update package.

Step 3. (Windows 2003) Install the ibm\_rndis\_server\_os.inf file by right-clicking the file and clicking Install. This generates a PNF file of the same name in \WINDOWS\inf.

(Windows 2008) Click **Computer Management**  $\rightarrow$  **Device Manager** and find the RNDIS Device. Click **Properties**  $\rightarrow$  **Driver**  $\rightarrow$  **Reinstall driver**. Point the server or compute node to the \Windows \inf directory where it can find the ibm\_rndis\_server\_os.inf file and install the device.

- Step 4. Click **Computer Management** → **Device Manager**. Right-click **Network adapters** and select **Scan for hardware changes**. A small pop-up confirms that the Ethernet device is found and installed. The New Hardware Wizard starts automatically.
- Step 5. When you are prompted Can Windows connect to Windows Update to search for software?, select **No**, **not this time**. Click **Next** to continue.
- Step 6. When you are prompted What do you want the wizard to do?, select **Install from a list or specific location (Advanced)**. Click **Next** to continue.
- Step 7. When you are prompted Please choose your search and installation options, select **Don't search. I** will choose the driver to install. Click **Next** to continue.
- Step 8. When you are prompted Select a hardware type, and then click Next, select **Network adapters**. Click **Next** to continue.
- Step 9. When you are prompted with the statement Completing the Found New Hardware Wizard, click **Finish**. A new local area connection appears. If the message This connection has limited or no connectivity is displayed, ignore this message.
- Step 10. Return to the Device Manager. **IBM USB Remote NDIS Network Device** or **Lenovo USB Remote NDIS Network Device** appears under **Network Adapters**.
- Step 11. Use the Setup utility to view or set the IP address. See Table 4 "LAN over USB addresses" on page 47 for information about the IP addresses.
  - a. Connect a keyboard, monitor, and mouse to the console breakout cable and connect the console breakout cable to the compute node.
  - b. Turn on the compute node (see "Turning on the compute node" on page 16).

- c. When the prompt Press <F1> Setup is displayed, press F1. If you have set an administrator password, you must type the administrator password to access the full Setup utility menu. If you do not type the administrator password, a limited Setup utility menu is available.
- d. Select System Settings -> Integrated Management Module -> Network Configuration.
- e. Locate the IP address.
- f. Exit from the Setup utility.

#### Installing the LAN over USB Linux device driver

Versions of Linux since RHEL5 Update 3 and SLES10 Service Pack 2 support the LAN over USB interface by default. This interface is detected and displayed during the installation of these operating systems.

See Table 4 "LAN over USB addresses" on page 47 for information about the IP addresses.

**Note:** Older Linux distributions might not detect the LAN over USB interface, and might require manual configuration. For information about configuring LAN over USB on specific Linux distributions, see <a href="http://download.lenovo.com/servers/mig/systems/support/system\_x/introducing\_uefi-compliant\_firmware\_on\_ibm\_system\_x.1.2.pdf">http://download.lenovo.com/servers/mig/systems/support/system\_x/introducing\_uefi-compliant\_firmware\_on\_ibm\_system\_x.1.2.pdf</a>.

The IMM2 LAN over USB interface requires that the usbnet and cdc\_ether device drivers be loaded. If the drivers have not been installed, use **modprobe** to install them. When these drivers are installed, the IMM2 USB network interface is shown as a network device in the operating system. To discover the name that the operating system has assigned to the IMM2 USB network interface, type: dmesg | grep -i cdc ether

# Chapter 5. Parts listing, Types 9532 and 2951

The following replaceable components are available for the Lenovo Flex System x240 M5 Compute Node Types 9532 and 2951.

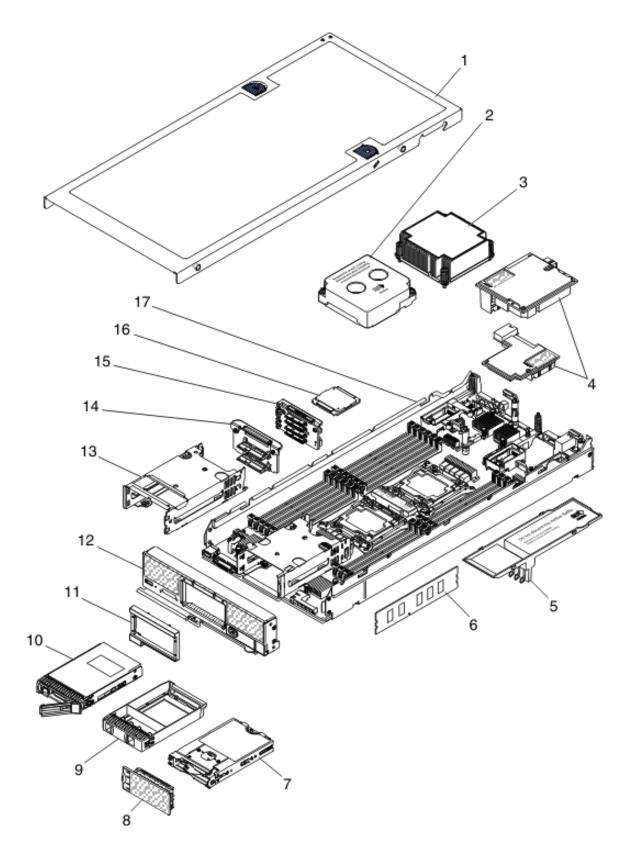
For an updated parts listing on the web, go to https://support.lenovo.com.

The system service label, which is on the cover of the server, provides a quick response (QR) code for mobile access to service information. You can scan the QR code using a QR code reader and scanner with a mobile device and get quick access to the Lenovo® Service Information website. The Lenovo Service Information website provides additional information for parts installation and replacement videos, and error codes for server support.

The following illustration shows the QR code for the Lenovo Flex System x240 M5 compute node.



Note: The illustrations in this document might differ slightly from your hardware.



Replaceable components consist of consumable parts, structural parts, and customer replaceable units (CRUs):

- **Consumable parts:** Purchase and replacement of consumable parts (components such as printer cartridges, that have depletable life) is your responsibility. If Lenovo acquires or installs a consumable part at your request, you will be charged for the installation.
- **Structural parts:** Purchase and replacement of structural parts (components such as the top cover) is your responsibility. If Lenovo acquires or installs a structural part at your request, you will be charged for the installation.
- **Tier 1 customer replaceable unit (CRU):** Replacement of Tier 1 CRUs is your responsibility. If Lenovo installs a Tier 1 CRU at your request without a service contract, you will be charged for the installation.
- **Tier 2 customer replaceable unit:** You may install a Tier 2 CRU yourself or request Lenovo to install it, at no additional charge, under the type of warranty service that is designated for your compute node.

For part listing of PCle and storage expansion node, see <u>http://flexsystem.lenovofiles.com/help/topic/</u> com.lenovo.acc.pme.doc/parts\_listing.html and <u>http://flexsystem.lenovofiles.com/help/topic/</u> com.lenovo.acc.sen.doc/parts\_listing.html.

For information about the terms of the warranty and getting service and assistance, see *Warranty Information* document.

Index	Description	CRU part number (Tier 1)	CRU part number (Tier 2)
3	Heat sink, front microprocessor (use with microprocessors that are less than 135W)		00AE666
3	Heat sink (vapor chamber), front microprocessor (use with microprocessors that are 135W or higher)		00KJ000
3	Heat sink, rear microprocessor (use with microprocessors that are less than 135W)		00AE667
3	Heat sink (vapor chamber), rear microprocessor (use with microprocessors that are 135W or higher)		00KJ001
4	Flex System Broadcom 10Gb NIC Adapter (option)	00AG532	
4	Flex System EN6132 2-Port 40 Gb Ethernet Adapter (option)	90Y3485	
4	Flex System IB6132 2-port FDR Infiniband Adapter (option)	00D8532	
4	Flex System CN4022 2-Port 10 Gb Converged Network Adapter (option)	88Y5922	
4	Flex System CN4052 2-port 10Gb Virtual Fabric Adapter (option)	00JY803	
4	Flex System CN4052R 2-port 10Gb Virtual Fabric Adapter (option)	00AG543 or 01KR606	
4	Flex System CN4054S 4-port 10Gb Virtual Fabric Adapter (option)	00AG593 or 01KR607	
4	Flex System CN4058 8-Port 10 Gb Virtual Fabric Adapter (option)	94Y5163	
4	Flex System CN4054R 10 Gb Virtual Fabric Adapter (option)	00MN789	
4	Flex System 4-port 1 Gb FC Adapter (option)	49Y7902	
4	Flex System FC3172 2-port 8 Gb FC Adapter (option)	69Y1941	
4	Flex System FC5172 2-Port 16 Gb FC Adapter (option)	69Y1945	
4	Flex System 2-port 8 Gb FC Adapter (option)	00MN779	

Table 5. Parts listing, Types 9532 and 2951

Table 5. Parts listing,	Types 9532 and 2951	(continued)
-------------------------	---------------------	-------------

Index	Description	CRU part number (Tier 1)	CRU part number (Tier 2)
4	Flex System FC5024D 4-port 16 Gb FC Adapter (option)	95Y2382	
4	Flex System FC5052 2-Port 16 Gb Network Adapter (option)	00Y5635	
4	Flex System FC5054 4-Port 16 Gb Network Adapter (option)	00Y5637	
4	Flex System FC5022 2-Port 16 Gb FC Adapter (option)	95Y2396	
4	io3 1.25TB Enterprise Mainstream Flash Adapter	00YA801	
4	io3 1.6TB Enterprise Mainstream Flash Adapter	00YA804	
4	io3 3.2TB Enterprise Mainstream Flash Adapter	00YA807	
4	io3 6.4TB Enterprise Mainstream Flash Adapter	00YA810	
4	P3700 1.6TB Enterprise Performance NVMe Flash Adapter	00YA813	
4	P3700 2TB Enterprise Performance NVMe Flash Adapter	00YA816	
4	Flex System CN4054S 4-port 10 GB Virtual Fabric Adapter with FCoE	01CV793	
4	Flex System CN4052S 2-Port 10Gb Virtual Fabric Adapter with FCoE	01CV783	
4	Flex System CN4052S 2-Port 10Gb Virtual Fabric Adapter	00AG543	
4	Flex System EN2024 4-port 1 Gb Ethernet Adapter	49Y7902	
6	Memory, 16 GB (2Rx8, 8 Gbit, 1.2 V) PC4-19200 TruDDR4 2400 MHz, RDIMM	01KN303	
6	Memory, 32 GB (2Rx4, 8 Gbit, 1.2 V) PC4-17000 TruDDR4 2133 MHz, RDIMM	95Y4810	
6	Memory, 32 GB (2Rx4, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz LRDIMM	46W0802	
6	Memory, 64GB (4Rx4, 8 Gbit, 1.2V) PC4-17000 TruDDR4 2133MHz LRDIMM	95Y4814	
6	Memory, 8GB (1Rx4, 1.2V) PC4-19200 CL17 TruDDR4 2400MHz LP RDIMM	46W0823	
6	Memory, 8GB (2Rx8, 1.2V) PC4-19200 CL17 TruDDR4 2400MHz LP RDIMM	46W0827	
6	Memory, 16GB (2Rx4, 1.2V) PC4-19200 CL17 TruDDR4 2400MHz LP RDIMM	46W0831	
6	Memory, 32GB (2Rx4, 1.2V) PC4-19200 CL17 TruDDR4 2400MHz LP RDIMM	46W0835	
6	Memory, 16 GB (2Rx8, 8 Gbit, 1.2V) PC4-19200 TruDDR4 2400 MHz RDIMM	01KN303	
7	Mounting sleeve, 1.8 inch solid-state drive (option)	00AE672	
8	Filler, 1.8 inch solid-state drive (option)	00AE677	
10	Hard-disk drive, 2.5 inch hot-swap SAS 146 GB 15K 6 Gbps (option)	42D0678	
10	Hard-disk drive, 2.5 inch hot-swap SATA 250 GB 6 Gbit NL (option)	81Y9723	
10	Hard-disk drive, 2.5 inch hot-swap SAS 300 GB, 10K 6 Gbps (option)	42D0638	

Index	Description	CRU part number (Tier 1)	CRU part number (Tier 2)
10	Hard-disk drive, 2.5 inch hot-swap SAS 300 GB 15K 6 Gbps (option)	81Y9671	
10	Hard-disk drive, 2.5 inch hot-swap SAS 300 GB 15K 6 Gbps (option)	00AJ082	
10	Hard-disk drive, 2.5 inch hot-swap SAS 500 GB 6 Gbps NL (option)	42D0708	
10	Hard-disk drive, 2.5 inch hot-swap SATA 500 GB 6 Gbit NL (option)	81Y9727	
10	Hard-disk drive, 2.5 inch hot-swap SAS 600 GB, 10K 6 Gbps (option)	49Y2004	
10	Hard-disk drive, 2.5 inch hot-swap SAS 900 GB 10K 6 Gbps (option)	81Y9651	
10	Hard-disk drive, 2.5 inch hot-swap SAS 900 GB G3HS	01GV036	
10	Hard-disk drive, 2.5 inch hot-swap SAS 1 TB 6 Gbps NL (option)	81Y9691	
10	Hard-disk drive, 2.5 inch hot-swap SATA 1 TB 7200 6 Gbit NL (option)	81Y9731	
10	Hard-disk drive, 2.5 inch hot-swap SAS 1 TB 7200 12 Gbit NL (option)	00NA492	
10	Hard-disk drive, 2.5 inch hot-swap SAS 2 TB 7200 12 Gbit NL (option)	00NA497	
10	Hard-disk drive, 2.5 inch SAS 300 GB 15K 12 Gbit (option)	00WG661	
10	Hard-disk drive, 2.5 inch SAS 600 GB 15K 12 Gbit (option)	00WG666	
10	Hard-disk drive, 2.5 inch SAS 300 GB 10K 12 Gbit (option)	00WG686	
10	Hard-disk drive, 2.5 inch SAS 600 GB 10K 12 Gbit (option)	00NA242	
10	Hard-disk drive, 2.5 inch SAS 600 GB 10K 12 Gbit (option)	00WG691	
10	Hard-disk drive, 2.5 inch SAS 900 GB 10K 12 Gbit (option)	00WG696	
10	Hard-disk drive, 2.5 inch SAS 300 GB 10K 6 Gbit (option)	00WG701	
10	Hard-disk drive, 2.5 inch SAS 1.2 TB 10K 12 Gbit (option)	00AJ097	
10	Hard-disk drive, 2.5 inch SAS 2.4 TB	01GV071	
10	Hard-disk drive, 2.5 inch SAS 1.8 TB	00NA272	
10	Solid-state drive, 1.8 inch SATA 50 GB SMART SSD (option)	43W7729	
10	Solid-state drive, 2.5 inch SATA 1.6 TB (option)	00YK228	
10	Solid-state drive, 2.5 inch hot-swap SATA 128 GB SFF Slim SSD (option)	90Y8649	
10	Solid-state drive, 2.5 inch SATA 200 GB SFF Slim SSD (option)	43W7721	
10	Solid-state drive, 1.8 inch SATA 200 GB SMART E-MLC SSD (option)	40K6897	
10	Solid-state drive, 2.5 inch SATA 256 GB SFF Slim SSD (option)	90Y8644	
10	Solid-state drive, 2.5 inch SATA 120 GB (option)	00WG621	
10	Solid-state drive, 2.5 inch SATA 240 GB (option)	00WG626	
10	Solid-state drive, 2.5 inch SATA 420 GB (option)	00WG631	
10	Solid-state drive, 2.5 inch SATA 800 GB (option)	00WG636 or 00AJ167	
10	Solid-state drive, 2.5 inch SAS 300 GB 10K 12 Gbit SED (option)	00WG706	

Index	Description	CRU part number (Tier 1)	CRU part number (Tier 2)
10	Solid-state drive, 2.5 inch SAS 600 GB 10K 12 Gbit SED (option)	00WG711	
10	Solid-state drive, 2.5 inch SAS 900 GB 10K 12 Gbit SED (option)	00WG716	
10	Solid-state drive, 2.5 inch SAS 1.2 TB 10K 12 Gbit SED (option)	00WG721	
10	Solid-state drive, 2.5 inch SATA 200 GB (option)	00YC321	
10	Solid-state drive, 2.5 inch SATA 400 GB (option)	00YC326	
10	Solid-state drive, 2.5 inch SAS 400 GB (option)	01GV712	
10	Solid-state drive, 2.5 inch SATA 800 GB (option)	00YC331	
10	Solid-state drive, 2.5 inch SAS 800 GB (option)	01GV717	
10	Solid-state drive, 2.5 inch SATA 200 GB (option)	00YC351	
10	Solid-state drive, 2.5 inch SATA 120 GB (option)	00YC386	
10	Solid-state drive, 2.5 inch SATA 240 GB (option)	00YC391	
10	Solid-state drive, 2.5 inch SATA 480 GB (option)	00YC396	
10	Solid-state drive, 2.5 inch SATA 960 GB (option)	00YC401 or 01GR847	
10	Solid-state drive, 2.5 inch SAS 1.6 TB (option)	01GV722	
10	Solid-state drive, 2.5 inch 3.84 TB G3HS (option)	01GR787	
10	Solid-state drive, 2.5 inch NVME 400 GB (option)	90Y3228	
10	Solid-state drive, 2.5 inch NVME 800 GB (option)	90Y3231	
10	Solid-state drive, 2.5 inch NVME 960 GB (option)	00YK288	
10	Solid-state drive, 2.5 inch NVME 1.6 TB (option)	90Y3234	
10	Solid-state drive, 2.5 inch NVME 1.92 TB (option)	00YK289	
10	Solid-state drive, 2.5 inch NVME 2 TB (option)	90Y3237	
10	Solid-state drive, 2.5 inch 240 GB SATA G3HS	01GV844	
10	Solid-state drive, 2.5 inch 480 GB SATA G3HS	01GV849	
10	Solid-state drive, 2.5 inch 960 GB SATA G3HS	01GV854	
10	Solid-state drive, 2.5 inch 1.92 TB SATA G3HS	01GV859	
10	Solid-state drive, 2.5 inch 3.84 TB SATA G3HS	01GV864	
10	Solid-state drive, 2.5 inch 480 GB SATA G3HS	01KR497	
10	Solid-state drive, 2.5 inch 960 GB SATA G3HS	01KR502	
10	Solid-state drive, 2.5 inch 1.92 TB SATA G3HS	01KR507	
10	Solid-state drive, 2.5 inch 3.84 TB SATA G3HS	01KR512	
10	Solid-state drive, 2.5 inch 240 GB SATA G3HS	01GT768	
10	Solid-state drive, 2.5 inch 480 GB SATA G3HS	01GT769	

Index	Description	CRU part number (Tier 1)	CRU part number (Tier 2)
10	Solid-state drive, 2.5 inch 960 GB SATA G3HS	01GT770	
10	Solid-state drive, 2.5 inch 480 GB SATA G3HS	01KR446	
10	Solid-state drive, 2.5 inch 960 GB SATA G3HS	01KR447	
10	Solid-state drive, 2.5 inch 1.92 TB SATA G3HS	01KR448	
10	Solid-state drive, 2.5 inch 1.92 TB SATA G3HS	01KR481	
10	Solid-state drive, 2.5 inch 240 GB SATA G3HS	00AJ401	
10	Solid-state drive, 2.5 inch 480 GB SATA G3HS	00AJ406	
10	Solid-state drive, 2.5 inch 3.84 TB SATA G3HS	01KR482	
10	Solid-state drive, 2.5 inch 240 GB SATA G3HS	01KR487	
10	Solid-state drive, 2.5 inch SATA 200 GB MLC G3HS	00AJ157	
10	Solid-state drive, 2.5 inch SATA 400 GB MLC G3HS	00AJ162	
10	Hybrid-disk drive, 2.5 inch SAS 600 GB G3HS 512e	00NA322	
10	Hard-disk drive, 2.5 inch SAS 200 GB G3HS 512e	00NA232	
10	Solid-state drive, 2.5 inch SATA 480 GB G3HS	00YC396	
10	Solid-state drive, 2.5 inch SATA 480 GB G3HS	00YK213	
10	Solid-state drive, 2.5 inch SATA 240 GB G3HS	01GR727	
11	Bezel, front assembly	00KF185	
11	Bezel, 1.8 inch solid-state drive (option)	00KF186	
11	Bezel, solid-state drive (option)	00KJ138	
12	Front Panel	00KJ149	
12	Front Panel	00KJ150	
14	Hard-disk drive backplane	00MV292	
15	Hard-disk drive backplane, 1.8 inch solid-state drive (option)	00MV293	
15	NVMe Enterprise PCIe SSD Enablement Kit for Flex System x240 M5 (option)	00MV294	
16	Intel Xeon Processor E5-2697V3 14C 2.6 GHz 35 MB Cache DDR4 2133 MHz 145W		00AE680
16	Intel Xeon Processor E5-2695V3 14C 2.3 GHz 35 MB Cache DDR4 2133 MHz 120W		00AE681
16	Intel Xeon Processor E5-2690V3 12C 2.6 GHz 30 MB Cache DDR4 2133 MHz 135W		00AE682
16	Intel Xeon Processor E5-2680V3 12C 2.5 GHz 30 MB Cache DDR4 2133 MHz 120W		00AE683
16	Intel Xeon Processor E5-2670V3 12C 2.3 GHz 30 MB Cache DDR4 2133 MHz 120W		00AE684
16	Intel Xeon Processor E5-2660V3 10C 2.6 GHz 25 MB Cache DDR4 2133 MHz 105W		00AE685

Index	Description	CRU part number (Tier 1)	CRU part number (Tier 2)
16	Intel Xeon Processor E5-2650V3 10C 2.3 GHz 25 MB Cache DDR4 2133 MHz 105W		00AE686
16	Intel Xeon Processor E5-2650L V3 12C 1.8 GHz 30 MB Cache DDR4 2133 MHz 65W		00AE687
16	Intel Xeon Processor E5-2640V3 8C 2.6 GHz 20 MB Cache DDR4 1866 MHz 90W		00AE688
16	Intel Xeon Processor E5-2630V3 8C 2.4 GHz 20 MB Cache DDR4 1866 MHz 85W		00AE689
16	Intel Xeon Processor E5-2620V3 6C 2.4 GHz 15 MB Cache DDR4 1866 MHz 85W		00AE690
16	Intel Xeon Processor E5-2630LV3 8C 1.8 GHz 20 MB Cache DDR4 1866 MHz 55W		00AE691
16	Intel Xeon Processor E5-2609V3 6C 1.9 GHz 15 MB Cache DDR4 1600 MHz 85W		00AE692
16	Intel Xeon Processor E5-2603V3 6C 1.6 GHz 15 MB Cache DDR4 1600 MHz 85W		00KC788
16	Intel Xeon Processor E5-2667V3 8C 3.2 GHz 20 MB Cache DDR4 2133 MHz 135W		00AE694
16	Intel Xeon Processor E5-2643V3 6C 3.4 GHz 20 MB Cache DDR4 2133 MHz 135W		00AE695
16	Intel Xeon Processor E5-2637V3 4C 3.5 GHz 15 MB Cache DDR4 2133 MHz 135W		00AE696
16	Intel Xeon Processor E5-2699V3 18C 2.3 GHz 45 MB Cache 2133 MHz 145W		00KJ033
16	Intel Xeon Processor E5-2658V3 12C 2.2 GHz 30 MB Cache 2133 MHz 105W		00KJ034
16	Intel Xeon Processor E5-2698V3 16C 2.3 GHz 40 MB Cache 2133 MHz 135W		00KJ035
16	Intel Xeon Processor E5-2685V3 12C 2.6 GHz 30 MB Cache 2133 MHz 120W		00KJ036
16	Intel Xeon Processor E5-2683V3 14C 2.0 GHz 35 MB Cache 2133 MHz 120W		00KJ037
16	Intel Xeon Processor E5-2623V3 4C 3.0 GHz 10 MB Cache 1866 MHz 75W		00KJ038
16	Intel Xeon Processor E5-2648L V3 12C 1.8 GHz 30 MB Cache 2133 MHz 75W		00KJ039
16	Intel Xeon Processor E5-2628L V3 10C 2.0 GHz 25 MB Cache 1866 MHz 75W		00KJ040
16	Intel Xeon Processor E5-2618L V3 8C 2.3 GHz 20 MB Cache 1866 MHz 75W		00KJ041
16	Intel Xeon Processor E5-2608L V3 6C 2.0 GHz 15 MB Cache 1866 MHz 52W		00KJ042
16	Intel Xeon Processor E5-2698 V4 20C 2.2 GHz 50MB Cache 2400 MHz 135W		00MW771

Index	Description	CRU part number (Tier 1)	CRU part number (Tier 2)
16	Intel Xeon Processor E5-2695 V4 18C 2.1 GHz 45MB Cache 2400 MHz 120W		00MW772
16	Intel Xeon Processor E5-2683 V4 16C 2.1 GHz 40MB Cache 2400 MHz 120W		00MW774
16	Intel Xeon Processor E5-2667 V4 8C 3.2 GHz 25MB Cache 2400 MHz 135W		00MW776
16	Intel Xeon Processor E5-2650L V4 14C 1.7 GHz 35MB Cache 2400 MHz 65W		00MW777
16	Intel Xeon Processor E5-2643 V4 6C 3.4 GHz 20MB Cache 2400 MHz 135W		00MW778
16	Intel Xeon Processor E5-2637 V4 4C 3.5 GHz 15MB Cache 2400 MHz 135W		00MW779
16	Intel Xeon Processor E5-2630L V4 10C 1.8 GHz 25MB Cache 2133 MHz 55W		00MW780
16	Intel Xeon Processor E5-2623 V4 4C 2.6 GHz 10MB Cache 2133 MHz 85W		00MW781
16	Intel Xeon Processor E5-2609 V4 8C 1.7 GHz 20MB Cache 1866 MHz 85W		00MW782
16	Intel Xeon Processor E5-2603 V4 6C 1.7 GHz 15MB Cache 1866 MHz 85W		00MW783
16	Intel Xeon Processor E5-2699 V4 22C 2.2 GHz 55MB Cache 2400 MHz 145W		00YD967
16	Intel Xeon Processor E5-2697 V4 18C 2.3 GHz 45MB Cache 2400 MHz 145W		00YD968
16	Intel Xeon Processor E5-2690 V4 14C 2.6 GHz 35MB Cache 2400 MHz 135W		00YD969
16	Intel Xeon Processor E5-2680 V4 14C 2.4 GHz 35MB Cache 2400 MHz 120W		00YD970
16	Intel Xeon Processor E5-2660 V4 14C 2.0 GHz 35MB Cache 2400 MHz 105W		00YD971
16	Intel Xeon Processor E5-2650 V4 12C 2.2 GHz 30MB Cache 2400 MHz 105W		00YD972
16	Intel Xeon Processor E5-2640 V4 10C 2.4 GHz 25MB Cache 2133 MHz 90W		00YD973
16	Intel Xeon Processor E5-2630 V4 10C 2.2 GHz 25MB Cache 2133 MHz 85W		00YD974
16	Intel Xeon Processor E5-2620 V4 8C 2.1 GHz 20MB Cache 2133 MHz 85W		00YD975
16	Intel Xeon Processor E5-2608L V4 8C 1.6 GHz 20MB Cache 1866 MHz 50W		00YE946
16	Intel Xeon Processor E5-2618L V4 10C 2.2 GHz 25MB Cache 2133 MHz 75W		00YE947
16	Intel Xeon Processor E5-2628L V4 12C 1.9 GHz 30MB Cache 2133 MHz 75W		00YE948
16	Intel Xeon Processor E5-2648L V4 14C 1.8 GHz 35MB Cache 2400 MHz 75W		00YE949
16	Intel Xeon Processor E5-2658L V4 14C 2.3 GHz 35MB Cache 2400 MHz 105W		00YE950
16	Intel Xeon Processor E5-2697A V4 16C 2.6 GHz 40 MB Cache 2400 MHz 145W		00YK831
16	Intel Xeon Processor E5-2699A V4 22C 2.4 GHz 55 MB Cache 2400 MHz 145W		01GT318

Index	Description	CRU part number (Tier 1)	CRU part number (Tier 2)
16	Intel Xeon Processor E5-2699R V4 22C 2.2 GHz 55 MB Cache 2400 MHz 145W		01GT319
	System-board assembly for Lenovo Flex System x240 M5 Compute Node (IBM version)		00MV291
	Tray, system-board		
17	System board		
	Cover (with replacement instructions on label)		
	Filler, front microprocessor socket		
	System-board assembly for Lenovo Flex System x240 M5 Compute Node with embedded 10Gb virtual fabric		00MW807
	Tray, system-board		
17	System board		
	Cover (with replacement instructions on label)		
	Filler, front microprocessor socket		
	Flex System console breakout cable	81Y5287	
	Power Cable	44E4767	
	1M 6Gbps mini-SAS cable	00YE299	
	1M 6Gbps mini-SAS cable	00YE300	
	4M 6Gbps mini-SAS cable	00YE301	
	6M 6Gbps mini-SAS cable	00YE302	
	0.5M 6Gbps mini-SAS cable	00YE303	
	1M 7Gbps mini-SAS cable	00YE304	
	2M 8Gbps mini-SAS cable	00YE305	
	4M 9Gbps mini-SAS cable	00YE306	
	6M 10Gbps mini-SAS cable	00YE307	
	Clw/Tln V2 Flex Cable	00FE025	
	DPI C13 universal power distribution unit	39Y8914	
	SD media adapter for System x (option)	00YK624	
	32 GB SD flash memory card	00ML701	
	32 GB SD flash memory card	00Y9084	
	2 GB USB flash key (including VMWare 5.0) (option)	42D0545	
	4 GB USB flash key	00WH143	
	Adapter-retention assembly	00AE668	
	System Service label kit	00AE669	
	System service label kit	00AE670	

Index	Description	CRU part number (Tier 1)	CRU part number (Tier 2)
	Quebec label kit (option)	00Y2761	
	Microprocessor installation tool		00YJ730
	Alcohol wipes		00MP352
	Thermal grease		41Y9292
	CMOS battery, 3.0 volt (all models)	33F8354	
	RFID label tag assembly (EMEA)	00E6323	
	RFID label tag assembly (US)	74Y8800	
	Light path LED card	81Y5290	
	RID tag (compute node)	00KF228	
	ServeRAID M5100 Series super capacitor	00JY023	
	ServeRAID M5215 SAS/SATA controller	00YJ996	
	Hard-disk drive backplane, ServeRAID controller	00JY707	
	Expansion shelf	44E4783	
	Storage expansion node	90Y9277	
	Cover, storage expansion node	44E4786	

1. Certain configurations of the Lenovo Flex System x240 M5 compute node will operate at acoustic levels significantly greater than typical Flex System levels, and the following noise hazard warning may apply:

**Important:** Government regulations (such as those prescribed by OSHA or European Community Directives) may govern noise level exposure in the workplace and may apply to you and your server installation. The actual sound pressure levels in your installation depend upon a variety of factors, including the number of racks in the installation; the size, materials, and configuration of the room; the noise levels from other equipment; the room ambient temperature, and employees' location in relation to the equipment. Further, compliance with such government regulations also depends upon a variety of additional factors, including the duration of employees' exposure and whether employees wear hearing protection. You should consult with qualified experts in this field to determine whether you are in compliance with the applicable regulations.

2. DIMMs are verified as authentic Lenovo modules (TruDDR4) by the UEFI software. If any non-authentic DIMMs are detected, an informational message appears in the system event log and memory performance might be limited. Non-authentic DIMMs are not covered by your Lenovo warranty.

#### **Consumable and structural parts**

Consumable and structural parts are not covered by the Lenovo Statement of Limited Warranty.

Index	Description	Part number
1	Cover (also order system service label kit 00AE669)	00AE665
2	Filler, front microprocessor socket	81Y5134
5	Air baffle over DIMMs	00JX144
9	Filler, hard disk drive bay	00FW856

Table 6. Consumable and structural parts, Types 9532 and 2951

Table 6. Consumable and structural parts, Types 9532 and 2951 (continued)

Index	Description	Part number
13	Hard-disk drive cage	00AE673
	Chassis bulkhead	94Y4869
	Front bezel assembly	00Y2899
	Miscellaneous parts kit	00AE671
	Lightbox cover	
	Screws	
	Support posts	
	Labels	

To order a consumable or structural part, complete the following steps:

- 1. Go to http://www3.lenovo.com.
- 2. From the Products menu, select Upgrades, accessories & parts.
- 3. Click **Obtain maintenance parts**; then, follow the instructions to order the part from the retail store.

If you need help with your order, call the toll-free number that is listed on the retail parts page, or contact your local Lenovo representative for assistance.

# Chapter 6. Troubleshooting

Use this information to diagnose and correct problems that might occur in your Lenovo Flex System x240 M5 compute node.

The information in this section describes tools and procedures for solving hardware and software problems. If you cannot diagnose and correct a problem by using the information, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.common.nav.doc/troubleshooting.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.common.nav.doc/troubleshooting.html</a> and Appendix A "Getting help and technical assistance" on page 773 for more information.

# **Service bulletins**

Lenovo continually updates the support website with tips and techniques that you can use to solve problems that you might have with the Lenovo Flex System x240 M5 compute node.

To find service bulletins that are available for the Lenovo Flex System x240 M5 compute node, go to <u>https://</u><u>support.lenovo.com</u> and search for the terms 9532 or 2591 and retain.

# **Diagnostic tools**

Use this information to review the diagnostic tools to diagnose and solve hardware-related problems.

# Light path diagnostics

Use this information as an overview of light path diagnostics.

Light path diagnostics is a system of LEDs above the control panel and on various internal components of the compute node. When an error occurs, LEDs can be lit throughout the compute node to help identify the source of the error.

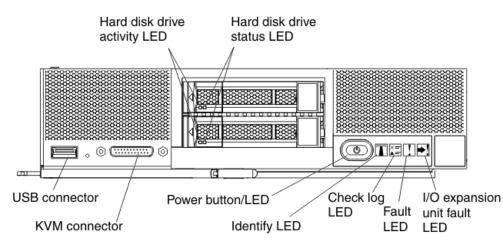
## Viewing the light path diagnostics LEDs

Use this information to locate and identify the light path diagnostics LEDs.

Before you work inside the compute node to view light path diagnostics LEDs, read "Safety" on page iii and "Installation guidelines" on page 691.

If an error occurs, view the light path diagnostics LEDs in the following order:

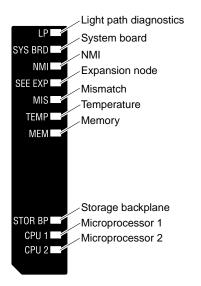
1. Look at the control panel on the front of the compute node.



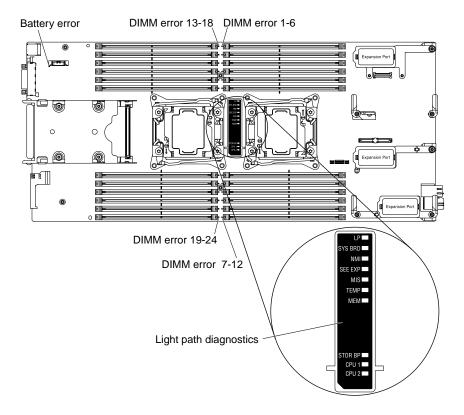
- If the check log LED is lit, it indicates that a condition that causes an event to log in the IMM event log has occurred.
- If the fault LED is lit, it indicates that an error has occurred; view the light path diagnostics panel and LEDs to isolate the failing component.
- If the I/O expansion unit fault LED is lit, it indicates that an error has occurred in an I/O expansion unit that is installed in the compute node; check the IMM or CMM event log and the light path diagnostics LEDs to isolate the failing component.
- 2. To view the light path diagnostics LEDs, select one of the following procedures:
  - You can view the LEDs through the CMM led command, the CMM web interface and the Lenovo XClarity Administrator application (if installed) or Flex System Manager management software (if installed).
    - For more information about the CMM **led** command, see <u>http://flexsystem.lenovofiles.com/help/</u> topic/com.lenovo.acc.cmm.doc/cli\_command\_led.html.
    - From the CMM web interface, select Compute Nodes from the Chassis Management menu. For more information, see <u>"Flex System Chassis Management Module: User's Guide" at http:// pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_user \_guide.html. All fields and options are described in the CMM web interface online help.
      </u>
    - For more information about the Lenovo XClarity Administrator application, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html</a>.
    - For more information about Flex System Manager management software, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html</a>.
  - If you are in the same location as the compute node, you can complete the following steps:
    - a. Remove the compute node from the Lenovo Flex System chassis, (see "Removing a compute node from a chassis" on page 692 for instructions).
    - b. Carefully lay the compute node on a flat, static-protective surface.
    - c. Open the compute node cover (see "Removing the compute node cover" on page 699 for instructions).
    - d. Remove the air baffles installed over the DIMM connectors.
    - e. Press and hold the power button. When you press the power button, LEDs on the light path diagnostics panel and the system board will be lit if there are any hardware-related issues.

**Note:** The power source for light path diagnostics is designed only to last a short time. If you press the power button and the light path diagnostics LED lights, light path diagnostics is charged to light the LEDs.

The following illustration shows the LEDs on the light path diagnostics panel.



The following illustration shows the locations of the light path diagnostics LEDs on the system board.



## Light path diagnostics LEDs

Use this information to diagnose possible errors that are indicated by the light path diagnostics LEDs.

The following table describes the LEDs on the light path diagnostics panel and the light path diagnostics LEDs on the system board. See "Viewing the light path diagnostics LEDs" on page 63 for information about lighting the LEDs.

Note: Additional information about error conditions is in the CMM event log.

Table 7. Light path diagnostics LEDs

Lit light path diagnostics LED	Description
None	The compute node is not sufficiently charged to display the LEDs on the system board.
Battery error	The system CMOS battery is not installed or is not working.
DIMM error x	A memory error occurred.
I/O expansion unit (SEE EXP)	An error has occurred with the I/O expansion unit. Check for error LEDs on the I/O expansion unit.
Light path diagnostics (LP)	The power source for the light path diagnostics LEDs is charged.
Light path diagnostics (LP) only	No errors have occurred.
Memory (MEM)	A memory error has occurred.
Microprocessor x error (CPU X)	The IMM2 lights this LED when a microprocessor has failed or overheated or the start microprocessor (CPU 1) is missing. The fault LED on the front panel is also lit.
Mismatch (MIS)	The microprocessors are mismatched. If the Memory LED is also lit, the DIMMs are mismatched.
NMI	The system board has failed.
SAS backplane error (STOR BP)	A hard disk drive backplane error has occurred.
System board (SYS BRD)	The system board has failed.
Temperature (TEMP)	The system temperature has exceeded a threshold level.

# **IMM** event log

Use this information as an overview of the IMM event log.

The integrated management module II (IMM2) consolidates the system-management processor functionality, video controller, and remote presence capabilities in a single chip on the system board. The IMM2 monitors all components of the compute node and posts events in the IMM event log. In addition, most events are also sent to the Chassis Management Module event log. You can view the IMM event log through the Dynamic System Analysis (DSA) program (as the ASM event log).

To diagnose and resolve IMM error codes, see "IMM messages" on page 203.

**Note:** When viewing event messages in the CMM event log, look for events that might have occurred earlier in the log that are related to the problem you are experiencing. For example, if you see an event for a microprocessor bus error, look for errors relating to memory that could also be the cause of this error.

## Viewing event logs through the Setup utility

You can view the IMM and POST events through the Setup utility.

To view the POST event log or system-event log, complete the following steps:

- Step 1. Connect a keyboard, monitor, and mouse to the console breakout cable and connect the console breakout cable to the compute node.
- Step 2. Turn on the compute node.
- Step 3. When the prompt <F1> Set up is displayed, press F1. If you have set both a power-on password and an administrator password, you must type the administrator password to view the event logs.
- Step 4. Select System Event Logs and use one of the following procedures:

- To view the POST event log, select **POST Event Viewer**.
- To view the system-event log, select System Event Log.

## Viewing event logs without restarting the compute node

If the compute node is not hung, methods are available for you to view one or more event logs without having to restart the compute node.

You can view the Chassis Management Module event log using the Lenovo XClarity Administrator, in the Flex System Manager Chassis Manager, or through the **Event Log** link in Flex System Manager management software (if installed). For more information about the Lenovo XClarity Administrator application, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html</a>. For more information about the Lenovo XClarity Administrator application, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html</a>. For more information about the Lenovo XClarity Administrator application, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.lxca.doc/aug\_product\_page.html</a>. For more information about Flex System Manager management software, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html</a>.

You can also view the Chassis Management Module event log through the **Event Log** link by using the CMM **displaylog** command or the CMM web interface.

- For more information about the CMM **displaylog** command, see <u>"Flex System Chassis Management</u> <u>Module: Command-Line Interface Reference Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/information/</u> topic/com.lenovo.acc.cmm.doc/cli\_command\_displaylog.html.
- From the CMM web interface, select **Event Log** from the Events menu. For more information, see <u>"Flex System Chassis Management Module: User's Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_user\_guide.html</u>. All fields and options are described in the CMM web interface online help.

**Note:** If event IDs are not currently displayed in the Event Log page, you can enable them. To do so, click **Filter Events** and select the **Event ID** check box under **Visible columns**.

If you have installed DSA Portable Edition, you can use it to view the system-event log (as the IPMI event log), the operating-system event logs, or the merged DSA log. You can also use DSA Preboot to view these logs, although you must restart the compute node to use DSA Preboot. To install Portable DSA or DSA Preboot or to download a DSA Preboot CD image, go to <a href="https://support.lenovo.com/solutions/Invo-dsa">https://support.lenovo.com/solutions/Invo-dsa</a>.

If IPMItool is installed in the compute node, you can use it to view the system-event log. Most recent versions of the Linux operating system come with a current version of IPMItool. For information about IPMItool, complete the following steps.

**Note:** Changes are made periodically to the Lenovo website. The actual procedure might vary slightly from what is described in this document.

- 1. Go to https://support.lenovo.com/solutions/serv-dsa.
- 2. Click Linux.
- 3. Click the Linux blueprints tab.
- 4. Click Blueprints for Linux on IBM systems or Blueprints for Linux on Lenovo systems, and then click Using Intelligent Platform Management Interface (IPMI) on IBM Linux platforms or Using Intelligent Platform Management Interface (IPMI) on Lenovo Linux platforms.

The following table describes the methods that you can use to view the event logs, depending on the condition of the compute node. The first two conditions generally do not require that you restart the compute node.

#### Table 8. Methods for viewing event logs

Condition	Action
The compute node is not hung and is connected to a	Use any of the following methods:
network.	<ul> <li>In a web browser, type the IP address of the Chassis Management Module and go to the Event Log page.</li> </ul>
	<ul> <li>Run Portable or Installable DSA to view the event logs or create an output file that you can send to Lenovo Support.</li> </ul>
	Use IPMItool to view the system-event log.
The compute node is not hung and is not connected to a network.	Use IPMItool locally to view the system-event log.
The compute node is hung.	Use any of the following methods:
	<ul> <li>If DSA Preboot is installed, restart the compute node and press F2 to start DSA Preboot and view the event logs.</li> </ul>
	<ul> <li>If DSA Preboot is not installed, insert the DSA Preboot CD and restart the compute node to start DSA Preboot and view the event logs.</li> </ul>
	<ul> <li>Alternatively, you can restart the compute node and press F1 to start the Setup utility and view the POST event log or system-event log. For more information, see "Viewing event logs through the Setup utility" on page 66.</li> </ul>

# Lenovo Dynamic System Analysis

Lenovo Dynamic System Analysis (DSA) collects and analyzes system information to aid in diagnosing compute node problems.

DSA collects the following information about the compute node:

- Drive health information
- · Event logs for ServeRAID controllers and system-management processors
- · Hardware inventory, including PCI and USB information
- · Installed applications and hot fixes
- Kernel modules
- Light path diagnostics status
- Network interfaces and settings
- · Performance data and details about processes that are running
- RAID and controller configuration
- Integrated management module II (IMM2) status and configuration
- System configuration
- Vital product data and firmware information

DSA creates a DSA log, which is a chronologically ordered merge of the system-event log (as the IPMI event log), the IMM event log (as the ASM event log), and the operating-system event logs. You can send the DSA log as a file to a support representative or view the information as a text file or HTML file.

In a multi-node environment, each node has a unique DSA interface. You can view node-specific information, such as error logs, from these unique DSA interfaces.

To obtain DSA code and the *Dynamic System Analysis Installation and User's Guide*, go to <u>https://support.lenovo.com/solutions/Invo-dsa</u>.

## **DSA** editions

Two editions of Dynamic System Analysis are available:

## • DSA Portable

DSA Portable Edition runs within the operating system; you do not have to restart the compute node to run it. It is packaged as a self-extracting file that you download from the Web. When you run the file, it self-extracts to a temporary folder and performs comprehensive collection of hardware and operating-system information. After it runs, it automatically deletes the temporary files and folder and leaves the results of the data collection and diagnostics on the compute node.

If you are able to start the compute node, use DSA Portable.

#### DSA Preboot

DSA Preboot runs outside of the operating system; you must restart the compute node to run it. It is packaged as an ISO image that you download from the Web, or it is provided in flash memory on the compute node. In addition to the capabilities of the other editions of DSA, DSA Preboot includes diagnostic routines that would be disruptive to run within the operating-system environment (such as resetting devices and causing loss of network connectivity). It has a graphical user interface that you can use to specify which diagnostics to run and to view the diagnostic and data collection results.

If you are unable to restart the compute node or if you need comprehensive diagnostics, use DSA Preboot.

DSA Preboot performs the following tasks:

- Collects system information into a compressed XML file that you can send to Lenovo Support
- Provides a bootable image that you can use to run extended hardware tests independent of the operating system or applications
- Collects the version and license information from local VMware ESXi hypervisor software

## **Running DSA Preboot**

Use this information to run DSA Preboot.

To run the DSA Preboot diagnostic programs, complete the following steps:

- 1. If the compute node is turned on, turn off the compute node (see "Turning off the compute node" on page 17).
- 2. If necessary, connect a keyboard, monitor, and mouse to the console breakout cable and connect the console breakout cable to the compute node.
- 3. Turn on the compute node (see "Turning on the compute node" on page 16).
- 4. When the prompt <F2> Diagnostics is displayed, press F2.
- 5. Select **Quit** from the actions available on the Memory Test screen.

**Note:** After you exit the Memory Test screen, you must restart the compute node to access the standalone memory diagnostic environment again.

6. Enter gui to start the DSA graphical user interface, or select **cmd** to display the DSA interactive menu.

7. From the diagnostic programs screen, select the test that you want to run, and follow the instructions on the screen. For additional information, see *Dynamic System Analysis Installation and User's Guide*, which is available at <a href="https://support.lenovo.com/solutions/Invo-dsa">https://support.lenovo.com/solutions/Invo-dsa</a>.

Help for DSA is available. For help about the DSA CLI, enter help in the command line. For help about the DSA user interface, press F1. Pressing F1 within a help panel displays additional online documentation.

## **Diagnostic text messages**

Use this information to understand the diagnostic text messages that are displayed while the tests are running.

A diagnostic text message contains one of the following results:

- Passed: The test was completed without any errors.
- Failed: The test detected an error.
- User Aborted: You stopped the test before it was completed.
- Not Applicable: You attempted to test a device that is not present in the compute node.
- Aborted: The test could not proceed because of the compute node configuration.
- **Warning:** The test could not be run. There was no failure of the hardware that was being tested, but there might be a hardware failure elsewhere, or another problem prevented the test from running; for example, there might be a configuration problem, or the hardware might be missing or is not being recognized.

The result is followed by an error code or other additional information about the error.

## Viewing the test results

Use this information to view the test results.

You can use one of the following methods to access the test log when the tests are completed:

- From the DSA command line, issue the DSA CLI View command or select the **Diagnostic Event Log** option from the DSA graphical user interface (GUI).
- From the DSA interactive menu, select the getextendedresults option.
- From the DSA interactive menu, select the **View** option to view all of the collected results and error log data.
- In the DSA GUI, select **DSA Error Log** from the System Information page.

You can send the DSA error log file to Lenovo Support to aid in diagnosing the compute node problems, or you can use the DSA CLI copy command to copy the log to an external USB device.

# **DSA diagnostic test results**

After running the DSA diagnostic tests, use this information to resolve any issues that were found.

## **DSA CPU stress test results**

The following messages can result when you run the CPU stress test.

## Test results for the DSA CPU stress test

The following messages can result when you run the DSA CPU stress test.

#### 089-000-000 : CPU Stress Test Passed

CPU Stress Test Passed.

## Recoverable

No

## Severity

Event

# Serviceable

No

## Automatically notify support

No

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 089-801-000 : CPU Stress Test Aborted

CPU Stress Test Aborted. Internal Program Error.

Recoverable

No

Severity Warning

Serviceable

Yes

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Turn off and restart the system.
- 2. Make sure that the DSA Diagnostic code is at the latest level.
- 3. Run the test again.
- 4. Check system firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component. The latest level firmware for this component can be found in reference to this system type at the IBM Support website: https://www.ibm.com/support/entry/portal/docdisplay?Indocid=MIGR-4JTS2T.
- 5. Run the test again.
- 6. If the system has stopped responding, turn off and restart the system and then run the test again.
- 7. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 089-802-000 : CPU Stress Test Aborted

CPU Stress Test Aborted. System resource unavailability error.

Recoverable No

Severity Warning

#### Serviceable

Yes

#### Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Turn off and restart the system.
- 2. Make sure that the DSA Diagnostic code is at the latest level.
- 3. Run the test again.
- 4. Check system firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 5. Run the test again.
- 6. If the system has stopped responding, turn off and restart the system and then run the test again.
- 7. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 089-803-000 : CPU Stress Test Aborted

CPU Stress Test Aborted. Memory size is insufficient to run the test. At least 1GB is required.

## Recoverable

No

Severity Warning

Serviceable

Yes

#### Automatically notify support

No

#### **Related links**

- Lenovo Support website

- Latest level of DSA
- 089-804-000 : CPU Stress Test Aborted

CPU Stress Test Aborted. User pressed Ctrl-C.

#### Recoverable

No

Severity Warning

Serviceable Yes

Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### 089-901-000 : CPU Stress Test Failed

CPU Stress Test Failed.

Recoverable

No

Severity Error

Serviceable Yes

Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. If the system has stopped responding, turn off and restart the system and then run the test again.
- 2. Make sure that the DSA Diagnostic code is at the latest level.
- 3. Run the test again.
- 4. Check system firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 5. Run the test again.
- 6. If the system has stopped responding, turn off and restart the system and then run the test again.
- 7. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

## **DSA** memory stress test results

The following messages can result when you run the memory stress test.

#### Test results for the DSA memory stress test

The following messages can result when you run the DSA memory stress test.

#### • 202-000-000 : MemStr Test Passed

Test Passed.

Recoverable No

Severity Event

Serviceable

No

Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### • 202-801-000 : MemStr Test Aborted

Internal program error.

#### Recoverable

No

Severity Warning

Serviceable Yes

Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Turn off and restart the system.
- 2. Make sure that the DSA Diagnostic code is at the latest level.
- 3. Run the test again.
- 4. If the system has stopped responding, turn off and restart the system.
- 5. Check the system firmware level and upgrade if necessary.
- 6. Run the memory diagnostic to identify the specific failing DIMM.
- 7. If the failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 202-802-000 : MemStr Test Aborted

Memory size is insufficient to run the test. At least 1 GB is required.

Recoverable No Severity

Warning

Serviceable

Yes

Automatically notify support No

#### **Related links**

- Lenovo Support website

Latest level of DSA

• 202-803-000 : MemStr Test Aborted

User pressed Ctrl-C.

Recoverable No

Severity Warning Serviceable

Yes

Automatically notify support No

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 202-901-000 : MemStr Test Failed

Test Failed.

Recoverable No

Severity Error

LIIUI

Serviceable Yes

Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Execute the standard DSA memory diagnostics to validate all memory.
- 2. Make sure that the DSA Diagnostic code is at the latest level.
- 3. Turn off the system and disconnect it from power.
- 4. Reseat the memory cards and DIMMs.
- 5. Reconnect the system to power and turn the system on.
- 6. Run the test again.
- 7. Execute the standard DSA memory diagnostics to validate all memory.
- 8. If the failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 202-902-000 : MemStr Test Failed

Memory size is insufficient to run the test.

Recoverable

No

.

Severity Error

Serviceable

Yes

Automatically notify support No

## User Response

Complete the following steps:

- 1. Ensure that all memory is enabled by checking the "Available System Memory" in the "Resource Utilization" section of the DSA Diagnostic Event log.
- 2. If necessary, access the Configuration/Setup Utility program by pressing F1 during system boot and enable all memory.
- 3. Make sure that the DSA Diagnostic code is at the latest level.
- 4. Run the test again.
- 5. Execute the standard DSA memory diagnostics to validate all memory.
- 6. If the failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## **DSA** memory isolation test results

The following messages can result when you run the memory isolation test.

## Test results for the DSA memory isolation test

The following messages can result when you run the DSA memory isolation test.

## • 201-000-000 : Standalone Memory Test Passed

Quick/Full Memory Test All CPUs Passed.

Recoverable

No

Severity Event

Serviceable

No

#### Automatically notify support No

#### **Related links**

- Lenovo Support website

- Latest level of DSA
- 201-000-001 : Standalone Memory Test Passed

Quick/Full Memory Test CPU 1 Passed.

Recoverable

No

Severity Event

Serviceable

No

Automatically notify support No

Related links

- Lenovo Support website
- Latest level of DSA

#### • 201-000-002 : Standalone Memory Test Passed

Quick/Full Memory Test CPU 2 Passed.

Recoverable

No

Severity Event

Serviceable No

Automatically notify support No

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-000-003 : Standalone Memory Test Passed

Quick/Full Memory Test CPU 3 Passed.

## Recoverable

No

Severity Event

Serviceable No

Automatically notify support No

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-000-004 : Standalone Memory Test Passed

Quick/Full Memory Test CPU 4 Passed.

Recoverable

No

Severity Event

Serviceable

No

Automatically notify support

No

## **Related links**

- Lenovo Support website

- Latest level of DSA
- 201-811-000 : Standalone Memory Test Aborted

Unable to Locate SMBIOS key "\_SM\_".

Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-811-001 : Standalone Memory Test Aborted

Unable to Locate SMBIOS key "\_SM\_".

## Recoverable

No

Severity

Warning

Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-811-002 : Standalone Memory Test Aborted

Unable to Locate SMBIOS key "\_SM\_".

## Recoverable

No

Severity Warning

Serviceable

No

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-811-003 : Standalone Memory Test Aborted

Unable to Locate SMBIOS key "\_SM\_".

## Recoverable

No

Severity Warning

Serviceable

No

## Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- <u>Latest level of DSA</u>
- 201-812-000 : Standalone Memory Test Aborted

Memory test is not supported for this system.

Recoverable

No

Severity Warning

Serviceable No

Automatically notify support

#### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-812-001 : Standalone Memory Test Aborted

Memory test is not supported for this system.

## Recoverable

No

Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- <u>Latest level of DSA</u>

## • 201-812-002 : Standalone Memory Test Aborted

Memory test is not supported for this system.

## Recoverable

No

Severity

Warning

## Serviceable

No

## Automatically notify support

No

#### **User Response**

Complete the following steps:

1. Perform the actions mentioned one at a time and try the test after each action.

- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-812-003 : Standalone Memory Test Aborted

Memory test is not supported for this system.

## Recoverable

No

## Severity

Warning

Serviceable

No

#### Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-813-000 : Standalone Memory Test Aborted

Chipset Error: Can not turn OFF ECC error reporting in CPU.

#### Recoverable

No

Severity Warning

> . ما با محمد است

Serviceable No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.

4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-813-001 : Standalone Memory Test Aborted

Chipset Error: Can not turn OFF ECC error reporting in CPU.

## Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## Related links

- Lenovo Support website
- Latest level of DSA

## • 201-813-002 : Standalone Memory Test Aborted

Chipset Error: Can not turn OFF ECC error reporting in CPU.

#### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

<u>Lenovo Support website</u>

Latest level of DSA

#### • 201-813-003 : Standalone Memory Test Aborted

Chipset Error: Can not turn OFF ECC error reporting in CPU.

#### Recoverable

No

# Severity

Warning

## Serviceable

No

#### Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-814-000 : Standalone Memory Test Aborted

Chipset Error: Can not disable Scubbing feature for CPU.

#### Recoverable

No

•

## Severity

Warning

## Serviceable

No

#### Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-814-001 : Standalone Memory Test Aborted

Chipset Error: Can not disable Scubbing feature for CPU.

# Recoverable

No

Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-814-002 : Standalone Memory Test Aborted

Chipset Error: Can not disable Scubbing feature for CPU.

## Recoverable

No

Severity Warning

Serviceable No

NO

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-814-003 : Standalone Memory Test Aborted

Chipset Error: Can not disable Scubbing feature for CPU.

Recoverable No

## Severity

#### Warning

#### Serviceable

No

#### Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-815-000 : Standalone Memory Test Aborted

Program Error with Quick Memory Menu Option Selection.

Recoverable

No

Severity

Warning

Serviceable No

#### Automatically notify support No

#### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### Related links

- Lenovo Support website
- Latest level of DSA
- 201-815-001 : Standalone Memory Test Aborted

Program Error with Quick Memory Menu Option Selection.

#### Recoverable

No

Severity Warning

Serviceable No

#### Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-815-002 : Standalone Memory Test Aborted

Program Error with Quick Memory Menu Option Selection.

Recoverable

No

Severity

Warning

## Serviceable

No

Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-815-003 : Standalone Memory Test Aborted

Program Error with Quick Memory Menu Option Selection.

## Recoverable

No

Severity Warning

Serviceable

No

## Automatically notify support No

**User Response** 

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### Related links

- Lenovo Support website
- Latest level of DSA
- 201-816-000 : Standalone Memory Test Aborted

Program Error with Full Memory Menu Option Selection.

#### Recoverable

No

Severity Warning

Serviceable No

Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- <u>Lenovo Support website</u>
- Latest level of DSA

## 201-816-001 : Standalone Memory Test Aborted

Program Error with Full Memory Menu Option Selection.

Recoverable No

. . .

Severity

Warning

Serviceable

No

#### Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.

- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-816-002 : Standalone Memory Test Aborted

Program Error with Full Memory Menu Option Selection.

## Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-816-003 : Standalone Memory Test Aborted

Program Error with Full Memory Menu Option Selection.

#### Recoverable

No

Severity

Warning

Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- <u>Lenovo Support website</u>
- Latest level of DSA

#### • 201-818-000 : Standalone Memory Test Aborted

Unable to Locate SMBIOS key "\_SM\_".

#### Recoverable

No

Severity

Warning

Serviceable No

Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-818-001 : Standalone Memory Test Aborted

Unable to Locate SMBIOS key "\_SM\_".

#### Recoverable

No

## Severity

Warning

#### Serviceable

No

#### Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-818-002 : Standalone Memory Test Aborted

Unable to Locate SMBIOS key "\_SM\_".

#### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-818-003 : Standalone Memory Test Aborted

Unable to Locate SMBIOS key "\_SM\_".

#### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-819-000 : Standalone Memory Test Aborted

The start-end address ranges in the restricted area of the memory.

#### Recoverable

No

## Severity

Warning

Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-819-001 : Standalone Memory Test Aborted

The start-end address ranges in the restricted area of the memory.

## Recoverable

No

## Severity

Warning

Serviceable No

# Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-819-002 : Standalone Memory Test Aborted

The start-end address ranges in the restricted area of the memory.

Recoverable

No

Severity Warning

Serviceable

No

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-819-003 : Standalone Memory Test Aborted

The start-end address ranges in the restricted area of the memory.

Recoverable

No

## Severity

Warning

#### Serviceable

No

## Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-820-000 : Standalone Memory Test Aborted

Memory Upper limit is less than 16 Mbytes.

## Recoverable

No

Severity Warning

Serviceable No

#### Automatically notify support No

92 Lenovo Flex System x240 M5 Compute Node Installation and Service Guide

#### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-820-001 : Standalone Memory Test Aborted

Memory Upper limit is less than 16 Mbytes.

#### Recoverable

No

Severity Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### 201-820-002 : Standalone Memory Test Aborted

Memory Upper limit is less than 16 Mbytes.

## Recoverable

No

Severity

Warning

## Serviceable

No

# Automatically notify support

No

## **User Response**

Complete the following steps:

1. Perform the actions mentioned one at a time and try the test after each action.

- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-820-003 : Standalone Memory Test Aborted

Memory Upper limit is less than 16 Mbytes.

## Recoverable

No

## Severity

Warning

Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-821-000 : Standalone Memory Test Aborted

Variable range MTRR registers are larger than fixed range MTRR registers.

## Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.

4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-821-001 : Standalone Memory Test Aborted

Variable range MTRR registers are larger than fixed range MTRR registers.

Recoverable

No

## Severity

Warning

Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-821-002 : Standalone Memory Test Aborted

Variable range MTRR registers are larger than fixed range MTRR registers.

Recoverable

No

## Severity

Warning

#### Serviceable

No

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website

Latest level of DSA

## 201-821-003 : Standalone Memory Test Aborted

Variable range MTRR registers are larger than fixed range MTRR registers.

#### Recoverable

No

#### Severity

Warning

#### Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-822-000 : Standalone Memory Test Aborted

Invalid MTRR service request.

#### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-822-001 : Standalone Memory Test Aborted

Invalid MTRR service request.

## Recoverable

No

Severity

Warning

## Serviceable

No

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-822-002 : Standalone Memory Test Aborted

Invalid MTRR service request.

## Recoverable

No

Severity Warning

Serviceable No

#### Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-822-003 : Standalone Memory Test Aborted

Invalid MTRR service request.

Recoverable No

Severity

#### Warning

#### Serviceable

No

#### Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- <u>Lenovo Support website</u>
- Latest level of DSA

## 201-824-000 : Standalone Memory Test Aborted

Node Interleave feature must be OFF. Go to Setup and disable Node Interleave option and then re-run the test.

## Recoverable

No

#### Severitv

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- <u>Lenovo Support website</u>
- Latest level of DSA

## 201-824-001 : Standalone Memory Test Aborted

Node Interleave feature must be OFF. Go to Setup and disable Node Interleave option and then re-run the test.

Recoverable No

Severity

Warning

### Serviceable

No

### Automatically notify support

No

### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

### 201-824-002 : Standalone Memory Test Aborted

Node Interleave feature must be OFF. Go to Setup and disable Node Interleave option and then re-run the test.

### Recoverable

No

Severity Warning

Serviceable

No

### Automatically notify support

No

### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

### • 201-824-003 : Standalone Memory Test Aborted

Node Interleave feature must be OFF. Go to Setup and disable Node Interleave option and then re-run the test.

Recoverable

Severity Warning

Serviceable No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

### 201-826-000 : Standalone Memory Test Aborted

BIOS: Memory Controller has been disabled. Go to Setup and Enable Memory Controller.

Recoverable

No

Severity

Warning

## Serviceable

No

Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-826-001 : Standalone Memory Test Aborted

BIOS: Memory Controller has been disabled. Go to Setup and Enable Memory Controller.

Recoverable

No

Severity Warning

Serviceable

No

## Automatically notify support No

**User Response** 

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### Related links

- Lenovo Support website
- Latest level of DSA
- 201-826-002 : Standalone Memory Test Aborted

BIOS: Memory Controller has been disabled. Go to Setup and Enable Memory Controller.

### Recoverable

No

Severity Warning

Serviceable No

Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- <u>Lenovo Support website</u>
- Latest level of DSA

### 201-826-003 : Standalone Memory Test Aborted

BIOS: Memory Controller has been disabled. Go to Setup and Enable Memory Controller.

Recoverable No

Severity

Warning

Serviceable

No

#### Automatically notify support

No

### **User Response**

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.

- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

- Lenovo Support website
- Latest level of DSA

## • 201-827-000 : Standalone Memory Test Aborted

BIOS: ECC function has been disabled by BIOS. Go to Setup and enable ECC generation.

### Recoverable

No

## Severity

Warning

### Serviceable

No

## Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-827-001 : Standalone Memory Test Aborted

BIOS: ECC function has been disabled by BIOS. Go to Setup and enable ECC generation.

### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

- Lenovo Support website
- Latest level of DSA

### • 201-827-002 : Standalone Memory Test Aborted

BIOS: ECC function has been disabled by BIOS. Go to Setup and enable ECC generation.

Recoverable

No

Severity

Warning

Serviceable

No

### Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-827-003 : Standalone Memory Test Aborted

BIOS: ECC function has been disabled by BIOS. Go to Setup and enable ECC generation.

### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-844-000 : Standalone Memory Test Aborted

Chipset Error: Problem in masking MSR machine check control MASK registers.

### Recoverable

No

### Severity

Warning

### Serviceable

No

### Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-844-001 : Standalone Memory Test Aborted

Chipset Error: Problem in masking MSR machine check control MASK registers.

### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-844-002 : Standalone Memory Test Aborted

Chipset Error: Problem in masking MSR machine check control MASK registers.

### Recoverable

No

## Severity

Warning

Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-844-003 : Standalone Memory Test Aborted

Chipset Error: Problem in masking MSR machine check control MASK registers.

## Recoverable

No

### Severity

Warning

Serviceable No

# Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-845-000 : Standalone Memory Test Aborted

Chipset Error: Problem clearing MSR machine check control registers.

## Recoverable

No

Severity Warning

Serviceable

No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-845-001 : Standalone Memory Test Aborted

Chipset Error: Problem clearing MSR machine check control registers.

Recoverable

No

## Severity

Warning

### Serviceable

No

## Automatically notify support

No

### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

### 201-845-002 : Standalone Memory Test Aborted

Chipset Error: Problem clearing MSR machine check control registers.

Recoverable

No

Severity Warning

Serviceable No

# Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-845-003 : Standalone Memory Test Aborted

Chipset Error: Problem clearing MSR machine check control registers.

### Recoverable

No

## Severity

Warning

### Serviceable

No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

### 201-859-000 : Standalone Memory Test Aborted

INVALID XSECSRAT type.

## Recoverable

No

## Severity

Warning

## Serviceable

No

# Automatically notify support

No

## **User Response**

Complete the following steps:

1. Perform the actions mentioned one at a time and try the test after each action.

- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

- Lenovo Support website
- Latest level of DSA
- 201-859-001 : Standalone Memory Test Aborted

### INVALID XSECSRAT type.

### Recoverable

No

### Severity

Warning

### Serviceable

No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-859-002 : Standalone Memory Test Aborted

INVALID XSECSRAT type.

### Recoverable

No

Severity

Warning

## Serviceable

No

### Automatically notify support

No

### **User Response**

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.

4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-859-003 : Standalone Memory Test Aborted

### INVALID XSECSRAT type.

### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-860-000 : Standalone Memory Test Aborted

No OEM0 type 1 found.

### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website

Latest level of DSA

### • 201-860-001 : Standalone Memory Test Aborted

No OEM0 type 1 found.

### Recoverable

No

## Severity

Warning

### Serviceable

No

### Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

### 201-860-002 : Standalone Memory Test Aborted

No OEM0 type 1 found.

### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-860-003 : Standalone Memory Test Aborted

No OEM0 type 1 found.

## Recoverable

No

Severity

Warning

## Serviceable

No

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-861-000 : Standalone Memory Test Aborted

No SRAT type 1 found.

### Recoverable

No

Severity Warning

Serviceable No

### Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-861-001 : Standalone Memory Test Aborted

No SRAT type 1 found.

Recoverable No

Severity

#### Warning

### Serviceable

No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-861-002 : Standalone Memory Test Aborted

No SRAT type 1 found.

### Recoverable

No

## Severity

Warning

#### Serviceable No

Automatically notify support

## NO

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-861-003 : Standalone Memory Test Aborted

No SRAT type 1 found.

### Recoverable

No

Severity Warning

Serviceable No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

### • 201-862-000 : Standalone Memory Test Aborted

No OEM1 structure found.

Recoverable

No

Severity Warning

Serviceable

No

Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-862-001 : Standalone Memory Test Aborted

No OEM1 structure found.

## Recoverable

No

Severity Warning

Serviceable

No

Automatically notify support No

**User Response** 

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-862-002 : Standalone Memory Test Aborted

No OEM1 structure found.

### Recoverable

No

Severity Warning

Serviceable

No

Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-862-003 : Standalone Memory Test Aborted

No OEM1 structure found.

Recoverable

No

## Severity

Warning

Serviceable

No

## Automatically notify support

No

## **User Response**

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.

- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

- Lenovo Support website
- Latest level of DSA

### • 201-863-000 : Standalone Memory Test Aborted

No IBMERROR key in OEM1 structure.

### Recoverable

No

Severity Warning

### Serviceable

No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

### • 201-863-001 : Standalone Memory Test Aborted

No IBMERROR key in OEM1 structure.

### Recoverable

No

Severity

Warning

Serviceable

No

Automatically notify support

No

## User Response

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

- Lenovo Support website
- Latest level of DSA
- 201-863-002 : Standalone Memory Test Aborted

No IBMERROR key in OEM1 structure.

### Recoverable

No

Severity

Warning

Serviceable

No

### Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-863-003 : Standalone Memory Test Aborted

No IBMERROR key in OEM1 structure.

### Recoverable

No

### Severity

Warning

### Serviceable

No

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-864-000 : Standalone Memory Test Aborted

### No GAS located in OEM1.

### **Recoverable**

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-864-001 : Standalone Memory Test Aborted

No GAS located in OEM1.

Recoverable

No

Severity Warning

Serviceable No

### Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-864-002 : Standalone Memory Test Aborted ٠

No GAS located in OEM1.

### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-864-003 : Standalone Memory Test Aborted

No GAS located in OEM1.

## Recoverable

No

Severity

Warning

Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-865-000 : Standalone Memory Test Aborted

No XSECSRAT key in OEM0 structure.

## Recoverable

No

Severity Warning

Serviceable

No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-865-001 : Standalone Memory Test Aborted

No XSECSRAT key in OEM0 structure.

Recoverable

No

Severity Warning

Serviceable

No

### Automatically notify support

No

### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- <u>Latest level of DSA</u>
- 201-865-002 : Standalone Memory Test Aborted

No XSECSRAT key in OEM0 structure.

Recoverable

No

Severity Warning

Serviceable No

Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-865-003 : Standalone Memory Test Aborted

No XSECSRAT key in OEM0 structure.

### Recoverable

No

Severity

Warning

## Serviceable

No

## Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-866-000 : Standalone Memory Test Aborted

EFI-SAL Invalid parameter from GetMemoryMap function.

## Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

1. Perform the actions mentioned one at a time and try the test after each action.

- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

- Lenovo Support website
- Latest level of DSA
- 201-866-001 : Standalone Memory Test Aborted

EFI-SAL Invalid parameter from GetMemoryMap function.

### Recoverable

No

## Severity

Warning

Serviceable

No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

### • 201-866-002 : Standalone Memory Test Aborted

EFI-SAL Invalid parameter from GetMemoryMap function.

### Recoverable

No

Severity Warning

Serviceable

No

### Automatically notify support

No

## **User Response**

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.

4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-866-003 : Standalone Memory Test Aborted

EFI-SAL Invalid parameter from GetMemoryMap function.

### Recoverable

No

## Severity

Warning

### Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

### • 201-867-000 : Standalone Memory Test Aborted

EFI/SAL: Buffer not allocated.

### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

<u>Lenovo Support website</u>

Latest level of DSA

### • 201-867-001 : Standalone Memory Test Aborted

EFI/SAL: Buffer not allocated.

### Recoverable

No

Severity Warning

### Serviceable

No

### Automatically notify support

No

### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- <u>Latest level of DSA</u>

### 201-867-002 : Standalone Memory Test Aborted

EFI/SAL: Buffer not allocated.

#### Recoverable

No

## Severity

Warning

## Serviceable

No

### Automatically notify support

No

### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-867-003 : Standalone Memory Test Aborted

EFI/SAL: Buffer not allocated.

# Recoverable

No

Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-868-000 : Standalone Memory Test Aborted

EFI/SAL: Buffer allocated in GetMemoryMap too small.

## Recoverable

No

Severity Warning

Serviceable

No

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-868-001 : Standalone Memory Test Aborted

EFI/SAL: Buffer allocated in GetMemoryMap too small.

Recoverable No

## Severity

### Warning

### Serviceable

No

### Automatically notify support

No

### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-868-002 : Standalone Memory Test Aborted

EFI/SAL: Buffer allocated in GetMemoryMap too small.

Recoverable

No

Severity

Warning

Serviceable No

### Automatically notify support No

### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### Related links

- Lenovo Support website
- Latest level of DSA
- 201-868-003 : Standalone Memory Test Aborted

EFI/SAL: Buffer allocated in GetMemoryMap too small.

Recoverable

No

Severity Warning

Serviceable No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

### 201-869-000 : Standalone Memory Test Aborted

EFI/SAL Invalid parameter from GetMemoryMap function.

### Recoverable

No

## Severity

Warning

### Serviceable

No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-869-001 : Standalone Memory Test Aborted

EFI/SAL Invalid parameter from GetMemoryMap function.

## Recoverable

No

Severity Warning

## Serviceable

No

### Automatically notify support No

**User Response** 

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### Related links

- Lenovo Support website
- Latest level of DSA
- 201-869-002 : Standalone Memory Test Aborted

EFI/SAL Invalid parameter from GetMemoryMap function.

### Recoverable

No

Severity Warning

Serviceable No

Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- <u>Lenovo Support website</u>
- Latest level of DSA

### 201-869-003 : Standalone Memory Test Aborted

EFI/SAL Invalid parameter from GetMemoryMap function.

Recoverable

No

Severity

Warning

Serviceable

No

#### Automatically notify support

No

#### **User Response**

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.

- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

- Lenovo Support website
- Latest level of DSA
- 201-870-000 : Standalone Memory Test Aborted

CPU Doamin in ACPI not valid.

### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-870-001 : Standalone Memory Test Aborted

CPU Doamin in ACPI not valid.

### Recoverable

No

Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

- <u>Lenovo Support website</u>
- Latest level of DSA

### • 201-870-002 : Standalone Memory Test Aborted

CPU Doamin in ACPI not valid.

Recoverable

No

Severity

Warning

Serviceable No

Automatically notify support

No

### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-870-003 : Standalone Memory Test Aborted

CPU Doamin in ACPI not valid.

### Recoverable

No

Severity

Warning

### Serviceable

No

### Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-871-000 : Standalone Memory Test Aborted

Data Mis-compare encountered.

### Recoverable

No

## Severity

Warning

## Serviceable

No

### Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-871-001 : Standalone Memory Test Aborted

Data Mis-compare encountered.

### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-871-002 : Standalone Memory Test Aborted

Data Mis-compare encountered.

### Recoverable

No

## Severity

Warning

Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

### • 201-871-003 : Standalone Memory Test Aborted

Data Mis-compare encountered.

### Recoverable

No

Severity

Warning

Serviceable No

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-877-000 : Standalone Memory Test Aborted

BIOS: Sparing in Extended PCI reg. must be OFF. Go to setup and disable sparing.

## Recoverable

No

Severity Warning

Serviceable

No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

### 201-877-001 : Standalone Memory Test Aborted

BIOS: Sparing in Extended PCI reg. must be OFF. Go to setup and disable sparing.

Recoverable

No

## Severity

Warning

### Serviceable

No

## Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

### 201-877-002 : Standalone Memory Test Aborted

BIOS: Sparing in Extended PCI reg. must be OFF. Go to setup and disable sparing.

Recoverable

No

Severity Warning

Serviceable No

# Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-877-003 : Standalone Memory Test Aborted

BIOS: Sparing in Extended PCI reg. must be OFF. Go to setup and disable sparing.

### Recoverable

No

## Severity

Warning

### Serviceable

No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

### **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-878-000 : Standalone Memory Test Aborted

Sparing feature must be turned OFF. Go to setup and turn the sparing feature OFF.

Recoverable

No

Severity

Warning

Serviceable

No

## Automatically notify support

No

### **User Response**

Complete the following steps:

1. Perform the actions mentioned one at a time and try the test after each action.

- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

- Lenovo Support website
- Latest level of DSA

## 201-878-001 : Standalone Memory Test Aborted

Sparing feature must be turned OFF. Go to setup and turn the sparing feature OFF.

### Recoverable

No

## Severity

Warning

Serviceable

No

### Automatically notify support

No

### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

### 201-878-002 : Standalone Memory Test Aborted

Sparing feature must be turned OFF. Go to setup and turn the sparing feature OFF.

### Recoverable

No

## Severity

Warning

## Serviceable

No

## Automatically notify support

No

## **User Response**

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.

4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-878-003 : Standalone Memory Test Aborted

Sparing feature must be turned OFF. Go to setup and turn the sparing feature OFF.

Recoverable

No

## Severity

Warning

Serviceable

No

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-885-000 : Standalone Memory Test Aborted

Processor does not support MTRR register manipulation. Can not write to memory without cache.

Recoverable

No

## Severity

Warning

#### Serviceable

No

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website

Latest level of DSA

### • 201-885-001 : Standalone Memory Test Aborted

Processor does not support MTRR register manipulation. Can not write to memory without cache.

#### Recoverable

No

#### Severity

Warning

#### Serviceable

No

#### Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-885-002 : Standalone Memory Test Aborted

Processor does not support MTRR register manipulation. Can not write to memory without cache.

#### Recoverable

No

#### Severity

Warning

#### Serviceable

No

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-885-003 : Standalone Memory Test Aborted

Processor does not support MTRR register manipulation. Can not write to memory without cache.

# Recoverable

No

Severity

Warning

# Serviceable

No

# Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## Related links

- Lenovo Support website
- Latest level of DSA

## • 201-886-000 : Standalone Memory Test Aborted

Memory Upper limit is less than 16 Mbytes.

## Recoverable

No

Severity Warning

Serviceable No

## Automatically notify support

No

# User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

# **Related links**

- Lenovo Support website
- Latest level of DSA

# • 201-886-001 : Standalone Memory Test Aborted

Memory Upper limit is less than 16 Mbytes.

Recoverable No

Severity

#### Warning

#### Serviceable

No

#### Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 201-886-002 : Standalone Memory Test Aborted

Memory Upper limit is less than 16 Mbytes.

Recoverable

No

Severity

Warning

#### Serviceable No

#### Automatically notify support No

## **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-886-003 : Standalone Memory Test Aborted

Memory Upper limit is less than 16 Mbytes.

#### Recoverable

No

Severity Warning

Serviceable No

#### Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-899-000 : Standalone Memory Test Aborted

Memory Diagnostics Test Aborted by user.

Recoverable No

INO

Severity Warning

Serviceable

No

Automatically notify support

No

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-899-001 : Standalone Memory Test Aborted

Memory Diagnostics Test Aborted by user.

Recoverable No

Severity

Warning

Serviceable

No

Automatically notify support

No

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 201-899-002 : Standalone Memory Test Aborted

Memory Diagnostics Test Aborted by user.

Recoverable No

Severity

#### Warning

#### Serviceable

No

#### Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 201-899-003 : Standalone Memory Test Aborted

Memory Diagnostics Test Aborted by user.

#### Recoverable

No

## Severity

Warning

Serviceable

No

## Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### 201-901-000 : Standalone Memory Test Failed

Memory Diagnostics Test Failed.

#### Recoverable

No

#### Severity Error

#### Serviceable

Yes

#### Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.
- 5. Replace any DIMMS(s) mentioned in error, one by one.
- 6. Make sure that all DIMMs are enabled in the Configuration/Setup Utility program.
- 7. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

## - Lenovo Support website

- Latest level of DSA

## 201-901-001 : Standalone Memory Test Failed

Memory Diagnostics Test Failed.

#### Recoverable

No

Severity Error

#### Serviceable

Yes

#### Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.
- 5. Replace any DIMMS(s) mentioned in error, one by one.
- 6. Make sure that all DIMMs are enabled in the Configuration/Setup Utility program.
- 7. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
  - Latest level of DSA

## • 201-901-002 : Standalone Memory Test Failed

Memory Diagnostics Test Failed.

#### Recoverable

No

Severity Error

Serviceable Yes

# Automatically notify support

No

## User Response

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.

- 5. Replace any DIMMS(s) mentioned in error, one by one.
- 6. Make sure that all DIMMs are enabled in the Configuration/Setup Utility program.
- 7. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

- Lenovo Support website
- <u>Latest level of DSA</u>
- 201-901-003 : Standalone Memory Test Failed

Memory Diagnostics Test Failed.

#### Recoverable

No

#### Severity

Error

Serviceable

Yes

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Perform the actions mentioned one at a time and try the test after each action.
- 2. If the problem remains, contact your technical-service representative.
- 3. Turn off the system and disconnect it from power. Wait for 45 seconds. Reseat DIMM(s). Reconnect it to power.
- 4. Make sure that DSA and BIOS/uEFI are at the latest level.
- 5. Replace any DIMMS(s) mentioned in error, one by one.
- 6. Make sure that all DIMMs are enabled in the Configuration/Setup Utility program.
- 7. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

## **DSA** optical drive test results

The following messages can result when you run the optical drive test.

#### Test results for the DSA optical drive test

The following messages can result when you run the DSA optical drive test.

• 215-000-000 : Optical Drive Test Passed

Optical Drive Test Passed.

Recoverable No Severity

Event

# Serviceable

No

## Automatically notify support

No

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 215-801-000 : Optical Drive Test Aborted

Optical Drive Test Aborted. Unable to communicate with driver.

Recoverable

No

## Severity

Warning

## Serviceable

Yes

## Automatically notify support

No

## User Response

Complete the following steps:

- 1. Make sure that the DSA Diagnostic code is at the latest level.
- 2. Run the test again.
- 3. Check the drive cabling for loose or broken connections at both ends or damage to the cable. Replace the cable if damage is present.
- 4. Run the test again.
- 5. Check system firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 6. Run the test again.

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 215-802-000 : Optical Drive Test Aborted

Optical Drive Test Aborted. A read error was encountered.

#### Recoverable

No

Severity Warning

## Serviceable

Yes

## Automatically notify support

No

## **User Response**

Complete the following steps:

1. Insert a new CD or DVD into the drive and wait for 15 seconds for the media to be recognized. Rerun the test.

- 2. Check the drive cabling for loose or broken connections at both ends or damage to the cable. Replace the cable if damage is present.
- 3. Run the test again.
- 4. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

- Lenovo Support website
- Latest level of DSA
- 215-803-000 : Optical Drive Test Failed

Optical Drive Test Failed. Disk may be in use by the operating system.

#### Recoverable

No

#### Severity

Error

Serviceable

Yes

Automatically notify support No

#### User Response

Complete the following steps:

- 1. Wait for the system activity to cease
- 2. Run the test again
- 3. Turn off and restart the system.
- 4. Run the test again.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 215-804-000 : Optical Drive Test Aborted

Optical Drive Test Aborted. The media tray is open.

#### Recoverable

No

Severity Warning

Serviceable

Yes

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Close the media tray and wait for 15 seconds for the media to be recognized. Run the test again.
- 2. Insert a new CD or DVD into the drive and wait for 15 seconds for the media to be recognized. Rerun the test.

- 3. Check the drive cabling for loose or broken connections at both ends or damage to the cable. Replace the cable if damage is present.
- 4. Run the test again.
- 5. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

- Lenovo Support website
- Latest level of DSA

## • 215-901-000 : Optical Drive Test Aborted

Optical Drive Test Aborted. Drive media is not detected.

#### Recoverable

No

## Severity

Warning

## Serviceable

Yes

Automatically notify support No

# User Response

Complete the following steps:

- 1. Insert a new CD or DVD into the drive and wait for 15 seconds for the media to be recognized. Rerun the test.
- 2. Check the drive cabling for loose or broken connections at both ends or damage to the cable. Replace the cable if damage is present.
- 3. Run the test again.
- 4. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 215-902-000 : Optical Drive Test Failed

Optical Drive Test Failed. Read miscompare.

#### Recoverable

No

# Severity

Error

# Serviceable

Yes

## Automatically notify support

No

## **User Response**

Complete the following steps:

1. Insert a new CD or DVD into the drive and wait for 15 seconds for the media to be recognized. Rerun the test.

- 2. Check the drive cabling for loose or broken connections at both ends or damage to the cable. Replace the cable if damage is present.
- 3. Run the test again.
- 4. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

- Lenovo Support website
- Latest level of DSA

## • 215-903-000 : Optical Drive Test Aborted

Optical Drive Test Aborted. Could not access the device.

#### Recoverable

No

## Severity

Warning

## Serviceable

Yes

# Automatically notify support

No

## User Response

Complete the following steps:

- 1. Insert a new CD or DVD into the drive and wait for 15 seconds for the media to be recognized. Rerun the test.
- 2. Check the drive cabling for loose or broken connections at both ends or damage to the cable. Replace the cable if damage is present.
- 3. Run the test again.
- 4. Check system firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 5. Run the test again.
- 6. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

## **Related links**

- Lenovo Support website
- Latest level of DSA

# DSA tape drive test results

The following messages can result when you run the tape drive test.

## Test results for the DSA tape drive test

The following messages can result when you run the DSA tape drive test.

## • 264-000-000 : Tape Test Passed

Tape Test Passed.

Recoverable No

Severity

Event

Serviceable

No

Automatically notify support

No

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 264-901-000 : Tape Test Failed

An error was found in the tape alert log.

## Recoverable

No

Severity Error

Serviceable

Yes

Automatically notify support

No

## User Response

Complete the following steps:

- 1. Clean the tape drive using the appropriate cleaning media and install new media.
- 2. Run the test again.
- 3. Clear the error log.
- 4. Run the test again.
- 5. Make sure that the drive firmware is at the latest level.
- 6. Rerun the test after upgrading to the latest firmware level.
- 7. If the failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 264-902-000 : Tape Test Failed

Tape Test Failed. Media is not detected.

Recoverable No

Severity Error

. . . .

Serviceable Yes

Automatically notify support No

#### User Response

Complete the following steps:

- 1. Clean the tape drive using the appropriate cleaning media and install new media.
- 2. Run the test again.
- 3. Make sure that the drive firmware is at the latest level.
- 4. Rerun the test after upgrading to the latest firmware level.
- 5. If the failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

- Lenovo Support website
- Latest level of DSA
- 264-903-000 : Tape Test Failed

Tape Test Failed. Media is not detected.

#### Recoverable

No

Severity Error

Serviceable

Yes

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Clean the tape drive using the appropriate cleaning media and install new media.
- 2. Run the test again.
- 3. Make sure that the drive firmware is at the latest level.
- 4. Rerun the test after upgrading to the latest firmware level.
- 5. If the failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 264-904-000 : Tape Test Failed

Tape Test Failed. Drive hardware error.

#### Recoverable

No

Severity Error

Serviceable

Yes

# Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Check the tape drive cabling for loose or broken connections or damage to the cable. Replace the cable if damage is present.
- 2. Clean the tape drive using the appropriate cleaning media and install new media.
- 3. Run the test again.
- 4. Make sure that the drive firmware is at the latest level.
- 5. Rerun the test after upgrading to the latest firmware level.
- 6. If the failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

- Lenovo Support website
- Latest level of DSA

#### • 264-905-000 : Tape Test Failed

Tape Test Failed. Software error: invalid request.

#### Recoverable

No

Severity Error

Serviceable

Yes

Automatically notify support

No

#### User Response

Complete the following steps:

- 1. If the system has stopped responding, turn off and restart the system.
- 2. Check the system firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 3. Run the test again.
- 4. If the system has stopped responding, turn off and restart the system.
- 5. Make sure that the drive firmware is at the latest level.
- 6. Run the test again.
- 7. If the failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 264-906-000 : Tape Test Failed

Tape Test Failed. Unrecognized error.

Recoverable

No

Severity Error

Serviceable Yes

#### Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Clean the tape drive using the appropriate cleaning media and install new media.
- 2. Run the test again.
- 3. Make sure that the drive firmware is at the latest level.
- 4. Rerun the test after upgrading to the latest firmware level.
- 5. Make sure that the DSA Diagnostic code is at the latest level.
- 6. Run the test again.
- 7. Check the system firmware level and upgrade if necessary.
- 8. Run the test again.
- 9. If the failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 264-907-000 : Tape Test Failed

An error was found in the block address somewhere.

#### Recoverable

No

Severity Error

## Serviceable

Yes

Automatically notify support

No

#### **User Response**

Complete the following steps:

1. Clean the tape drive using the appropriate cleaning media and install new media.

## **Related links**

- Lenovo Support website
- Latest level of DSA
- 264-908-000 : Tape Test Failed

An error was found in getting tape capacity.

Recoverable No Severity Error Serviceable Yes Automatically notify support No

#### **User Response**

Complete the following steps:

- 1. Make sure that medium is present.
- 2. Clean the tape drive using the appropriate cleaning media and install new media.

## Related links

- Lenovo Support website
- Latest level of DSA

## **DSA** hard drive test results

The following messages can result when you run the hard drive test.

## Test results for the DSA hard drive test

The following messages can result when you run the DSA hard drive test.

#### • 217-000-000 : HDD Test Passed

HDD Stress Test Passed.

Recoverable

No

Severity

Event

Serviceable

No

Automatically notify support No

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 217-800-000 : HDD Test Aborted

HDD Test Aborted. The test was canceled.

Recoverable

No

Severity Warning

Serviceable

Yes

Automatically notify support No

#### User Response

Complete the following steps:

- 1. Check cable connections.
- 2. Rerun the test.
- 3. Verify that Hard drive supports self test and self test logging.
- 4. If the problem remains, contact your technical-support representative.

#### **Related links**

- Lenovo Support website

Latest level of DSA

• 217-900-000 : HDD Test Failed

HDD Test Failed. The hard drive self-test detected a failure.

#### Recoverable

No

Severity

Error

## Serviceable

Yes

Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Check cable connections.
- 2. Rerun the test.
- 3. Verify the firmware is at the latest level.
- 4. Rerun the test.
- 5. If the problem remains, contact your technical-support representative.

## **Related links**

- Lenovo Support website
- Latest level of DSA

# **DSA LSI** hard drive test results

The following messages can result when you run the LSI hard drive test.

## Test results for the DSA LSI hard drive test

The following messages can result when you run the DSA LSI hard drive test.

## • 407-000-000 : LSIESG:DiskDefaultDiagnostic Test Passed

The test passed.

Recoverable No
Severity Event
Serviceable No
Automatically notify support No
Related links <ul> <li>Lenovo Support website</li> <li>Latest level of DSA</li> </ul>
407-800-000 : LSIESG:DiskDefaultDiagnostic Test Aborted

The test was canceled.

## Recoverable

No

## Severity

Warning

# Serviceable

No

## Automatically notify support

No

## **Related links**

- Lenovo Support website
- Latest level of DSA

## 407-900-000 : LSIESG:DiskDefaultDiagnostic Test Failed

The hard drive self-test detected a failure.

Recoverable

No

Severity Error

Serviceable

Yes

## Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Check cable connections.
- 2. Rerun the test.
- 3. Verify whether the firmware is at the latest level.
- 4. Rerun the test.
- 5. If the problem remains, contact your IBM technical-support representative.

## **Related links**

- Lenovo Support website
- Latest level of DSA

# **DSA Nvidia GPU test results**

The following messages can result when you run the Nvidia GPU test.

# Test results for the DSA Nvidia GPU test

The following messages can result when you run the DSA Nvidia GPU test.

## • 409-000-000 : NVIDIA User Diagnostic Test Passed

NVIDIA User Diagnostic test passed.

Recoverable No

Severity Event

#### Serviceable

No

Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### 409-003-000 : Nvidia::DiagnosticServiceProvider::Bandwidth Test Passed

Nvidia GPU Bandwidth test passed.

Recoverable

No

## Severity

Event

Serviceable

No

## Automatically notify support

No

## **Related links**

- Lenovo Support website

- Latest level of DSA

## • 409-004-000 : Nvidia::DiagnosticServiceProvider::Query Test Passed

Nvidia GPU Query test passed.

#### Recoverable

No

# Severity

Event

# Serviceable

No

## Automatically notify support

No

## **Related links**

- Lenovo Support website

- Latest level of DSA

## • 409-005-000 : Nvidia::DiagnosticServiceProvider::Matrix Test Passed

Nvidia GPU Matrix test passed.

Recoverable

No

Severity Event

Serviceable No

# Automatically notify support

No

- Lenovo Support website
- Latest level of DSA
- 409-006-000 : Nvidia::DiagnosticServiceProvider::Binomial Test Passed

Nvidia GPU Binomial test passed.

#### Recoverable

No

Severity

Event

Serviceable

No

#### Automatically notify support

No

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 409-800-000 : NVIDIA User Diagnostic Test Aborted

NVIDIA User Diagnostic test was canceled.

Recoverable

No

Severity

Event

Serviceable

No

#### Automatically notify support

No

## **Related links**

- Lenovo Support website
- Latest level of DSA

### 409-803-000 : Nvidia::DiagnosticServiceProvider::Bandwidth Test Aborted

Nvidia GPU Bandwidth test was canceled.

Recoverable

No

Severity

Warning

Serviceable No

Automatically notify support

No

**Related links** 

- Lenovo Support website
- Latest level of DSA
- 409-804-000 : Nvidia::DiagnosticServiceProvider::Query Test Aborted

Nvidia GPU Query test was canceled.

Recoverable

No

Severity

Warning

Serviceable

No

Automatically notify support

No

**Related links** 

<u>Lenovo Support website</u>

- Latest level of DSA

## • 409-805-000 : Nvidia::DiagnosticServiceProvider::Matrix Test Aborted

Nvidia GPU Matrix test was canceled.

## Recoverable

No

Severity Warning

Serviceable No

Automatically notify support

No

## **Related links**

- Lenovo Support website
- Latest level of DSA

## • 409-806-000 : Nvidia::DiagnosticServiceProvider::Binomial Test Aborted

Nvidia GPU Binomial test was canceled.

## Recoverable

No

Severity

Warning

# Serviceable

No

# Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA

# • 409-900-000 : NVIDIA User Diagnostic Test Failed

NVIDIA User Diagnostic Test Failed.

# Recoverable

No

## Severity

Event

#### Serviceable

Yes

#### Automatically notify support

No

## User Response

Complete the following steps:

- 1. Verify that the GPU is seated in the PCIe slot correctly by reseating the GPU. Then power cycle the system.
- 2. Verify that the power connectors to the GPU are connected firmly. Then power cycle the system.
- 3. Run nvidia-smi -q In some cases this will report a poorly connected power cable.
- 4. Rerun the diagnostics, using the same GPU, on system that is known to be working. A variety of system issues can cause diagnostic failure.
- 5. If the problem remains, contact your IBM technical-support representative.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

## • 409-903-000 : Nvidia::DiagnosticServiceProvider::Bandwidth Test Failed

Nvidia GPU Bandwidth Test Failed.

### Recoverable

No

Severity Error

Serviceable

Yes

#### Automatically notify support No

INO

#### User Response

Complete the following steps:

- 1. Verify that the GPU is seated in the PCIe slot correctly by reseating the GPU. Then power cycle the system.
- 2. Verify that the power connectors to the GPU are connected firmly. Then power cycle the system.
- 3. Run nvidia-smi -q In some cases this will report a poorly connected power cable.
- 4. Rerun the diagnostics, using the same GPU, on system that is known to be working. A variety of system issues can cause diagnostic failure.
- 5. If the problem remains, contact your IBM technical-support representative.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### 409-904-000 : Nvidia::DiagnosticServiceProvider::Query Test Failed

Nvidia GPU Query Test Failed.

#### Recoverable

No

# Severity

Error

## Serviceable

Yes

# Automatically notify support

No

# **User Response**

Complete the following steps:

- 1. Verify that the GPU is seated in the PCIe slot correctly by reseating the GPU. Then power cycle the system.
- 2. Verify that the power connectors to the GPU are connected firmly. Then power cycle the system.
- 3. Run nvidia-smi -q In some cases this will report a poorly connected power cable.
- 4. Rerun the diagnostics, using the same GPU, on system that is known to be working. A variety of system issues can cause diagnostic failure.
- 5. If the problem remains, contact your IBM technical-support representative.

# **Related links**

- Lenovo Support website
- Latest level of DSA

# 409-905-000 : Nvidia::DiagnosticServiceProvider::Matrix Test Failed

Nvidia GPU Matrix Test Failed.

# Recoverable

No

Severity Error

Serviceable

Yes

# Automatically notify support

No

# User Response

Complete the following steps:

- 1. Verify that the GPU is seated in the PCIe slot correctly by reseating the GPU. Then power cycle the system.
- 2. Verify that the power connectors to the GPU are connected firmly. Then power cycle the system.
- 3. Run nvidia-smi -q In some cases this will report a poorly connected power cable.
- 4. Rerun the diagnostics, using the same GPU, on system that is known to be working. A variety of system issues can cause diagnostic failure.
- 5. If the problem remains, contact your IBM technical-support representative.

# **Related links**

- Lenovo Support website
- Latest level of DSA
- 409-906-000 : Nvidia::DiagnosticServiceProvider::Binomial Test Failed

Nvidia GPU Binomial Test Failed.

# Recoverable

No

# Severity

Error

Serviceable

Yes

# Automatically notify support

No

## **User Response**

Complete the following steps:

- 1. Verify that the GPU is seated in the PCIe slot correctly by reseating the GPU. Then power cycle the system.
- 2. Verify that the power connectors to the GPU are connected firmly. Then power cycle the system.
- 3. Run nvidia-smi -q In some cases this will report a poorly connected power cable.
- 4. Rerun the diagnostics, using the same GPU, on system that is known to be working. A variety of system issues can cause diagnostic failure.
- 5. If the problem remains, contact your IBM technical-support representative.

## Related links

- Lenovo Support website
- Latest level of DSA

# DSA system management test results

The following messages can result when you run the system management test.

## Test results for the DSA system management test

The following messages can result when you run the DSA system management test.

## • 166-000-001 : IMM I2C Test Passed

IMM I2C Test Passed.

Recoverable

No Severity

Event

Serviceable

No

# Automatically notify support

No

# **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-801-001 : IMM I2C Test Aborted

IMM returned incorrect response length.

Recoverable No

Severity Warning

## Serviceable

Yes

## Automatically notify support

No

## **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

## **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM

## • 166-802-001 : IMM I2C Test Aborted

Test cannot be completed for unknown reason.

Recoverable

No

Severity

Warning

Serviceable

Yes

Automatically notify support

No

## **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

## **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-803-001 : IMM I2C Test Aborted

Node Busy. Try later.

#### Recoverable

No

Severity Warning

Serviceable

Yes

## Automatically notify support

No

## **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-804-001 : IMM I2C Test Aborted

Invalid Command.

#### Recoverable

No

Severity Warning

#### Serviceable

Yes

## Automatically notify support

No

## User Response

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

## **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM

## • 166-805-001 : IMM I2C Test Aborted

Invalid Command for given LUN.

#### Recoverable

No

# Severity

Warning

Serviceable

Yes

## Automatically notify support

No

## User Response

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-806-001 : IMM I2C Test Aborted

Timeout while processing command.

#### Recoverable

No

## Severity

Warning

## Serviceable

Yes

# Automatically notify support

No

## **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

## **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-807-001 : IMM I2C Test Aborted

Out of space.

Recoverable

No

Severity Warning

Serviceable

Yes

# Automatically notify support

No

## **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-808-001 : IMM I2C Test Aborted

Reservation Canceled or Invalid Reservation ID.

Recoverable

No

Severity Warning

Serviceable

Yes

## Automatically notify support

No

## User Response

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-809-001 : IMM I2C Test Aborted

Request data truncated.

#### Recoverable

No

Severity

Warning

## Serviceable

Yes

## Automatically notify support

No

#### User Response

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM

# • 166-810-001 : IMM I2C Test Aborted

Request data length invalid.

#### Recoverable

No

#### Severity

Warning

### Serviceable

Yes

## Automatically notify support

No

## User Response

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- <u>Latest level of BMC/IMM</u>
- 166-811-001 : IMM I2C Test Aborted

Request data field length limit exceeded.

# Recoverable

No

Severity

Warning

Serviceable

Yes

## Automatically notify support

No

## **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

## **Related links**

- Lenovo Data Center Support website

- Latest level of DSA
- Latest level of BMC/IMM
- 166-812-001 : IMM I2C Test Aborted

Parameter out of range.

## Recoverable

No

## Severity

Warning

## Serviceable

Yes

## Automatically notify support

No

## **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

## **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-813-001 : IMM I2C Test Aborted

Cannot return number of requested data bytes.

Recoverable No Severity Warning Serviceable Yes Automatically notify support No

### **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

## **Related links**

- <u>Lenovo Data Center Support website</u>
- Latest level of DSA
- Latest level of BMC/IMM

## • 166-814-001 : IMM I2C Test Aborted

Requested Sensor, data, or record not present.

#### Recoverable

No

#### Severity

Warning

#### Serviceable

Yes

## Automatically notify support

No

# User Response

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- <u>Latest level of BMC/IMM</u>
- 166-815-001 : IMM I2C Test Aborted

Invalid data field in Request.

#### Recoverable

No

# Severity

Warning

## Serviceable

Yes

#### Automatically notify support

No

## User Response

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

#### **Related links**

- <u>Lenovo Data Center Support website</u>
- Latest level of DSA
- Latest level of BMC/IMM

## • 166-816-001 : IMM I2C Test Aborted

Command illegal for specified sensor or record type.

## Recoverable

No

Severity Warning

Serviceable Yes

Automatically notify support

No

#### **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-817-001 : IMM I2C Test Aborted

Command response could not be provided.

#### Recoverable

No

Severity Warning

## Serviceable

Yes

#### Automatically notify support

No

#### **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-818-001 : IMM I2C Test Aborted

Cannot execute duplicated request.

#### Recoverable

No

Severity Warning

Serviceable

Yes

#### Automatically notify support

No

#### **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM

## 166-819-001 : IMM I2C Test Aborted

Command response could not be provided. SDR Repository in?update mode.

#### Recoverable

No

Severity Warning

Serviceable

Yes

Automatically notify support

No

#### User Response

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM

#### 166-820-001 : IMM I2C Test Aborted

Command response could not be provided. Device in firmware update mode.

Recoverable

No

Severity Warning

Serviceable

Yes

#### Automatically notify support

No

#### User Response

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM

## • 166-821-001 : IMM I2C Test Aborted

Command response could not be provided. BMC initialization in progress.

## Recoverable

No

Severity Warning

## Serviceable

Yes

## Automatically notify support

No

## **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

## **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM

## • 166-822-001 : IMM I2C Test Aborted

Destination unavailable.

#### Recoverable

No

Severity

Warning

Serviceable

Yes

## Automatically notify support

No

## **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-823-001 : IMM I2C Test Aborted

Cannot execute command. Insufficient privilege level.

#### Recoverable

No

# Severity

Warning

Serviceable

Yes

## Automatically notify support

No

## **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

## **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-824-001 : IMM I2C Test Aborted

Cannot execute command.

Recoverable No

Severity Warning

Serviceable

Yes

#### Automatically notify support No

#### 110

#### User Response Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-901-001 : IMM I2C Test Failed

IMM Indicates failure in RTMM bus (BUS 0).

#### Recoverable

No

Severity

Error

Serviceable

Yes

## Automatically notify support

No

#### **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.
- 3. Run the test again.
- 4. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-902-001 : IMM I2C Test Failed

IMM Indicates failure in TPM bus (BUS 1).

#### Recoverable

No

Severity Error

Serviceable

Yes

## Automatically notify support

No

## **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.
- 3. Run the test again.
- 4. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-903-001 : IMM I2C Test Failed

IMM Indicates failure in SD bus (BUS 2).

#### Recoverable

No

Severity Error

Serviceable

Yes

## Automatically notify support

No

## **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.

- 3. Run the test again.
- 4. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-905-001 : IMM I2C Test Failed

IMM Indicates failure in SAS Backplane bus (BUS 4).

#### Recoverable

No

#### Severity

Error

#### Serviceable

Yes

#### Automatically notify support

No

#### User Response

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.
- 3. Run the test again.
- 4. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM
- 166-906-001 : IMM I2C Test Failed

IMM Indicates failure in Wellsburg bus (BUS 5).

#### Recoverable

No

# Severity

Error

# Serviceable

Yes

#### Automatically notify support

No

# User Response

Perform the actions mentioned one at a time and try the test after each action:

1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.

- 2. Make sure that DSA and BMC/IMM are at the latest level.
- 3. Run the test again.

4. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Data Center Support website
- <u>Latest level of DSA</u>
- Latest level of BMC/IMM
- 166-907-001 : IMM I2C Test Failed

IMM Indicates failure in I2C mux bus (BUS 6).

#### Recoverable

No

# Severity

Error

# Serviceable

Yes

# Automatically notify support

No

# **User Response**

Perform the actions mentioned one at a time and try the test after each action:

- 1. Turn off the system and disconnect it from power. Wait for 45 seconds. Reconnect it to power.
- 2. Make sure that DSA and BMC/IMM are at the latest level.
- 3. Run the test again.
- 4. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

# **Related links**

- Lenovo Data Center Support website
- Latest level of DSA
- Latest level of BMC/IMM

# **DSA** checkpoint panel test results

The following messages can result when you run the checkpoint panel test.

# Test results for the DSA checkpoint panel test

The following messages can result when you run the DSA checkpoint panel test.

# • 180-000-000 : Check-point Panel Test Passed

Check-point Panel Test Passed.

Recoverable No Severity Event Serviceable No Automatically notify support No Related links

#### - Lenovo Support website

- Latest level of DSA

#### 180-801-000 : Check-point Panel Test Aborted

Check-point Panel Test Aborted. BMC is unable to verify that the operator information panel cable is connected.

Recoverable

No

Severity

Warning

Serviceable

Yes

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Inspect and reseat operator information panel cable at both ends.
- 2. Verify that the Baseboard Management Controller (BMC) is working.
- 3. Run the test again.
- 4. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

# • 180-901-000 : Check-point Panel Test Failed

Check-point Panel Test Failed. Operator reported incorrect display.

#### Recoverable

No

#### Severity

Error

#### Serviceable

Yes

#### Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Check the operator information panel cabling for loose or broken connections at both ends or damage to the cable.
- 2. Replace the information panel cable if damage is present.
- 3. Run the test again.
- 4. Replace the operator information panel assembly.
- 5. Run the test again.
- 6. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### **DSA Broadcom network test results**

The following messages can result when you run the Broadcom network test.

#### Test results for the DSA Broadcom network test

The following messages can result when you run the DSA Broadcom network test.

#### • 405-000-000 : BRCM:TestControlRegisters Test Passed

The test passed.

Recoverable No Severity

Event

Serviceable

No

#### Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### • 405-001-000 : BRCM:TestMIIRegisters Test Passed

The test passed.

Recoverable

No

Severity Event

Serviceable

No

Automatically notify support

No

#### **Related links**

- Lenovo Support website

```
- Latest level of DSA
```

405-002-000 : BRCM:TestEEPROM Test Passed

The test passed.

Recoverable No

Severity Event

Serviceable No

#### Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 405-003-000 : BRCM:TestInternalMemory Test Passed

#### The test passed.

# Recoverable

No

Severity Event

# Serviceable

No

#### Automatically notify support No

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 405-004-000 : BRCM:TestInterrupt Test Passed

The test passed.

#### Recoverable

No

Severity Event

#### Serviceable No

INO

# Automatically notify support

No

# **Related links**

- Lenovo Support website

- Latest level of DSA

# • 405-005-000 : BRCM:TestLoopbackMAC Test Passed

The test passed.

# Recoverable

No

Severity Event

#### Serviceable No

# Automatically notify support

No

- Lenovo Support website
- Latest level of DSA

#### • 405-006-000 : BRCM:TestLoopbackPhysical Test Passed

The test passed.

Recoverable

No

Severity

Event

Serviceable No

Automatically notify support

No

**Related links** 

- Lenovo Support website

- Latest level of DSA

• 405-007-000 : BRCM:TestLEDs Test Passed

The test passed.

Recoverable

No

Severity Event

Serviceable

No

Automatically notify support No

# **Related links**

- Lenovo Support website
- Latest level of DSA

• 405-800-000 : BRCM:TestControlRegisters Test Aborted

The control registers test was canceled.

Recoverable

No

Severity Warning

Serviceable

No

Automatically notify support

No

**Related links** 

- Lenovo Support website

Latest level of DSA

• 405-801-000 : BRCM:TestMIIRegisters Test Aborted

The MII register test was canceled.

Recoverable

No

#### Severity Warning

Serviceable

No

#### Automatically notify support No

# Related links

- Lenovo Support website
- Latest level of DSA

# 405-802-000 : BRCM:TestEEPROM Test Aborted

The EEPROM test was canceled.

Recoverable

No

Severity Warning

Serviceable No

Automatically notify support No

# **Related links**

- Lenovo Support website

- Latest level of DSA

# • 405-803-000 : BRCM:TestInternalMemory Test Aborted

The internal memory test was canceled.

# Recoverable

No

Severity Warning

Serviceable

No

#### Automatically notify support No

# **Related links**

- Lenovo Support website

- Latest level of DSA

# • 405-804-000 : BRCM:TestInterrupt Test Aborted

The interrupt test was canceled.

Recoverable No

Severity Warning

Serviceable No

#### Automatically notify support

No

#### **Related links**

- Lenovo Support website
- <u>Latest level of DSA</u>

#### • 405-805-000 : BRCM:TestLoopbackMAC Test Aborted

Loopback testing at the MAC layer was canceled.

#### Recoverable

No

# Severity

Warning

# Serviceable

No

# Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA

# • 405-806-000 : BRCM:TestLoopbackPhysical Test Aborted

Loopback testing at the physical layer was canceled.

# Recoverable

No

Severity Warning

# Serviceable

No

# Automatically notify support

No

# **Related links**

- Lenovo Support website

Latest level of DSA

# • 405-807-000 : BRCM:TestLEDs Test Aborted

Verification of status LEDs was canceled.

# Recoverable

No

# Severity Warning

Serviceable No

# Automatically notify support

No

- Lenovo Support website
- Latest level of DSA

#### • 405-900-000 : BRCM:TestControlRegisters Test Failed

A failure was detected while testing internal MAC registers

#### Recoverable

No

Severity

Error

Serviceable

Yes

Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- <u>Lenovo Support website</u>
- Latest level of DSA

#### 405-901-000 : BRCM:TestMIIRegisters Test Failed

A failure was detected while testing internal PHY registers.

#### Recoverable

No

# Severity

Error

#### Serviceable

Yes

#### Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- <u>Lenovo Support website</u>
- Latest level of DSA
- 405-902-000 : BRCM:TestEEPROM Test Failed

A failure was detected while testing non-volatile RAM.

#### Recoverable

No

Severity

Error

Serviceable

Yes

#### Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 405-903-000 : BRCM:TestInternalMemory Test Failed

A failure was detected while testing internal memory.

#### Recoverable

No

Severity

Error

Serviceable

Yes

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

# **Related links**

- Lenovo Support website
- Latest level of DSA
- 405-904-000 : BRCM:TestInterrupt Test Failed

A failure was detected while testing interrupts.

Recoverable No Severity

Error

Serviceable

Yes

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### 405-905-000 : BRCM:TestLoopbackMAC Test Failed

BRCM:TestLoopbackMAC Test Failed.

Recoverable

No

Severity

Error

Serviceable

Yes

Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### • 405-906-000 : BRCM:TestLoopbackPhysical Test Failed

A failure was detected during the loopback test at the physical layer.

Recoverable No Severity Error Serviceable Yes Automatically notify support No User Response Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 405-907-000 : BRCM:TestLEDs Test Failed

A failure was detected while verifying operation of the status LEDs.

#### Recoverable

No

Severity Error

Serviceable

Yes

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### **DSA Brocade test results**

The following messages can result when you run the Brocade test.

#### Test results for the DSA Brocade test

The following messages can result when you run the DSA Brocade test.

#### • 218-000-000 : Brocade:MemoryTest Passed

The test passed.

Recoverable No Severity

Event

Serviceable No

Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 218-001-000 : Brocade:ExternalLoopbackTest Passed

The test passed.

#### Recoverable

No

٠

# Severity

Event

# Serviceable

No

# Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA

# 218-002-000 : Brocade:SerdesLoopbackTest Passed

The test passed.

Recoverable

No

Severity

Event

# Serviceable

No

#### Automatically notify support No

# **Related links**

- Lenovo Support website
- Latest level of DSA

# 218-003-000 : Brocade:PCILoopbackTest Passed

The test passed.

# Recoverable

No

•

# Severity

Event

# Serviceable

No

# Automatically notify support

No

- Lenovo Support website
- Latest level of DSA
- 218-004-000 : Brocade:ExternalEthLoopbackTest Passed

The test passed.

Recoverable

No

Severity Event

Lvent

Serviceable No

Automatically notify support

No

**Related links** 

- Lenovo Support website

- Latest level of DSA

• 218-005-000 : Brocade:SerdesEthLoopbackTest Passed

The test passed.

Recoverable No

Severity Event

Serviceable

No

Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA
- 218-006-000 : Brocade:InternalLoopbackTest Passed

The test passed.

Recoverable

No

Severity

Event

Serviceable No

Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 218-800-000 : Brocade:MemoryTest Aborted

The test was canceled.

Recoverable No

Severity

#### Warning

# Serviceable

No

#### Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 218-801-000 : Brocade:ExternalLoopbackTest Aborted

The test was canceled.

#### Recoverable

No

# Severity

Warning

# Serviceable

No

# Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA

# 218-802-000 : Brocade:SerdesLoopbackTest Aborted

The test was canceled.

# Recoverable

No

#### Severity Warning

Serviceable

No

Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA
- 218-803-000 : Brocade:PCILoopbackTest Aborted

The test was canceled.

Recoverable No

Severity Warning

Serviceable No

Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 218-804-000 : Brocade:ExternalEthLoopbackTest Aborted

The test was canceled.

#### Recoverable

No

# Severity

Warning

# Serviceable

No

# Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA

# 218-805-000 : Brocade:SerdesEthLoopbackTest Aborted

The test was canceled.

Recoverable

No

#### Severity Warning

varning

# Serviceable

No

#### Automatically notify support No

# **Related links**

- Lenovo Support website
- Latest level of DSA

# 218-806-000 : Brocade:InternalLoopbackTest Aborted

The test was canceled.

# Recoverable

No

# Severity

٠

Warning

Serviceable

No

# Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA

# • 218-900-000 : Brocade:MemoryTest Failed

A failure was detected while testing the adapter memory.

#### Recoverable

No

#### Severity

Error

# Serviceable

Yes

#### Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Rerun the test.
- 2. Verify whether the firmware is at proper level.
- 3. Rerun the test.
- 4. If the problem remains, contact your IBM technical-support representative.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

# • 218-901-000 : Brocade:ExternalLoopbackTest Failed

A failure was detected during the Loopback test.

#### Recoverable

No

Severity Error

# Serviceable

Yes

Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Check cable connections.
- 2. Rerun the test.
- 3. Verify whether the firmware is at proper level.
- 4. Rerun the test.
- 5. If the problem remains, contact your IBM technical-support representative.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### 218-902-000 : Brocade:SerdesLoopbackTest Failed

A failure was detected during the Loopback test.

#### Recoverable

No

# Severity

Error

# Serviceable

Yes

# Automatically notify support

No

# **User Response**

Complete the following steps:

- 1. Rerun the test.
- 2. Verify whether the firmware is at proper level.
- 3. Rerun the test.
- 4. If the problem remains, contact your IBM technical-support representative.

# **Related links**

- Lenovo Support website
- Latest level of DSA

# 218-903-000 : Brocade:PCILoopbackTest Failed

A failure was detected during the Loopback test.

Recoverable

No

# Severity

Error

#### Serviceable

Yes

#### Automatically notify support No

# User Response

Complete the following steps:

- 1. Rerun the test.
- 2. Verify whether the firmware is at proper level.
- 3. Rerun the test.
- 4. If the problem remains, contact your IBM technical-support representative.

# **Related links**

- Lenovo Support website
- Latest level of DSA

# • 218-904-000 : Brocade:ExternalEthLoopbackTest Failed

A failure was detected during the Loopback test.

Recoverable No Severity Error Serviceable

Yes

# Automatically notify support

No

# User Response

Complete the following steps:

- 1. Check or replace SFP/cable.
- 2. Rerun the test.
- 3. Verify whether the firmware is at proper level.
- 4. Rerun the test.
- 5. If the problem remains, contact your IBM technical-support representative.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### 218-905-000 : Brocade:SerdesEthLoopbackTest Failed

A failure was detected during the Loopback test.

Recoverable

No

Severity

Error

#### Serviceable

Yes

Automatically notify support

No

# User Response

Complete the following steps:

- 1. Rerun the test.
- 2. Verify whether the firmware is at proper level.
- 3. Rerun the test.
- 4. If the problem remains, contact your IBM technical-support representative.

# **Related links**

- Lenovo Support website
- Latest level of DSA

#### • 218-906-000 : Brocade:InternalLoopbackTest Failed

A failure was detected during the Loopback test.

# Recoverable

No

Severity Error

Serviceable Yes

# Automatically notify support

No

# User Response

Complete the following steps:

1. Rerun the test.

- 2. Verify whether the firmware is at proper level.
- 3. Rerun the test.
- 4. If the problem remains, contact your IBM technical-support representative.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

# **DSA Emulex adapter test results**

The following messages can result when you run the Emulex adapter test.

#### Test results for the DSA Emulex adapter test

The following messages can result when you run the DSA Emulex adapter test.

#### • 516-000-000 : ELXUCNA: NIC MAC LoopBackTest Passed

The test passed.

Recoverable No

Severity Event

Serviceable

No

Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA
- 516-001-000 : ELXUCNA: NIC PHY LoopBackTest Passed

The test passed.

Recoverable

No

Severity Event

Serviceable

No

Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA

# • 516-002-000 : ELXUCNA: ELXUCNA: NIC LED(Beacon)Test Passed

The test passed.

Recoverable No

Severity

Event

Serviceable

No

Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA

# 516-800-000 : ELXUCNA: NIC MAC LoopBackTest Aborted

Loopback testing at the MAC layer was canceled.

Recoverable

No

Severity

Warning

Serviceable

No

Automatically notify support No

#### **Related links**

- Lenovo Support website
- Latest level of DSA

# • 516-801-000 : ELXUCNA: NIC PHY LoopBackTest Aborted

Loopback testing at the physical layer was canceled.

# Recoverable

No

Severity Warning

Serviceable No

Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA

# • 516-802-000 : ELXUCNA: ELXUCNA: NIC LED(Beacon)Test Aborted

Verification of status LEDs was canceled.

Recoverable No

Severity Warning

Serviceable No

Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### 516-900-000 : ELXUCNA: NIC MAC LoopBackTest Failed

A failure was detected during the loopback test at the MAC layer.

#### Recoverable

No

# Severity

Error

# Serviceable

Yes

#### Automatically notify support

No

# **User Response**

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

# • 516-901-000 : ELXUCNA: NIC PHY LoopBackTest Failed

A failure was detected during the loopback test at the physical layer.

#### Recoverable

No

# Severity

Error

# Serviceable

Yes

# Automatically notify support

No

# User Response

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

- Lenovo Support website
- Latest level of DSA

#### • 516-902-000 : ELXUCNA: ELXUCNA: NIC LED(Beacon)Test Failed

A failure was detected while verifying operation of the status LEDs.

#### Recoverable

No

Severity Error

Serviceable

Yes

Automatically notify support

No

#### User Response

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

# **DSA Mellanox adapter test results**

The following messages can result when you run the Mellanox adapter test.

#### Test results for the DSA Mellanox adapter test

The following messages can result when you run the DSA Mellanox adapter test.

#### 408-000-000 : MLNX:MLNX\_DiagnosticTestEthernetPort Test Passed

Port Test Passed.

Recoverable No Severity Event Serviceable No Automatically notify support No Related links - Lenovo Support website - Latest level of DSA 408-001-000 : MLNX:MLNX\_DiagnosticTestIBPort Test Passed Port Test Passed.

Recoverable No

# Severity

Event

Serviceable

No

# Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA
- 408-800-000 : MLNX:MLNX\_DiagnosticTestEthernetPort Test Aborted

Port Test was canceled.

Recoverable

No

Severity

Warning

Serviceable

No

# Automatically notify support

No

# **Related links**

- Lenovo Support website

- Latest level of DSA

# 408-801-000 : MLNX:MLNX\_DiagnosticTestIBPort Test Aborted

Port Test was canceled.

Recoverable

No

# Severity

Warning

Serviceable

No

# Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA

# 408-900-000 : MLNX:MLNX\_DiagnosticTestEthernetPort Test Failed

Port Test Failed.

Recoverable No

Severity Error

Serviceable Yes

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Make sure that the physical link of the port under test in the active state.
- 2. If these condition was met but the test keeps failing the port's adapter might be faulty.
- 3. Try replacing the adapter and repeating the test.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### • 408-901-000 : MLNX:MLNX\_DiagnosticTestIBPort Test Failed

Port Test Failed.

#### Recoverable

No

# Severity

Error

# Serviceable

Yes

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Make sure that the physical link of the port under test in the active state and a subnet manager running on the fabric to which the port is attached.
- 2. If these condition was met but the test keeps failing the port's adapter might be faulty.
- 3. Try replacing the adapter and repeating the test.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

# **DSA EXA port ping test results**

The following messages can result when you run the EXA port ping test.

#### Test results for the DSA EXA port ping test

The following messages can result when you run the DSA EXA port ping test.

# • 401-000-000 : EXA Port Ping Test Passed

EXA Port Ping Test Passed.

Recoverable No

Severity Event

Serviceable No

#### Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA
- 401-801-000 : EXA Port Ping Test Aborted

EXA Port Ping Test Aborted. Unable to get device base address.

#### Recoverable

No

Severity Warning

# Serviceable

Yes

# Automatically notify support

No

# **User Response**

Complete the following steps:

- 1. Remove power cables, wait for 45 seconds, reconnect and rerun the test.
- 2. Make sure that the scalability cable connections are as per specification.
- 3. Make sure that DSA and BIOS/uEFI are at the latest level.
- 4. If the problem remains, contact your technical-service representative.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 401-802-000 : EXA Port Ping Test Aborted

EXA Port Ping Test Aborted. Port connections may not be correct.

#### Recoverable

No

#### Severity

Warning

# Serviceable

Yes

# Automatically notify support

No

# User Response

Complete the following steps:

- 1. Remove power cables, wait for 45 seconds, reconnect and rerun the test.
- 2. Make sure that the scalability cable connections are as per specification.
- 3. Make sure that DSA and BIOS/uEFI are at the latest level.
- 4. If the problem remains, contact your technical-service representative.

- Lenovo Support website
- Latest level of DSA

#### • 401-901-001 : EXA Port Ping Test Failed

EXA Port Ping Test Failed.

Recoverable

No

Severity Error

Serviceable Yes

Automatically notify support

No

# User Response

Complete the following steps:

- 1. Remove power cables, wait for 45 seconds, reconnect and rerun the test.
- 2. Make sure that the scalability cable connections are as per specification.
- 3. Check scalability cables for loose connections.
- 4. Replace the scalability cable(s) for specified port(s).
- 5. If the problem remains, contact your technical-service representative.

# **Related links**

- Lenovo Support website
- Latest level of DSA

# **DSA Intel network test results**

The following messages can result when you run the Intel network test.

# Test results for the DSA Intel network test

The following messages can result when you run the DSA Intel network test.

# • 406-000-000 : IANet:Registers Test Passed

The test passed.

Recoverable

No Severity

Event

Serviceable No

Automatically notify support No

Related links

- Lenovo Support website

- Latest level of DSA
- 406-001-000 : IANet:EEPROM Test Passed

The test passed.

Recoverable No Severity

Event

Serviceable

No

#### Automatically notify support No

# **Related links**

- Lenovo Support website
- Latest level of DSA
- 406-002-000 : IANet:FIFO Test Passed

The test passed.

Recoverable

No

Severity

Event

Serviceable

No

Automatically notify support No

# **Related links**

- Lenovo Support website

- Latest level of DSA

• 406-003-000 : IANet:Interrupts Test Passed

The test passed.

Recoverable

No

Severity

Event

Serviceable

No

# Automatically notify support No

# **Related links**

- Lenovo Support website
- Latest level of DSA

• 406-004-000 : IANet:Loopback Test Passed

The test passed.

Recoverable

No

Severity Event

Serviceable No

#### Automatically notify support

No

# **Related links**

- Lenovo Support website
- Latest level of DSA
- 406-800-000 : IANet:Registers Test Aborted

Registers test was canceled.

#### Recoverable

No

Severity Warning

# Serviceable

No

#### Automatically notify support No

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 406-801-000 : IANet:EEPROM Test Aborted

EEPROM test was canceled.

#### Recoverable

No

Severity Warning

Serviceable No

Automatically notify support No

# **Related links**

- Lenovo Support website

- Latest level of DSA
- 406-802-000 : IANet:FIFO Test Aborted

FIFO test was canceled.

#### Recoverable

No

Severity Warning

Serviceable No

# Automatically notify support

NO

- Lenovo Support website
- Latest level of DSA

#### • 406-803-000 : IANet:Interrupts Test Aborted

Interrupt test was canceled.

#### Recoverable

No

Severity

Warning

Serviceable No

Automatically notify support

No

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 406-804-000 : IANet:Loopback Test Aborted

Loopback test was canceled.

#### Recoverable

No

Severity Warning

Serviceable

No

Automatically notify support No

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 406-900-000 : IANet:Registers Test Failed

A failure was detected during the Registers test.

#### Recoverable

No

Severity Error

Serviceable Yes

#### Automatically notify support

No

# **User Response**

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### • 406-901-000 : IANet:EEPROM Test Failed

A failure was detected during the EEPROM test.

Recoverable

No

Severity Error

Serviceable

Yes

#### Automatically notify support

No

# **User Response**

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA
- 406-902-000 : IANet:FIFO Test Failed

A failure was detected during the FIFO test.

# Recoverable

No

Severity Error

Serviceable

Yes

# Automatically notify support

No

# User Response

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

- Lenovo Support website
  - Latest level of DSA
- 406-903-000 : IANet:Interrupts Test Failed

A failure was detected during the Interrupt test.

#### Recoverable

No

# Severity

Error

# Serviceable

Yes

#### Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 2. Rerun the test.
- 3. Check interrupt assignments in the PCI Hardware section of the DSA Diagnostic Log. If the ethernet device is sharing interrupts, if possible modify the interrupt assignments using F1 Setup to assign a unique interrupt to the device.
- 4. Rerun the test.
- 5. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

#### **Related links**

- Lenovo Support website
- Latest level of DSA

#### • 406-904-000 : IANet:Loopback Test Failed

A failure was detected during the Loopback test.

#### Recoverable

No

#### Severity

Error

# Serviceable

Yes

# Automatically notify support

No

#### **User Response**

Complete the following steps:

- 1. Check the Ethernet cable for damage and ensure correct cable type and attachment.
- 2. Check component firmware level and upgrade if necessary. The installed firmware level can be found in the DSA Diagnostic Event Log within the Firmware/VPD section for this component.
- 3. Rerun the test.
- 4. If failure remains, refer to "Troubleshooting by symptom" in the system "Installation and Service Guide" for the next corrective action.

- Lenovo Support website
- Latest level of DSA

# **Event messages**

Use this information to review event messages and resolve many errors.

**Note:** IMM and UEFI events related to communications errors can take up to 20 minutes to be displayed in the CMM event log.

When viewing event messages in the CMM event log, look for events that might have occurred earlier in the log that are related to the problem you are experiencing. For example, if you see an event for a microprocessor bus error, look for errors relating to memory that could also be the cause of this error.

# **IMM** messages

When a hardware event is detected by the IMM on a Lenovo Flex System x240 M5 compute node, the IMM logs that event in the system-event log in the compute node. In addition, the IMM sends that event to the CMM and to the Lenovo XClarity Administrator (if installed) or the Flex System Manager management software (if installed).

For each event code, the following fields are displayed:

#### **Event identifier**

A hexadecimal identifier that uniquely identifies an event or class of events. In this documentation, the event identifiers are prefixed with 0x and followed by eight characters.

#### **Event description**

The logged message string that appears for an event. When the event string is displayed in the systemevent log, information such as a specific component is displayed. In this documentation, that additional information appears as variables, such as [arg1] or [arg2].

#### Explanation

Additional information to explain why the event occurred.

#### Severity

An indication of the level of concern for the condition. In the system-event log, the severity is abbreviated to the first character. The following severities can be displayed:

- Info: The event was recorded for audit purposes. This is usually a user action or a change of states that is normal behavior.
- **Warning:** The event is not as severe as an error, but if possible, the condition should be corrected before it becomes an error. It might also be a condition that requires additional monitoring or maintenance.
- Error: The event is a failure or critical condition that impairs service or an expected function.

#### **Alert Category**

Similar events are grouped in categories. The alert category is in the following format:

#### severity - device component

severity is one of the following severity levels:

- Critical: A key component in the server is no longer functioning.
- Warning: The event might progress to a critical level.
- **System:** The event is the result of a system error or a configuration change.

device component is the specific device in the compute node that caused the event to be generated.

#### Serviceable

Whether user action is required to correct the problem.

#### **CIM** Information

The prefix of the message ID and the sequence number that is used by the CIM message registry.

#### **SNMP** Trap ID

The SNMP trap ID that is found in the SNMP alert management information base (MIB).

#### Automatically notify Support

If this field is set to **Yes** and you have enabled Call Home on the Lenovo XClarity Administrator (if installed) or Electronic Service Agent (ESA) on the Flex System Manager management software (if installed), Lenovo Support will be notified automatically if the event is generated.

If the Lenovo XClarity Administrator or Flex System Manager management software is not installed, you can enable automatic notification of Lenovo Support from the CMM web interface.

While you wait for Lenovo Support to call, you can perform the recommended actions for the event.

#### **User response**

The actions that you should perform to solve the event.

Perform the steps listed in this section in the order shown until the problem is solved. After you perform all of the actions that are described in this field, if you cannot solve the problem, contact Lenovo Support.

Note: This list includes error codes and messages that might not apply to this machine type and model.

# List of IMM events

This section lists all messages that can be sent from the IMM.

#### • 40000001-000000000 : Management Controller [arg1] Network Initialization Complete. ()

This message is for the use case where a Management Controller network has completed initialization.

May also be shown as 400000010000000 or 0x4000000100000000

Severity Info Serviceable No Automatically notify support No Alert Category System - IMM Network event SNMP Trap ID 37

CIM Information Prefix: IMM ID: 0001

User Response Information only; no action is required.

#### 40000002-00000000 : Certificate Authority [arg1] has detected a [arg2] Certificate Error. ()

This message is for the use case when there is an error with an SSL Server, SSL Client, or SSL Trusted CA Certificate.

May also be shown as 4000000200000000 or 0x4000000200000000

Severity

Error

Serviceable No

......

Automatically notify support No

Alert Category System - SSL certification

SNMP Trap ID 22 CIM Information

Prefix: IMM ID: 0002

User Response

Make sure that the certificate that you are importing is correct and properly generated.

# • 40000003-00000000 : Ethernet Data Rate modified from [arg1] to [arg2] by user [arg3]. ()

This message is for the use case where a user modifies the Ethernet Port data rate.

May also be shown as 400000030000000 or 0x400000030000000

Severity Info

Serviceable No

Automatically notify support No Alert Category

none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0003

#### **User Response**

Information only; no action is required.

# • 40000004-000000000 : Ethernet Duplex setting modified from [arg1] to [arg2] by user [arg3]. ()

This message is for the use case where A user modifies the Ethernet Port duplex setting.

May also be shown as 400000040000000 or 0x4000000400000000

Severity Info Serviceable No Automatically notify support No

#### Alert Category none

#### **SNMP** Trap ID

CIM Information Prefix: IMM ID: 0004

#### **User Response**

Information only; no action is required.

#### • 40000005-00000000 : Ethernet MTU setting modified from [arg1] to [arg2] by user [arg3]. ()

This message is for the use case where a user modifies the Ethernet Port MTU setting.

May also be shown as 400000050000000 or 0x400000050000000

Severity Info Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0005

#### **User Response**

Information only; no action is required.

# 40000006-00000000 : Ethernet locally administered MAC address modified from [arg1] to [arg2] by user [arg3]. ()

This message is for the use case where a user modifies the Ethernet Port MAC address setting.

May also be shown as 40000060000000 or 0x400000060000000

Severity Info Serviceable No Automatically notify support No Alert Category none SNMP Trap ID CIM Information Prefix: IMM ID: 0006

**User Response** 

Information only; no action is required.

### • 40000007-00000000 : Ethernet interface [arg1] by user [arg2]. ()

This message is for the use case where a user enables or disabled the ethernet interface.

May also be shown as 4000000700000000 or 0x4000000700000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information

Prefix: IMM ID: 0007

User Response Information only; no action is required.

### • 40000008-00000000 : Hostname set to [arg1] by user [arg2]. ()

This message is for the use case where user modifies the Hostname of a Management Controller.

May also be shown as 400000080000000 or 0x400000080000000

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - IMM Network event

SNMP Trap ID 37

CIM Information Prefix: IMM ID: 0008

User Response Information only; no action is required.

40000009-00000000 : IP address of network interface modified from [arg1] to [arg2] by user [arg3].
 ()

This message is for the use case where user modifies the IP address of a Management Controller.

May also be shown as 400000090000000 or 0x400000090000000

Severity

Info

Serviceable No

Automatically notify support

No

Alert Category System - IMM Network event

SNMP Trap ID 37

CIM Information Prefix: IMM ID: 0009

### **User Response**

Information only; no action is required.

## • 4000000a-00000000 : IP subnet mask of network interface modified from [arg1] to [arg2] by user [arg3]. ()

This message is for the use case where a user modifies the IP subnet mask of a Management Controller.

May also be shown as 4000000a0000000 or 0x4000000a0000000

Severity Info Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0010

**User Response** 

Information only; no action is required.

### • 4000000b-000000000 : IP address of default gateway modified from [arg1] to [arg2] by user [arg3]. ()

This message is for the use case where a user modifies the default gateway IP address of a Management Controller.

May also be shown as 4000000b0000000 or 0x4000000b00000000

Severity Info Serviceable No Automatically notify support No Alert Category none

### **SNMP Trap ID**

CIM Information

Prefix: IMM ID: 0011

### User Response

Information only; no action is required.

### • 4000000c-00000000 : OS Watchdog response [arg1] by [arg2] . ()

This message is for the use case where an OS Watchdog has been enabled or disabled by a user.

May also be shown as 4000000c0000000 or 0x4000000c00000000

Severity

Warning

Serviceable No

### Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0012

### User Response

.

Information only; no action is required.

### 4000000d-00000000 : DHCP[[arg1]] failure, no IP address assigned. ()

This message is for the use case where a DHCP server fails to assign an IP address to a Management Controller.

Severity Warning Serviceable No Automatically notify support No

Alert Category none

**SNMP** Trap ID

**CIM Information** 

Prefix: IMM ID: 0013

User Response

Complete the following steps until the problem is solved:

- 1. Make sure that the IMM network cable is connected.
- 2. Make sure that there is a DHCP server on the network that can assign an IP address to the IMM.
- 4000000e-000000000 : Remote Login Successful. Login ID: [arg1] using [arg2] from [arg3] at IP address [arg4]. ()

This message is for the use case where a user successfully logs in to a Management Controller.

May also be shown as 4000000e00000000 or 0x4000000e00000000

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Remote Login

SNMP Trap ID 30

CIM Information Prefix: IMM ID: 0014

### **User Response**

Information only; no action is required.

### 4000000f-000000000 : Attempting to [arg1] server [arg2] by user [arg3]. ()

This message is for the use case where a user is using the Management Controller to perform a power function on the system.

May also be shown as 4000000f0000000 or 0x4000000f00000000

Severity Info Serviceable

No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0015

User Response

Information only; no action is required.

• 40000010-00000000 : Security: Userid: [arg1] using [arg2] had [arg3] login failures from WEB client at IP address [arg4]. ()

This message is for the use case where a user has failed to log in to a Management Controller from a web browser.

May also be shown as 400000100000000 or 0x400000100000000

Severity

Warning

### Serviceable

No

#### Automatically notify support No

### **Alert Category**

System - Remote Login

**SNMP** Trap ID

30

CIM Information Prefix: IMM ID: 0016

### **User Response**

Complete the following steps until the problem is solved:

- 1. Make sure that the correct login ID and password are being used.
- 2. Have the system administrator reset the login ID or password.

### • 40000011-00000000 : Security: Login ID: [arg1] had [arg2] login failures from CLI at [arg3]. ()

This message is for the use case where a user has failed to log in to a Management Controller from the Legacy CLI.

May also be shown as 4000001100000000 or 0x4000001100000000

Severity Warning

Serviceable No

Automatically notify support No

Alert Category System - Remote Login

SNMP Trap ID 30

CIM Information Prefix: IMM ID: 0017

### User Response

Complete the following steps until the problem is solved:

- 1. Make sure that the correct login ID and password are being used.
- 2. Have the system administrator reset the login ID or password.
- 40000012-00000000 : Remote access attempt failed. Invalid userid or password received. Userid is [arg1] from WEB browser at IP address [arg2]. ()

This message is for the use case where a remote user has failed to establish a remote control session from a Web browser session.

May also be shown as 4000001200000000 or 0x4000001200000000

Severity Info

Serviceable

No

Automatically notify support No

Alert Category System - Remote Login

SNMP Trap ID 30

CIM Information Prefix: IMM ID: 0018

**User Response** 

Make sure that the correct login ID and password are being used.

• 40000013-00000000 : Remote access attempt failed. Invalid userid or password received. Userid is [arg1] from TELNET client at IP address [arg2]. ()

This message is for the use case where a user has failed to log in to a Management Controller from a telnet session.

May also be shown as 400000130000000 or 0x400000130000000

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Remote Login

SNMP Trap ID 30

CIM Information Prefix: IMM ID: 0019

### **User Response**

Make sure that the correct login ID and password are being used.

### 40000014-00000000 : The [arg1] on system [arg2] cleared by user [arg3]. ()

This message is for the use case where a Management Controller Event Log on a system is cleared by a user.

May also be shown as 4000001400000000 or 0x4000001400000000

Severity Info Serviceable No

Automatically notify support

No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0020

### **User Response**

Information only; no action is required.

### • 40000015-00000000 : Management Controller [arg1] reset was initiated by user [arg2]. ()

This message is for the use case where a Management Controller reset is initiated by a user.

May also be shown as 400000150000000 or 0x400000150000000

Severity Info Serviceable No Automatically notify support No Alert Category none SNMP Trap ID

CIM Information Prefix: IMM ID: 0021

User Response Information only; no action is required.

## • 40000016-00000000 : ENET[[arg1]] DHCP-HSTN=[arg2], DN=[arg3], IP@=[arg4], SN=[arg5], GW@= [arg6], DNS1@=[arg7] . ()

This message is for the use case where a Management Controller IP address and configuration has been assigned by the DHCP server.

May also be shown as 400000160000000 or 0x400000160000000

Severity Info Serviceable No

Automatically notify support

No

Alert Category none

SNMP Trap ID

**CIM** Information

### Prefix: IMM ID: 0022

#### **User Response**

Information only; no action is required.

### 40000017-00000000 : ENET[[arg1]] IP-Cfg:HstName=[arg2], IP@=[arg3] ,NetMsk=[arg4], GW@= [arg5] . ()

This message is for the use case where a Management Controller IP address and configuration has been assigned statically using user data.

May also be shown as 4000001700000000 or 0x4000001700000000

Severity Info Serviceable No

Automatically notify support No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0023

### **User Response**

Information only; no action is required.

### 40000018-00000000 : LAN: Ethernet[[arg1]] interface is no longer active. ()

This message is for the use case where a Management Controller ethernet interface is no longer active.

May also be shown as 400000180000000 or 0x400000180000000

Severity Info Serviceable No Automatically notify support No Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0024

### **User Response**

Information only; no action is required.

### 40000019-00000000 : LAN: Ethernet[[arg1]] interface is now active. ()

This message is for the use case where a Management Controller ethernet interface is now active.

May also be shown as 400000190000000 or 0x400000190000000

Severity Info

inio

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0025

### User Response

Information only; no action is required.

### • 4000001a-00000000 : DHCP setting changed to [arg1] by user [arg2]. ()

This message is for the use case where a user changes the DHCP setting.

May also be shown as 4000001a00000000 or 0x4000001a00000000

Severity Info

Serviceable No

Automatically notify support No Alert Category

none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0026

### **User Response**

Information only; no action is required.

## • 4000001b-00000000 : Management Controller [arg1]: Configuration restored from a file by user [arg2]. ()

This message is for the use case where a user restores a Management Controller configuration from a file.

May also be shown as 4000001b0000000 or 0x4000001b0000000

Severity Info Serviceable

No

Automatically notify support

No

#### Alert Category none

### **SNMP Trap ID**

### **CIM Information** Prefix: IMM ID: 0027

### User Response

Information only; no action is required.

### 4000001c-00000000 : Watchdog [arg1] Screen Capture Occurred . ()

This message is for the use case where an operating system error has occurred and the screen was captured.

May also be shown as 4000001c00000000 or 0x4000001c00000000

Severity Info

Serviceable

No

Automatically notify support No

**Alert Category** System - other

**SNMP Trap ID** 22

**CIM Information** Prefix: IMM ID: 0028

### **User Response**

If there was no operating-system error, complete the following steps until the problem is solved:

- 1. Reconfigure the watchdog timer to a higher value.
- 2. Make sure that the IMM Ethernet-over-USB interface is enabled.
- 3. Reinstall the RNDIS or cdc\_ether device driver for the operating system.
- 4. Disable the watchdog.

If there was an operating-system error, check the integrity of the installed operating system.

#### 4000001d-00000000 : Watchdog [arg1] Failed to Capture Screen. () ٠

This message is for the use case where an operating system error has occurred and the screen capture failed.

May also be shown as 4000001d00000000 or 0x4000001d00000000

Severity Error Serviceable No

### Automatically notify support

No

### Alert Category

System - other

SNMP Trap ID

22

CIM Information Prefix: IMM ID: 0029

### User Response

Complete the following steps until the problem is solved:

- 1. Reconfigure the watchdog timer to a higher value.
- 2. Make sure that the IMM Ethernet over USB interface is enabled.
- 3. Reinstall the RNDIS or cdc\_ether device driver for the operating system.
- 4. Disable the watchdog. Check the integrity of the installed operating system.
- 5. Update the IMM firmware. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.

### • 4000001e-00000000 : Running the backup Management Controller [arg1] main application. ()

This message is for the use case where a Management Controller has resorted to running the backup main application.

May also be shown as 4000001e00000000 or 0x4000001e00000000

Severity Warning Serviceable No Automatically notify support No

Alert Category System - other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0030

### **User Response**

Update the IMM firmware. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.

### 4000001f-00000000 : Please ensure that the Management Controller [arg1] is flashed with the correct firmware. The Management Controller is unable to match its firmware to the server. ()

This message is for the use case where a Management Controller firmware version does not match the server.

May also be shown as 4000001f00000000 or 0x4000001f00000000

### Severity

Error

Serviceable No

Automatically notify support

No

Alert Category System - other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0031

### **User Response**

Update the IMM firmware to a version that the server supports. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.

40000020-00000000 : Management Controller [arg1] Reset was caused by restoring default values.
 ()

This message is for the use case where a Management Controller has been reset due to a user restoring the configuration to default values.

May also be shown as 400000200000000 or 0x400000200000000

Severity Info Serviceable No Automatically notify support No Alert Category none SNMP Trap ID

CIM Information Prefix: IMM ID: 0032

**User Response** 

Information only; no action is required.

### • 40000021-00000000 : Management Controller [arg1] clock has been set from NTP server [arg2]. ()

This message is for the use case where a Management Controller clock has been set from the Network Time Protocol server.

May also be shown as 4000002100000000 or 0x4000002100000000

Severity Info Serviceable No

### Automatically notify support

No

Alert Category none

**SNMP** Trap ID

### CIM Information

Prefix: IMM ID: 0033

### **User Response**

Information only; no action is required.

# • 40000022-00000000 : SSL data in the Management Controller [arg1] configuruation data is invalid. Clearing configuration data region and disabling SSL. ()

This message is for the use case where a Management Controller has detected invalid SSL data in the configuration data and is clearing the configuration data region and disabling the SSL.

May also be shown as 400000220000000 or 0x400000220000000

Severity Error

Serviceable No

Automatically notify support No

Alert Category System - other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0034

### **User Response**

Complete the following steps until the problem is solved:

- 1. Make sure that the certificate that you are importing is correct.
- 2. Try to import the certificate again.

### • 40000023-00000000 : Flash of [arg1] from [arg2] succeeded for user [arg3] . ()

This message is for the use case where a user has successfully flashed the firmware component (MC Main Application, MC Boot ROM, BIOS, Diagnostics, System Power Backplane, Remote Expansion Enclosure Power Backplane, Integrated System Managem

May also be shown as 400000230000000 or 0x400000230000000

Severity Info Serviceable No Automatically notify support

No

### Alert Category none

### **SNMP** Trap ID

## CIM Information

Prefix: IMM ID: 0035

### **User Response**

Information only; no action is required.

### • 40000024-00000000 : Flash of [arg1] from [arg2] failed for user [arg3]. ()

This message is for the use case where a user has not flashed the firmware component from the interface and IP address due to a failure.

May also be shown as 4000002400000000 or 0x4000002400000000

Severity Info Serviceable No Automatically notify support No Alert Category System - other SNMP Trap ID 22 CIM Information Prefix: IMM ID: 0036 User Response

Information only; no action is required.

### • 40000025-00000000 : The [arg1] on system [arg2] is 75% full. ()

This message is for the use case where a Management Controller Event Log on a system is 75% full.

May also be shown as 4000002500000000 or 0x4000002500000000

### Severity Info Serviceable No Automatically notify support No Alert Category System - Event Log 75% full SNMP Trap ID 35 CIM Information Prefix: IMM ID: 0037

**User Response** 

Information only; no action is required.

### • 40000026-00000000 : The [arg1] on system [arg2] is 100% full. ()

This message is for the use case where a Management Controller Event Log on a system is 100% full. May also be shown as 400000260000000 or 0x4000002600000000

Severity Info

Serviceable

No

Automatically notify support No

Alert Category

System - Event Log 75% full

SNMP Trap ID 35

CIM Information Prefix: IMM ID: 0038

### **User Response**

To avoid losing older log entries, save the log as a text file and clear the log.

### • 40000027-00000000 : Platform Watchdog Timer expired for [arg1]. ()

This message is for the use case when an implementation has detected a Platform Watchdog Timer Expired

May also be shown as 4000002700000000 or 0x4000002700000000

### Severity

Error

Serviceable No

Automatically notify support

No

Alert Category System - OS Timeout

SNMP Trap ID

21

CIM Information Prefix: IMM ID: 0039

### **User Response**

Complete the following steps until the problem is solved:

- 1. Reconfigure the watchdog timer to a higher value.
- 2. Make sure that the IMM Ethernet-over-USB interface is enabled.
- 3. Reinstall the RNDIS or cdc\_ether device driver for the operating system.
- 4. Disable the watchdog.
- 5. Check the integrity of the installed operating system.

### 

This message is for the use case where a user has generated a Test Alert.

May also be shown as 400000280000000 or 0x400000280000000

Severity Info Serviceable No Automatically notify support No Alert Category System - other SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0040

User Response Information only; no action is required.

40000029-00000000 : Security: Userid: [arg1] using [arg2] had [arg3] login failures from an SSH client at IP address [arg4]. ()

This message is for the use case where a user has failed to log in to a Management Controller from SSH.

May also be shown as 400000290000000 or 0x400000290000000

Severity Info

Serviceable No

Automatically notify support

No

Alert Category

System - Remote Login

SNMP Trap ID

30

CIM Information Prefix: IMM ID: 0041

### **User Response**

Complete the following steps until the problem is solved:

- 1. Make sure that the correct login ID and password are being used.
- 2. Have the system administrator reset the login ID or password.
- 4000002a-00000000 : [arg1] firmware mismatch internal to system [arg2]. Please attempt to flash the [arg3] firmware. ()

This message is for the use case where a specific type of firmware mismatch has been detected.

May also be shown as 4000002a00000000 or 0x4000002a00000000

Severity Error

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0042

User Response Reflash the IMM firmware to the latest version.

### • 4000002b-00000000 : Domain name set to [arg1]. ()

Domain name set by user

May also be shown as 4000002b0000000 or 0x4000002b0000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0043

User Response

Information only; no action is required.

### 4000002c-00000000 : Domain Source changed to [arg1] by user [arg2]. ()

Domain source changed by user

May also be shown as 4000002c0000000 or 0x4000002c0000000

Severity Info

٠

Serviceable No

Automatically notify support No

Alert Category none

### **SNMP** Trap ID

CIM Information

Prefix: IMM ID: 0044

### **User Response**

Information only; no action is required.

### 4000002d-00000000 : DDNS setting changed to [arg1] by user [arg2]. ()

DDNS setting changed by user

May also be shown as 4000002d0000000 or 0x4000002d0000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0045

### **User Response**

Information only; no action is required.

### • 4000002e-00000000 : DDNS registration successful. The domain name is [arg1]. ()

DDNS registation and values

May also be shown as 4000002e00000000 or 0x4000002e00000000

Severity Info Serviceable No Automatically notify support No Alert Category none SNMP Trap ID

CIM Information Prefix: IMM ID: 0046

User Response Information only; no action is required.

4000002f-00000000 : IPv6 enabled by user [arg1]. ()

### IPv6 protocol is enabled by user

May also be shown as 4000002f0000000 or 0x4000002f00000000

### Severity

Info

Serviceable No

### Automatically notify support No

Alert Category none

### **SNMP** Trap ID

CIM Information Prefix: IMM ID: 0047

### **User Response**

Information only; no action is required.

### • 40000030-00000000 : IPv6 disabled by user [arg1] . ()

IPv6 protocol is disabled by user

May also be shown as 400000300000000 or 0x400000300000000

### Severity

Info

### Serviceable No

### Automatically notify support No

Alert Category none

### **SNMP Trap ID**

CIM Information Prefix: IMM ID: 0048

### User Response

Information only; no action is required.

### • 40000031-00000000 : IPv6 static IP configuration enabled by user [arg1]. ()

IPv6 static address assignment method is enabled by user

May also be shown as 400000310000000 or 0x400000310000000

Severity Info

Serviceable No

### Automatically notify support

No

### Alert Category none

### **SNMP** Trap ID

**CIM Information** 

Prefix: IMM ID: 0049

### User Response Information only; no action is required.

### • 40000032-00000000 : IPv6 DHCP enabled by user [arg1]. ()

IPv6 DHCP assignment method is enabled by user

May also be shown as 400000320000000 or 0x400000320000000

**Severity** Info

Serviceable No

Automatically notify support

No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0050

User Response Information only; no action is required.

### • 40000033-00000000 : IPv6 stateless auto-configuration enabled by user [arg1]. ()

IPv6 statless auto-assignment method is enabled by user

May also be shown as 400000330000000 or 0x400000330000000

Severity Info Serviceable No Automatically notify support No Alert Category none SNMP Trap ID

CIM Information Prefix: IMM ID: 0051

### **User Response**

Information only; no action is required.

### • 40000034-00000000 : IPv6 static IP configuration disabled by user [arg1]. ()

IPv6 static assignment method is disabled by user

May also be shown as 400000340000000 or 0x400000340000000

Severity Info

Serviceable

No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0052

User Response Information only; no action is required.

### • 40000035-00000000 : IPv6 DHCP disabled by user [arg1]. ()

IPv6 DHCP assignment method is disabled by user

May also be shown as 400000350000000 or 0x400000350000000

Severity

Info

Serviceable No

Automatically notify support

No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0053

User Response Information only; no action is required.

### • 40000036-00000000 : IPv6 stateless auto-configuration disabled by user [arg1]. ()

IPv6 statless auto-assignment method is disabled by user

May also be shown as 400000360000000 or 0x400000360000000

Severity

Info

Serviceable No

Automatically notify support

No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0054

### **User Response**

Information only; no action is required.

### • 40000037-00000000 : ENET[[arg1]] IPv6-LinkLocal:HstName=[arg2], IP@=[arg3] ,Pref=[arg4] . ()

IPv6 Link Local address is active

May also be shown as 400000370000000 or 0x400000370000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0055

**User Response** 

Information only; no action is required.

### 40000038-00000000 : ENET[[arg1]] IPv6-Static:HstName=[arg2], IP@=[arg3] ,Pref=[arg4], GW@= [arg5] . ()

IPv6 Static address is active

May also be shown as 400000380000000 or 0x400000380000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

### **SNMP Trap ID**

CIM Information Prefix: IMM ID: 0056

### **User Response**

Information only; no action is required.

### • 40000039-00000000 : ENET[[arg1]] DHCPv6-HSTN=[arg2], DN=[arg3], IP@=[arg4], Pref=[arg5]. ()

IPv6 DHCP-assigned address is active

May also be shown as 400000390000000 or 0x400000390000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0057

### **User Response**

Information only; no action is required.

 4000003a-00000000 : IPv6 static address of network interface modified from [arg1] to [arg2] by user [arg3]. ()

A user modifies the IPv6 static address of a Management Controller

May also be shown as 4000003a0000000 or 0x4000003a0000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0058

User Response

Information only; no action is required.

### • 4000003b-00000000 : DHCPv6 failure, no IP address assigned. ()

S DHCP6 server fails to assign an IP address to a Management Controller.

May also be shown as 4000003b0000000 or 0x4000003b0000000

### Severity Warning Serviceable No Automatically notify support No Alert Category none SNMP Trap ID

CIM Information Prefix: IMM ID: 0059

### **User Response**

Complete the following steps until the problem is solved:

- 1. Make sure that the IMM network cable is connected.
- 2. Make sure that there is a DHCPv6 server on the network that can assign an IP address to the IMM.

### 4000003c-00000000 : Platform Watchdog Timer expired for [arg1]. ()

An implementation has detected an OS Loader Watchdog Timer Expired

May also be shown as 4000003c0000000 or 0x4000003c0000000

Severity Error

### Serviceable

No

Automatically notify support

No

Alert Category System - Loader timeout

SNMP Trap ID 26

CIM Information Prefix: IMM ID: 0060

### **User Response**

- 1. Reconfigure the watchdog timer to a higher value.
- 2. Make sure that the IMM Ethernet over USB interface is enabled.
- 3. Reinstall the RNDIS or cdc\_ether device driver for the operating system.
- 4. Disable the watchdog.
- 5. Check the integrity of the installed operating system.

### • 4000003d-00000000 : Telnet port number changed from [arg1] to [arg2] by user [arg3]. ()

A user has modified the telnet port number

May also be shown as 4000003d0000000 or 0x4000003d0000000

Severity Info Serviceable No Automatically notify support No Alert Category none **SNMP Trap ID CIM Information** Prefix: IMM ID: 0061 User Response Information only; no action is required. 4000003e-00000000 : SSH port number changed from [arg1] to [arg2] by user [arg3]. () A user has modified the SSH port number May also be shown as 4000003e0000000 or 0x4000003e00000000 Severity Info

Serviceable No

٠

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0062

User Response Information only; no action is required.

### • 4000003f-00000000 : Web-HTTP port number changed from [arg1] to [arg2] by user [arg3]. ()

A user has modified the Web HTTP port number

May also be shown as 4000003f0000000 or 0x4000003f0000000

Severity Info

Serviceable No

### Automatically notify support

No

Alert Category none

### **SNMP** Trap ID

CIM Information Prefix: IMM ID: 0063

### User Response Information only; no action is required.

### • 40000040-00000000 : Web-HTTPS port number changed from [arg1] to [arg2] by user [arg3]. ()

A user has modified the Web HTTPS port number

May also be shown as 400000400000000 or 0x400000400000000

Severity Info Serviceable No Automatically notify support No Alert Category

none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0064

User Response Information only; no action is required.

### • 40000041-00000000 : CIM/XML HTTP port number changed from [arg1] to [arg2] by user [arg3]. ()

A user has modified the CIM HTTP port number

May also be shown as 4000004100000000 or 0x4000004100000000

Severity Info Serviceable No Automatically notify support No Alert Category

none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0065

### **User Response**

Information only; no action is required.

• 40000042-00000000 : CIM/XML HTTPS port number changed from [arg1] to [arg2] by user [arg3]. ()

A user has modified the CIM HTTPS port number

May also be shown as 4000004200000000 or 0x4000004200000000

Severity Info

Serviceable

No

Automatically notify support No

Alert Category none

**SNMP Trap ID** 

CIM Information Prefix: IMM ID: 0066

User Response Information only; no action is required.

• 40000043-00000000 : SNMP Agent port number changed from [arg1] to [arg2] by user [arg3]. ()

A user has modified the SNMP Agent port number

May also be shown as 400000430000000 or 0x400000430000000

Severity Info

Inio

Serviceable No

Automatically notify support

No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0067

User Response Information only; no action is required.

### • 40000044-00000000 : SNMP Traps port number changed from [arg1] to [arg2] by user [arg3]. ()

A user has modified the SNMP Traps port number

May also be shown as 4000004400000000 or 0x4000004400000000

Severity

Info

Serviceable No

Automatically notify support

No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0068

### **User Response**

Information only; no action is required.

### • 40000045-00000000 : Syslog port number changed from [arg1] to [arg2] by user [arg3]. ()

A user has modified the Syslog receiver port number

May also be shown as 4000004500000000 or 0x4000004500000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0069

User Response

Information only; no action is required.

### • 40000046-00000000 : Remote Presence port number changed from [arg1] to [arg2] by user [arg3]. ()

A user has modified the Remote Presence port number

May also be shown as 400000460000000 or 0x400000460000000

Severity Info Serviceable No Automatically notify support No

Alert Category none

### **SNMP Trap ID**

CIM Information Prefix: IMM ID: 0070

### **User Response**

Information only; no action is required.

### • 40000047-00000000 : LED [arg1] state changed to [arg2] by [arg3]. ()

A user has modified the state of an LED

May also be shown as 4000004700000000 or 0x4000004700000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0071

### **User Response**

Information only; no action is required.

40000048-00000000 : Inventory data changed for device [arg1], new device data hash=[arg2], new master data hash=[arg3]. ()

Something has caused the physical inventory to change

May also be shown as 400000480000000 or 0x400000480000000

Severity Info Serviceable No

Automatically notify support No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0072

User Response

Information only; no action is required.

### • 40000049-00000000 : SNMP [arg1] enabled by user [arg2] . ()

A user enabled SNMPv1 or SNMPv3 or Traps

May also be shown as 400000490000000 or 0x400000490000000

### Severity Info Serviceable No Automatically notify support No Alert Category none SNMP Trap ID

CIM Information Prefix: IMM ID: 0073

### **User Response**

Information only; no action is required.

### • 4000004a-00000000 : SNMP [arg1] disabled by user [arg2] . ()

A user disabled SNMPv1 or SNMPv3 or Traps

May also be shown as 4000004a00000000 or 0x4000004a00000000

### Severity

Info

Serviceable No

### Automatically notify support

No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0074

### User Response Information only; no action is required.

 4000004b-00000000 : SNMPv1 [arg1] set by user [arg2]: Name=[arg3], AccessType=[arg4], Address=[arg5], . ()

A user changed the SNMP community string

May also be shown as 4000004b00000000 or 0x4000004b00000000

Severity Info

### Serviceable

No

### Automatically notify support

No

Alert Category

none

### SNMP Trap ID

CIM Information Prefix: IMM ID: 0075

### User Response Information only; no action is required.

• 4000004c-00000000 : LDAP Server configuration set by user [arg1]: SelectionMethod=[arg2], DomainName=[arg3], Server1=[arg4], Server2=[arg5], Server3=[arg6], Server4=[arg7]. ()

A user changed the LDAP server configuration

May also be shown as 4000004c00000000 or 0x4000004c00000000

Severity Info

Serviceable

No

Automatically notify support No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0076

User Response

Information only; no action is required.

### 4000004d-00000000 : LDAP set by user [arg1]: RootDN=[arg2], UIDSearchAttribute=[arg3], BindingMethod=[arg4], EnhancedRBS=[arg5], TargetName=[arg6], GroupFilter=[arg7], GroupAttribute=[arg8], LoginAttribute=[arg9]. ()

A user configured an LDAP Miscellaneous setting

May also be shown as 4000004d00000000 or 0x4000004d00000000

Severity Info Serviceable No Automatically notify support No Alert Category none

### **SNMP** Trap ID

CIM Information Prefix: IMM ID: 0077

### **User Response**

Information only; no action is required.

 4000004e-00000000 : Serial Redirection set by user [arg1]: Mode=[arg2], BaudRate=[arg3], StopBits=[arg4], Parity=[arg5], SessionTerminateSequence=[arg6]. ()

A user configured the Serial Port mode

May also be shown as 4000004e00000000 or 0x4000004e00000000

Severity Info Serviceable No

Automatically notify support No Alert Category

none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0078

### **User Response**

Information only; no action is required.

 4000004f-00000000 : Date and Time set by user [arg1]: Date=[arg2], Time-[arg3], DST Auto-adjust= [arg4], Timezone=[arg5]. ()

A user configured the Date and Time settings

May also be shown as 4000004f0000000 or 0x4000004f00000000

Severity

Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0079

User Response

Information only; no action is required.

### 40000050-00000000 : Server General Settings set by user [arg1]: Name=[arg2], Contact=[arg3], Location=[arg4], Room=[arg5], RackID=[arg6], Rack U-position=[arg7]. ()

A user configured the Location setting

May also be shown as 400000500000000 or 0x400000500000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information

Prefix: IMM ID: 0080

User Response Information only; no action is required.

### • 40000051-00000000 : Server Power Off Delay set to [arg1] by user [arg2]. ()

A user configured the Server Power Off Delay

May also be shown as 4000005100000000 or 0x4000005100000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0081

User Response Information only; no action is required.

### • 40000052-00000000 : Server [arg1] scheduled for [arg2] at [arg3] by user [arg4]. ()

A user configured a Server Power action at a specific time

May also be shown as 400000520000000 or 0x400000520000000

Severity Info

Serviceable

No

### Automatically notify support

No

Alert Category none

**SNMP Trap ID** 

CIM Information Prefix: IMM ID: 0082

User Response Information only; no action is required.

### • 40000053-00000000 : Server [arg1] scheduled for every [arg2] at [arg3] by user [arg4]. ()

A user configured a recurring Server Power Action

May also be shown as 400000530000000 or 0x400000530000000

Severity Info Serviceable

No

Automatically notify support

No

Alert Category none

**SNMP Trap ID** 

CIM Information Prefix: IMM ID: 0083

User Response Information only; no action is required.

### • 40000054-00000000 : Server [arg1] [arg2] cleared by user [arg3]. ()

A user cleared a Server Power Action.

May also be shown as 4000005400000000 or 0x4000005400000000

Severity Info

Serviceable

No

Automatically notify support

No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0084

**User Response** 

Information only; no action is required.

• 40000055-00000000 : Synchronize time setting by user [arg1]: Mode=[arg2], NTPServerHost1= [arg3]:[arg4],NTPServerHost2=[arg5]:[arg6],NTPServerHost3=[arg7]:[arg8],NTPServerHost4=[arg9]: [arg10],NTPUpdateFrequency=[arg11]. ()

A user configured the Date and Time synchronize settings

May also be shown as 4000005500000000 or 0x4000005500000000

Severity Info Serviceable No Automatically notify support No Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0085

### **User Response**

Information only; no action is required.

### • 40000056-00000000 : SMTP Server set by user [arg1] to [arg2]:[arg3]. ()

A user configured the SMTP server

May also be shown as 400000560000000 or 0x400000560000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0086

### **User Response**

Information only; no action is required.

### • 40000057-00000000 : Telnet [arg1] by user [arg2]. ()

A user enables or disables Telnet services

May also be shown as 4000005700000000 or 0x4000005700000000

Severity

Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0087

User Response

Information only; no action is required.

 40000058-00000000: DNS servers set by user [arg1]: UseAdditionalServers=[arg2], PreferredDNStype=[arg3], IPv4Server1=[arg4], IPv4Server2=[arg5], IPv4Server3=[arg6], IPv6Server1=[arg7], IPv6Server2=[arg8], IPv6Server3=[arg9]. ()

A user configures the DNS servers

May also be shown as 400000580000000 or 0x400000580000000

Severity

Info

Serviceable No

INO

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0088

User Response Information only; no action is required.

• 40000059-00000000 : LAN over USB [arg1] by user [arg2]. ()

A user configured USB-LAN

May also be shown as 400000590000000 or 0x400000590000000

Severity Info

Serviceable

No

## Automatically notify support

No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0089

User Response Information only; no action is required.

4000005a-00000000 : LAN over USB Port Forwarding set by user [arg1]: ExternalPort=[arg2], USB-LAN port=[arg3]. ()

A user configured USB-LAN port forwarding

May also be shown as 4000005a0000000 or 0x4000005a0000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0090

User Response

Information only; no action is required.

## • 4000005b-00000000 : Secure Web services (HTTPS) [arg1] by user [arg2]. ()

A user enables or disables Secure web services

May also be shown as 4000005b0000000 or 0x4000005b0000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

## CIM Information Prefix: IMM ID: 0091

## **User Response**

Information only; no action is required.

## • 4000005c-00000000 : Secure CIM/XML(HTTPS) [arg1] by user [arg2]. ()

A user enables or disables Secure CIM/XML services

May also be shown as 4000005c0000000 or 0x4000005c0000000

Severity Info

Serviceable

No

Automatically notify support No

Alert Category none

**SNMP Trap ID** 

CIM Information Prefix: IMM ID: 0092

## **User Response**

Information only; no action is required.

## • 4000005d-00000000 : Secure LDAP [arg1] by user [arg2]. ()

A user enables or disables Secure LDAP services

May also be shown as 4000005d0000000 or 0x4000005d0000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0093

User Response

Information only; no action is required.

## • 4000005e-00000000 : SSH [arg1] by user [arg2]. ()

A user enables or disables SSH services

May also be shown as 4000005e00000000 or 0x4000005e00000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP Trap ID** 

CIM Information Prefix: IMM ID: 0094

User Response Information only; no action is required.

• 4000005f-00000000 : Server timeouts set by user [arg1]: EnableOSWatchdog=[arg2], OSWatchdogTimout=[arg3], EnableLoaderWatchdog=[arg4], LoaderTimeout=[arg5]. ()

A user configures Server Timeouts

May also be shown as 4000005f0000000 or 0x4000005f00000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0095

## **User Response**

Information only; no action is required.

## • 40000060-00000000 : License key for [arg1] added by user [arg2]. ()

A user installs License Key

May also be shown as 400000600000000 or 0x400000600000000

Severity Info Serviceable No Automatically notify support No Alert Category

Chapter 6. Troubleshooting 245

none

### **SNMP Trap ID**

## CIM Information

Prefix: IMM ID: 0096

## **User Response**

Information only; no action is required.

## • 40000061-00000000 : License key for [arg1] removed by user [arg2]. ()

A user removes a License Key

May also be shown as 4000006100000000 or 0x4000006100000000

Severity

Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0097

## **User Response**

Information only; no action is required.

 40000062-00000000 : Global Login General Settings set by user [arg1]: AuthenticationMethod= [arg2], LockoutPeriod=[arg3], SessionTimeout=[arg4]. ()

A user changes the Global Login General Settings

May also be shown as 400000620000000 or 0x400000620000000

Severity Info Serviceable No Automatically notify support No Alert Category none SNMP Trap ID

CIM Information Prefix: IMM ID: 0098

User Response Information only; no action is required.  40000063-00000000: Global Login Account Security set by user [arg1]: PasswordRequired=[arg2], PasswordExpirationPeriod=[arg3], MinimumPasswordReuseCycle=[arg4], MinimumPasswordLength=[arg5], MinimumPasswordChangeInterval=[arg6], MaxmumLoginFailures=[arg7], LockoutAfterMaxFailures=[arg8]. ()

A user changes the Global Login Account Security Settings to Legacy

May also be shown as 400000630000000 or 0x400000630000000

Severity Info Serviceable No

Automatically notify support No

Alert Category

none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0099

User Response Information only; no action is required.

## • 40000064-00000000 : User [arg1] created. ()

A user account was created

May also be shown as 4000006400000000 or 0x4000006400000000

Severity

Info

Serviceable No

Automatically notify support

No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0100

## User Response

Information only; no action is required.

## • 40000065-00000000 : User [arg1] removed. ()

A user account was deleted

May also be shown as 4000006500000000 or 0x4000006500000000

## Severity

Info

Serviceable No

Automatically notify support

No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0101

## **User Response**

Information only; no action is required.

## • 40000066-00000000 : User [arg1] password modified. ()

A user account was changed

May also be shown as 400000660000000 or 0x400000660000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0102

## **User Response**

Information only; no action is required.

## • 40000067-00000000 : User [arg1] role set to [arg2]. ()

A user account role assigned

May also be shown as 4000006700000000 or 0x4000006700000000

Severity Info

Serviceable No Automatically notify support

No

Alert Category none

## **SNMP** Trap ID

CIM Information Prefix: IMM ID: 0103

### **User Response**

Information only; no action is required.

## • 40000068-00000000 : User [arg1] custom privileges set: [arg2]. ()

User account priveleges assigned

May also be shown as 400000680000000 or 0x400000680000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0104

## **User Response**

Information only; no action is required.

• 40000069-00000000 : User [arg1] for SNMPv3 set: AuthenticationProtocol=[arg2], PrivacyProtocol= [arg3], AccessType=[arg4], HostforTraps=[arg5]. ()

User account SNMPv3 settings changed

May also be shown as 400000690000000 or 0x400000690000000

Severity Info Serviceable No

Automatically notify support No

Alert Category none

**SNMP Trap ID** 

CIM Information Prefix: IMM ID: 0105

User Response

Information only; no action is required.

## • 4000006a-00000000 : SSH Client key added for user [arg1]. ()

User locally defined an SSH Client key

May also be shown as 4000006a0000000 or 0x4000006a00000000

## Severity Info Serviceable No Automatically notify support No Alert Category none SNMP Trap ID

CIM Information Prefix: IMM ID: 0106

## **User Response**

Information only; no action is required.

## • 4000006b-00000000 : SSH Client key imported for user [arg1] from [arg2]. ()

User imported an SSH Client key

May also be shown as 4000006b0000000 or 0x4000006b0000000

#### Severity Info

Into

Serviceable No

## Automatically notify support

No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0107

User Response Information only; no action is required.

## • 4000006c-00000000 : SSH Client key removed from user [arg1]. ()

User removed an SSH Client key

May also be shown as 4000006c00000000 or 0x4000006c00000000

Severity Info

Serviceable No

## Automatically notify support

No

Alert Category none

**SNMP Trap ID** 

## CIM Information

Prefix: IMM ID: 0108

## **User Response**

Information only; no action is required.

## • 4000006d-00000000 : Management Controller [arg1]: Configuration saved to a file by user [arg2]. ()

A user saves a Management Controller configuration to a file.

May also be shown as 4000006d0000000 or 0x4000006d0000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP Trap ID** 

CIM Information Prefix: IMM ID: 0109

User Response Information only; no action is required.

# • 4000006e-00000000 : Alert Configuration Global Event Notification set by user [arg1]: RetryLimit= [arg2], RetryInterval=[arg3], EntryInterval=[arg4]. ()

A user changes the Global Event Notification settings.

May also be shown as 4000006e0000000 or 0x4000006e00000000

## Severity Info Serviceable No

Automatically notify support

No

Alert Category none

SNMP Trap ID

**CIM** Information

Prefix: IMM ID: 0110

#### **User Response**

Information only; no action is required.

 4000006f-00000000 : Alert Recipient Number [arg1] updated: Name=[arg2], DeliveryMethod=[arg3], Address=[arg4], IncludeLog=[arg5], Enabled=[arg6], EnabledAlerts=[arg7], AllowedFilters=[arg8]. ()

A user adds or updates an Alert Recipient

May also be shown as 4000006f00000000 or 0x4000006f00000000

Severity Info

Serviceable

No

Automatically notify support No

Alert Category none

**SNMP Trap ID** 

CIM Information Prefix: IMM ID: 0111

## User Response

Information only; no action is required.

 40000070-00000000 : SNMP Traps enabled by user [arg1]: EnabledAlerts=[arg2], AllowedFilters= [arg3]. ()

A user enabled the SNMP Traps configuration

May also be shown as 400000700000000 or 0x400000700000000

Severity Info Serviceable No Automatically notify support No Alert Category none SNMP Trap ID

CIM Information Prefix: IMM ID: 0112

## **User Response**

Information only; no action is required.

 40000071-00000000 : The power cap value changed from [arg1] watts to [arg2] watts by user [arg3]. () Power Cap values changed by user

May also be shown as 4000007100000000 or 0x4000007100000000

Severity

Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0113

### **User Response**

Information only; no action is required.

## • 40000072-00000000 : The minimum power cap value changed from [arg1] watts to [arg2] watts. ()

Minimum Power Cap value changed

May also be shown as 4000007200000000 or 0x4000007200000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0114

## User Response

Information only; no action is required.

## • 40000073-00000000 : The maximum power cap value changed from [arg1] watts to [arg2] watts. ()

Maximum Power Cap value changed

May also be shown as 400000730000000 or 0x400000730000000

Severity Info

Serviceable No

## Automatically notify support

No

### Alert Category none

## **SNMP** Trap ID

**CIM** Information

Prefix: IMM ID: 0115

## **User Response**

Information only; no action is required.

# 40000074-00000000 : The soft minimum power cap value changed from [arg1] watts to [arg2] watts. ()

Soft Minimum Power Cap value changed

May also be shown as 4000007400000000 or 0x4000007400000000

Severity Info

Serviceable

No

### Automatically notify support No

Alert Category none

## **SNMP** Trap ID

CIM Information Prefix: IMM ID: 0116

## User Response

Information only; no action is required.

## • 40000075-000000000 : The measured power value exceeded the power cap value. ()

Power exceeded cap

May also be shown as 4000007500000000 or 0x4000007500000000

Severity

Warning

Serviceable No

## Automatically notify support

No

Alert Category Warning - Power

#### SNMP Trap ID 164

**CIM** Information

Prefix: IMM ID: 0117

#### **User Response**

Information only; no action is required.

## • 40000076-00000000 : The new minimum power cap value exceeded the power cap value. ()

Minimum Power Cap exceeds Power Cap

May also be shown as 400000760000000 or 0x400000760000000

Severity Warning

Serviceable No

Automatically notify support No

Alert Category Warning - Power

SNMP Trap ID 164

CIM Information Prefix: IMM ID: 0118

## User Response

Information only; no action is required.

## • 40000077-00000000 : Power capping was activated by user [arg1]. ()

Power capping activated by user

May also be shown as 4000007700000000 or 0x4000007700000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0119

## **User Response**

Information only; no action is required.

## • 40000078-00000000 : Power capping was deactivated by user [arg1]. ()

Power capping deactivated by user

May also be shown as 400000780000000 or 0x400000780000000

Severity Info

Serviceable No

Automatically notify support No

IN

Alert Category

none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0120

User Response

Information only; no action is required.

## • 40000079-00000000 : Static Power Savings mode has been turned on by user [arg1]. ()

Static Power Savings mode turned on by user

May also be shown as 400000790000000 or 0x400000790000000

Severity Info Serviceable

No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0121

User Response

Information only; no action is required.

## 4000007a-00000000 : Static Power Savings mode has been turned off by user [arg1]. ()

Static Power Savings mode turned off by user

May also be shown as 4000007a00000000 or 0x4000007a00000000

Severity Info Serviceable No

Automatically notify support No

Alert Category none

## **SNMP Trap ID**

CIM Information Prefix: IMM ID: 0122

### User Response

Information only; no action is required.

## • 4000007b-00000000 : Dynamic Power Savings mode has been turned on by user [arg1]. ()

Dynamic Power Savings mode turned on by user

May also be shown as 4000007b00000000 or 0x4000007b00000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0123

## **User Response**

Information only; no action is required.

## • 4000007c-00000000 : Dynamic Power Savings mode has been turned off by user [arg1]. ()

Dynamic Power Savings mode turned off by user

May also be shown as 4000007c00000000 or 0x4000007c00000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0124

**User Response** 

Information only; no action is required.

• 4000007d-00000000 : Power cap and external throttling occurred. ()

Power cap and external throttling occurred

May also be shown as 4000007d00000000 or 0x4000007d00000000

Severity

Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0125

**User Response** 

Information only; no action is required.

## 4000007e-00000000 : External throttling occurred . ()

External throttling occurred

May also be shown as 4000007e00000000 or 0x4000007e00000000

Severity

Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0126

## User Response

Information only; no action is required.

## 4000007f-00000000 : Power cap throttling occurred. ()

Power cap throttling occurrred

May also be shown as 4000007f00000000 or 0x4000007f00000000

Severity Info Serviceable No

258 Lenovo Flex System x240 M5 Compute Node Installation and Service Guide

## Automatically notify support

No

Alert Category none

## **SNMP** Trap ID

## **CIM** Information

Prefix: IMM ID: 0127

## User Response

Information only; no action is required.

## • 40000080-00000000 : Remote Control session started by user [arg1] in [arg2] mode. ()

Remote Control session started

May also be shown as 400000800000000 or 0x400000800000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

## **SNMP** Trap ID

CIM Information Prefix: IMM ID: 0128

## **User Response**

Information only; no action is required.

## • 40000081-00000000 : PXE boot requested by user [arg1]. ()

PXE boot requested

May also be shown as 400000810000000 or 0x400000810000000

## Severity

Info

Serviceable No

## Automatically notify support

No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0129 **User Response** 

Information only; no action is required.

• 40000082-000000000 : The measured power value has returned below the power cap value. ()

Power exceeded cap recovered

May also be shown as 400000820000000 or 0x400000820000000

Severity Info Serviceable No

Automatically notify support No

Alert Category Warning - Power

SNMP Trap ID 164

CIM Information Prefix: IMM ID: 0130

User Response Information only; no action is required.

Minimum Power Cap exceeds Power Cap recovered

May also be shown as 400000830000000 or 0x400000830000000

Severity Info

Serviceable

No

Automatically notify support

No

Alert Category Warning - Power

SNMP Trap ID 164

CIM Information Prefix: IMM ID: 0131

**User Response** 

Information only; no action is required.

• 40000084-00000000 : IMM firmware mismatch between nodes [arg1] and [arg2]. Please attempt to flash the IMM firmware to the same level on all nodes. ()

A mismatch of IMM firmware has been detected between nodes

May also be shown as 400000840000000 or 0x400000840000000

Severity Error

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0132

## **User Response**

Attempt to flash the IMM firmware to the same level on all nodes.

• 40000085-00000000 : FPGA firmware mismatch between nodes [arg1] and [arg2]. Please attempt to flash the FPGA firmware to the same level on all nodes. ()

A mismatch of FPGA firmware has been detected between nodes

May also be shown as 400000850000000 or 0x400000850000000

Severity Error

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0133

#### **User Response**

Attempt to flash the FPGA firmware to the same level on all nodes.

## • 40000086-00000000 : Test Call Home Generated by user [arg1]. ()

Test Call Home generated by user.

May also be shown as 400000860000000 or 0x400000860000000

Severity Info Serviceable No Automatically notify support Yes

Alert Category

none

### **SNMP Trap ID**

## **CIM Information**

Prefix: IMM ID: 0134

## **User Response**

Information only; no action is required.

## • 40000087-00000000 : Manual Call Home by user [arg1]: [arg2]. ()

Manual Call Home by user.

May also be shown as 400000870000000 or 0x400000870000000

Severity

Info

Serviceable No

#### Automatically notify support Yes

Alert Category none

**SNMP** Trap ID

## CIM Information

Prefix: IMM ID: 0135

## **User Response**

IBM Support will address the problem.

# • 40000088-00000000 : Management Controller [arg1]: Configuration restoration from a file by user [arg2] completed. ()

This message is for the use case where a user restores a Management Controller configuration from a file and it completes.

May also be shown as 400000880000000 or 0x400000880000000

## Severity Info Serviceable No Automatically notify support No Alert Category none SNMP Trap ID

CIM Information Prefix: IMM ID: 0136

## **User Response**

Information only; no action is required.

# • 40000089-00000000 : Management Controller [arg1]: Configuration restoration from a file by user [arg2] failed to complete. ()

This message is for the use case where a user restores a Management Controller configuration from a file and the restoration fails to complete.

May also be shown as 400000890000000 or 0x400000890000000

## Severity

Error

Serviceable

No

## Automatically notify support

No

Alert Category System - Other

## **SNMP** Trap ID

22

## CIM Information

Prefix: IMM ID: 0137

## **User Response**

- 1. Turn off the server and disconnect it from the power source. You must disconnect the server from ac power to reset the IMM.
- 2. After 45 seconds, reconnect the server to the power source and turn on the server.
- 3. Retry the operation.
- 4000008a-00000000 : Management Controller [arg1]: Configuration restoration from a file by user [arg2] failed to start. ()

This message is for the use case where a user restores a Management Controller configuration from a file and the restoration fails to start.

May also be shown as 4000008a0000000 or 0x4000008a0000000

Severity Error Serviceable No Automatically notify support No Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0138

User Response

- 1. Turn off the server and disconnect it from the power source. You must disconnect the server from ac power to reset the IMM.
- 2. After 45 seconds, reconnect the server to the power source and turn on the server.
- 3. Retry the operation.
- 4000008b-00000000 : Storage [arg1] has changed. ()

This message is for the use case where an IP address for the Storage Management has changed

May also be shown as 4000008b0000000 or 0x4000008b0000000

Severity Info Serviceable No Automatically notify support No Alert Category System - IMM Network event **SNMP Trap ID** 37 **CIM** Information Prefix: IMM ID: 0139 **User Response** Information only; no action is required. 4000008c-00000000 : Security: Userid: [arg1] had [arg2] login failures from a CIM client at IP address [arg3]. () This message is for the use case where a user has failed to log in to a Management Controller from CIM. May also be shown as 4000008c0000000 or 0x4000008c0000000 Severity Info Serviceable No Automatically notify support No Alert Category System - Remote Login **SNMP Trap ID** 30

CIM Information Prefix: IMM ID: 0140

## **User Response**

Information only; no action is required.

• 4000008d-00000000 : Remote access attempt failed. Invalid userid or password received. Userid is [arg1] from a CIM client at IP address [arg2]. ()

This message is for the use case where a remote user has failed to establish a remote control session from CIM.

May also be shown as 4000008d0000000 or 0x4000008d0000000

## Severity

Info

#### Serviceable No

#### Automatically notify support No

Alert Category System - Remote Login

# **SNMP Trap ID**

30

## **CIM Information** Prefix: IMM ID: 0141

## **User Response**

Information only; no action is required.

#### 4000008e-00000000 : Device [arg1] VPD is not valid. () ٠

The VPD for a device is invalid

May also be shown as 4000008e0000000 or 0x4000008e0000000

## Severity Warning

#### Serviceable No

Automatically notify support No

## **Alert Category** System - Other

**SNMP Trap ID** 22

**CIM** Information Prefix: IMM ID: 0142

# **User Response**

Information only; no action is required.

#### 4000008f-00000000 : The bare metal connection process has been started. () ٠

Bare Metal Connection process has been started

May also be shown as 4000008f0000000 or 0x4000008f0000000

Severity Info Serviceable

No

# Automatically notify support

No

Alert Category System - Other

#### SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0143

User Response Information only; no action is required.

## • 40000090-000000000 : The bare metal update application reports a status of [arg1]. ()

**Bare Metal Update Application Status** 

May also be shown as 400000900000000 or 0x400000900000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0144

User Response Information only; no action is required.

## • 40000091-00000000 : User [arg1] has terminated an active console session. ()

A user has terminated an active console session

May also be shown as 4000009100000000 or 0x4000009100000000

Severity Info Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0145 **User Response** 

Information only; no action is required.

 40000092-00000000 : TKLM servers set by user [arg1]: TKLMServer1=[arg2] Port=[arg3], TKLMServer2=[arg4] Port=[arg5], TKLMServer3=[arg6] Port=[arg7], TKLMServer4=[arg8] Port= [arg9]. ()

A user configured the TKLM servers

May also be shown as 400000920000000 or 0x400000920000000

Severity Info Serviceable

No

Automatically notify support

No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0146

## **User Response**

Information only; no action is required.

## 40000093-00000000 : TKLM servers device group set by user [arg1]: TKLMServerDeviceGroup= [arg2]. ()

A user configured the TKLM device group

May also be shown as 400000930000000 or 0x400000930000000

Severity Info Serviceable

No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0147

User Response

Information only; no action is required.

## • 40000094-00000000 : User [arg1] has generated a new encryption key pair and installed a selfsigned certificate for the TKLM client. ()

User generated a new encryption key pair and installed a self-signed certificate for the TKLM client

May also be shown as 400000940000000 or 0x4000009400000000

**Severity** Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0148

### **User Response**

Information only; no action is required.

• 40000095-00000000 : User [arg1] has generated a new encryption key and certificate signing request for the TKLM client. ()

User generated a new encryption key and certificate signing request for the TKLM client

May also be shown as 400000950000000 or 0x400000950000000

Severity Info Serviceable No Automatically notify support No Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0149

## **User Response**

Information only; no action is required.

40000096-00000000 : User [arg1] has imported a signed certificate for the TKLM client from [arg2].
 ()

User imported a signed certificate for the TKLM client

May also be shown as 400000960000000 or 0x400000960000000

Severity Info Serviceable No

## Automatically notify support

No

Alert Category none

## **SNMP Trap ID**

## CIM Information

Prefix: IMM ID: 0150

## User Response

Information only; no action is required.

## • 40000097-00000000 : User [arg1] has imported a server certificate for the TKLM server. ()

User imported a server certificate for the TKLM Server

May also be shown as 4000009700000000 or 0x4000009700000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

## **SNMP** Trap ID

CIM Information Prefix: IMM ID: 0151

## User Response

Information only; no action is required.

## • 40000098-000000000 : The UEFI Definitions have been changed. ()

UEFI Definitions change has been detected

May also be shown as 400000980000000 or 0x400000980000000

## Severity Info

inic

Serviceable No

## Automatically notify support No

Alert Category

none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0152 **User Response** 

Information only; no action is required.

40000099-00000000 : Security: Userid: [arg1] had [arg2] login failures from IPMI client at IP address
[arg3]. ()

This message is for the use case where a user has failed to log in to a Management Controller from IPMI.

May also be shown as 400000990000000 or 0x400000990000000

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Remote Login

SNMP Trap ID 30

CIM Information Prefix: IMM ID: 0153

User Response Information only; no action is required.

## 4000009a-00000000 : Security: Userid: [arg1] had [arg2] login failures from SNMP client at IP address [arg3]. ()

This message is for the use case where a user has failed to access a Management Controller from SNMP.

May also be shown as 4000009a0000000 or 0x4000009a00000000

Severity Info Serviceable No Automatically notify support

No

Alert Category System - Remote Login

SNMP Trap ID 30

CIM Information Prefix: IMM ID: 0154

**User Response** 

Information only; no action is required.

## • 4000009b-00000000 : Security: Userid: [arg1] had [arg2] login failures from IPMI serial client. ()

This message is for the use case where a user has failed to log in to a Management Controller from IPMI serial client

May also be shown as 4000009b00000000 or 0x4000009b00000000

**Severity** Info

Serviceable No

Automatically notify support No

Alert Category System - Remote Login

SNMP Trap ID 30 CIM Information

Prefix: IMM ID: 0155

User Response

Information only; no action is required.

## • 4000009c-00000000 : Remote Login Successful. Login ID: [arg1] from [arg2] serial interface. ()

This message is for the use case where a user successfully logs in to a Management Controller.

May also be shown as 4000009c0000000 or 0x4000009c0000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Remote Login

SNMP Trap ID 30

CIM Information Prefix: IMM ID: 0156

## **User Response**

Information only; no action is required.

## • 4000009d-00000000 : Login ID: [arg1] from [arg2] at IP address [arg3] has logged off. ()

This message is for the use case where a user has logged off of a Management Controller.

May also be shown as 4000009d00000000 or 0x4000009d00000000

Severity Info Serviceable No Automatically notify support No

## Alert Category

System - Remote Login

## SNMP Trap ID

30

## CIM Information Prefix: IMM ID: 0157

## **User Response**

Information only; no action is required.

## • 4000009e-00000000 : Login ID: [arg1] from [arg2] at IP address [arg3] has been logged off. ()

This message is for the use case where a user has been logged off of a Management Controller.

May also be shown as 4000009e00000000 or 0x4000009e00000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Remote Login

SNMP Trap ID 30

CIM Information Prefix: IMM ID: 0158

User Response Information only; no action is required.

# • 4000009f-00000000 : User [arg1] has initiated a TKLM Server Connection Test to check connectivity to server [arg2]. ()

User initiated a TKLM Server Connection test.

May also be shown as 4000009f0000000 or 0x4000009f00000000

Severity Info Serviceable No Automatically notify support

No

Alert Category none

SNMP Trap ID

CIM Information Prefix: IMM ID: 0159

**User Response** 

Information only; no action is required.

## • 400000a0-00000000 : User [arg1] has initiated an SMTP Server Connection Test. ()

User initiated an SMTP Server Connection test.

May also be shown as 400000a00000000 or 0x400000a00000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information

Prefix: IMM ID: 0160

User Response

Information only; no action is required.

## 400000a1-00000000 : UEFI Reported: [arg1]. ()

UEFI audit event logged.

May also be shown as 400000a10000000 or 0x400000a10000000

## Severity

Info

Serviceable No

. . . .

Automatically notify support No

Alert Category none

**SNMP** Trap ID

CIM Information Prefix: IMM ID: 0161

## User Response

Information only; no action is required.

## • 400000a2-00000000 : User [arg1] has [arg2] file [arg3] from [arg4]. ()

User has mounted/unmounted file from URL or server

May also be shown as 400000a20000000 or 0x400000a200000000

Severity Info Serviceable No

Automatically notify support

No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0162

User Response Information only; no action is required.

## • 400000a3-00000000 : User [arg1] has set the SMTP Server reverse-path to [arg2]. ()

User set SMTP Server reverse-path address

May also be shown as 400000a30000000 or 0x400000a30000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0163

## User Response

Information only; no action is required.

## • 400000a4-00000000 : User [arg1] has removed a certificate. ()

User removed certificate

May also be shown as 400000a400000000 or 0x400000a400000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

## CIM Information Prefix: IMM ID: 0164

## User Response

Information only; no action is required.

## • 400000a5-00000000: A certificate has been revoked. ()

A certificate has been revoked

May also be shown as 400000a50000000 or 0x400000a50000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0165

## User Response

Information only; no action is required.

## • 400000a6-00000000 : The server was restarted for an unknown reason. ()

The server was restarted for an unknown reason

May also be shown as 400000a60000000 or 0x400000a60000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0166

User Response Information only; no action is required.

## • 400000a7-00000000 : The server is restarted by chassis control command. ()

Server is restarted by chassis control command

May also be shown as 400000a700000000 or 0x400000a700000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0167

User Response Information only; no action is required.

400000a8-000000000 : The server was reset via pushbutton. ()

Server was reset via pushbutton

May also be shown as 400000a80000000 or 0x400000a80000000

Severity Info

٠

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0168

User Response

Information only; no action is required.

## 400000a9-00000000 : The server was powered-up via power pushbutton. ()

Server was power-up via power pushbutton

May also be shown as 400000a90000000 or 0x400000a900000000

Severity Info

•

Serviceable No

Automatically notify support No

Alert Category System - Other

## SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0169

## User Response

Information only; no action is required.

## • 400000aa-00000000 : The server was restarted when the watchdog expired.. ()

Server was restarted when the watchdog expired.

May also be shown as 400000aa0000000 or 0x400000aa00000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0170

# User Response

Information only; no action is required.

## • 400000ab-00000000 : The server was restarted for OEM reason. ()

Server was restarted for OEM reason

May also be shown as 400000ab0000000 or 0x400000ab0000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0171

## User Response

Information only; no action is required.

# • 400000ac-00000000 : The server was automatically powered on because the power restore policy is set to always restore.. ()

Server was automatically powered on because the power restore policy is set to always restore.

May also be shown as 400000ac0000000 or 0x400000ac0000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0172

User Response Information only; no action is required.

• 400000ad-00000000 : The server was automatically powered on because the power restore policy is set to restore previous power state.. ()

Server was automatically powered on because the power restore policy is set to restore previous power state.

May also be shown as 400000ad0000000 or 0x400000ad00000000

Severity

Info

Serviceable No

Automatically notify support

No

Alert Category System - Other

SNMP Trap ID

22

CIM Information Prefix: IMM ID: 0173

User Response

Information only; no action is required.

## 400000ae-00000000 : The server was reset via Platform Event Filter. ()

Server was reset via Platform Event Filter

May also be shown as 400000ae00000000 or 0x400000ae00000000

Severity

•

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0174

#### **User Response**

Information only; no action is required.

# • 400000af-00000000 : The server was power-cycled via Platform Event Filter. ()

Server was power-cycled via Platform Event Filter

May also be shown as 400000af0000000 or 0x400000af00000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0175

#### **User Response**

Information only; no action is required.

#### • 400000b0-00000000 : The server was soft reset. ()

Server was soft reset

May also be shown as 400000b00000000 or 0x400000b00000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

# SNMP Trap ID

22

CIM Information Prefix: IMM ID: 0176

## **User Response**

Information only; no action is required.

#### • 400000b1-00000000 : The server was powered up via Real Time Clock (scheduled power on). ()

Server was powered up via Real Time Clock (scheduled power on)

May also be shown as 400000b100000000 or 0x400000b100000000

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0177

#### User Response

Information only; no action is required.

#### • 400000b2-00000000 : The server was powered off for an unknown reason. ()

Server was powered off for an unknown reason

May also be shown as 400000b20000000 or 0x400000b20000000

Severity Info Serviceable No Automatically notify support No Alert Category System - Other SNMP Trap ID 22 CIM Information Prefix: IMM ID: 0178

User Response Information only; no action is required.

• 400000b3-00000000 : The server was powered off by chassis control command. ()

Server was powered off by chassis control command

May also be shown as 400000b30000000 or 0x400000b30000000

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0179

#### **User Response**

Information only; no action is required.

#### 400000b4-00000000 : The server was powered off via pushbutton. ()

Server was powered off via pushbutton

May also be shown as 400000b40000000 or 0x400000b400000000

Severity Info

•

Serviceable No

Automatically notify support No Alert Category

System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0180

# User Response

Information only; no action is required.

#### • 400000b5-00000000 : The server was powered off when the watchdog expired. ()

Server was powered off when the watchdog expired.

May also be shown as 400000b50000000 or 0x400000b50000000

Severity Info

Serviceable No

# Automatically notify support

No

Alert Category System - Other

#### SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0181

User Response Information only; no action is required.

# • 400000b6-00000000 : The server stayed powered off because the power restore policy is set to always restore.. ()

Server stayed powered off because the power restore policy is set to always restore.

May also be shown as 400000b60000000 or 0x400000b60000000

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0182

User Response Information only; no action is required.

• 400000b7-00000000 : The server stayed powered off because the power restore policy is set to restore previous power state.. ()

Server stayed powered off because the power restore policy is set to restore previous power state.

May also be shown as 400000b700000000 or 0x400000b700000000

Severity Info Serviceable No

Automatically notify support

No

Alert Category System - Other

SNMP Trap ID 22

# CIM Information Prefix: IMM ID: 0183

#### User Response

Information only; no action is required.

## • 400000b8-00000000 : The server was powered off via Platform Event Filter. ()

Server was power off via Platform Event Filter

May also be shown as 400000b80000000 or 0x400000b80000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0184

#### User Response

Information only; no action is required.

• 400000b9-00000000 : The server was powered off via Real Time Clock (scheduled power off). ()

Server was powered up via Real Time Clock (scheduled power off)

May also be shown as 400000b90000000 or 0x400000b90000000

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0185

User Response Information only; no action is required.

#### • 400000ba-00000000 : Management Controller [arg1] reset was initiated due to Power-On-Reset. ()

Management Controller reset was initiated due to Power-On-Reset

May also be shown as 400000ba0000000 or 0x400000ba0000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0186

User Response Information only; no action is required.

## • 400000bb-00000000 : Management Controller [arg1] reset was initiated by PRESET. ()

Management Controller reset was initiated by PRESET

May also be shown as 400000bb0000000 or 0x400000bb0000000

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0187

User Response Information only; no action is required.

#### • 400000bc-00000000 : Management Controller [arg1] reset was initiated by CMM. ()

Management Controller reset was initiated by CMM

May also be shown as 400000bc0000000 or 0x400000bc0000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

# SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0188

#### **User Response**

Information only; no action is required.

# • 400000bd-00000000 : Management Controller [arg1] reset was initiated by IMM firmware. ()

Management Controller reset was initiated by IMM firmware

May also be shown as 400000bd00000000 or 0x400000bd00000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0189

# User Response

Information only; no action is required.

#### • 400000be-00000000 : The [arg1] certificate is expired and has been removed. ()

Expired certificate has been removed

May also be shown as 400000be00000000 or 0x400000be00000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0190

User Response

Information only; no action is required.

• 400000bf-00000000 : Operating System status has changed to [arg1]. ()

Operating System status change

May also be shown as 400000bf00000000 or 0x400000bf00000000

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0191

**User Response** 

Information only; no action is required.

# 400000c1-00000000 : System running in setup. ()

System running in setup

May also be shown as 400000c10000000 or 0x400000c10000000

#### Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0193

#### **User Response**

Information only; no action is required.

# 400000c2-00000000 : Remote Control session started by user [arg1] in [arg2] mode has been closed. ()

Remote Control session closed

May also be shown as 400000c20000000 or 0x400000c20000000

Severity Info Serviceable No

# Automatically notify support

No

Alert Category none

# **SNMP** Trap ID

# **CIM** Information

Prefix: IMM ID: 0194

# User Response

Information only; no action is required.

# • 400000c3-00000000 : Call Home to [arg1] failed to complete: [arg2]. ()

Call Home failed to complete.

May also be shown as 400000c30000000 or 0x400000c30000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0195

User Response Information only; no action is required.

# • 400000c5-00000000 : UEFI deployment boot mode is enabled for NextBoot. ()

UEFI deployment boot mode is enabled for NextBoot

May also be shown as 400000c50000000 or 0x400000c50000000

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0197

#### **User Response**

Information only; no action is required.

## • 400000c6-00000000 : UEFI deployment boot mode is enabled for NextAc. ()

UEFI deployment boot mode is enabled for NextAC

May also be shown as 400000c60000000 or 0x400000c60000000

Severity Info Serviceable No Automatically notify support

No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0198

User Response Information only; no action is required.

## • 400000c7-00000000 : UEFI deployment boot mode has been disabled. ()

UEFI deployment boot mode has been disabled

May also be shown as 400000c700000000 or 0x400000c700000000

Severity Info

Serviceable No

Automatically notify support

No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: IMM ID: 0199

**User Response** 

Information only; no action is required.

 80010202-0701ffff : Numeric sensor [NumericSensorElementName] going low (lower critical) has asserted. (SysBrd 12V)

This message is for the use case when an implementation has detected a Lower Critical sensor going low has asserted.

May also be shown as 800102020701ffff or 0x800102020701ffff

Severity Error

Serviceable

Yes

Automatically notify support

Yes

Alert Category

Critical - Voltage

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0480

#### **User Response**

If the specified sensor is CMOS battery, replace the system battery. If the specified sensor is Planar 3.3V or Planar 5V, (trained technician only) replace the system board. If the specified sensor is Planar 12V, complete the following steps until the problem is solved:

- 1. Check power supply n LED.
- 2. Remove the failing power supply.
- 3. Follow actions in "Power Problems and Solving Power Problems".
- 4. (Trained technician only) Replace the system board. (n = power supply number)

SysBrd 3.3V : SysBrd 5V :

# • 80010202-2801ffff : Numeric sensor [NumericSensorElementName] going low (lower critical) has asserted. (CMOS Battery)

This message is for the use case when an implementation has detected a Lower Critical sensor going low has asserted.

May also be shown as 800102022801ffff or 0x800102022801ffff

Severity Error Serviceable

Yes

Automatically notify support Yes

Alert Category Critical - Voltage

SNMP Trap ID

1

CIM Information Prefix: PLAT ID: 0480

#### **User Response**

If the specified sensor is CMOS battery, replace the system battery. If the specified sensor is Planar 3.3V or Planar 5V, (trained technician only) replace the system board. If the specified sensor is Planar 12V, complete the following steps until the problem is solved:

1. Check power supply n LED.

- 2. Remove the failing power supply.
- 3. Follow actions in "Power Problems and Solving Power Problems".
- 4. (Trained technician only) Replace the system board. (n = power supply number)

# • 80010701-2d01ffff : Numeric sensor [NumericSensorElementName] going high (upper non-critical) has asserted. (PCH Temp)

This message is for the use case when an implementation has detected an Upper Non-critical sensor going high has asserted.

May also be shown as 800107012d01ffff or 0x800107012d01ffff

Severity Warning Serviceable

Yes

Automatically notify support No

Alert Category

Warning - Temperature

**SNMP** Trap ID

12

CIM Information Prefix: PLAT ID: 0490

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffle is in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications (see Server Features and specifications for more information).
- 3. Make sure that the heat sink for microprocessor n.
- 4. (Trained technician only) Replace system board.
- 80010701-3701ffff : Numeric sensor [NumericSensorElementName] going high (upper non-critical) has asserted. (Inlet Temp)

This message is for the use case when an implementation has detected an Upper Non-critical sensor going high has asserted.

May also be shown as 800107013701ffff or 0x800107013701ffff

Severity Warning

Warning

Serviceable Yes

Automatically notify support

No

Alert Category Warning - Temperature

**SNMP** Trap ID

#### 12

# CIM Information Prefix: PLAT ID: 0490

# **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffle is in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications (see Server Features and specifications for more information).
- 3. Make sure that the heat sink for microprocessor n.
- 4. (Trained technician only) Replace system board.
- 80010901-2d01ffff : Numeric sensor [NumericSensorElementName] going high (upper critical) has asserted. (PCH Temp)

This message is for the use case when an implementation has detected an Upper Critical sensor going high has asserted.

May also be shown as 800109012d01ffff or 0x800109012d01ffff

Severity

Error

#### Serviceable

Yes

Automatically notify support No

Alert Category Critical - Temperature

# **SNMP** Trap ID

0

## CIM Information Prefix: PLAT ID: 0494

# User Response

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffle is in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications (see Server Features and specifications for more information).
- 3. Make sure that the heat sink for microprocessor n.
- 4. (Trained technician only) Replace system board.
- 80010901-3701ffff : Numeric sensor [NumericSensorElementName] going high (upper critical) has asserted. (Inlet Temp)

This message is for the use case when an implementation has detected an Upper Critical sensor going high has asserted.

May also be shown as 800109013701ffff or 0x800109013701ffff

# Severity

Error

Serviceable

Yes

Automatically notify support

No

Alert Category

Critical - Temperature

**SNMP** Trap ID

0

CIM Information

Prefix: PLAT ID: 0494

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffle is in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications (see Server Features and specifications for more information).
- 3. Make sure that the heat sink for microprocessor n.
- 4. (Trained technician only) Replace system board.

## 80010902-0701ffff : Numeric sensor [NumericSensorElementName] going high (upper critical) has asserted. (SysBrd 12V)

This message is for the use case when an implementation has detected an Upper Critical sensor going high has asserted.

May also be shown as 800109020701ffff or 0x800109020701ffff

Severity

Error

Serviceable

Yes

# Automatically notify support

Yes

Alert Category Critical - Voltage

SNMP Trap ID

CIM Information

Prefix: PLAT ID: 0494

#### **User Response**

If the specified sensor is Planar 3.3V or Planar 5V, (Trained technician only) replace the system board. If the specified sensor is Planar 12V, complete the following steps until the problem is solved:

- 1. Check power supply n LED.
- 2. Remove the failing power supply.
- 3. (Trained technician only) Replace the system board. (n = power supply number)

SysBrd 3.3V : SysBrd 5V :

#### 80010b01-2d01ffff : Numeric sensor [NumericSensorElementName] going high (upper nonrecoverable) has asserted. (PCH Temp)

This message is for the use case when an implementation has detected an Upper Non-recoverable sensor going high has asserted.

May also be shown as 80010b012d01ffff or 0x80010b012d01ffff

Severity

Error

Serviceable Yes

Automatically notify support No

Alert Category

Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0498

## **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffle is in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications (see Server Features and specifications for more information).
- 3. Make sure that the heat sink for microprocessor n.
- 4. (Trained technician only) Replace system board.
- 80010b01-3701ffff : Numeric sensor [NumericSensorElementName] going high (upper non-recoverable) has asserted. (Inlet Temp)

This message is for the use case when an implementation has detected an Upper Non-recoverable sensor going high has asserted.

May also be shown as 80010b013701ffff or 0x80010b013701ffff

Severity Error Serviceable Yes

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID 0

CIM Information Prefix: PLAT ID: 0498

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffle is in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications (see Server Features and specifications for more information).
- 3. Make sure that the heat sink for microprocessor n.
- 4. (Trained technician only) Replace system board.

#### 80030006-2101ffff : Sensor [SensorElementName] has deasserted. (Sig Verify Fail)

This message is for the use case when an implementation has detected a Sensor has deasserted.

May also be shown as 800300062101ffff or 0x800300062101ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0509

User Response No action; information only.

#### 8003010c-2581ffff : Sensor [SensorElementName] has asserted. (Non-Auth DIMMs)

This message is for the use case when an implementation has detected a Sensor has asserted.

May also be shown as 8003010c2581ffff or 0x8003010c2581ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other SNMP Trap ID

CIM Information Prefix: PLAT ID: 0508

**User Response** 

- 1. Replace the power supply with higher rated power.
- 2. Reduce the total power consumption by removing newly added or unused option like drives or adapters.
- 8003010e-2581ffff : Sensor [SensorElementName] has asserted. (Memory Resized)

This message is for the use case when an implementation has detected a Sensor has asserted.

May also be shown as 8003010e2581ffff or 0x8003010e2581ffff

Severity

Info

Serviceable No

#### Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0508

## **User Response**

- 1. Replace the power supply with higher rated power.
- 2. Reduce the total power consumption by removing newly added or unused option like drives or adapters.

# 8003010f-2101ffff : Sensor [SensorElementName] has asserted. (IMM FW Corrupted)

This message is for the use case when an implementation has detected a Sensor has asserted.

May also be shown as 8003010f2101ffff or 0x8003010f2101ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0508

#### User Response

- 1. Replace the power supply with higher rated power.
- 2. Reduce the total power consumption by removing newly added or unused option like drives or adapters.

## • 80030112-0601ffff : Sensor [SensorElementName] has asserted. (SMM Mode)

This message is for the use case when an implementation has detected a Sensor has asserted.

May also be shown as 800301120601ffff or 0x800301120601ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0508

#### **User Response**

- 1. Replace the power supply with higher rated power.
- 2. Reduce the total power consumption by removing newly added or unused option like drives or adapters.

SMM Monitor :

#### 80030118-1701ffff : Sensor [SensorElementName] has asserted. (Invalid NEBs Cfg)

This message is for the use case when an implementation has detected a Sensor has asserted.

May also be shown as 800301181701ffff or 0x800301181701ffff

Severity Info Serviceable

No

Automatically notify support

No

Alert Category

System - Other

# SNMP Trap ID

#### **CIM Information**

Prefix: PLAT ID: 0508

#### **User Response**

- 1. Replace the power supply with higher rated power.
- 2. Reduce the total power consumption by removing newly added or unused option like drives or adapters.

#### 80030121-0782ffff : Sensor [SensorElementName] has asserted. (PCIe Dev LK Down)

This message is for the use case when an implementation has detected a Sensor has asserted.

May also be shown as 800301210782ffff or 0x800301210782ffff

Severity

Info

Serviceable

No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

**CIM Information** 

Prefix: PLAT ID: 0508

#### **User Response**

- 1. Replace the power supply with higher rated power.
- 2. Reduce the total power consumption by removing newly added or unused option like drives or adapters.
- 8007000d-3030ffff : Sensor [SensorElementName] has transitioned to normal state. (ROMB Volume)

This message is for the use case when an implementation has detected a Sensor transition to the normal state.

May also be shown as 8007000d3030ffff or 0x8007000d3030ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0518

User Response No action; information only.

 80070101-0301ffff : Sensor [SensorElementName] has transitioned from normal to non-critical state. (CPU 1 Overtemp)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from normal.

May also be shown as 800701010301ffff or 0x800701010301ffff

Severity Warning

Serviceable Yes

Automatically notify support

No

Alert Category Warning - Temperature

SNMP Trap ID 12

CIM Information Prefix: PLAT ID: 0520

## **User Response**

- 1. Check the microprocessor installed is Intel E5-2690.
- 2. Reduce the ambient temperature under 27 Celsius degree.
- 80070101-0302ffff : Sensor [SensorElementName] has transitioned from normal to non-critical state. (CPU 2 Overtemp)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from normal.

May also be shown as 800701010302ffff or 0x800701010302ffff

Severity

Warning

Serviceable Yes

165

Automatically notify support No

Alert Category

Warning - Temperature

**SNMP** Trap ID

12

CIM Information Prefix: PLAT ID: 0520

# **User Response**

- 1. Check the microprocessor installed is Intel E5-2690.
- 2. Reduce the ambient temperature under 27 Celsius degree.

# 80070101-0f02ffff : Sensor [SensorElementName] has transitioned from normal to non-critical state. (M5215 RAID Temp)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from normal.

May also be shown as 800701010f02ffff or 0x800701010f02ffff

Severity

Warning

Serviceable Yes

Automatically notify support No

INO

Alert Category Warning - Temperature

# SNMP Trap ID

12

CIM Information Prefix: PLAT ID: 0520

# **User Response**

- 1. Check the microprocessor installed is Intel E5-2690.
- 2. Reduce the ambient temperature under 27 Celsius degree.
- 80070101-2c01ffff : Sensor [SensorElementName] has transitioned from normal to non-critical state. (Mezz Exp 1 Temp)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from normal.

May also be shown as 800701012c01ffff or 0x800701012c01ffff

Severity

Warning

Serviceable Yes

Automatically notify support No

Alert Category Warning - Temperature

SNMP Trap ID 12

CIM Information Prefix: PLAT ID: 0520

#### User Response

- 1. Check the microprocessor installed is Intel E5-2690.
- 2. Reduce the ambient temperature under 27 Celsius degree.
- 80070101-2c02ffff : Sensor [SensorElementName] has transitioned from normal to non-critical state. (Mezz Exp 2 Temp)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from normal.

May also be shown as 800701012c02ffff or 0x800701012c02ffff

Severity Warning

Serviceable Yes

#### Automatically notify support

No

#### Alert Category

Warning - Temperature

# **SNMP** Trap ID

12

# **CIM Information**

Prefix: PLAT ID: 0520

# **User Response**

- 1. Check the microprocessor installed is Intel E5-2690.
- 2. Reduce the ambient temperature under 27 Celsius degree.

# • 8007010d-3030ffff : Sensor [SensorElementName] has transitioned from normal to non-critical state. (ROMB Volume)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from normal.

May also be shown as 8007010d3030ffff or 0x8007010d3030ffff

Severity Warning

# Serviceable

Yes

Automatically notify support No

Alert Category Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0520

#### User Response None

# • 8007010f-2201ffff : Sensor [SensorElementName] has transitioned from normal to non-critical state. (GPT Status)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from normal.

May also be shown as 8007010f2201ffff or 0x8007010f2201ffff

Severity Warning Serviceable Yes Automatically notify support No

**Alert Category** 

Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0520

#### User Response

- 1. Check the IBM support site for service bulletins or firmware updates that apply to this GPT error.
- 2. Set the UEFI setting DISK GPT Recovery to Automatic.
- 3. Replace the corrupt disk.

# • 8007010f-2582ffff : Sensor [SensorElementName] has transitioned from normal to non-critical state. (I/O Resources)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from normal.

May also be shown as 8007010f2582ffff or 0x8007010f2582ffff

Severity Warning

Serviceable Yes

Automatically notify support

No

Alert Category Warning - Other

**SNMP Trap ID** 60

CIM Information Prefix: PLAT ID: 0520

User Response

- 1. Check the IBM support site for service bulletins or firmware updates that apply to this GPT error.
- 2. Set the UEFI setting DISK GPT Recovery to Automatic.
- 3. Replace the corrupt disk.

# • 80070112-0b01ffff : Sensor [SensorElementName] has transitioned from normal to non-critical state. (RAID Warn Log)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from normal.

May also be shown as 800701120b01ffff or 0x800701120b01ffff

Severity Warning Serviceable

Yes

Automatically notify support No

#### Alert Category Warning - Other

SNMP Trap ID

60

CIM Information Prefix: PLAT ID: 0520

# User Response

None

# 80070114-2201ffff : Sensor [SensorElementName] has transitioned from normal to non-critical state. (TPM Lock)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from normal.

May also be shown as 800701142201ffff or 0x800701142201ffff

Severity Warning

Serviceable

Yes

Automatically notify support No

Alert Category Warning - Other

# SNMP Trap ID

60

CIM Information Prefix: PLAT ID: 0520

# **User Response**

- 1. Complete the administrative tasks that require the TPM physical presence switch to be in the ON position.
- 2. Restore the physical presence switch to the OFF position.
- 3. Reboot the system.
- 4. (Trained technician only) If the error continues, replace the planar.

TPM Phy Pres Set :

# • 80070117-0f02ffff : Sensor [SensorElementName] has transitioned from normal to non-critical state. (M5215 RAID Fault)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from normal.

May also be shown as 800701170f02ffff or 0x800701170f02ffff

Severity Warning

vvarning

Serviceable Yes

# Automatically notify support

No

Alert Category Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0520

User Response None

 80070128-2e01ffff : Sensor [SensorElementName] has transitioned from normal to non-critical state. (ME Recovery)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from normal.

May also be shown as 800701282e01ffff or 0x800701282e01ffff

Severity Warning

Serviceable Yes

Automatically notify support No

Alert Category Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0520

User Response None

• 80070202-0701ffff : Sensor [SensorElementName] has transitioned to critical from a less severe state. (SysBrd Vol Fault)

This message is for the use case when an implementation has detected a Sensor transitioned to critical from less severe.

May also be shown as 800702020701ffff or 0x800702020701ffff

**Severity** Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Voltage

**SNMP** Trap ID

1

# CIM Information Prefix: PLAT ID: 0522

#### **User Response**

- 1. Check the system-event log.
- 2. Check for an error LED on the system board.
- 3. Replace any failing device.
- 4. Check for a server firmware update. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 5. (Trained technician only) Replace the system board.
- 8007020d-3030ffff : Sensor [SensorElementName] has transitioned to critical from a less severe state. (ROMB Volume)

This message is for the use case when an implementation has detected a Sensor transitioned to critical from less severe.

May also be shown as 8007020d3030ffff or 0x8007020d3030ffff

Severity Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0522

User Response None

# • 8007020f-2201ffff : Sensor [SensorElementName] has transitioned to critical from a less severe state. (TXT ACM Module)

This message is for the use case when an implementation has detected a Sensor transitioned to critical from less severe.

May also be shown as 8007020f2201ffff or 0x8007020f2201ffff

Severity Error Serviceable Yes Automatically notify support No

Alert Category

Critical - Other

SNMP Trap ID

50

CIM Information

Prefix: PLAT ID: 0522

## User Response

- 1. If enabling TXT is not required, disable TXT from the Setup Utility.
- 2. If enabling TXT is required, verify that the TPM is enabled and activated from the Setup Utility.
- 3. If the problem remains, contact your service representative.

# • 8007020f-2582ffff : Sensor [SensorElementName] has transitioned to critical from a less severe state. (I/O Resources)

This message is for the use case when an implementation has detected a Sensor transitioned to critical from less severe.

May also be shown as 8007020f2582ffff or 0x8007020f2582ffff

Severity

Error

Serviceable Yes

Automatically notify support

No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0522

#### **User Response**

- 1. If enabling TXT is not required, disable TXT from the Setup Utility.
- 2. If enabling TXT is required, verify that the TPM is enabled and activated from the Setup Utility.
- 3. If the problem remains, contact your service representative.

# • 80070212-0b02ffff : Sensor [SensorElementName] has transitioned to critical from a less severe state. (RAID Error Log)

This message is for the use case when an implementation has detected a Sensor transitioned to critical from less severe.

May also be shown as 800702120b02ffff or 0x800702120b02ffff

Severity Error Serviceable Yes

Automatically notify support No

# Alert Category

Critical - Other

# SNMP Trap ID

50

CIM Information Prefix: PLAT ID: 0522

# User Response

None

# • 80070217-0f02ffff : Sensor [SensorElementName] has transitioned to critical from a less severe state. (M5215 RAID Batt)

This message is for the use case when an implementation has detected a Sensor transitioned to critical from less severe.

May also be shown as 800702170f02ffff or 0x800702170f02ffff

Severity Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0522

User Response None M5215 RAID Fault :

 80070217-2c01ffff : Sensor [SensorElementName] has transitioned to critical from a less severe state. (Mezz Exp 1 Fault)

This message is for the use case when an implementation has detected a Sensor transitioned to critical from less severe.

May also be shown as 800702172c01ffff or 0x800702172c01ffff

Severity Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50 CIM Information Prefix: PLAT ID: 0522

User Response None

• 80070217-2c02ffff : Sensor [SensorElementName] has transitioned to critical from a less severe state. (Mezz Exp 2 Fault)

This message is for the use case when an implementation has detected a Sensor transitioned to critical from less severe.

May also be shown as 800702172c02ffff or 0x800702172c02ffff

Severity Error Serviceable

Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0522

User Response None

• 80070219-0701ffff : Sensor [SensorElementName] has transitioned to critical from a less severe state. (Sys Board Fault)

This message is for the use case when an implementation has detected a Sensor transitioned to critical from less severe.

May also be shown as 800702190701ffff or 0x800702190701ffff

Severity Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0522

# **User Response**

1. Check for an error LED on the system board.

- 2. Check the system-event log.
- 3. Check for the system firmware version and update to the latest version. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 4. Unplug and restore AC power cord, then, perform step 1 and 2 again.
- 5. If problems still occurred, (trained technician only) replace the system board.
- 8007021b-0301ffff : Sensor [SensorElementName] has transitioned to critical from a less severe state. (CPU 1 QPILinkErr)

This message is for the use case when an implementation has detected a Sensor transitioned to critical from less severe.

May also be shown as 8007021b0301ffff or 0x8007021b0301ffff

Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0522

# **User Response**

- 1. Check for a server firmware update.
- 2. Make sure that the installed microprocessors are compatible.
- 3. Make sure the microprocessor 2 expansion board is installed correctly (see Installing the microprocessor 2 expansion board).
- 4. (Trained technician only) Replace microprocessor
- 5. (Trained technician only) Replace microprocessor 2 expansion board.

## 8007021b-0302ffff : Sensor [SensorElementName] has transitioned to critical from a less severe state. (CPU 2 QPILinkErr)

This message is for the use case when an implementation has detected a Sensor transitioned to critical from less severe.

May also be shown as 8007021b0302ffff or 0x8007021b0302ffff

Severity Error Serviceable Yes

#### Automatically notify support No

## **Alert Category**

Critical - Other

SNMP Trap ID

50

CIM Information Prefix: PLAT ID: 0522

## User Response

- 1. Check for a server firmware update.
- 2. Make sure that the installed microprocessors are compatible.
- 3. Make sure the microprocessor 2 expansion board is installed correctly (see Installing the microprocessor 2 expansion board).
- 4. (Trained technician only) Replace microprocessor
- 5. (Trained technician only) Replace microprocessor 2 expansion board.
- 80070228-2e01ffff : Sensor [SensorElementName] has transitioned to critical from a less severe state. (ME Error)

This message is for the use case when an implementation has detected a Sensor transitioned to critical from less severe.

May also be shown as 800702282e01ffff or 0x800702282e01ffff

Severity

Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0522

User Response None ME Flash Error :

## 80070301-0301ffff : Sensor [SensorElementName] has transitioned to non-recoverable from a less severe state. (CPU 1 Overtemp)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable from less severe.

May also be shown as 800703010301ffff or 0x800703010301ffff

Severity Error

Serviceable Yes

Automatically notify support

No

#### Alert Category

Critical - Temperature

## **SNMP Trap ID**

0

#### CIM Information

Prefix: PLAT ID: 0524

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffle is in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications (see Server Features and specifications for more information).
- 3. Make sure that the heat sink for microprocessor n.
- 4. (Trained technician only) Replace microprocessor n. (n = microprocessor number)

#### 80070301-0302ffff : Sensor [SensorElementName] has transitioned to non-recoverable from a less severe state. (CPU 2 Overtemp)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable from less severe.

May also be shown as 800703010302ffff or 0x800703010302ffff

# Severity

Error

# Serviceable

Yes

#### Automatically notify support No

# Alert Category

Critical - Temperature

# **SNMP** Trap ID

0

CIM Information Prefix: PLAT ID: 0524

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffle is in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications (see Server Features and specifications for more information).
- 3. Make sure that the heat sink for microprocessor n.
- 4. (Trained technician only) Replace microprocessor n. (n = microprocessor number)
- 80070301-0f02ffff : Sensor [SensorElementName] has transitioned to non-recoverable from a less severe state. (M5215 RAID Temp)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable from less severe.

May also be shown as 800703010f02ffff or 0x800703010f02ffff

#### Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Temperature

# **SNMP** Trap ID

0

CIM Information Prefix: PLAT ID: 0524

# User Response

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffle is in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications (see Server Features and specifications for more information).
- 3. Make sure that the heat sink for microprocessor n.
- 4. (Trained technician only) Replace microprocessor n. (n = microprocessor number)
- 80070301-2c01ffff : Sensor [SensorElementName] has transitioned to non-recoverable from a less severe state. (Mezz Exp 1 Temp)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable from less severe.

May also be shown as 800703012c01ffff or 0x800703012c01ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0 CIM Information Prefix: PLAT ID: 0524

**User Response** 

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffle is in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications (see Server Features and specifications for more information).
- 3. Make sure that the heat sink for microprocessor n.
- 4. (Trained technician only) Replace microprocessor n. (n = microprocessor number)
- 80070301-2c02ffff : Sensor [SensorElementName] has transitioned to non-recoverable from a less severe state. (Mezz Exp 2 Temp)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable from less severe.

May also be shown as 800703012c02ffff or 0x800703012c02ffff

Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Temperature

# SNMP Trap ID

0

CIM Information

Prefix: PLAT ID: 0524

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffle is in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications (see Server Features and specifications for more information).
- 3. Make sure that the heat sink for microprocessor n.
- 4. (Trained technician only) Replace microprocessor n. (n = microprocessor number)

## 8007030d-3030ffff : Sensor [SensorElementName] has transitioned to non-recoverable from a less severe state. (ROMB Volume)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable from less severe.

May also be shown as 8007030d3030ffff or 0x8007030d3030ffff

Severity Error Serviceable Yes Automatically notify support No

# Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0524

#### User Response None

• 80070319-2201ffff : Sensor [SensorElementName] has transitioned to non-recoverable from a less severe state. (S3 Resume Fail)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable from less severe.

May also be shown as 800703192201ffff or 0x800703192201ffff

Severity Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0524

**User Response** None

 80070401-0f02ffff : Sensor [SensorElementName] has transitioned to non-critical from a more severe state. (M5215 RAID Temp)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from more severe.

May also be shown as 800704010f02ffff or 0x800704010f02ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

# CIM Information Prefix: PLAT ID: 0526

#### **User Response**

No action; information only.

• 80070401-2c01ffff : Sensor [SensorElementName] has transitioned to non-critical from a more severe state. (Mezz Exp 1 Temp)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from more severe.

May also be shown as 800704012c01ffff or 0x800704012c01ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other SNMP Trap ID 22 CIM Information Prefix: PLAT ID: 0526

User Response No action; information only.

 80070401-2c02ffff : Sensor [SensorElementName] has transitioned to non-critical from a more severe state. (Mezz Exp 2 Temp)

This message is for the use case when an implementation has detected a Sensor transitioned to noncritical from more severe.

May also be shown as 800704012c02ffff or 0x800704012c02ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other SNMP Trap ID 22 CIM Information Prefix: PLAT ID: 0526

User Response No action; information only.

### 80070601-0f02ffff : Sensor [SensorElementName] has transitioned to non-recoverable. (M5215 RAID Temp)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable.

May also be shown as 800706010f02ffff or 0x800706010f02ffff

Severity

Error

Serviceable Yes

Automatically notify support No

Alert Category

Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0530

User Response None

 80070601-2c01ffff : Sensor [SensorElementName] has transitioned to non-recoverable. (Mezz Exp 1 Temp)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable.

May also be shown as 800706012c01ffff or 0x800706012c01ffff

Severity Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID 0

CIM Information Prefix: PLAT ID: 0530

User Response None

 80070601-2c02ffff : Sensor [SensorElementName] has transitioned to non-recoverable. (Mezz Exp 2 Temp)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable.

May also be shown as 800706012c02ffff or 0x800706012c02ffff

Severity

Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Temperature

0 CIM Information Prefix: PLAT ID: 0530

User Response None

**SNMP Trap ID** 

• 8007060f-2201ffff : Sensor [SensorElementName] has transitioned to non-recoverable. (BOFM Config Err)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable.

May also be shown as 8007060f2201ffff or 0x8007060f2201ffff

Severity

Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0530

User Response None

 80070614-2201ffff : Sensor [SensorElementName] has transitioned to non-recoverable. (TPM Phy Pres Set)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable.

May also be shown as 800706142201ffff or 0x800706142201ffff

Severity

Error

Serviceable

Yes

# Automatically notify support

No

Alert Category Critical - Other

SNMP Trap ID

50

CIM Information Prefix: PLAT ID: 0530

# User Response

- 1. Update the server firmware (see Recovering the server firmware).
- 2. If the problem persists, (trained technician only) replace the system board (see Removing the system board and Installing the system board).
- 80070617-2c01ffff : Sensor [SensorElementName] has transitioned to non-recoverable. (Mezz Exp 1 Fault)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable.

May also be shown as 800706172c01ffff or 0x800706172c01ffff

Severity

Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0530

User Response None

# 80070617-2c02ffff : Sensor [SensorElementName] has transitioned to non-recoverable. (Mezz Exp 2 Fault)

This message is for the use case when an implementation has detected a Sensor transitioned to non-recoverable.

May also be shown as 800706172c02ffff or 0x800706172c02ffff

Severity Error

Serviceable Yes

Automatically notify support

No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0530

User Response None

• 80080017-0f01ffff : Device [LogicalDeviceElementName] has been removed from unit [PhysicalPackageElementName]. (SAS BP)

This message is for the use case when an implementation has detected a Device was removed.

May also be shown as 800800170f01ffff or 0x800800170f01ffff

Severity Info Serviceable No Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0537

User Response No action; information only.

• 8008010f-2101ffff : Device [LogicalDeviceElementName] has been added. (Phy Presence Jmp)

This message is for the use case when an implementation has detected a Device was inserted.

May also be shown as 8008010f2101ffff or 0x8008010f2101ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other SNMP Trap ID

CIM Information Prefix: PLAT ID: 0536 **User Response** 

No action; information only.

• 80080128-2101ffff : Device [LogicalDeviceElementName] has been added. (Low Security Jmp)

This message is for the use case when an implementation has detected a Device was inserted.

May also be shown as 800801282101ffff or 0x800801282101ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0536

User Response No action; information only.

• 8009000c-0701ffff : Device [LogicalDeviceElementName] has been disabled. (Performance Mode)

This message is for the use case when an implementation has detected a Device was disabled.

May also be shown as 8009000c0701ffff or 0x8009000c0701ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0539

User Response No action; information only.

#### • 8009010c-0701ffff : Device [LogicalDeviceElementName] has been enabled. (Performance Mode)

This message is for the use case when an implementation has detected a Device was enabled.

May also be shown as 8009010c0701ffff or 0x8009010c0701ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0538

User Response No action; information only.

# • 80090112-2101ffff : Device [LogicalDeviceElementName] has been enabled. (IPMI/SNMP Accts)

This message is for the use case when an implementation has detected a Device was enabled.

May also be shown as 800901122101ffff or 0x800901122101ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0538

User Response No action; information only.

# 800b010c-2581ffff : Redundancy Lost for [RedundancySetElementName] has asserted. (Backup Memory)

This message is for the use case when Redundancy Lost has asserted.

May also be shown as 800b010c2581ffff or 0x800b010c2581ffff

Severity Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Memory

# **SNMP** Trap ID

41

CIM Information Prefix: PLAT ID: 0802

### **User Response**

- 1. Check the system-event log for DIMM failure events (uncorrectable or PFA) and correct the failures.
- 2. Re-enable mirroring in the Setup utility.
- 800b030c-2581ffff : Non-redundant:Sufficient Resources from Redundancy Degraded or Fully Redundant for [RedundancySetElementName] has asserted. (Backup Memory)

This message is for the use case when a Redundancy Set has transitioned from Redundancy Degraded or Fully Redundant to Non-redundant:Sufficient.

May also be shown as 800b030c2581ffff or 0x800b030c2581ffff

Severity Warning Serviceable

Yes

Automatically notify support No

Alert Category Warning - Memory

**SNMP Trap ID** 43

CIM Information Prefix: PLAT ID: 0806

# User Response

.

- 1. Check the system-event log for DIMM failure events (uncorrectable or PFA) and correct the failures.
- 2. Re-enable mirroring in the Setup utility.

# 800b050c-2581ffff : Non-redundant:Insufficient Resources for [RedundancySetElementName] has asserted. (Backup Memory)

This message is for the use case when a Redundancy Set has transitioned to Non-redundant:Insufficient Resources.

May also be shown as 800b050c2581ffff or 0x800b050c2581ffff

Severity Error Serviceable Yes Automatically notify support

No

Alert Category Critical - Memory

# **SNMP** Trap ID

41

# CIM Information Prefix: PLAT ID: 0810

### **User Response**

- 1. Check the system-event log for DIMM failure events (uncorrectable or PFA) and correct the failures.
- 2. Re-enable mirroring in the Setup utility.

# • 806f0007-0301ffff : [ProcessorElementName] has Failed with IERR. (CPU 1)

This message is for the use case when an implementation has detected a Processor Failed - IERR Condition.

May also be shown as 806f00070301ffff or 0x806f00070301ffff

Severity Error Serviceable Yes Automatically notify support No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0042

#### **User Response**

- 1. Update the latest level of system firmware and device drivers are installed for all adapters and standard devices, such as UEFI, IMM Ethernet, and SAS. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 2. Run the DSA program.
- 3. Reseat the adapter.
- 4. Replace the adapter.
- 5. (Trained technician only) Replace microprocessor n. (n = microprocessor number)
- 6. (Trained technician only) Replace the system board.

#### 806f0007-0302ffff : [ProcessorElementName] has Failed with IERR. (CPU 2)

This message is for the use case when an implementation has detected a Processor Failed - IERR Condition.

May also be shown as 806f00070302ffff or 0x806f00070302ffff

Severity

Error

### Serviceable

Yes

# Automatically notify support

No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0042

# **User Response**

- 1. Update the latest level of system firmware and device drivers are installed for all adapters and standard devices, such as UEFI, IMM Ethernet, and SAS. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 2. Run the DSA program.
- 3. Reseat the adapter.
- 4. Replace the adapter.
- 5. (Trained technician only) Replace microprocessor n. (n = microprocessor number)
- 6. (Trained technician only) Replace the system board.

# 806f0007-2584ffff : [ProcessorElementName] has Failed with IERR. (All CPUs)

This message is for the use case when an implementation has detected a Processor Failed - IERR Condition.

May also be shown as 806f00072584ffff or 0x806f00072584ffff

Severity

Error

Serviceable

Yes

# Automatically notify support

No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0042

#### **User Response**

- 1. Update the latest level of system firmware and device drivers are installed for all adapters and standard devices, such as UEFI, IMM Ethernet, and SAS. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 2. Run the DSA program.

- 3. Reseat the adapter.
- 4. Replace the adapter.
- 5. (Trained technician only) Replace microprocessor n. (n = microprocessor number)
- 6. (Trained technician only) Replace the system board.

One of CPUs :

# • 806f0009-0701ffff : [PowerSupplyElementName] has been turned off. (Host Power)

This message is for the use case when an implementation has detected a Power Unit that has been Disabled.

May also be shown as 806f00090701ffff or 0x806f00090701ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Power Off **SNMP Trap ID** 23 **CIM** Information Prefix: PLAT ID: 0106 **User Response** No action; information only. 806f000d-0400ffff : The [StorageVolumeElementName] has been added. (Drive 0) This message is for the use case when an implementation has detected a Drive has been Added. May also be shown as 806f000d0400ffff or 0x806f000d0400ffff Severity Info Serviceable No Automatically notify support No **Alert Category** Critical - Hard Disk drive **SNMP Trap ID** 5 **CIM Information** Prefix: PLAT ID: 0162 **User Response** No action; information only. 806f000d-0401ffff : The [StorageVolumeElementName] has been added. (Drive 1)

This message is for the use case when an implementation has detected a Drive has been Added.

May also be shown as 806f000d0401ffff or 0x806f000d0401ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0162

User Response No action; information only.

#### • 806f000d-0402ffff : The [StorageVolumeElementName] has been added. (Drive 2)

This message is for the use case when an implementation has detected a Drive has been Added.

May also be shown as 806f000d0402ffff or 0x806f000d0402ffff

Severity Info

Serviceable No

Automatically notify support No Alert Category

Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0162

User Response No action; information only.

#### • 806f000d-0403ffff : The [StorageVolumeElementName] has been added. (Drive 3)

This message is for the use case when an implementation has detected a Drive has been Added.

May also be shown as 806f000d0403ffff or 0x806f000d0403ffff

Severity Info

Serviceable No

# Automatically notify support

No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0162

User Response No action; information only.

# • 806f000d-0404ffff : The [StorageVolumeElementName] has been added. (Drive 4)

This message is for the use case when an implementation has detected a Drive has been Added.

May also be shown as 806f000d0404ffff or 0x806f000d0404ffff

Severity Info Serviceable No Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0162

User Response No action; information only.

# • 806f000d-0405ffff : The [StorageVolumeElementName] has been added. (Drive 5)

This message is for the use case when an implementation has detected a Drive has been Added.

May also be shown as 806f000d0405ffff or 0x806f000d0405ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Hard Disk drive SNMP Trap ID 5 CIM Information Prefix: PLAT ID: 0162 **User Response** 

No action; information only.

# • 806f000d-0406ffff : The [StorageVolumeElementName] has been added. (Drive 6)

This message is for the use case when an implementation has detected a Drive has been Added.

May also be shown as 806f000d0406ffff or 0x806f000d0406ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0162

User Response No action; information only.

#### • 806f000d-0407ffff : The [StorageVolumeElementName] has been added. (Drive 7)

This message is for the use case when an implementation has detected a Drive has been Added.

May also be shown as 806f000d0407ffff or 0x806f000d0407ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0162

User Response No action; information only.

 806f000f-220101ff : The System [ComputerSystemElementName] has detected no memory in the system. (ABR Status)

This message is for the use case when an implementation has detected that memory was detected in the system.

May also be shown as 806f000f220101ff or 0x806f000f220101ff

Severity Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0794

# **User Response**

This is a UEFI detected event. The UEFI(POST) error code for this event can be found in the logged IMM message text. Please refer to the UEFI(POST) error code in the "UEFI(POST) error code" section of the Information Center for the appropriate user response. Firmware Error : Sys Boot Status :

# • 806f000f-220102ff : Subsystem [MemoryElementName] has insufficient memory for operation. (ABR Status)

This message is for the use case when an implementation has detected that the usable Memory is insufficient for operation.

May also be shown as 806f000f220102ff or 0x806f000f220102ff

Severity

Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Memory

# SNMP Trap ID

41

CIM Information Prefix: PLAT ID: 0132

#### **User Response**

This is a UEFI detected event. The UEFI(POST) error code for this event can be found in the logged IMM message text. Please refer to the UEFI(POST) error code in the "UEFI(POST) error code" section of the Information Center for the appropriate user response. Firmware Error : Sys Boot Status :

# • 806f000f-220103ff : The System [ComputerSystemElementName] encountered firmware error - unrecoverable boot device failure. (ABR Status)

This message is for the use case when an implementation has detected that System Firmware Error Unrecoverable boot device failure has occurred.

May also be shown as 806f000f220103ff or 0x806f000f220103ff

Severity

Error

Serviceable

Yes

Automatically notify support No

#### Alert Category

Critical - Hard Disk drive

SNMP Trap ID

5

CIM Information Prefix: PLAT ID: 0770

#### **User Response**

This is a UEFI detected event. The UEFI(POST) error code for this event can be found in the logged IMM message text. Please refer to the UEFI(POST) error code in the "UEFI(POST) error code" section of the Information Center for the appropriate user response. Firmware Error : Sys Boot Status :

# • 806f000f-220104ff : The System [ComputerSystemElementName]has encountered a motherboard failure. (ABR Status)

This message is for the use case when an implementation has detected that a fatal motherboard failure in the system.

May also be shown as 806f000f220104ff or 0x806f000f220104ff

Severity Error Serviceable Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0795

#### User Response

This is a UEFI detected event. The UEFI(POST) error code for this event can be found in the logged IMM message text. Please refer to the UEFI(POST) error code in the "UEFI(POST) error code" section of the Information Center for the appropriate user response. Firmware Error : Sys Boot Status :

#### 806f000f-220107ff : The System [ComputerSystemElementName] encountered firmware error unrecoverable keyboard failure. (ABR Status)

This message is for the use case when an implementation has detected that System Firmware Error Unrecoverable Keyboard failure has occurred.

May also be shown as 806f000f220107ff or 0x806f000f220107ff

Severity

Error

Serviceable

Yes

Automatically notify support

No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0764

#### **User Response**

This is a UEFI detected event. The UEFI(POST) error code for this event can be found in the logged IMM message text. Please refer to the UEFI(POST) error code in the "UEFI(POST) error code" section of the Information Center for the appropriate user response. Firmware Error : Sys Boot Status :

#### 806f000f-22010aff : The System [ComputerSystemElementName] encountered firmware error - no video device detected. (ABR Status)

This message is for the use case when an implementation has detected that System Firmware Error No video device detected has occurred.

May also be shown as 806f000f22010aff or 0x806f000f22010aff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Other SNMP Trap ID 50 CIM Information Prefix: PLAT ID: 0766

#### **User Response**

This is a UEFI detected event. The UEFI(POST) error code for this event can be found in the logged IMM message text. Please refer to the UEFI(POST) error code in the "UEFI(POST) error code" section of the Information Center for the appropriate user response. Firmware Error : Sys Boot Status :

# • 806f000f-22010bff : Firmware BIOS (ROM) corruption was detected on system [ComputerSystemElementName] during POST. (ABR Status)

Firmware BIOS (ROM) corruption was detected on the system during POST.

May also be shown as 806f000f22010bff or 0x806f000f22010bff

Severity Info Serviceable Yes

#### Automatically notify support

No

Alert Category Critical - Other

#### SNMP Trap ID 40

40

# CIM Information

Prefix: PLAT ID: 0850

#### **User Response**

- 1. Make sure the server meets the minimum configuration to start (see Power-supply LEDs).
- 2. Recover the server firmware from the backup page: a.Restart the server. b.At the prompt, press F3 to recover the firmware.
- 3. Update the server firmware to the latest level (see Updating the firmware). Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 4. Remove components one at a time, restarting the server each time, to see if the problem goes away.
- 5. If the problem remains, (trained service technician) replace the system board.

Firmware Error : Sys Boot Status :

# • 806f000f-22010cff : CPU voltage mismatch detected on [ProcessorElementName]. (ABR Status)

This message is for the use case when an implementation has detected a CPU voltage mismatch with the socket voltage.

May also be shown as 806f000f22010cff or 0x806f000f22010cff

#### Severity

Error

#### Serviceable

Yes

# Automatically notify support

No

Alert Category Critical - CPU

# **SNMP** Trap ID

40

#### **CIM** Information

Prefix: PLAT ID: 0050

#### **User Response**

This is a UEFI detected event. The UEFI(POST) error code for this event can be found in the logged IMM message text. Please refer to the UEFI(POST) error code in the "UEFI(POST) error code" section of the Information Center for the appropriate user response. Firmware Error : Sys Boot Status :

#### 806f000f-2201ffff : The System [ComputerSystemElementName] encountered a POST Error. (ABR Status)

This message is for the use case when an implementation has detected a Post Error.

May also be shown as 806f000f2201ffff or 0x806f000f2201ffff

Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category

Critical - Other

SNMP Trap ID 50

50

CIM Information Prefix: PLAT ID: 0184

#### **User Response**

This is a UEFI detected event. The UEFI(POST) error code for this event can be found in the logged IMM message text. Please refer to the UEFI(POST) error code in the "UEFI(POST) error code" section of the Information Center for the appropriate user response. Firmware Error : Sys Boot Status :

# • 806f0013-1701ffff : A diagnostic interrupt has occurred on system [ComputerSystemElementName]. (NMI State)

This message is for the use case when an implementation has detected a Front Panel NMI / Diagnostic Interrupt.

May also be shown as 806f00131701ffff or 0x806f00131701ffff

Severity Error Serviceable

Yes

Automatically notify support

No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0222

#### **User Response**

If the NMI button has not been pressed, complete the following steps:

- 1. Make sure that the NMI button is not pressed.
- 2. Replace the operator information panel cable.
- 3. Replace the operator information panel.
- 806f0021-2201ffff : Fault in slot [PhysicalConnectorSystemElementName] on system [ComputerSystemElementName]. (No Op ROM Space)

This message is for the use case when an implementation has detected a Fault in a slot.

May also be shown as 806f00212201ffff or 0x806f00212201ffff

#### Severity

Error

#### Serviceable

Yes

#### Automatically notify support Yes

Alert Category

Critical - Other

SNMP Trap ID

50

CIM Information Prefix: PLAT ID: 0330

#### **User Response**

- 1. Check the PCI LED.
- 2. Reseat the affected adapters and riser card.
- 3. Update the server firmware (UEFI and IMM) and adapter firmware. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 4. Replace the affected adapters.
- 5. Replace the riser card.
- 6. (Trained service technicians only) Replace the system board.
- 806f0021-2582ffff : Fault in slot [PhysicalConnectorSystemElementName] on system [ComputerSystemElementName]. (PCIe Error)

This message is for the use case when an implementation has detected a Fault in a slot.

May also be shown as 806f00212582ffff or 0x806f00212582ffff

Severity Error Serviceable Yes

Automatically notify support Yes

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0330

#### **User Response**

- 1. Check the PCI LED.
- 2. Reseat the affected adapters and riser card.

- 3. Update the server firmware (UEFI and IMM) and adapter firmware. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 4. Replace the affected adapters.
- 5. Replace the riser card.
- 6. (Trained service technicians only) Replace the system board.
- 806f0023-2101ffff : Watchdog Timer expired for [WatchdogElementName]. (IPMI Watchdog)

This message is for the use case when an implementation has detected a Watchdog Timer Expired.

May also be shown as 806f00232101ffff or 0x806f00232101ffff

Severity Info Serviceable No Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0368

User Response No action; information only.

• 806f0028-2101ffff : Sensor [SensorElementName] is unavailable or degraded on management system [ComputerSystemElementName]. (TPM Cmd Failures)

This message is for the use case when an implementation has detected a Sensor is Unavailable or degraded.

May also be shown as 806f00282101ffff or 0x806f00282101ffff

Severity Warning Serviceable Yes Automatically notify support No Alert Category Warning - Other SNMP Trap ID 60 CIM Information Prefix: PLAT ID: 0398

User Response

- 1. Turn off the server and disconnect the power cords. Reconnect the power cords and restart the server.
- 2. If the problem remains, (trained technician only) replace the system board.

# • 806f0107-0301ffff : An Over-Temperature Condition has been detected on [ProcessorElementName]. (CPU 1)

This message is for the use case when an implementation has detected an Over-Temperature Condition Detected for Processor.

May also be shown as 806f01070301ffff or 0x806f01070301ffff

Severity Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0036

#### **User Response**

- 1. Make sure that the fans are operating. There are no obstructions to the airflow (front and rear of the server), the air baffles are in place and correctly installed, and the server cover is installed and completely closed.
- 2. Make sure that the heat sink for microprocessor n is installed correctly.
- 3. (Trained technician only) Replace microprocessor n. (n = microprocessor number)

### 806f0107-0302ffff : An Over-Temperature Condition has been detected on [ProcessorElementName]. (CPU 2)

This message is for the use case when an implementation has detected an Over-Temperature Condition Detected for Processor.

May also be shown as 806f01070302ffff or 0x806f01070302ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID

0

**CIM Information** 

#### Prefix: PLAT ID: 0036

#### **User Response**

- 1. Make sure that the fans are operating. There are no obstructions to the airflow (front and rear of the server), the air baffles are in place and correctly installed, and the server cover is installed and completely closed.
- 2. Make sure that the heat sink for microprocessor n is installed correctly.
- 3. (Trained technician only) Replace microprocessor n. (n = microprocessor number)

#### 806f0107-2584ffff : An Over-Temperature Condition has been detected on [ProcessorElementName]. (All CPUs)

This message is for the use case when an implementation has detected an Over-Temperature Condition Detected for Processor.

May also be shown as 806f01072584ffff or 0x806f01072584ffff

Severity Error Serviceable Yes Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information

Prefix: PLAT ID: 0036

#### **User Response**

- 1. Make sure that the fans are operating. There are no obstructions to the airflow (front and rear of the server), the air baffles are in place and correctly installed, and the server cover is installed and completely closed.
- 2. Make sure that the heat sink for microprocessor n is installed correctly.
- 3. (Trained technician only) Replace microprocessor n. (n = microprocessor number)

One of CPUs :

#### 806f0109-0701ffff : [PowerSupplyElementName] has been Power Cycled. (Host Power)

This message is for the use case when an implementation has detected a Power Unit that has been power cycled.

May also be shown as 806f01090701ffff or 0x806f01090701ffff

Severity Info Serviceable No Automatically notify support No Alert Category

#### System - Other

#### SNMP Trap ID

CIM Information Prefix: PLAT ID: 0108

#### User Response

No action; information only.

### 806f010c-2001ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 1)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2001ffff or 0x806f010c2001ffff

Severity

Error

Serviceable Yes

Automatically notify support

Yes

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0138

#### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.
- 806f010c-2002ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 2)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2002ffff or 0x806f010c2002ffff

Severity

Error

Serviceable Yes

Automatically notify support

Yes

Alert Category Critical - Memory

**SNMP** Trap ID

41

**CIM Information** 

Prefix: PLAT ID: 0138

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f010c-2003ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 3)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2003ffff or 0x806f010c2003ffff

Severity Error Serviceable Yes

# Automatically notify support

Yes

# Alert Category

Critical - Memory

SNMP Trap ID

41

# CIM Information

Prefix: PLAT ID: 0138

# User Response

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f010c-2004ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 4)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2004ffff or 0x806f010c2004ffff

Severity

Error

Serviceable

Yes

Automatically notify support

Yes

Alert Category Critical - Memory

SNMP Trap ID

41

CIM Information Prefix: PLAT ID: 0138

#### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f010c-2005ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 5)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2005ffff or 0x806f010c2005ffff

#### Severity

Error

Serviceable

Yes

#### Automatically notify support Yes

res

Alert Category Critical - Memory

#### **SNMP** Trap ID

41

# **CIM Information**

Prefix: PLAT ID: 0138

#### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.

- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f010c-2006ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 6)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2006ffff or 0x806f010c2006ffff

# Severity

Error

Serviceable

Yes

Automatically notify support Yes

Alert Category Critical - Memory

SNMP Trap ID 41

**CIM** Information Prefix: PLAT ID: 0138

# **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.
- 806f010c-2007ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 7)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2007ffff or 0x806f010c2007ffff

Severity

Error

Serviceable Yes

Automatically notify support

Yes

Alert Category Critical - Memory

**SNMP** Trap ID

41

**CIM Information** 

Prefix: PLAT ID: 0138

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f010c-2008ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 8)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2008ffff or 0x806f010c2008ffff

Severity Error Serviceable Yes

# Automatically notify support

# Alert Category

Critical - Memory

SNMP Trap ID

41

# CIM Information

Prefix: PLAT ID: 0138

# User Response

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f010c-2009ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 9)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2009ffff or 0x806f010c2009ffff

Severity

Error

Serviceable

Yes

Automatically notify support

Yes

Alert Category Critical - Memory

SNMP Trap ID

41

CIM Information Prefix: PLAT ID: 0138

#### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f010c-200affff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 10)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c200affff or 0x806f010c200affff

#### Severity

Error

Serviceable

Yes

#### Automatically notify support Yes

res

Alert Category Critical - Memory

#### **SNMP** Trap ID

41

# **CIM Information**

Prefix: PLAT ID: 0138

#### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.

- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f010c-200bffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 11)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c200bffff or 0x806f010c200bffff

# Severity

Error

Serviceable

Yes

Automatically notify support

Yes

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0138

# **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.
- 806f010c-200cffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 12)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c200cffff or 0x806f010c200cffff

Severity

Error

Serviceable Yes

Automatically notify support

Yes

Alert Category Critical - Memory

**SNMP** Trap ID

41

**CIM Information** 

Prefix: PLAT ID: 0138

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f010c-200dffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 13)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c200dffff or 0x806f010c200dffff

Severity Error Serviceable Yes

# Automatically notify support

Yes

# Alert Category

Critical - Memory

SNMP Trap ID

41

# CIM Information

Prefix: PLAT ID: 0138

# User Response

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f010c-200effff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 14)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c200effff or 0x806f010c200effff

Severity

Error

Serviceable

Yes

Automatically notify support

Yes

Alert Category Critical - Memory

SNMP Trap ID

41

CIM Information Prefix: PLAT ID: 0138

#### User Response

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# • 806f010c-200fffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 15)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c200fffff or 0x806f010c200fffff

#### Severity

Error

Serviceable

Yes

#### Automatically notify support Yes

Alert Category

Critical - Memory

#### **SNMP** Trap ID

41

# **CIM Information**

Prefix: PLAT ID: 0138

#### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.

- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f010c-2010ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 16)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2010ffff or 0x806f010c2010ffff

# Severity

Error

Serviceable

Yes

Automatically notify support Yes

Alert Category Critical - Memory

SNMP Trap ID 41

**CIM** Information Prefix: PLAT ID: 0138

# **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.
- 806f010c-2011ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 17)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2011ffff or 0x806f010c2011ffff

Severity

Error

Serviceable Yes

Automatically notify support

Yes

Alert Category Critical - Memory

SNMP Trap ID

41

**CIM** Information

Prefix: PLAT ID: 0138

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f010c-2012ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 18)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2012ffff or 0x806f010c2012ffff

Severity Error Serviceable Yes

# Automatically notify support

Yes

## Alert Category

Critical - Memory

SNMP Trap ID

41

# CIM Information

Prefix: PLAT ID: 0138

### User Response

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

### 806f010c-2013ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 19)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2013ffff or 0x806f010c2013ffff

Severity

Error

Serviceable

Yes

Automatically notify support

Yes

Alert Category Critical - Memory

SNMP Trap ID

41

CIM Information Prefix: PLAT ID: 0138

### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

### 806f010c-2014ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 20)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2014ffff or 0x806f010c2014ffff

### Severity

Error

Serviceable

Yes

#### Automatically notify support Yes

res

Alert Category Critical - Memory

### **SNMP** Trap ID

41

## **CIM Information**

Prefix: PLAT ID: 0138

### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.

- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

### 806f010c-2015ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 21)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2015ffff or 0x806f010c2015ffff

## Severity

Error

Serviceable

Yes

Automatically notify support Yes

Alert Category Critical - Memory

SNMP Trap ID 41

**CIM** Information Prefix: PLAT ID: 0138

## **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.
- 806f010c-2016ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 22)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2016ffff or 0x806f010c2016ffff

Severity

Error

Serviceable Yes

Automatically notify support

Yes

Alert Category Critical - Memory

SNMP Trap ID

41

**CIM** Information

Prefix: PLAT ID: 0138

### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

### 806f010c-2017ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 23)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2017ffff or 0x806f010c2017ffff

Severity Error Serviceable Yes

# Automatically notify support

Yes

## Alert Category

Critical - Memory

SNMP Trap ID

41

# CIM Information

Prefix: PLAT ID: 0138

### User Response

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

### 806f010c-2018ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 24)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2018ffff or 0x806f010c2018ffff

Severity

Error

Serviceable

Yes

Automatically notify support

Yes

Alert Category Critical - Memory

SNMP Trap ID

41

CIM Information Prefix: PLAT ID: 0138

### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

### 806f010c-2581ffff : Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (All DIMMs)

This message is for the use case when an implementation has detected a Memory uncorrectable error.

May also be shown as 806f010c2581ffff or 0x806f010c2581ffff

### Severity

Error

Serviceable

Yes

#### Automatically notify support Yes

res

Alert Category Critical - Memory

### **SNMP** Trap ID

41

## **CIM Information**

Prefix: PLAT ID: 0138

### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.

- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

One of the DIMMs :

## 806f010d-0400ffff : The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 0)

This message is for the use case when an implementation has detected a Drive was Disabled due to fault.

May also be shown as 806f010d0400ffff or 0x806f010d0400ffff

Severity Error Serviceable Yes Automatically notify support

Yes

Alert Category

Critical - Hard Disk drive

5 SNMP Trap ID

CIM Information Prefix: PLAT ID: 0164

## **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)

# • 806f010d-0401ffff : The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 1)

This message is for the use case when an implementation has detected a Drive was Disabled due to fault.

May also be shown as 806f010d0401ffff or 0x806f010d0401ffff

Severity Error Serviceable

Yes

Automatically notify support Yes

Alert Category

Critical - Hard Disk drive

SNMP Trap ID

5

CIM Information

Prefix: PLAT ID: 0164

### **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)
- 806f010d-0402ffff : The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 2)

This message is for the use case when an implementation has detected a Drive was Disabled due to fault.

May also be shown as 806f010d0402ffff or 0x806f010d0402ffff

Severity

Error

### Serviceable

Yes

Automatically notify support Yes

Alert Category Critical - Hard Disk drive

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0164

### **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)
- 806f010d-0403ffff : The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 3)

This message is for the use case when an implementation has detected a Drive was Disabled due to fault.

May also be shown as 806f010d0403ffff or 0x806f010d0403ffff

Severity Error

## Serviceable

Yes

### Automatically notify support

Yes

### Alert Category

Critical - Hard Disk drive

### **SNMP** Trap ID

5

CIM Information Prefix: PLAT ID: 0164

### **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)

## 806f010d-0404ffff : The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 4)

This message is for the use case when an implementation has detected a Drive was Disabled due to fault.

May also be shown as 806f010d0404ffff or 0x806f010d0404ffff

## Severity

Error

### Serviceable Yes

Automatically notify support Yes

# Alert Category

Critical - Hard Disk drive

SNMP Trap ID

5

CIM Information Prefix: PLAT ID: 0164

## **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)
- 806f010d-0405ffff : The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 5)

This message is for the use case when an implementation has detected a Drive was Disabled due to fault.

May also be shown as 806f010d0405ffff or 0x806f010d0405ffff

### Severity

Error

### Serviceable

Yes

# Automatically notify support

Yes

### Alert Category

Critical - Hard Disk drive

### **SNMP** Trap ID

5

### CIM Information Prefix: PLAT ID: 0164

### **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)
- 806f010d-0406ffff : The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 6)

This message is for the use case when an implementation has detected a Drive was Disabled due to fault.

May also be shown as 806f010d0406ffff or 0x806f010d0406ffff

Severity Error

### Serviceable

Yes

### Automatically notify support

Yes

## Alert Category

Critical - Hard Disk drive

# SNMP Trap ID

5

#### CIM Information Prefix: PLAT ID: 0164

### **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)

### 806f010d-0407ffff : The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 7)

This message is for the use case when an implementation has detected a Drive was Disabled due to fault.

May also be shown as 806f010d0407ffff or 0x806f010d0407ffff

Severity

Error

Serviceable Yes

Automatically notify support Yes

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information

Prefix: PLAT ID: 0164

### User Response

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)
- 806f010f-2201ffff : The System [ComputerSystemElementName] encountered a firmware hang. (Firmware Error)

This message is for the use case when an implementation has detected a System Firmware Hang.

May also be shown as 806f010f2201ffff or 0x806f010f2201ffff

Severity Error Serviceable Yes

Automatically notify support No

Alert Category System - Boot failure

SNMP Trap ID

25

CIM Information Prefix: PLAT ID: 0186

### **User Response**

1. Make sure the server meets the minimum configuration to start (see Power-supply LEDs).

- 2. Update the server firmware on the primary page. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 3. (Trained technician only) Replace the system board.

# • 806f0123-2101ffff : Reboot of system [ComputerSystemElementName] initiated by [WatchdogElementName]. (IPMI Watchdog)

This message is for the use case when an implementation has detected a Reboot by a Watchdog occurred.

May also be shown as 806f01232101ffff or 0x806f01232101ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0370

**User Response** 

No action; information only.

### 806f0125-1f05ffff : [ManagedElementName] detected as absent. (LOM)

This message is for the use case when an implementation has detected a Managed Element is Absent.

May also be shown as 806f01251f05ffff or 0x806f01251f05ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0392

**User Response** 

Please ensure the PCI riser 1 has been installed correctly.

• 806f0207-0301ffff : [ProcessorElementName] has Failed with FRB1/BIST condition. (CPU 1)

This message is for the use case when an implementation has detected a Processor Failed - FRB1/BIST condition.

May also be shown as 806f02070301ffff or 0x806f02070301ffff

Severity

Error

Serviceable Yes

Automatically notify support Yes

Alert Category Critical - CPU

**SNMP** Trap ID

40

CIM Information Prefix: PLAT ID: 0044

### User Response

- 1. Update the latest level of system firmware and device drivers are installed for all adapters and standard devices, such as UEFI, IMM Ethernet, and SAS. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 2. Run the DSA program.
- 3. Reseat the adapter.
- 4. Replace the adapter.
- 5. (Trained technician only) Replace microprocessor n. (n = microprocessor number)
- 6. (Trained technician only) Replace the system board.
- 806f0207-0302ffff : [ProcessorElementName] has Failed with FRB1/BIST condition. (CPU 2)

This message is for the use case when an implementation has detected a Processor Failed - FRB1/BIST condition.

May also be shown as 806f02070302ffff or 0x806f02070302ffff

Severity Error Serviceable Yes Automatically notify support Yes Alert Category Critical - CPU SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0044

### **User Response**

- 1. Update the latest level of system firmware and device drivers are installed for all adapters and standard devices, such as UEFI, IMM Ethernet, and SAS. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 2. Run the DSA program.
- 3. Reseat the adapter.
- 4. Replace the adapter.
- 5. (Trained technician only) Replace microprocessor n. (n = microprocessor number)
- 6. (Trained technician only) Replace the system board.

### • 806f0207-2584ffff : [ProcessorElementName] has Failed with FRB1/BIST condition. (All CPUs)

This message is for the use case when an implementation has detected a Processor Failed - FRB1/BIST condition.

May also be shown as 806f02072584ffff or 0x806f02072584ffff

Severity

Error

# Serviceable

Yes

#### Automatically notify support Yes

Alert Category Critical - CPU

# SNMP Trap ID

40

CIM Information Prefix: PLAT ID: 0044

### **User Response**

- 1. Update the latest level of system firmware and device drivers are installed for all adapters and standard devices, such as UEFI, IMM Ethernet, and SAS. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 2. Run the DSA program.
- 3. Reseat the adapter.
- 4. Replace the adapter.
- 5. (Trained technician only) Replace microprocessor n. (n = microprocessor number)
- 6. (Trained technician only) Replace the system board.

One of CPUs :

# • 806f020d-0400ffff : Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 0)

This message is for the use case when an implementation has detected an Array Failure is Predicted.

May also be shown as 806f020d0400ffff or 0x806f020d0400ffff

Severity

Warning

### Serviceable

Yes

#### Automatically notify support Yes

## Alert Category

System - Predicted Failure

### SNMP Trap ID

27

CIM Information Prefix: PLAT ID: 0168

### **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)

# • 806f020d-0401ffff : Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 1)

This message is for the use case when an implementation has detected an Array Failure is Predicted.

May also be shown as 806f020d0401ffff or 0x806f020d0401ffff

Severity Warning

### Serviceable

Yes

### Automatically notify support

Yes

Alert Category

System - Predicted Failure

SNMP Trap ID 27

CIM Information Prefix: PLAT ID: 0168

### User Response

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)

# • 806f020d-0402ffff : Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 2)

This message is for the use case when an implementation has detected an Array Failure is Predicted.

May also be shown as 806f020d0402ffff or 0x806f020d0402ffff

Severity

Warning

Serviceable Yes

Automatically notify support Yes

Alert Category System - Predicted Failure

SNMP Trap ID

27

CIM Information Prefix: PLAT ID: 0168

### **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)
- 806f020d-0403ffff : Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 3)

This message is for the use case when an implementation has detected an Array Failure is Predicted.

May also be shown as 806f020d0403ffff or 0x806f020d0403ffff

Severity Warning Serviceable Yes

Automatically notify support

Yes

Alert Category System - Predicted Failure

# SNMP Trap ID

27

CIM Information Prefix: PLAT ID: 0168

## **User Response**

1. Run the hard disk drive diagnostic test on drive n.

- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- 3. Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)

#### 806f020d-0404ffff : Failure Predicted on [StorageVolumeElementName] for array ٠ [ComputerSystemElementName]. (Drive 4)

This message is for the use case when an implementation has detected an Array Failure is Predicted.

May also be shown as 806f020d0404ffff or 0x806f020d0404ffff

Severity

Warning

Serviceable

Yes

Automatically notify support Yes

Alert Category

System - Predicted Failure

**SNMP Trap ID** 27

**CIM Information** Prefix: PLAT ID: 0168

### **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- 3. Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)

#### 806f020d-0405ffff : Failure Predicted on [StorageVolumeElementName] for array . [ComputerSystemElementName]. (Drive 5)

This message is for the use case when an implementation has detected an Array Failure is Predicted.

May also be shown as 806f020d0405ffff or 0x806f020d0405ffff

Severity

Warning

Serviceable Yes

Automatically notify support

Yes

Alert Category System - Predicted Failure

SNMP Trap ID 27

## CIM Information Prefix: PLAT ID: 0168

### **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)

# • 806f020d-0406ffff : Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 6)

This message is for the use case when an implementation has detected an Array Failure is Predicted.

May also be shown as 806f020d0406ffff or 0x806f020d0406ffff

Severity Warning

Serviceable Yes

Automatically notify support Yes

Alert Category System - Predicted Failure

SNMP Trap ID

27

CIM Information Prefix: PLAT ID: 0168

## **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)

## 806f020d-0407ffff : Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 7)

This message is for the use case when an implementation has detected an Array Failure is Predicted.

May also be shown as 806f020d0407ffff or 0x806f020d0407ffff

Severity Warning Serviceable

Yes

# Automatically notify support

Yes

## **Alert Category**

System - Predicted Failure

SNMP Trap ID 27

CIM Information

Prefix: PLAT ID: 0168

## **User Response**

- 1. Run the hard disk drive diagnostic test on drive n.
- 2. Reseat the following components: a. Hard disk drive (wait 1 minute or more before reinstalling the drive) b. Cable from the system board to the backplane
- Replace the following components one at a time, in the order shown, restarting the server each time: a. Hard disk drive b. Cable from the system board to the backplane c. Hard disk drive backplane (n = hard disk drive number)

## 806f0223-2101ffff : Powering off system [ComputerSystemElementName] initiated by [WatchdogElementName]. (IPMI Watchdog)

This message is for the use case when an implementation has detected a Poweroff by Watchdog has occurred.

May also be shown as 806f02232101ffff or 0x806f02232101ffff

Severity Info

Serviceable No

Automatically notify support No Alert Category

System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0372

**User Response** 

No action; information only.

# • 806f0225-0f02ffff : [ManagedElementName] has been disabled. (M5215 RAID Card)

This message is for the use case when an implementation has detected a Managed Element was Disabled.

May also be shown as 806f02250f02ffff or 0x806f02250f02ffff

Severity Info Serviceable No

Automatically notify support No

### Alert Category System - Other

### **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0394

Prefix: PLAT ID: 039

### **User Response**

No action; information only.

# • 806f030c-2001ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 1)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2001ffff or 0x806f030c2001ffff

Severity Error Serviceable

Yes

### Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0136

## **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.
- 806f030c-2002ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 2)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2002ffff or 0x806f030c2002ffff

Severity

Error

### Serviceable

Yes

Automatically notify support No

### Alert Category

Critical - Memory

### **SNMP** Trap ID

41

CIM Information Prefix: PLAT ID: 0136

### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-2003ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 3)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2003ffff or 0x806f030c2003ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41

## **CIM Information**

### Prefix: PLAT ID: 0136

### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

# • 806f030c-2004ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 4)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2004ffff or 0x806f030c2004ffff

### Severity

Error

Serviceable

Yes

Automatically notify support

No

Alert Category Critical - Memory

### SNMP Trap ID

41

### **CIM Information**

Prefix: PLAT ID: 0136

### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.

- 6. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-2005ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 5)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2005ffff or 0x806f030c2005ffff

Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0136

## User Response

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.
- 806f030c-2006ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 6)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2006ffff or 0x806f030c2006ffff

Severity

Error

Serviceable

Yes

Automatically notify support

No

Alert Category

Critical - Memory

**SNMP** Trap ID

41

### **CIM** Information

Prefix: PLAT ID: 0136

### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

# • 806f030c-2007ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 7)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2007ffff or 0x806f030c2007ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0136

### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-2008ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 8)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2008ffff or 0x806f030c2008ffff

### Severity

Error

Serviceable Yes

# Automatically notify support

No

Alert Category Critical - Memory

## SNMP Trap ID

41

# **CIM Information**

Prefix: PLAT ID: 0136

## **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.

- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-2009ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 9)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2009ffff or 0x806f030c2009ffff

# Severity

Error

## Serviceable

Yes

# Automatically notify support

No

### Alert Category Critical - Memory

SNMP Trap ID

41

### CIM Information Prefix: PLAT ID: 0136

## **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

# • 806f030c-200affff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 10)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c200affff or 0x806f030c200affff

## Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category

Critical - Memory

**SNMP** Trap ID

41

CIM Information

Prefix: PLAT ID: 0136

### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-200bffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 11)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c200bffff or 0x806f030c200bffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0136

### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- 6. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-200cffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 12)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c200cffff or 0x806f030c200cffff

### Severity

Error

Serviceable Yes

### Automatically notify support No

140

Alert Category Critical - Memory

## **SNMP** Trap ID

41

# **CIM Information**

Prefix: PLAT ID: 0136

# **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.

- 6. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-200dffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 13)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c200dffff or 0x806f030c200dffff

Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0136

## User Response

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.
- 806f030c-200effff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 14)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c200effff or 0x806f030c200effff

Severity

Error

Serviceable

Yes

Automatically notify support

No

### Alert Category

Critical - Memory

SNMP Trap ID

41

### **CIM Information**

Prefix: PLAT ID: 0136

### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-200fffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 15)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c200fffff or 0x806f030c200fffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0136

### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-2010ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 16)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2010ffff or 0x806f030c2010ffff

### Severity

Error

Serviceable Yes

# Automatically notify support

No

Alert Category Critical - Memory

## SNMP Trap ID

41

# **CIM Information**

Prefix: PLAT ID: 0136

## **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.

- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-2011ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 17)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2011ffff or 0x806f030c2011ffff

# Severity

Error

## Serviceable

Yes

# Automatically notify support

No

### Alert Category Critical - Memory

SNMP Trap ID

41

### CIM Information Prefix: PLAT ID: 0136

## **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

# • 806f030c-2012ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 18)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2012ffff or 0x806f030c2012ffff

## Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category

Critical - Memory

**SNMP** Trap ID

41

CIM Information

Prefix: PLAT ID: 0136

### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-2013ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 19)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2013ffff or 0x806f030c2013ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0136

### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- 6. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-2014ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 20)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2014ffff or 0x806f030c2014ffff

### Severity

Error

Serviceable Yes

### Automatically notify support No

110

Alert Category Critical - Memory

### **SNMP** Trap ID

41

## **CIM Information**

Prefix: PLAT ID: 0136

### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.

- 6. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

### 806f030c-2015ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 21)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2015ffff or 0x806f030c2015ffff

Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0136

## User Response

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.
- 806f030c-2016ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 22)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2016ffff or 0x806f030c2016ffff

### Severity

Error

Serviceable

Yes

Automatically notify support

No

Alert Category

Critical - Memory

**SNMP** Trap ID

41

### **CIM** Information

Prefix: PLAT ID: 0136

### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

# • 806f030c-2017ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 23)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2017ffff or 0x806f030c2017ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0136

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

## 806f030c-2018ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 24)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2018ffff or 0x806f030c2018ffff

#### Severity

Error

Serviceable Yes

## Automatically notify support

No

Alert Category Critical - Memory

## SNMP Trap ID

41

## **CIM Information**

Prefix: PLAT ID: 0136

## **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.

- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

## 806f030c-2581ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (All DIMMs)

This message is for the use case when an implementation has detected a Memory Scrub failure.

May also be shown as 806f030c2581ffff or 0x806f030c2581ffff

## Severity

Error

## Serviceable

Yes

## Automatically notify support

No

#### Alert Category Critical - Memory

SNMP Trap ID 41

## CIM Information Prefix: PLAT ID: 0136

## **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Manually re-enable all affected DIMMs.
- 4. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 5. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 7. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 8. (Trained technician only) Replace the affected microprocessor.

One of the DIMMs :

## • 806f030d-0400ffff : Hot Spare enabled for [ComputerSystemElementName]. (Drive 0)

This message is for the use case when an implementation has detected a Hot Spare has been Enabled.

May also be shown as 806f030d0400ffff or 0x806f030d0400ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0170

User Response

No action; information only.

## • 806f030d-0401ffff : Hot Spare enabled for [ComputerSystemElementName]. (Drive 1)

This message is for the use case when an implementation has detected a Hot Spare has been Enabled.

May also be shown as 806f030d0401ffff or 0x806f030d0401ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0170

User Response No action; information only.

## • 806f030d-0402ffff : Hot Spare enabled for [ComputerSystemElementName]. (Drive 2)

This message is for the use case when an implementation has detected a Hot Spare has been Enabled.

May also be shown as 806f030d0402ffff or 0x806f030d0402ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

## **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0170

**User Response** 

No action; information only.

#### • 806f030d-0403ffff : Hot Spare enabled for [ComputerSystemElementName]. (Drive 3)

This message is for the use case when an implementation has detected a Hot Spare has been Enabled.

May also be shown as 806f030d0403ffff or 0x806f030d0403ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0170

User Response No action; information only.

## • 806f030d-0404ffff : Hot Spare enabled for [ComputerSystemElementName]. (Drive 4)

This message is for the use case when an implementation has detected a Hot Spare has been Enabled.

May also be shown as 806f030d0404ffff or 0x806f030d0404ffff

Severity Info Serviceable No Automatically notify support No Alert Category

System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0170

User Response No action; information only.

806f030d-0405ffff : Hot Spare enabled for [ComputerSystemElementName]. (Drive 5)

This message is for the use case when an implementation has detected a Hot Spare has been Enabled.

May also be shown as 806f030d0405ffff or 0x806f030d0405ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0170

User Response No action; information only.

## • 806f030d-0406ffff : Hot Spare enabled for [ComputerSystemElementName]. (Drive 6)

This message is for the use case when an implementation has detected a Hot Spare has been Enabled.

May also be shown as 806f030d0406ffff or 0x806f030d0406ffff

Severity Info

Serviceable No

Automatically notify support No Alert Category

System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0170

User Response No action; information only.

## • 806f030d-0407ffff : Hot Spare enabled for [ComputerSystemElementName]. (Drive 7)

This message is for the use case when an implementation has detected a Hot Spare has been Enabled.

May also be shown as 806f030d0407ffff or 0x806f030d0407ffff

Severity Info

Serviceable No

## Automatically notify support

No

Alert Category System - Other

## **SNMP** Trap ID

**CIM** Information

Prefix: PLAT ID: 0170

User Response

No action; information only.

## 806f0313-1701ffff : A software NMI has occurred on system [ComputerSystemElementName]. (NMI State)

This message is for the use case when an implementation has detected a Software NMI.

May also be shown as 806f03131701ffff or 0x806f03131701ffff

Severity Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0228

## **User Response**

- 1. Check the device driver.
- 2. Reinstall the device driver.
- 3. Update all device drivers to the latest level.
- 4. Update the firmware (UEFI and IMM).

# • 806f0323-2101ffff : Power cycle of system [ComputerSystemElementName] initiated by watchdog [WatchdogElementName]. (IPMI Watchdog)

This message is for the use case when an implementation has detected a Power Cycle by Watchdog occurred.

May also be shown as 806f03232101ffff or 0x806f03232101ffff

Severity Info Serviceable No Automatically notify support No

## Alert Category System - Other

## SNMP Trap ID

CIM Information Prefix: PLAT ID: 0374

## User Response

No action; information only.

# • 806f040c-2001ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 1)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2001ffff or 0x806f040c2001ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

## CIM Information Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-2002ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 2)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2002ffff or 0x806f040c2002ffff

Severity Info Serviceable No Automatically notify support No

**Alert Category** 

System - Other

## **SNMP** Trap ID

**CIM Information** 

Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

# • 806f040c-2003ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 3)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2003ffff or 0x806f040c2003ffff

Severity

Info

## Serviceable

No

Automatically notify support No

Alert Category System - Other

## SNMP Trap ID

## CIM Information

Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).
- 806f040c-2004ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 4)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2004ffff or 0x806f040c2004ffff

Severity Info

## Serviceable

No

## Automatically notify support

NO

Alert Category System - Other

## **SNMP** Trap ID

## 

Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-2005ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 5)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2005ffff or 0x806f040c2005ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).
- 806f040c-2006ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 6)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2006ffff or 0x806f040c2006ffff

Severity

Info

Serviceable

No

Automatically notify support No

Alert Category System - Other

## **SNMP** Trap ID

## **CIM** Information

Prefix: PLAT ID: 0131

#### **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-2007ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 7)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2007ffff or 0x806f040c2007ffff

Severity Info

## Serviceable

No

## Automatically notify support

No

Alert Category System - Other

## SNMP Trap ID

## **CIM** Information

Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-2008ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 8)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2008ffff or 0x806f040c2008ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

#### CIM Information Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).
- 806f040c-2009ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 9)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2009ffff or 0x806f040c2009ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0131

## User Response

1. Make sure the DIMM is installed correctly.

- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

# • 806f040c-200affff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 10)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c200affff or 0x806f040c200affff

Severity Info Serviceable No Automatically notify support

No

Alert Category System - Other

## **SNMP** Trap ID

## **CIM** Information

Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-200bffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 11)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c200bffff or 0x806f040c200bffff

Severity Info Serviceable No Automatically notify support

No

Alert Category System - Other

**SNMP Trap ID** 

## CIM Information Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-200cffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 12)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c200cffff or 0x806f040c200cffff

**Severity** Info

Serviceable No

Automatically notify support No

Alert Category System - Other

## **SNMP Trap ID**

CIM Information

Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-200dffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 13)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c200dffff or 0x806f040c200dffff

Severity Info Serviceable No

Automatically notify support No

## Alert Category

System - Other

## **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-200effff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 14)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c200effff or 0x806f040c200effff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

## **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-200fffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 15)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c200fffff or 0x806f040c200fffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

## SNMP Trap ID

CIM Information Prefix: PLAT ID: 0131

#### **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

# • 806f040c-2010ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 16)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2010ffff or 0x806f040c2010ffff

Severity Info Serviceable No Automatically notify support

No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).
- 806f040c-2011ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 17)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2011ffff or 0x806f040c2011ffff

Severity

Info

Serviceable

No

Automatically notify support No

Alert Category System - Other

## **SNMP** Trap ID

#### **CIM Information**

Prefix: PLAT ID: 0131

#### **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

# • 806f040c-2012ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 18)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2012ffff or 0x806f040c2012ffff

Severity Info

## Serviceable

No

## Automatically notify support

No

Alert Category System - Other

## SNMP Trap ID

## **CIM** Information

Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-2013ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 19)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2013ffff or 0x806f040c2013ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

#### CIM Information Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).
- 806f040c-2014ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 20)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2014ffff or 0x806f040c2014ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0131

## User Response

1. Make sure the DIMM is installed correctly.

- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

# • 806f040c-2015ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 21)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2015ffff or 0x806f040c2015ffff

Severity Info Serviceable No Automatically notify support

No

Alert Category System - Other

## **SNMP** Trap ID

## **CIM** Information

Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-2016ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 22)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2016ffff or 0x806f040c2016ffff

Severity Info Serviceable No Automatically notify support

No

Alert Category System - Other

**SNMP Trap ID** 

## CIM Information Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-2017ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 23)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2017ffff or 0x806f040c2017ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

## **SNMP Trap ID**

CIM Information

Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

## 806f040c-2018ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (DIMM 24)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2018ffff or 0x806f040c2018ffff

Severity Info Serviceable No

Automatically notify support No

## Alert Category

System - Other

## **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- 3. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

# • 806f040c-2581ffff : [PhysicalMemoryElementName] Disabled on Subsystem [MemoryElementName]. (All DIMMs)

This message is for the use case when an implementation has detected that Memory has been Disabled.

May also be shown as 806f040c2581ffff or 0x806f040c2581ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

## **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0131

## **User Response**

- 1. Make sure the DIMM is installed correctly.
- 2. If the DIMM was disabled because of a memory fault (memory uncorrectable error or memory logging limit reached), follow the suggested actions for that error event and restart the server.
- Check the IBM support website for an applicable retain tip or firmware update that applies to this memory event. If no memory fault is recorded in the logs and no DIMM connector error LED is lit, you can re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).

One of the DIMMs :

# 806f0413-2582ffff : A PCI PERR has occurred on system [ComputerSystemElementName]. (All PCI Error)

This message is for the use case when an implementation has detected a PCI PERR.

May also be shown as 806f04132582ffff or 0x806f04132582ffff

Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0232

#### **User Response**

- 1. Check the PCI LED.
- 2. Reseat the affected adapters and riser cards.
- Update the server firmware (UEFI and IMM) and adapter firmware. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 4. Remove both adapters.
- 5. Replace the PCIe adapters.
- 6. Replace the riser card.

One of PCI Error : PCIs :

## • 806f0507-0301ffff : [ProcessorElementName] has a Configuration Mismatch. (CPU 1)

This message is for the use case when an implementation has detected a Processor Configuration Mismatch has occurred.

May also be shown as 806f05070301ffff or 0x806f05070301ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - CPU SNMP Trap ID 40 CIM Information Prefix: PLAT ID: 0062 User Response

- 1. Make sure that the installed microprocessors are compatible with each other.
- 2. (Trained technician only) Reseat microprocessor n.
- 3. (Trained technician only) Replace microprocessor n. (n = microprocessor number)

## • 806f0507-0302ffff : [ProcessorElementName] has a Configuration Mismatch. (CPU 2)

This message is for the use case when an implementation has detected a Processor Configuration Mismatch has occurred.

May also be shown as 806f05070302ffff or 0x806f05070302ffff

Severity Error Serviceable

Yes

Automatically notify support No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0062

## **User Response**

- 1. Make sure that the installed microprocessors are compatible with each other.
- 2. (Trained technician only) Reseat microprocessor n.
- 3. (Trained technician only) Replace microprocessor n. (n = microprocessor number)

## 806f0507-2584ffff : [ProcessorElementName] has a Configuration Mismatch. (All CPUs)

This message is for the use case when an implementation has detected a Processor Configuration Mismatch has occurred.

May also be shown as 806f05072584ffff or 0x806f05072584ffff

Severity Error Serviceable

Yes

Automatically notify support No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0062

## **User Response**

- 1. Make sure that the installed microprocessors are compatible with each other.
- 2. (Trained technician only) Reseat microprocessor n.
- 3. (Trained technician only) Replace microprocessor n. (n = microprocessor number) One of CPUs :

## 806f050c-2001ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 1)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2001ffff or 0x806f050c2001ffff

Severity

Warning

Serviceable Yes

Automatically notify support Yes

Alert Category

Warning - Memory

SNMP Trap ID

43

CIM Information Prefix: PLAT ID: 0144

## **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.
- 806f050c-2002ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 2)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2002ffff or 0x806f050c2002ffff

Severity

Warning

Serviceable

Yes

Automatically notify support

Yes

Alert Category

Warning - Memory

SNMP Trap ID 43

CIM Information

Prefix: PLAT ID: 0144

## **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

## 806f050c-2003ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 3)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2003ffff or 0x806f050c2003ffff

## Severity Warning

Serviceable

Yes

## Automatically notify support

Yes

Alert Category Warning - Memory

**SNMP Trap ID** 43

## **CIM** Information

Prefix: PLAT ID: 0144

## **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

## • 806f050c-2004ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 4)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2004ffff or 0x806f050c2004ffff

## Severity

Warning

#### Serviceable

Yes

## Automatically notify support

Yes

#### Alert Category Warning - Memory

SNMP Trap ID

43

CIM Information Prefix: PLAT ID: 0144

#### **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.

- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

## 806f050c-2005ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 5)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2005ffff or 0x806f050c2005ffff

Severity Warning Serviceable Yes Automatically notify support

Yes

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information

Prefix: PLAT ID: 0144

## **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.

- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# • 806f050c-2006ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 6)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2006ffff or 0x806f050c2006ffff

Severity Warning

Serviceable

Yes

Automatically notify support Yes

Alert Category

Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0144

## **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.
- 806f050c-2007ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 7)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2007ffff or 0x806f050c2007ffff

#### Severity

Warning

#### Serviceable

Yes

## Automatically notify support

Yes

Alert Category Warning - Memory

## **SNMP** Trap ID

43

## **CIM Information**

Prefix: PLAT ID: 0144

## **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

## 806f050c-2008ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 8)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2008ffff or 0x806f050c2008ffff

Severity Warning

Serviceable Yes

#### Automatically notify support

Yes

Alert Category Warning - Memory

Warning Wor

#### SNMP Trap ID 43

**CIM** Information

Prefix: PLAT ID: 0144

## **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

## 806f050c-2009ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 9)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2009ffff or 0x806f050c2009ffff

Severity Warning Serviceable Yes Automatically notify support Yes Alert Category Warning - Memory SNMP Trap ID 43 CIM Information

Prefix: PLAT ID: 0144

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

#### 806f050c-200affff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 10)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c200affff or 0x806f050c200affff

## Severity

Warning

#### Serviceable

Yes

#### Automatically notify support

Yes

## **Alert Category**

Warning - Memory

**SNMP Trap ID** 43

CIM Information Prefix: PLAT ID: 0144

## **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.

- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

## 806f050c-200bffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 11)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c200bffff or 0x806f050c200bffff

Severity

Warning

Serviceable

Yes

Automatically notify support

Yes

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0144

## **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.

- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# • 806f050c-200cffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 12)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c200cffff or 0x806f050c200cffff

Severity

Warning

Serviceable

Yes

Automatically notify support

Yes

Alert Category Warning - Memory

SNMP Trap ID

43

## CIM Information

Prefix: PLAT ID: 0144

## **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# • 806f050c-200dffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 13)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c200dffff or 0x806f050c200dffff

Severity

Warning

## Serviceable

Yes

Automatically notify support Yes

## Alert Category

Warning - Memory

**SNMP** Trap ID

43

CIM Information Prefix: PLAT ID: 0144

## **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

## 806f050c-200effff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 14)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c200effff or 0x806f050c200effff

Severity Warning Serviceable Yes

Automatically notify support Yes

## Alert Category

Warning - Memory

## **SNMP** Trap ID

43

#### CIM Information Prefix: PLAT ID: 0144

FIGHT: FLATID: UT

## User Response

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

## 806f050c-200fffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 15)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c200fffff or 0x806f050c200fffff

Severity Warning Serviceable Yes Automatically notify support Yes Alert Category Warning - Memory SNMP Trap ID 43 CIM Information Prefix: PLAT ID: 0144

**User Response** 

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# • 806f050c-2010ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 16)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2010ffff or 0x806f050c2010ffff

## Severity

Warning

## Serviceable

Yes

## Automatically notify support

Yes

## Alert Category

Warning - Memory

## SNMP Trap ID

43

## CIM Information

Prefix: PLAT ID: 0144

## **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.

- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

## 806f050c-2011ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 17)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2011ffff or 0x806f050c2011ffff

## Severity

Warning

## Serviceable

Yes

Automatically notify support

Yes

## Alert Category Warning - Memory

SNMP Trap ID 43

## CIM Information Prefix: PLAT ID: 0144

## **User Response**

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.

9. (Trained Service technician only) Replace the affected microprocessor.

# • 806f050c-2012ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 18)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2012ffff or 0x806f050c2012ffff

#### Severity

Warning

Serviceable

Yes

#### Automatically notify support

Yes

Alert Category Warning - Memory

#### SNMP Trap ID

43

#### CIM Information

Prefix: PLAT ID: 0144

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

#### 806f050c-2013ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 19)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2013ffff or 0x806f050c2013ffff

#### Severity

#### Warning

#### Serviceable

Yes

Automatically notify support

Yes

#### Alert Category

Warning - Memory

# SNMP Trap ID

43

# CIM Information

Prefix: PLAT ID: 0144

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# • 806f050c-2014ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 20)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2014ffff or 0x806f050c2014ffff

Severity Warning Serviceable Yes Automatically notify support Yes

Alert Category Warning - Memory

**SNMP** Trap ID

43

#### CIM Information Prefix: PLAT ID: 0144

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

# 806f050c-2015ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 21)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2015ffff or 0x806f050c2015ffff

Severity Warning Serviceable Yes Automatically notify support Yes Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0144

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

1. Refer to TIP H212293 for minimum code level.

- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

#### 806f050c-2016ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 22)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2016ffff or 0x806f050c2016ffff

#### Severity

Warning

# Serviceable

Yes

#### Automatically notify support Yes

res

#### Alert Category Warning - Memory

# **SNMP** Trap ID

43

# **CIM** Information

Prefix: PLAT ID: 0144

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.

- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.
- 806f050c-2017ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 23)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2017ffff or 0x806f050c2017ffff

Severity

Warning

Serviceable Yes

Automatically notify support

Yes

Alert Category Warning - Memory

SNMP Trap ID 43

....

CIM Information Prefix: PLAT ID: 0144

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

#### 806f050c-2018ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 24)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2018ffff or 0x806f050c2018ffff

#### Severity

Warning

# Serviceable

Yes

# Automatically notify support

Yes

# Alert Category

Warning - Memory

# **SNMP** Trap ID

43

# CIM Information

Prefix: PLAT ID: 0144

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

#### 806f050c-2581ffff : Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (All DIMMs)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Reached.

May also be shown as 806f050c2581ffff or 0x806f050c2581ffff

# Severity

Warning

Serviceable Yes

Automatically notify support

Yes

Alert Category

Warning - Memory

SNMP Trap ID 43

CIM Information

Prefix: PLAT ID: 0144

#### **User Response**

Note: Each time you install or remove a DIMM, you must disconnect the server from the power source; then, wait 10 seconds before restarting the server.

- 1. Refer to TIP H212293 for minimum code level.
- 2. Check the IBM support website for an applicable retain tip or firmware update that applies to this memory error.
- 3. Swap the affected DIMMs (as indicated by the error LEDs on the system board or the event logs) to a different memory channel or microprocessor.
- 4. If the problem follows the DIMM, replace the failing DIMM.
- 5. (Trained technician only) If the problem occurs on the same DIMM connector, check the DIMM connector. If the connector contains any foreign material or is damaged, replace the system board.
- 6. (Trained technician only) Remove the affected microprocessor and check the microprocessor socket pins for any damaged pins. If a damage is found, replace the system board.
- 7. (Trained technician only) Replace the affected microprocessor.
- 8. Manually re-enable all affected DIMMs if the server firmware version is older than UEFI v1.10. If the server firmware version is UEFI v1.10 or newer, disconnect and reconnect the server to the power source and restart the server.
- 9. (Trained Service technician only) Replace the affected microprocessor.

One of the DIMMs :

# • 806f050d-0400ffff : Array [ComputerSystemElementName] is in critical condition. (Drive 0)

This message is for the use case when an implementation has detected that an Array is Critical.

May also be shown as 806f050d0400ffff or 0x806f050d0400ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Hard Disk drive SNMP Trap ID 5 CIM Information

### Prefix: PLAT ID: 0174

#### **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Check backplane cable connection.
- 5. Replace the RAID adapter.
- 6. Replace the hard disk drive that is indicated by a lit status LED.

# • 806f050d-0401ffff : Array [ComputerSystemElementName] is in critical condition. (Drive 1)

This message is for the use case when an implementation has detected that an Array is Critical.

May also be shown as 806f050d0401ffff or 0x806f050d0401ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Hard Disk drive SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0174

#### **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Check backplane cable connection.
- 5. Replace the RAID adapter.
- 6. Replace the hard disk drive that is indicated by a lit status LED.

# • 806f050d-0402ffff : Array [ComputerSystemElementName] is in critical condition. (Drive 2)

This message is for the use case when an implementation has detected that an Array is Critical.

May also be shown as 806f050d0402ffff or 0x806f050d0402ffff

Severity Error Serviceable Yes Automatically notify support No

Alert Category

Critical - Hard Disk drive

SNMP Trap ID

5

CIM Information Prefix: PLAT ID: 0174

# User Response

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Check backplane cable connection.
- 5. Replace the RAID adapter.
- 6. Replace the hard disk drive that is indicated by a lit status LED.

# • 806f050d-0403ffff : Array [ComputerSystemElementName] is in critical condition. (Drive 3)

This message is for the use case when an implementation has detected that an Array is Critical.

May also be shown as 806f050d0403ffff or 0x806f050d0403ffff

# Severity

Error

# Serviceable

Yes

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID

5

CIM Information Prefix: PLAT ID: 0174

# **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Check backplane cable connection.
- 5. Replace the RAID adapter.
- 6. Replace the hard disk drive that is indicated by a lit status LED.

# • 806f050d-0404ffff : Array [ComputerSystemElementName] is in critical condition. (Drive 4)

This message is for the use case when an implementation has detected that an Array is Critical.

May also be shown as 806f050d0404ffff or 0x806f050d0404ffff

Severity Error

Serviceable

Yes

# Automatically notify support

No

Alert Category Critical - Hard Disk drive

# SNMP Trap ID

5

CIM Information Prefix: PLAT ID: 0174

# **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Check backplane cable connection.
- 5. Replace the RAID adapter.
- 6. Replace the hard disk drive that is indicated by a lit status LED.

# • 806f050d-0405ffff : Array [ComputerSystemElementName] is in critical condition. (Drive 5)

This message is for the use case when an implementation has detected that an Array is Critical.

May also be shown as 806f050d0405ffff or 0x806f050d0405ffff

# Severity

Error

#### Serviceable Yes

163

Automatically notify support No

Alert Category

Critical - Hard Disk drive

# **SNMP** Trap ID

5

CIM Information Prefix: PLAT ID: 0174

# **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Check backplane cable connection.
- 5. Replace the RAID adapter.
- 6. Replace the hard disk drive that is indicated by a lit status LED.

# 806f050d-0406ffff : Array [ComputerSystemElementName] is in critical condition. (Drive 6)

This message is for the use case when an implementation has detected that an Array is Critical.

May also be shown as 806f050d0406ffff or 0x806f050d0406ffff

Severity

Error

#### Serviceable

Yes

#### Automatically notify support No

#### **Alert Category**

Critical - Hard Disk drive

#### **SNMP** Trap ID

5

CIM Information Prefix: PLAT ID: 0174

#### **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Check backplane cable connection.
- 5. Replace the RAID adapter.
- 6. Replace the hard disk drive that is indicated by a lit status LED.

### • 806f050d-0407ffff : Array [ComputerSystemElementName] is in critical condition. (Drive 7)

This message is for the use case when an implementation has detected that an Array is Critical.

May also be shown as 806f050d0407ffff or 0x806f050d0407ffff

Severity Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0174

#### User Response

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Check backplane cable connection.
- 5. Replace the RAID adapter.

6. Replace the hard disk drive that is indicated by a lit status LED.

# 806f0513-2582ffff : A PCI SERR has occurred on system [ComputerSystemElementName]. (All PCI Error)

This message is for the use case when an implementation has detected a PCI SERR.

May also be shown as 806f05132582ffff or 0x806f05132582ffff

Severity Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0234

#### **User Response**

- 1. Check the PCI LED.
- 2. Reseat the affected adapters and riser card.
- 3. Update the server firmware (UEFI and IMM) and adapter firmware. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 4. Make sure that the adapter is supported. For a list of supported optional devices, see http:// www.ibm.com/systems/info/x86servers/serverproven/compat/us/.
- 5. Remove both adapters.
- 6. Replace the PCIe adapters.
- 7. Replace the riser card.

One of PCI Error : PCIs :

#### • 806f052b-2101ffff : Invalid or Unsupported firmware or software was detected on system [ComputerSystemElementName]. (IMM2 FW Failover)

This message is for the use case when an implementation has detected an Invalid/Unsupported Firmware/ Software Version.

May also be shown as 806f052b2101ffff or 0x806f052b2101ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Other

SNMP Trap ID

50

CIM Information Prefix: PLAT ID: 0446

#### **User Response**

- 1. Make sure the server meets the minimum configuration to start (see Power-supply LEDs).
- 2. Recover the server firmware from the backup page by restarting the server.
- 3. Update the server firmware to the latest level (see Updating the firmware). Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 4. Remove components one at a time, restarting the server each time, to see if the problem goes away.
- 5. If the problem remains, (trained service technician) replace the system board.
- 806f0607-0301ffff : An SM BIOS Uncorrectable CPU complex error for [ProcessorElementName] has asserted. (CPU 1)

This message is for the use case when an SM BIOS Uncorrectable CPU complex error has asserted.

May also be shown as 806f06070301ffff or 0x806f06070301ffff

#### Severity

Error

Serviceable Yes

#### Automatically notify support No

. .

Alert Category Critical - CPU

# SNMP Trap ID

40

CIM Information

Prefix: PLAT ID: 0816

# **User Response**

- Update the latest level of system firmware and device drivers are installed for all adapters and standard devices, such as UEFI, IMM Ethernet, and SAS. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 2. Run the DSA program.
- 3. Reseat the adapter.
- 4. Replace the adapter.
- 5. (Trained technician only) Replace microprocessor n. (n = microprocessor number)
- 6. (Trained technician only) Replace the system board.

### 806f0607-0302ffff : An SM BIOS Uncorrectable CPU complex error for [ProcessorElementName] has asserted. (CPU 2)

This message is for the use case when an SM BIOS Uncorrectable CPU complex error has asserted.

May also be shown as 806f06070302ffff or 0x806f06070302ffff

Severity

Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - CPU

SNMP Trap ID

40

CIM Information

Prefix: PLAT ID: 0816

#### **User Response**

- Update the latest level of system firmware and device drivers are installed for all adapters and standard devices, such as UEFI, IMM Ethernet, and SAS. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 2. Run the DSA program.
- 3. Reseat the adapter.
- 4. Replace the adapter.
- 5. (Trained technician only) Replace microprocessor n. (n = microprocessor number)
- 6. (Trained technician only) Replace the system board.

# 806f0607-2584ffff : An SM BIOS Uncorrectable CPU complex error for [ProcessorElementName] has asserted. (All CPUs)

This message is for the use case when an SM BIOS Uncorrectable CPU complex error has asserted.

May also be shown as 806f06072584ffff or 0x806f06072584ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - CPU SNMP Trap ID 40 CIM Information

# Prefix: PLAT ID: 0816

#### **User Response**

- 1. Update the latest level of system firmware and device drivers are installed for all adapters and standard devices, such as UEFI, IMM Ethernet, and SAS. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 2. Run the DSA program.
- 3. Reseat the adapter.
- 4. Replace the adapter.
- 5. (Trained technician only) Replace microprocessor n. (n = microprocessor number)
- 6. (Trained technician only) Replace the system board.

One of CPUs :

#### • 806f060d-0400ffff : Array [ComputerSystemElementName] has failed. (Drive 0)

This message is for the use case when an implementation has detected that an Array Failed.

May also be shown as 806f060d0400ffff or 0x806f060d0400ffff

Severity

Error

Serviceable

Yes

Automatically notify support Yes

Alert Category

Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0176

#### **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Replace the RAID adapter.
- 5. Replace the hard disk drive that is indicated by a lit status LED.

#### 806f060d-0401ffff : Array [ComputerSystemElementName] has failed. (Drive 1)

This message is for the use case when an implementation has detected that an Array Failed.

May also be shown as 806f060d0401ffff or 0x806f060d0401ffff

Severity Error Serviceable Yes

#### Automatically notify support

Yes

#### Alert Category

Critical - Hard Disk drive

# SNMP Trap ID

5

# **CIM Information**

Prefix: PLAT ID: 0176

### **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Replace the RAID adapter.
- 5. Replace the hard disk drive that is indicated by a lit status LED.

# 806f060d-0402ffff : Array [ComputerSystemElementName] has failed. (Drive 2)

This message is for the use case when an implementation has detected that an Array Failed.

May also be shown as 806f060d0402ffff or 0x806f060d0402ffff

# Severity

Error

Serviceable Yes

Automatically notify support Yes

Alert Category Critical - Hard Disk drive

# SNMP Trap ID

5

CIM Information Prefix: PLAT ID: 0176

# **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Replace the RAID adapter.
- 5. Replace the hard disk drive that is indicated by a lit status LED.

# 806f060d-0403ffff : Array [ComputerSystemElementName] has failed. (Drive 3)

This message is for the use case when an implementation has detected that an Array Failed.

May also be shown as 806f060d0403ffff or 0x806f060d0403ffff

Severity Error Serviceable Yes

Automatically notify support Yes

Alert Category Critical - Hard Disk drive

5 SNMP Trap ID

CIM Information Prefix: PLAT ID: 0176

#### **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Replace the RAID adapter.
- 5. Replace the hard disk drive that is indicated by a lit status LED.

# • 806f060d-0404ffff : Array [ComputerSystemElementName] has failed. (Drive 4)

This message is for the use case when an implementation has detected that an Array Failed.

May also be shown as 806f060d0404ffff or 0x806f060d0404ffff

Severity

Error

Serviceable Yes

Automatically notify support Yes

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0176

#### User Response

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Replace the RAID adapter.
- 5. Replace the hard disk drive that is indicated by a lit status LED.
- 806f060d-0405ffff : Array [ComputerSystemElementName] has failed. (Drive 5)

This message is for the use case when an implementation has detected that an Array Failed.

May also be shown as 806f060d0405ffff or 0x806f060d0405ffff

Severity Error

Serviceable Yes

Automatically notify support

Yes

Alert Category

Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0176

# **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Replace the RAID adapter.
- 5. Replace the hard disk drive that is indicated by a lit status LED.

# 806f060d-0406ffff : Array [ComputerSystemElementName] has failed. (Drive 6)

This message is for the use case when an implementation has detected that an Array Failed.

May also be shown as 806f060d0406ffff or 0x806f060d0406ffff

Severity Error Serviceable Yes Automatically notify support Yes Alert Category Critical - Hard Disk drive SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0176

# **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Replace the RAID adapter.
- 5. Replace the hard disk drive that is indicated by a lit status LED.

# 806f060d-0407ffff : Array [ComputerSystemElementName] has failed. (Drive 7)

This message is for the use case when an implementation has detected that an Array Failed.

May also be shown as 806f060d0407ffff or 0x806f060d0407ffff

Severity

Error

#### Serviceable

Yes

Automatically notify support Yes

#### Alert Category

Critical - Hard Disk drive

#### **SNMP** Trap ID

5 CIM Information

Prefix: PLAT ID: 0176

#### **User Response**

- 1. Make sure that the RAID adapter firmware and hard disk drive firmware are at the latest level.
- 2. Make sure that the SAS cable is connected correctly.
- 3. Replace the SAS cable.
- 4. Replace the RAID adapter.
- 5. Replace the hard disk drive that is indicated by a lit status LED.

# • 806f070c-2001ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 1)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2001ffff or 0x806f070c2001ffff

Severity Error

#### Serviceable

Yes

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0126

#### User Response

Make sure that DIMMs are installed and following the memory population chart in the system publication.

• 806f070c-2002ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 2)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2002ffff or 0x806f070c2002ffff

#### Severity

Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Memory

#### **SNMP** Trap ID

41

CIM Information Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

# • 806f070c-2003ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 3)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2003ffff or 0x806f070c2003ffff

#### Severity

Error

Serviceable Yes

Automatically notify support

No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

# • 806f070c-2004ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 4)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2004ffff or 0x806f070c2004ffff

Severity

Error

#### Serviceable

Yes

Automatically notify support No

#### Alert Category Critical - Memory

**SNMP** Trap ID

41

CIM Information Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

#### 806f070c-2005ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 5)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2005ffff or 0x806f070c2005ffff

#### Severity Error

Erro

Serviceable Yes

# Automatically notify support

No

Alert Category Critical - Memory

Ontioal Mic

SNMP Trap ID 41

# **CIM** Information

Prefix: PLAT ID: 0126

# User Response

Make sure that DIMMs are installed and following the memory population chart in the system publication.

# • 806f070c-2006ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 6)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2006ffff or 0x806f070c2006ffff

# Severity

Error

Serviceable

Yes

Automatically notify support

No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information

Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

• 806f070c-2007ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 7)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2007ffff or 0x806f070c2007ffff

Severity Error Serviceable Yes

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0126

**User Response** 

Make sure that DIMMs are installed and following the memory population chart in the system publication.

 806f070c-2008ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 8)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2008ffff or 0x806f070c2008ffff

Severity Error Serviceable Yes

#### Automatically notify support

No

Alert Category Critical - Memory

#### **SNMP** Trap ID 41

#### **CIM** Information Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

#### 806f070c-2009ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 9)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2009ffff or 0x806f070c2009ffff

Severity Error

Serviceable Yes

Automatically notify support

No

Alert Category Critical - Memory

**SNMP** Trap ID 41

**CIM** Information Prefix: PLAT ID: 0126

# User Response

Make sure that DIMMs are installed and following the memory population chart in the system publication.

#### 806f070c-200affff : Configuration Error for [PhysicalMemoryElementName] on Subsystem . [MemoryElementName]. (DIMM 10)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c200affff or 0x806f070c200affff

Severity Error Serviceable Yes Automatically notify support No **Alert Category** 

Critical - Memory

**SNMP** Trap ID

41

# CIM Information

Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

# • 806f070c-200bffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 11)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c200bffff or 0x806f070c200bffff

Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

#### 806f070c-200cffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 12)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c200cffff or 0x806f070c200cffff

Severity Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

### CIM Information Prefix: PLAT ID: 0126

### User Response

Make sure that DIMMs are installed and following the memory population chart in the system publication.

• 806f070c-200dffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 13)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c200dffff or 0x806f070c200dffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0126

# User Response

Make sure that DIMMs are installed and following the memory population chart in the system publication.

 806f070c-200effff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 14)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c200effff or 0x806f070c200effff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0126

**User Response** 

Make sure that DIMMs are installed and following the memory population chart in the system publication.

# • 806f070c-200fffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 15)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c200fffff or 0x806f070c200fffff

Severity

Error

Serviceable

Yes

Automatically notify support

No

Alert Category

Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

• 806f070c-2010ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 16)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2010ffff or 0x806f070c2010ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

#### 806f070c-2011ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 17)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2011ffff or 0x806f070c2011ffff

Severity

Error

Serviceable Yes

Automatically notify support No

110

Alert Category

Critical - Memory

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0126

#### User Response

Make sure that DIMMs are installed and following the memory population chart in the system publication.

# • 806f070c-2012ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 18)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2012ffff or 0x806f070c2012ffff

**Severity** Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0126

User Response

Make sure that DIMMs are installed and following the memory population chart in the system publication.

 806f070c-2013ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 19) This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2013ffff or 0x806f070c2013ffff

#### Severity

Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Memory

#### **SNMP** Trap ID

41

CIM Information Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

#### 806f070c-2014ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 20)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2014ffff or 0x806f070c2014ffff

#### Severity

Error

Serviceable Yes

Automatically notify support

No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

### 806f070c-2015ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 21)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2015ffff or 0x806f070c2015ffff

Severity

Error

#### Serviceable

Yes

Automatically notify support No

#### Alert Category Critical - Memory

**SNMP** Trap ID

41

CIM Information Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

#### 806f070c-2016ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 22)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2016ffff or 0x806f070c2016ffff

# Severity

Error

Serviceable Yes

# Automatically notify support

No

Alert Category Critical - Memory

United - Me

#### SNMP Trap ID 41

41

# CIM Information

Prefix: PLAT ID: 0126

# User Response

Make sure that DIMMs are installed and following the memory population chart in the system publication.

# • 806f070c-2017ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 23)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2017ffff or 0x806f070c2017ffff

# Severity

Error

Serviceable

Yes

Automatically notify support

No

Alert Category Critical - Memory

SNMP Trap ID

41

CIM Information Prefix: PLAT ID: 0126

#### **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication.

 806f070c-2018ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 24)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2018ffff or 0x806f070c2018ffff

Severity Error Serviceable Yes

Automatically notify support No Alert Category

Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0126

**User Response** 

Make sure that DIMMs are installed and following the memory population chart in the system publication.

• 806f070c-2581ffff : Configuration Error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (All DIMMs)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has been corrected.

May also be shown as 806f070c2581ffff or 0x806f070c2581ffff

Severity Error Serviceable Yes

#### Automatically notify support

No

**Alert Category** Critical - Memory

#### **SNMP** Trap ID 41

# **CIM** Information

Prefix: PLAT ID: 0126

# **User Response**

Make sure that DIMMs are installed and following the memory population chart in the system publication. One of the DIMMs :

#### 806f070d-0400ffff : Rebuild in progress for Array in system [ComputerSystemElementName]. (Drive 0)

This message is for the use case when an implementation has detected that an Array Rebuild is in Progress.

May also be shown as 806f070d0400ffff or 0x806f070d0400ffff

Severity Info

Serviceable No

Automatically notify support

No

Alert Category System - Other

# **SNMP Trap ID**

**CIM** Information Prefix: PLAT ID: 0178

# User Response

No action; information only.

#### 806f070d-0401ffff : Rebuild in progress for Array in system [ComputerSystemElementName]. (Drive • 1)

This message is for the use case when an implementation has detected that an Array Rebuild is in Progress.

May also be shown as 806f070d0401ffff or 0x806f070d0401ffff

Severity Info

Serviceable No

# Automatically notify support No

**Alert Category** System - Other

### **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0178

User Response

No action; information only.

806f070d-0402ffff : Rebuild in progress for Array in system [ComputerSystemElementName]. (Drive 2)

This message is for the use case when an implementation has detected that an Array Rebuild is in Progress.

May also be shown as 806f070d0402ffff or 0x806f070d0402ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other SNMP Trap ID

CIM Information Prefix: PLAT ID: 0178

User Response No action; information only.

806f070d-0403ffff : Rebuild in progress for Array in system [ComputerSystemElementName]. (Drive 3)

This message is for the use case when an implementation has detected that an Array Rebuild is in Progress.

May also be shown as 806f070d0403ffff or 0x806f070d0403ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0178 **User Response** 

No action; information only.

806f070d-0404ffff : Rebuild in progress for Array in system [ComputerSystemElementName]. (Drive 4)

This message is for the use case when an implementation has detected that an Array Rebuild is in Progress.

May also be shown as 806f070d0404ffff or 0x806f070d0404ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category

System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0178

#### User Response

No action; information only.

806f070d-0405ffff : Rebuild in progress for Array in system [ComputerSystemElementName]. (Drive 5)

This message is for the use case when an implementation has detected that an Array Rebuild is in Progress.

May also be shown as 806f070d0405ffff or 0x806f070d0405ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0178

#### **User Response**

No action; information only.

806f070d-0406ffff : Rebuild in progress for Array in system [ComputerSystemElementName]. (Drive
 6)

This message is for the use case when an implementation has detected that an Array Rebuild is in Progress.

May also be shown as 806f070d0406ffff or 0x806f070d0406ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information

Prefix: PLAT ID: 0178

#### **User Response**

No action; information only.

806f070d-0407ffff : Rebuild in progress for Array in system [ComputerSystemElementName]. (Drive 7)

This message is for the use case when an implementation has detected that an Array Rebuild is in Progress.

May also be shown as 806f070d0407ffff or 0x806f070d0407ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0178

User Response No action; information only.

#### • 806f072b-2101ffff : A successful software or firmware change was detected on system [ComputerSystemElementName]. (IMM Promotion)

This message is for the use case when an implementation has detected a Successful Software or Firmware Change.

May also be shown as 806f072b2101ffff or 0x806f072b2101ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0450

User Response

No action; information only. IMM Recovery :

#### • 806f072b-2201ffff : A successful software or firmware change was detected on system [ComputerSystemElementName]. (Bkup Auto Update)

This message is for the use case when an implementation has detected a Successful Software or Firmware Change.

May also be shown as 806f072b2201ffff or 0x806f072b2201ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0450

#### **User Response**

No action; information only. ROM Recovery :

#### • 806f0807-0301ffff : [ProcessorElementName] has been Disabled. (CPU 1)

This message is for the use case when an implementation has detected a Processor has been Disabled.

May also be shown as 806f08070301ffff or 0x806f08070301ffff

Severity Info Serviceable No Automatically notify support

No

### Alert Category System - Other

#### **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0061

User Response

No action; information only.

# • 806f0807-0302ffff : [ProcessorElementName] has been Disabled. (CPU 2)

This message is for the use case when an implementation has detected a Processor has been Disabled.

May also be shown as 806f08070302ffff or 0x806f08070302ffff

Severity Info

Serviceable No

Automatically notify support

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0061

User Response No action; information only.

# • 806f0807-2584ffff : [ProcessorElementName] has been Disabled. (All CPUs)

This message is for the use case when an implementation has detected a Processor has been Disabled.

May also be shown as 806f08072584ffff or 0x806f08072584ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other SNMP Trap ID

CIM Information Prefix: PLAT ID: 0061

User Response No action; information only. One of CPUs :

#### 806f080c-2001ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 1)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2001ffff or 0x806f080c2001ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0140

User Response No action; information only.

 806f080c-2002ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 2)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2002ffff or 0x806f080c2002ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0140

#### User Response

No action; information only.

#### 806f080c-2003ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 3)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2003ffff or 0x806f080c2003ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0140

User Response

No action; information only.

• 806f080c-2004ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 4)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2004ffff or 0x806f080c2004ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0140

User Response No action; information only.

 806f080c-2005ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 5)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2005ffff or 0x806f080c2005ffff

Severity Info

Serviceable

No

#### Automatically notify support No

Alert Category System - Other

#### **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0140

User Response No action; information only.

• 806f080c-2006ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 6)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2006ffff or 0x806f080c2006ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

#### **SNMP Trap ID**

CIM Information Prefix: PLAT ID: 0140

#### User Response

No action; information only.

# • 806f080c-2007ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 7)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2007ffff or 0x806f080c2007ffff

Severity Info Serviceable

No

Automatically notify support No

**Alert Category** 

#### System - Other

#### **SNMP** Trap ID

# 

Prefix: PLAT ID: 0140

# User Response

No action; information only.

# • 806f080c-2008ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 8)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2008ffff or 0x806f080c2008ffff

Severity Info Serviceable No Automatically notify support

No

### Alert Category System - Other

SNMP Trap ID

# CIM Information Prefix: PLAT ID: 0140

User Response No action; information only.

# • 806f080c-2009ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 9)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2009ffff or 0x806f080c2009ffff

Severity Info Serviceable No Automatically notify support No Alert Category

System - Other

**SNMP** Trap ID

### **CIM Information**

Prefix: PLAT ID: 0140

#### **User Response**

No action; information only.

• 806f080c-200affff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 10)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c200affff or 0x806f080c200affff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0140

## User Response

No action; information only.

• 806f080c-200bffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 11)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c200bffff or 0x806f080c200bffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0140

User Response No action; information only.

# • 806f080c-200cffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 12)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c200cffff or 0x806f080c200cffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0140

User Response No action; information only.

 806f080c-200dffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 13)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c200dffff or 0x806f080c200dffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0140

**User Response** 

No action; information only.

#### 806f080c-200effff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 14)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c200effff or 0x806f080c200effff

Severity

Info

Serviceable

No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0140

User Response

No action; information only.

• 806f080c-200fffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 15)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c200fffff or 0x806f080c200fffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0140

User Response No action; information only.

# • 806f080c-2010ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 16)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2010ffff or 0x806f080c2010ffff

Severity Info

Serviceable

No

#### Automatically notify support No

Alert Category System - Other

#### **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0140

User Response No action; information only.

# • 806f080c-2011ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 17)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2011ffff or 0x806f080c2011ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category System - Other

#### SNMP Trap ID

CIM Information Prefix: PLAT ID: 0140

#### User Response

No action; information only.

# • 806f080c-2012ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 18)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2012ffff or 0x806f080c2012ffff

Severity Info Serviceable

No

Automatically notify support No

**Alert Category** 

#### System - Other

#### **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0140

User Response No action; information only.

# • 806f080c-2013ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 19)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2013ffff or 0x806f080c2013ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0140

User Response No action; information only.

• 806f080c-2014ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 20)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2014ffff or 0x806f080c2014ffff

Severity Info Serviceable

No

Automatically notify support

No

Alert Category System - Other

**SNMP** Trap ID

**CIM Information** 

Prefix: PLAT ID: 0140

#### User Response

No action; information only.

# • 806f080c-2015ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 21)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2015ffff or 0x806f080c2015ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0140

### User Response

No action; information only.

# • 806f080c-2016ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 22)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2016ffff or 0x806f080c2016ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other SNMP Trap ID CIM Information

Prefix: PLAT ID: 0140

User Response No action; information only.

#### 806f080c-2017ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 23)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2017ffff or 0x806f080c2017ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0140

User Response No action; information only.

• 806f080c-2018ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 24)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2018ffff or 0x806f080c2018ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0140

#### User Response

No action; information only.

# • 806f080c-2581ffff : Memory sparing initiated for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (All DIMMs)

This message is for the use case when an implementation has detected that Memory double chip sparing has been initiated.

May also be shown as 806f080c2581ffff or 0x806f080c2581ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0140

**User Response** 

No action; information only. One of the DIMMs :

#### • 806f0813-2581ffff : An Uncorrectable Error has occurred on [SensorElementName]. (DIMMs)

This message is for the use case when an implementation has detected a Bus Uncorrectable Error.

May also be shown as 806f08132581ffff or 0x806f08132581ffff

Severity Error Serviceable Yes

Automatically notify support Yes Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0240

#### **User Response**

- 1. Check the system-event log.
- 2. (Trained technician only) Remove the failing microprocessor from the system board (see Removing a microprocessor and heat sink).
- 3. Check for a server firmware update. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 4. Make sure that the two microprocessors are matching.
- 5. (Trained technician only) Replace the system board.

#### 806f0813-2584ffff : An Uncorrectable Error has occurred on [SensorElementName]. (CPUs)

This message is for the use case when an implementation has detected a Bus Uncorrectable Error.

May also be shown as 806f08132584ffff or 0x806f08132584ffff

Severity

Error

#### Serviceable

Yes

Automatically notify support Yes

Alert Category

Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0240

#### **User Response**

- 1. Check the system-event log.
- 2. (Trained technician only) Remove the failing microprocessor from the system board (see Removing a microprocessor and heat sink).
- 3. Check for a server firmware update. Important: Some cluster solutions require specific code levels or coordinated code updates. If the device is part of a cluster solution, verify that the latest level of code is supported for the cluster solution before you update the code.
- 4. Make sure that the two microprocessors are matching.
- 5. (Trained technician only) Replace the system board.
- 806f0823-2101ffff : Watchdog Timer interrupt occurred for [WatchdogElementName]. (IPMI Watchdog)

This message is for the use case when an implementation has detected a Watchdog Timer interrupt occurred.

May also be shown as 806f08232101ffff or 0x806f08232101ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0376

### User Response

No action; information only.

### 806f090c-2001ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 1)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2001ffff or 0x806f090c2001ffff

Severity Warning

Serviceable Yes

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-2002ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 2)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2002ffff or 0x806f090c2002ffff

Severity Warning

Serviceable

Yes

Automatically notify support

No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-2003ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 3)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2003ffff or 0x806f090c2003ffff

Severity

Warning

Serviceable

Yes

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

22

CIM Information Prefix: PLAT ID: 0142

#### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-2004ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 4)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2004ffff or 0x806f090c2004ffff

Severity Warning Serviceable

Yes

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

#### User Response

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-2005ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 5)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2005ffff or 0x806f090c2005ffff

#### Severity

Warning

Serviceable

Yes

Automatically notify support

No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-2006ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 6)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2006ffff or 0x806f090c2006ffff

Severity Warning Serviceable Yes Automatically notify support

No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)

# 806f090c-2007ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 7)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2007ffff or 0x806f090c2007ffff

Severity Warning

Serviceable Yes

### Automatically notify support

No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

#### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-2008ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 8)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2008ffff or 0x806f090c2008ffff

Severity Warning

Serviceable Yes

Automatically notify support

No

Alert Category

System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

#### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)

### • 806f090c-2009ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 9)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2009ffff or 0x806f090c2009ffff

Severity Warning Serviceable Yes

Automatically notify support No

Alert Category System - Other

## **SNMP** Trap ID

22

CIM Information Prefix: PLAT ID: 0142

#### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)

### 806f090c-200affff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 10)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c200affff or 0x806f090c200affff

Severity Warning

Serviceable Yes

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

22

CIM Information Prefix: PLAT ID: 0142

#### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-200bffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 11)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c200bffff or 0x806f090c200bffff

Severity Warning Serviceable Yes Automatically notify support No Alert Category System - Other SNMP Trap ID 22 CIM Information

#### Prefix: PLAT ID: 0142

#### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-200cffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 12)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c200cffff or 0x806f090c200cffff

Severity Warning

Serviceable

Yes

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

#### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-200dffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 13)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c200dffff or 0x806f090c200dffff

Severity Warning Serviceable Yes

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

#### **User Response**

1. Reseat the DIMM, and then restart the server.

2. Replace DIMM n. (n = DIMM number)

### 806f090c-200effff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 14)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c200effff or 0x806f090c200effff

Severity Warning Serviceable

Yes

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

**User Response** 

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)

## 806f090c-200fffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 15)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c200fffff or 0x806f090c200fffff

Severity Warning Serviceable Yes Automatically notify support No Alert Category System - Other SNMP Trap ID 22 CIM Information

Prefix: PLAT ID: 0142

**User Response** 

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-2010ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 16)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2010ffff or 0x806f090c2010ffff

Severity

Warning

Serviceable Yes

Automatically notify support No

Alert Category

System - Other

SNMP Trap ID

---

CIM Information Prefix: PLAT ID: 0142

### User Response

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-2011ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 17)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2011ffff or 0x806f090c2011ffff

Severity

Warning

Serviceable Yes

Automatically notify support

No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0142

User Response

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-2012ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 18)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2012ffff or 0x806f090c2012ffff

Severity Warning

Serviceable Yes

Automatically notify support No

INC

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-2013ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 19)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2013ffff or 0x806f090c2013ffff

Severity

Warning

Serviceable Yes

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

22

CIM Information Prefix: PLAT ID: 0142

### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-2014ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 20)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2014ffff or 0x806f090c2014ffff

Severity Warning

Serviceable

Yes

# Automatically notify support

No

Alert Category System - Other

SNMP Trap ID

22

CIM Information Prefix: PLAT ID: 0142

### User Response

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)

### 806f090c-2015ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 21)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2015ffff or 0x806f090c2015ffff

Severity Warning

Serviceable Yes

Automatically notify support No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)

## 806f090c-2016ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 22)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2016ffff or 0x806f090c2016ffff

Severity Warning Serviceable

Yes

Automatically notify support No

#### **Alert Category**

System - Other

# SNMP Trap ID

22

#### CIM Information Prefix: PLAT ID: 0142

### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)

### 806f090c-2017ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 23)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2017ffff or 0x806f090c2017ffff

Severity Warning

Serviceable

Yes

Automatically notify support

No

Alert Category System - Other

SNMP Trap ID 22

CIM Information Prefix: PLAT ID: 0142

**User Response** 

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)
- 806f090c-2018ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] Throttled. (DIMM 24)

This message is for the use case when an implementation has detected Memory has been Throttled.

May also be shown as 806f090c2018ffff or 0x806f090c2018ffff

Severity Warning

Serviceable

Yes

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

#### 22

### CIM Information Prefix: PLAT ID: 0142

#### **User Response**

- 1. Reseat the DIMM, and then restart the server.
- 2. Replace DIMM n. (n = DIMM number)

# • 806f0a07-0301ffff : [ProcessorElementName] is operating in a Degraded State. (CPU 1)

This message is for the use case when an implementation has detected a Processor is running in the Degraded state.

May also be shown as 806f0a070301ffff or 0x806f0a070301ffff

Severity

Warning

Serviceable Yes

Automatically notify support

No

Alert Category Warning - CPU

SNMP Trap ID

42

CIM Information Prefix: PLAT ID: 0038

### User Response

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications.
- 3. Make sure that the heat sink for microprocessor n is installed correctly.
- 4. (Trained technician only) Replace microprocessor n. (n = microprocessor number)

# • 806f0a07-0302ffff : [ProcessorElementName] is operating in a Degraded State. (CPU 2)

This message is for the use case when an implementation has detected a Processor is running in the Degraded state.

May also be shown as 806f0a070302ffff or 0x806f0a070302ffff

Severity Warning Serviceable

Yes

Automatically notify support No

Alert Category Warning - CPU

#### **SNMP** Trap ID

42

#### CIM Information Prefix: PLAT ID: 0038

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications.
- 3. Make sure that the heat sink for microprocessor n is installed correctly.
- 4. (Trained technician only) Replace microprocessor n. (n = microprocessor number)

### • 806f0a07-2584ffff : [ProcessorElementName] is operating in a Degraded State. (All CPUs)

This message is for the use case when an implementation has detected a Processor is running in the Degraded state.

May also be shown as 806f0a072584ffff or 0x806f0a072584ffff

Severity

Warning

Serviceable Yes

Automatically notify support No

Alert Category Warning - CPU

SNMP Trap ID 42

CIM Information Prefix: PLAT ID: 0038

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow (front and rear of the server), that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Check the ambient temperature. You must be operating within the specifications.
- 3. Make sure that the heat sink for microprocessor n is installed correctly.
- 4. (Trained technician only) Replace microprocessor n. (n = microprocessor number) One of CPUs :

#### • 806f0a0c-2001ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 1)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2001ffff or 0x806f0a0c2001ffff

Severity

Error

Serviceable Yes

Automatically notify support

No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

#### 806f0a0c-2002ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 2)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2002ffff or 0x806f0a0c2002ffff

Severity Error Serviceable Yes Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)
- 806f0a0c-2003ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 3)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2003ffff or 0x806f0a0c2003ffff

#### Severity

Error

Serviceable

Yes

Automatically notify support

No

Alert Category

Critical - Temperature

#### **SNMP** Trap ID

0

**CIM Information** 

Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

#### 806f0a0c-2004ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 4)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2004ffff or 0x806f0a0c2004ffff

Severity Error Serviceable Yes Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0

CIM Information Prefix: PLAT ID: 0146

#### **User Response**

1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.

- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

#### 806f0a0c-2005ffff : An Over-Temperature Condition has been detected on the • [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 5)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2005ffff or 0x806f0a0c2005ffff

Severity Error Serviceable Yes

Automatically notify support No

Alert Category Critical - Temperature

**SNMP Trap ID** 0

**CIM Information** Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

#### 806f0a0c-2006ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 6)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2006ffff or 0x806f0a0c2006ffff

Severity Error Serviceable Yes Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID 0

## CIM Information Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

#### • 806f0a0c-2007ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 7)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2007ffff or 0x806f0a0c2007ffff

Severity

Error

### Serviceable

Yes

Automatically notify support No

Alert Category Critical - Temperature

# SNMP Trap ID

0

CIM Information Prefix: PLAT ID: 0146

### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

#### 806f0a0c-2008ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 8)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2008ffff or 0x806f0a0c2008ffff

Severity Error Serviceable Yes

#### Automatically notify support

No

#### **Alert Category**

Critical - Temperature

# SNMP Trap ID

0

#### **CIM Information**

Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

#### • 806f0a0c-2009ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 9)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2009ffff or 0x806f0a0c2009ffff

Severity Error

Serviceable Yes

Automatically notify support

No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)
- 806f0a0c-200affff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 10)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c200affff or 0x806f0a0c200affff

#### Severity

Error

#### Serviceable

Yes

# Automatically notify support

No

#### Alert Category

Critical - Temperature

#### **SNMP** Trap ID

0

CIM Information Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

#### • 806f0a0c-200bffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 11)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c200bffff or 0x806f0a0c200bffff

Severity Error Serviceable

Yes

Automatically notify support

No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.

- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)
- 806f0a0c-200cffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 12)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c200cffff or 0x806f0a0c200cffff

Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category

Critical - Temperature

**SNMP** Trap ID

0

CIM Information Prefix: PLAT ID: 0146

#### User Response

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

#### 806f0a0c-200dffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 13)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c200dffff or 0x806f0a0c200dffff

Severity Error Serviceable Yes Automatically notify support

No

Alert Category Critical - Temperature

SNMP Trap ID 0

**CIM Information** 

#### Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

### 806f0a0c-200effff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 14)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c200effff or 0x806f0a0c200effff

Severity Error Serviceable

Yes

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

#### • 806f0a0c-200fffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 15)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c200fffff or 0x806f0a0c200fffff

Severity Error

Serviceable

Yes

#### Automatically notify support

No

#### Alert Category

Critical - Temperature

SNMP Trap ID

0

CIM Information Prefix: PLAT ID: 0146

#### User Response

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

#### 806f0a0c-2010ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 16)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2010ffff or 0x806f0a0c2010ffff

Severity

Error

Serviceable Yes

#### Automatically notify support No

Alert Category Critical - Temperature

**SNMP** Trap ID

0

# **CIM** Information

Prefix: PLAT ID: 0146

### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)
- 806f0a0c-2011ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 17)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2011ffff or 0x806f0a0c2011ffff

#### Severity

Error

#### Serviceable

Yes

# Automatically notify support

No

#### Alert Category

Critical - Temperature

#### **SNMP** Trap ID

0

CIM Information Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

#### • 806f0a0c-2012ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 18)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2012ffff or 0x806f0a0c2012ffff

Severity Error Serviceable

Yes

Automatically notify support

No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0146

#### **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.

- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)
- 806f0a0c-2013ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 19)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2013ffff or 0x806f0a0c2013ffff

Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category

Critical - Temperature

**SNMP** Trap ID

0

CIM Information Prefix: PLAT ID: 0146

# User Response

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

# 806f0a0c-2014ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 20)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2014ffff or 0x806f0a0c2014ffff

Severity Error Serviceable Yes Automatically notify support

No

Alert Category Critical - Temperature

SNMP Trap ID 0

**CIM Information** 

# Prefix: PLAT ID: 0146

## **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

# • 806f0a0c-2015ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 21)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2015ffff or 0x806f0a0c2015ffff

Severity Error Serviceable

Yes

Automatically notify support

No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0146

## **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

# • 806f0a0c-2016ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 22)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2016ffff or 0x806f0a0c2016ffff

Severity Error

Serviceable

Yes

# Automatically notify support

No

## Alert Category

Critical - Temperature

SNMP Trap ID

0

CIM Information Prefix: PLAT ID: 0146

# User Response

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

# 806f0a0c-2017ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 23)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2017ffff or 0x806f0a0c2017ffff

# Severity

Error

Serviceable Yes

### Automatically notify support No

Alert Category Critical - Temperature

# **SNMP** Trap ID

0

# **CIM** Information

Prefix: PLAT ID: 0146

# **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)
- 806f0a0c-2018ffff : An Over-Temperature Condition has been detected on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 24)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Detected.

May also be shown as 806f0a0c2018ffff or 0x806f0a0c2018ffff

### Severity

Error

## Serviceable

Yes

#### Automatically notify support No

NO

# Alert Category

Critical - Temperature

# **SNMP** Trap ID

0

CIM Information Prefix: PLAT ID: 0146

## **User Response**

- 1. Make sure that the fans are operating, that there are no obstructions to the airflow, that the air baffles are in place and correctly installed, and that the server cover is installed and completely closed.
- 2. Make sure that ambient temperature is within the specifications.
- 3. If a fan has failed, complete the action for a fan failure.
- 4. Replace DIMM n. (n = DIMM number)

# • 806f0a13-2401ffff : A Fatal Bus Error has occurred on bus [SensorElementName]. (SMBus)

This message is for the use case when an implementation has detected a Bus Fatal Error.

May also be shown as 806f0a132401ffff or 0x806f0a132401ffff

# Severity

Error

Serviceable

Yes

#### Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0244

# **User Response**

- 1. (Trained technician only)Reseat the microprocessor, and then restart the server.
- 2. (Trained technician only)Replace microprocessor n. (n = microprocessor number)

# • 806f0a13-2582ffff : A Fatal Bus Error has occurred on bus [SensorElementName]. (All PCI Error)

This message is for the use case when an implementation has detected a Bus Fatal Error.

May also be shown as 806f0a132582ffff or 0x806f0a132582ffff

Severity Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0244

# **User Response**

- 1. (Trained technician only)Reseat the microprocessor, and then restart the server.
- 2. (Trained technician only)Replace microprocessor n. (n = microprocessor number) One of PCI Error : PCIs :
- 806f0b13-0701ffff : Bus [SensorElementName] is operating in a degraded state. (DMI Links)

This message is for the use case when an implementation has detected a Bus is Degraded.

May also be shown as 806f0b130701ffff or 0x806f0b130701ffff

Severity Warning Serviceable Yes Automatically notify support No Alert Category Warning - Other SNMP Trap ID 60 CIM Information Prefix: PLAT ID: 0246 User Response None 81010202-0701ffff : Numeric sensor [Num

 81010202-0701ffff : Numeric sensor [NumericSensorElementName] going low (lower critical) has deasserted. (SysBrd 12V)

This message is for the use case when an implementation has detected a Lower Critical sensor going low has deasserted.

May also be shown as 810102020701ffff or 0x810102020701ffff

Severity Info

Serviceable No

# Automatically notify support

No

Alert Category Critical - Voltage

# SNMP Trap ID

1

#### CIM Information Prefix: PLAT ID: 0481

User Response

No action; information only. SysBrd 3.3V : SysBrd 5V :

# • 81010202-2801ffff : Numeric sensor [NumericSensorElementName] going low (lower critical) has deasserted. (CMOS Battery)

This message is for the use case when an implementation has detected a Lower Critical sensor going low has deasserted.

May also be shown as 810102022801ffff or 0x810102022801ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Voltage

# SNMP Trap ID

CIM Information Prefix: PLAT ID: 0481

User Response No action; information only.

# 81010701-2d01ffff : Numeric sensor [NumericSensorElementName] going high (upper non-critical) has deasserted. (PCH Temp)

This message is for the use case when an implementation has detected an Upper Non-critical sensor going high has deasserted.

May also be shown as 810107012d01ffff or 0x810107012d01ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Warning - Temperature

## SNMP Trap ID 12

CIM Information Prefix: PLAT ID: 0491

# User Response No action; information only.

• 81010701-3701ffff : Numeric sensor [NumericSensorElementName] going high (upper non-critical) has deasserted. (Inlet Temp)

This message is for the use case when an implementation has detected an Upper Non-critical sensor going high has deasserted.

May also be shown as 810107013701ffff or 0x810107013701ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category Warning - Temperature

SNMP Trap ID 12

CIM Information Prefix: PLAT ID: 0491

User Response No action; information only.

• 81010901-2d01ffff : Numeric sensor [NumericSensorElementName] going high (upper critical) has deasserted. (PCH Temp)

This message is for the use case when an implementation has detected an Upper Critical sensor going high has deasserted.

May also be shown as 810109012d01ffff or 0x810109012d01ffff

Severity Info Serviceable No Automatically notify support No Alert Category

Critical - Temperature

SNMP Trap ID 0

CIM Information Prefix: PLAT ID: 0495 **User Response** 

No action; information only.

 81010901-3701ffff : Numeric sensor [NumericSensorElementName] going high (upper critical) has deasserted. (Inlet Temp)

This message is for the use case when an implementation has detected an Upper Critical sensor going high has deasserted.

May also be shown as 810109013701ffff or 0x810109013701ffff

Severity Info

Serviceable No

Automatically notify support

No

Alert Category

Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0495

#### **User Response**

No action; information only.

 81010902-0701ffff : Numeric sensor [NumericSensorElementName] going high (upper critical) has deasserted. (SysBrd 12V)

This message is for the use case when an implementation has detected an Upper Critical sensor going high has deasserted.

May also be shown as 810109020701ffff or 0x810109020701ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Voltage SNMP Trap ID 1

CIM Information Prefix: PLAT ID: 0495

# **User Response**

No action; information only. SysBrd 3.3V : SysBrd 5V :

 81010b01-2d01ffff : Numeric sensor [NumericSensorElementName] going high (upper nonrecoverable) has deasserted. (PCH Temp) This message is for the use case when an implementation has detected an Upper Non-recoverable sensor going high has deasserted.

May also be shown as 81010b012d01ffff or 0x81010b012d01ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0499

User Response

No action; information only.

# • 81010b01-3701ffff : Numeric sensor [NumericSensorElementName] going high (upper non-recoverable) has deasserted. (Inlet Temp)

This message is for the use case when an implementation has detected an Upper Non-recoverable sensor going high has deasserted.

May also be shown as 81010b013701ffff or 0x81010b013701ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0499

User Response No action; information only.

# • 81030006-2101ffff : Sensor [SensorElementName] has asserted. (Sig Verify Fail)

This message is for the use case when an implementation has detected a Sensor has asserted.

May also be shown as 810300062101ffff or 0x810300062101ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0508

User Response No action; information only.

# 8103000f-2101ffff : Sensor [SensorElementName] has asserted. (IMM FW Corrupted)

This message is for the use case when an implementation has detected a Sensor has asserted.

May also be shown as 8103000f2101ffff or 0x8103000f2101ffff

Severity Info

•

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0508

User Response No action; information only.

# • 8103010c-2581ffff : Sensor [SensorElementName] has deasserted. (Non-Auth DIMMs)

This message is for the use case when an implementation has detected a Sensor has deasserted.

May also be shown as 8103010c2581ffff or 0x8103010c2581ffff

Severity Info Serviceable No Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

# CIM Information Prefix: PLAT ID: 0509

### User Response

No action; information only.

# • 8103010e-2581ffff : Sensor [SensorElementName] has deasserted. (Memory Resized)

This message is for the use case when an implementation has detected a Sensor has deasserted.

May also be shown as 8103010e2581ffff or 0x8103010e2581ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0509

User Response No action; information only.

## • 81030112-0601ffff : Sensor [SensorElementName] has deasserted. (SMM Mode)

This message is for the use case when an implementation has detected a Sensor has deasserted.

May also be shown as 810301120601ffff or 0x810301120601ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0509

User Response No action; information only. SMM Monitor :

## 81030118-1701ffff : Sensor [SensorElementName] has deasserted. (Invalid NEBs Cfg)

This message is for the use case when an implementation has detected a Sensor has deasserted.

May also be shown as 810301181701ffff or 0x810301181701ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0509

User Response No action; information only.

## • 81030121-0782ffff : Sensor [SensorElementName] has deasserted. (PCIe Dev LK Down)

This message is for the use case when an implementation has detected a Sensor has deasserted.

May also be shown as 810301210782ffff or 0x810301210782ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0509

User Response No action; information only.

# • 81070101-0301ffff : Sensor [SensorElementName] has deasserted the transition from normal to non-critical state. (CPU 1 Overtemp)

This message is for the use case when an implementation has detected that a Sensor has deasserted a transition to non-critical from normal.

May also be shown as 810701010301ffff or 0x810701010301ffff

Severity Info Serviceable No Automatically notify support No

# Alert Category

Warning - Temperature

SNMP Trap ID

12

CIM Information Prefix: PLAT ID: 0521

# User Response

No action; information only.

# • 81070101-0302ffff : Sensor [SensorElementName] has deasserted the transition from normal to non-critical state. (CPU 2 Overtemp)

This message is for the use case when an implementation has detected that a Sensor has deasserted a transition to non-critical from normal.

May also be shown as 810701010302ffff or 0x810701010302ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Warning - Temperature

SNMP Trap ID 12

CIM Information Prefix: PLAT ID: 0521

User Response No action; information only.

• 81070101-0f02ffff : Sensor [SensorElementName] has deasserted the transition from normal to non-critical state. (M5215 RAID Temp)

This message is for the use case when an implementation has detected that a Sensor has deasserted a transition to non-critical from normal.

May also be shown as 810701010f02ffff or 0x810701010f02ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Warning - Temperature

SNMP Trap ID 12

# CIM Information Prefix: PLAT ID: 0521

#### **User Response**

No action; information only.

# • 81070101-2c01ffff : Sensor [SensorElementName] has deasserted the transition from normal to non-critical state. (Mezz Exp 1 Temp)

This message is for the use case when an implementation has detected that a Sensor has deasserted a transition to non-critical from normal.

May also be shown as 810701012c01ffff or 0x810701012c01ffff

Severity Info Serviceable No Automatically notify support No Alert Category Warning - Temperature SNMP Trap ID 12 CIM Information Prefix: PLAT ID: 0521 User Response

No action; information only.

# 81070101-2c02ffff : Sensor [SensorElementName] has deasserted the transition from normal to non-critical state. (Mezz Exp 2 Temp)

This message is for the use case when an implementation has detected that a Sensor has deasserted a transition to non-critical from normal.

May also be shown as 810701012c02ffff or 0x810701012c02ffff

Severity Info Serviceable No Automatically notify support No Alert Category Warning - Temperature SNMP Trap ID 12 CIM Information Prefix: PLAT ID: 0521

User Response No action; information only.

## 8107010d-3030ffff : Sensor [SensorElementName] has deasserted the transition from normal to non-critical state. (ROMB Volume)

This message is for the use case when an implementation has detected that a Sensor has deasserted a transition to non-critical from normal.

May also be shown as 8107010d3030ffff or 0x8107010d3030ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category

Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0521

User Response No action; information only.

 8107010f-2201ffff : Sensor [SensorElementName] has deasserted the transition from normal to non-critical state. (GPT Status)

This message is for the use case when an implementation has detected that a Sensor has deasserted a transition to non-critical from normal.

May also be shown as 8107010f2201ffff or 0x8107010f2201ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0521

## User Response

No action; information only.

### 8107010f-2582ffff : Sensor [SensorElementName] has deasserted the transition from normal to non-critical state. (I/O Resources)

This message is for the use case when an implementation has detected that a Sensor has deasserted a transition to non-critical from normal.

May also be shown as 8107010f2582ffff or 0x8107010f2582ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0521

**User Response** 

No action; information only.

• 81070112-0b01ffff : Sensor [SensorElementName] has deasserted the transition from normal to non-critical state. (RAID Warn Log)

This message is for the use case when an implementation has detected that a Sensor has deasserted a transition to non-critical from normal.

May also be shown as 810701120b01ffff or 0x810701120b01ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0521

User Response No action; information only.

• 81070114-2201ffff : Sensor [SensorElementName] has deasserted the transition from normal to non-critical state. (TPM Lock)

This message is for the use case when an implementation has detected that a Sensor has deasserted a transition to non-critical from normal.

May also be shown as 810701142201ffff or 0x810701142201ffff

Severity Info

Serviceable

No

#### Automatically notify support No

Alert Category Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0521

# User Response

No action; information only. TPM Phy Pres Set :

• 81070117-0f02ffff : Sensor [SensorElementName] has deasserted the transition from normal to non-critical state. (M5215 RAID Fault)

This message is for the use case when an implementation has detected that a Sensor has deasserted a transition to non-critical from normal.

May also be shown as 810701170f02ffff or 0x810701170f02ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0521

## User Response

No action; information only.

# • 81070128-2e01ffff : Sensor [SensorElementName] has deasserted the transition from normal to non-critical state. (ME Recovery)

This message is for the use case when an implementation has detected that a Sensor has deasserted a transition to non-critical from normal.

May also be shown as 810701282e01ffff or 0x810701282e01ffff

Severity Info Serviceable No

Automatically notify support No

**Alert Category** 

#### Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0521

#### **User Response**

No action; information only.

## 81070202-0701ffff : Sensor [SensorElementName] has transitioned to a less severe state from critical. (SysBrd Vol Fault)

This message is for the use case when an implementation has detected a Sensor transition to less severe from critical.

May also be shown as 810702020701ffff or 0x810702020701ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category Critical - Voltage

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0523

User Response No action; information only.

## 8107020d-3030ffff : Sensor [SensorElementName] has transitioned to a less severe state from critical. (ROMB Volume)

This message is for the use case when an implementation has detected a Sensor transition to less severe from critical.

May also be shown as 8107020d3030ffff or 0x8107020d3030ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Other

SNMP Trap ID 50

**CIM Information** 

Prefix: PLAT ID: 0523

# **User Response**

No action; information only.

• 8107020f-2201ffff : Sensor [SensorElementName] has transitioned to a less severe state from critical. (TXT ACM Module)

This message is for the use case when an implementation has detected a Sensor transition to less severe from critical.

May also be shown as 8107020f2201ffff or 0x8107020f2201ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0523

# User Response

No action; information only.

• 8107020f-2582ffff : Sensor [SensorElementName] has transitioned to a less severe state from critical. (I/O Resources)

This message is for the use case when an implementation has detected a Sensor transition to less severe from critical.

May also be shown as 8107020f2582ffff or 0x8107020f2582ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Other SNMP Trap ID 50 CIM Information Prefix: PLAT ID: 0523 User Response No action; information only.

# 81070212-0b02ffff : Sensor [SensorElementName] has transitioned to a less severe state from critical. (RAID Error Log)

This message is for the use case when an implementation has detected a Sensor transition to less severe from critical.

May also be shown as 810702120b02ffff or 0x810702120b02ffff

Severity Info

Serviceable No

Automatically notify support No

INO

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0523

User Response No action; information only.

 81070217-0f02ffff : Sensor [SensorElementName] has transitioned to a less severe state from critical. (M5215 RAID Batt)

This message is for the use case when an implementation has detected a Sensor transition to less severe from critical.

May also be shown as 810702170f02ffff or 0x810702170f02ffff

Severity Info Serviceable

No

Automatically notify support

No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0523

# **User Response**

No action; information only. M5215 RAID Fault :

 81070217-2c01ffff : Sensor [SensorElementName] has transitioned to a less severe state from critical. (Mezz Exp 1 Fault)

This message is for the use case when an implementation has detected a Sensor transition to less severe from critical.

May also be shown as 810702172c01ffff or 0x810702172c01ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0523

### **User Response**

No action; information only.

• 81070217-2c02ffff : Sensor [SensorElementName] has transitioned to a less severe state from critical. (Mezz Exp 2 Fault)

This message is for the use case when an implementation has detected a Sensor transition to less severe from critical.

May also be shown as 810702172c02ffff or 0x810702172c02ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0523

User Response No action; information only.

 81070219-0701ffff : Sensor [SensorElementName] has transitioned to a less severe state from critical. (Sys Board Fault)

This message is for the use case when an implementation has detected a Sensor transition to less severe from critical.

May also be shown as 810702190701ffff or 0x810702190701ffff

Severity Info

Serviceable

No

#### Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0523

User Response No action; information only.

 8107021b-0301ffff : Sensor [SensorElementName] has transitioned to a less severe state from critical. (CPU 1 QPILinkErr)

This message is for the use case when an implementation has detected a Sensor transition to less severe from critical.

May also be shown as 8107021b0301ffff or 0x8107021b0301ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0523

**User Response** 

No action; information only.

# 8107021b-0302ffff : Sensor [SensorElementName] has transitioned to a less severe state from critical. (CPU 2 QPILinkErr)

This message is for the use case when an implementation has detected a Sensor transition to less severe from critical.

May also be shown as 8107021b0302ffff or 0x8107021b0302ffff

Severity Info

Serviceable No

Automatically notify support No

**Alert Category** 

Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0523

User Response

No action; information only.

• 81070228-2e01ffff : Sensor [SensorElementName] has transitioned to a less severe state from critical. (ME Error)

This message is for the use case when an implementation has detected a Sensor transition to less severe from critical.

May also be shown as 810702282e01ffff or 0x810702282e01ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0523

**User Response** 

No action; information only. ME Flash Error :

• 81070301-0301ffff : Sensor [SensorElementName] has deasserted the transition to nonrecoverable from a less severe state. (CPU 1 Overtemp)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable from less severe has deasserted.

May also be shown as 810703010301ffff or 0x810703010301ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0 CIM Information Prefix: PLAT ID: 0525

**User Response** 

No action; information only.

## • 81070301-0302ffff : Sensor [SensorElementName] has deasserted the transition to nonrecoverable from a less severe state. (CPU 2 Overtemp)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable from less severe has deasserted.

May also be shown as 810703010302ffff or 0x810703010302ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0

CIM Information Prefix: PLAT ID: 0525

User Response

No action; information only.

## 81070301-0f02ffff : Sensor [SensorElementName] has deasserted the transition to non-recoverable from a less severe state. (M5215 RAID Temp)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable from less severe has deasserted.

May also be shown as 810703010f02ffff or 0x810703010f02ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0 CIM Information Prefix: PLAT ID: 0525 User Response No action; information only.

### 81070301-2c01ffff : Sensor [SensorElementName] has deasserted the transition to nonrecoverable from a less severe state. (Mezz Exp 1 Temp)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable from less severe has deasserted.

May also be shown as 810703012c01ffff or 0x810703012c01ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0 CIM Information Prefix: PLAT ID: 0525

User Response No action; information only.

## • 81070301-2c02ffff : Sensor [SensorElementName] has deasserted the transition to nonrecoverable from a less severe state. (Mezz Exp 2 Temp)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable from less severe has deasserted.

May also be shown as 810703012c02ffff or 0x810703012c02ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0 CIM Information Prefix: PLAT ID: 0525

## User Response

No action; information only.

#### • 8107030d-3030ffff : Sensor [SensorElementName] has deasserted the transition to nonrecoverable from a less severe state. (ROMB Volume)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable from less severe has deasserted.

May also be shown as 8107030d3030ffff or 0x8107030d3030ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0525

**User Response** 

No action; information only.

 81070601-0f02ffff : Sensor [SensorElementName] has deasserted the transition to nonrecoverable. (M5215 RAID Temp)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable has deasserted.

May also be shown as 810706010f02ffff or 0x810706010f02ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Temperature

**SNMP** Trap ID

0

CIM Information Prefix: PLAT ID: 0531

User Response No action; information only.

 81070601-2c01ffff : Sensor [SensorElementName] has deasserted the transition to nonrecoverable. (Mezz Exp 1 Temp)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable has deasserted.

May also be shown as 810706012c01ffff or 0x810706012c01ffff

Severity

Info

Serviceable

No

#### Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0531

User Response No action; information only.

 81070601-2c02ffff : Sensor [SensorElementName] has deasserted the transition to nonrecoverable. (Mezz Exp 2 Temp)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable has deasserted.

May also be shown as 810706012c02ffff or 0x810706012c02ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0531

## User Response

No action; information only.

# • 8107060f-2201ffff : Sensor [SensorElementName] has deasserted the transition to nonrecoverable. (BOFM Config Err)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable has deasserted.

May also be shown as 8107060f2201ffff or 0x8107060f2201ffff

Severity Info Serviceable

No

Automatically notify support No

**Alert Category** 

Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0531

User Response

No action; information only.

## 81070614-2201ffff : Sensor [SensorElementName] has deasserted the transition to nonrecoverable. (TPM Phy Pres Set)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable has deasserted.

May also be shown as 810706142201ffff or 0x810706142201ffff

Severity Info Serviceable No Automatically notify support No Alert Category

Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0531

User Response No action; information only.

 81070617-2c01ffff : Sensor [SensorElementName] has deasserted the transition to nonrecoverable. (Mezz Exp 1 Fault)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable has deasserted.

May also be shown as 810706172c01ffff or 0x810706172c01ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Other SNMP Trap ID 50

**CIM Information** 

Prefix: PLAT ID: 0531

#### **User Response**

No action; information only.

## 81070617-2c02ffff : Sensor [SensorElementName] has deasserted the transition to nonrecoverable. (Mezz Exp 2 Fault)

This message is for the use case when an implementation has detected that the Sensor transition to non-recoverable has deasserted.

May also be shown as 810706172c02ffff or 0x810706172c02ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0531

# User Response

No action; information only.

## • 81080017-0f01ffff : Device [LogicalDeviceElementName] has been added. (SAS BP)

This message is for the use case when an implementation has detected a Device was inserted.

May also be shown as 810800170f01ffff or 0x810800170f01ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0536

# **User Response**

No action; information only.

## • 81090112-2101ffff : Device [LogicalDeviceElementName] has been disabled. (IPMI/SNMP Accts)

This message is for the use case when an implementation has detected a Device was disabled.

May also be shown as 810901122101ffff or 0x810901122101ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0539

User Response

No action; information only.

810b010c-2581ffff : Redundancy Lost for [RedundancySetElementName] has deasserted. (Backup Memory)

This message is for the use case when Redundacy Lost has deasserted.

May also be shown as 810b010c2581ffff or 0x810b010c2581ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0803 User Response No action; information only.

• 810b030c-2581ffff : Non-redundant:Sufficient Resources from Redundancy Degraded or Fully Redundant for [RedundancySetElementName] has deasserted. (Backup Memory)

This message is for the use case when a Redundancy Set has transitioned from Non-redundant:Sufficient Resources.

May also be shown as 810b030c2581ffff or 0x810b030c2581ffff

Severity Info Serviceable No

# Automatically notify support

No

Alert Category Warning - Memory

#### SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0807

User Response No action; information only.

# • 810b050c-2581ffff : Non-redundant:Insufficient Resources for [RedundancySetElementName] has deasserted. (Backup Memory)

This message is for the use case when a Redundancy Set has transitioned from Non-redundant: Insufficient Resources.

May also be shown as 810b050c2581ffff or 0x810b050c2581ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID

41

•

CIM Information Prefix: PLAT ID: 0811

User Response

No action; information only.

# 816f0007-0301ffff : [ProcessorElementName] has Recovered from IERR. (CPU 1)

This message is for the use case when an implementation has detected a Processor Recovered - IERR Condition.

May also be shown as 816f00070301ffff or 0x816f00070301ffff

Severity Info Serviceable No Automatically notify support

No

Alert Category Critical - CPU

**SNMP** Trap ID

40

# CIM Information Prefix: PLAT ID: 0043

# **User Response**

No action; information only.

# • 816f0007-0302ffff : [ProcessorElementName] has Recovered from IERR. (CPU 2)

This message is for the use case when an implementation has detected a Processor Recovered - IERR Condition.

May also be shown as 816f00070302ffff or 0x816f00070302ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0043

# **User Response**

No action; information only.

# • 816f0007-2584ffff : [ProcessorElementName] has Recovered from IERR. (All CPUs)

This message is for the use case when an implementation has detected a Processor Recovered - IERR Condition.

May also be shown as 816f00072584ffff or 0x816f00072584ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - CPU SNMP Trap ID 40 CIM Information

Prefix: PLAT ID: 0043

# User Response

No action; information only. One of CPUs :

# • 816f0009-0701ffff : [PowerSupplyElementName] has been turned on. (Host Power)

This message is for the use case when an implementation has detected a Power Unit that has been Enabled.

May also be shown as 816f00090701ffff or 0x816f00090701ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Power On

SNMP Trap ID 24

CIM Information Prefix: PLAT ID: 0107

User Response No action; information only.

# • 816f000d-0400ffff : The [StorageVolumeElementName] has been removed from unit [PhysicalPackageElementName]. (Drive 0)

This message is for the use case when an implementation has detected a Drive has been Removed.

May also be shown as 816f000d0400ffff or 0x816f000d0400ffff

Severity Error

Serviceable

Yes

Automatically notify support

No

Alert Category Critical - Hard Disk drive

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0163

## **User Response**

- 1. Reseat hard disk drive n.(n = hard disk drive number). Wait 1 minute or more before reinstalling the drive.
- 2. Make sure that the disk firmware and RAID controller and backplane firmware are at the latest level.
- 3. Check the SAS cable.
- 4. Replace the hard disk drive.

# • 816f000d-0401ffff : The [StorageVolumeElementName] has been removed from unit [PhysicalPackageElementName]. (Drive 1)

This message is for the use case when an implementation has detected a Drive has been Removed.

May also be shown as 816f000d0401ffff or 0x816f000d0401ffff

## Severity

Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID

5

# CIM Information Prefix: PLAT ID: 0163

# **User Response**

- 1. Reseat hard disk drive n.(n = hard disk drive number). Wait 1 minute or more before reinstalling the drive.
- 2. Make sure that the disk firmware and RAID controller and backplane firmware are at the latest level.
- 3. Check the SAS cable.
- 4. Replace the hard disk drive.
- 816f000d-0402ffff : The [StorageVolumeElementName] has been removed from unit [PhysicalPackageElementName]. (Drive 2)

This message is for the use case when an implementation has detected a Drive has been Removed.

May also be shown as 816f000d0402ffff or 0x816f000d0402ffff

Severity

Error

Serviceable

Yes

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID

5

CIM Information Prefix: PLAT ID: 0163

# **User Response**

1. Reseat hard disk drive n.(n = hard disk drive number). Wait 1 minute or more before reinstalling the drive.

- 2. Make sure that the disk firmware and RAID controller and backplane firmware are at the latest level.
- 3. Check the SAS cable.
- 4. Replace the hard disk drive.

# 816f000d-0403ffff : The [StorageVolumeElementName] has been removed from unit [PhysicalPackageElementName]. (Drive 3)

This message is for the use case when an implementation has detected a Drive has been Removed.

May also be shown as 816f000d0403ffff or 0x816f000d0403ffff

Severity Error Serviceable

Yes

Automatically notify support No

Alert Category Critical - Hard Disk drive

**SNMP Trap ID** 5

**CIM Information** Prefix: PLAT ID: 0163

## **User Response**

- 1. Reseat hard disk drive n.(n = hard disk drive number). Wait 1 minute or more before reinstalling the drive.
- 2. Make sure that the disk firmware and RAID controller and backplane firmware are at the latest level.
- 3. Check the SAS cable.
- 4. Replace the hard disk drive.
- 816f000d-0404ffff : The [StorageVolumeElementName] has been removed from unit [PhysicalPackageElementName]. (Drive 4)

This message is for the use case when an implementation has detected a Drive has been Removed.

May also be shown as 816f000d0404ffff or 0x816f000d0404ffff

Severity Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Hard Disk drive

**SNMP** Trap ID

5

**CIM Information** 

# Prefix: PLAT ID: 0163

## **User Response**

- 1. Reseat hard disk drive n.(n = hard disk drive number). Wait 1 minute or more before reinstalling the drive.
- 2. Make sure that the disk firmware and RAID controller and backplane firmware are at the latest level.
- 3. Check the SAS cable.
- 4. Replace the hard disk drive.

# • 816f000d-0405ffff : The [StorageVolumeElementName] has been removed from unit [PhysicalPackageElementName]. (Drive 5)

This message is for the use case when an implementation has detected a Drive has been Removed.

May also be shown as 816f000d0405ffff or 0x816f000d0405ffff

Severity Error Serviceable Yes

Automatically notify support

No

Alert Category

Critical - Hard Disk drive

# SNMP Trap ID

5

# **CIM Information**

Prefix: PLAT ID: 0163

## **User Response**

- 1. Reseat hard disk drive n.(n = hard disk drive number). Wait 1 minute or more before reinstalling the drive.
- 2. Make sure that the disk firmware and RAID controller and backplane firmware are at the latest level.
- 3. Check the SAS cable.
- 4. Replace the hard disk drive.
- 816f000d-0406ffff : The [StorageVolumeElementName] has been removed from unit [PhysicalPackageElementName]. (Drive 6)

This message is for the use case when an implementation has detected a Drive has been Removed.

May also be shown as 816f000d0406ffff or 0x816f000d0406ffff

Severity Error Serviceable Yes

# Automatically notify support

No

#### **Alert Category**

Critical - Hard Disk drive

SNMP Trap ID

5

CIM Information

Prefix: PLAT ID: 0163

#### User Response

- 1. Reseat hard disk drive n.(n = hard disk drive number). Wait 1 minute or more before reinstalling the drive.
- 2. Make sure that the disk firmware and RAID controller and backplane firmware are at the latest level.
- 3. Check the SAS cable.
- 4. Replace the hard disk drive.

## • 816f000d-0407ffff : The [StorageVolumeElementName] has been removed from unit [PhysicalPackageElementName]. (Drive 7)

This message is for the use case when an implementation has detected a Drive has been Removed.

May also be shown as 816f000d0407ffff or 0x816f000d0407ffff

Severity

Error

Serviceable Yes

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0163

#### **User Response**

- 1. Reseat hard disk drive n.(n = hard disk drive number). Wait 1 minute or more before reinstalling the drive.
- 2. Make sure that the disk firmware and RAID controller and backplane firmware are at the latest level.
- 3. Check the SAS cable.
- 4. Replace the hard disk drive.
- 816f000f-2201ffff : The System [ComputerSystemElementName] has detected a POST Error deassertion. (ABR Status)

This message is for the use case when an implementation has detected that Post Error has deasserted.

May also be shown as 816f000f2201ffff or 0x816f000f2201ffff

Severity

Info

Serviceable No

Automatically notify support

No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0185

User Response No action; information only. Firmware Error : Sys Boot Status :

#### 816f0013-1701ffff : System [ComputerSystemElementName] has recovered from a diagnostic interrupt. (NMI State)

This message is for the use case when an implementation has detected a recovery from a Front Panel NMI / Diagnostic Interrupt

May also be shown as 816f00131701ffff or 0x816f00131701ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0223

User Response No action; information only.

### • 816f0021-2201ffff : Fault condition removed on slot [PhysicalConnectorElementName] on system [ComputerSystemElementName]. (No Op ROM Space)

This message is for the use case when an implementation has detected a Fault condition in a slot has been removed.

May also be shown as 816f00212201ffff or 0x816f00212201ffff

Severity Info Serviceable No Automatically notify support

No

#### Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0331

#### User Response

No action; information only.

• 816f0021-2582ffff : Fault condition removed on slot [PhysicalConnectorElementName] on system [ComputerSystemElementName]. (PCIe Error)

This message is for the use case when an implementation has detected a Fault condition in a slot has been removed.

May also be shown as 816f00212582ffff or 0x816f00212582ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0331

User Response No action; information only.

• 816f0028-2101ffff : Sensor [SensorElementName] has returned to normal on management system [ComputerSystemElementName]. (TPM Cmd Failures)

This message is for the use case when an implementation has detected a Sensor returned from degraded/ unavailable/failure.

May also be shown as 816f00282101ffff or 0x816f00282101ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Warning - Other

SNMP Trap ID 60

### CIM Information Prefix: PLAT ID: 0399

User Response

No action; information only.

# • 816f0107-0301ffff : An Over-Temperature Condition has been removed on [ProcessorElementName]. (CPU 1)

This message is for the use case when an implementation has detected a Over-Temperature Condition has been Removed for Processor.

May also be shown as 816f01070301ffff or 0x816f01070301ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0 CIM Information Prefix: PLAT ID: 0037 User Response No action; information only.

# • 816f0107-0302ffff : An Over-Temperature Condition has been removed on [ProcessorElementName]. (CPU 2)

This message is for the use case when an implementation has detected a Over-Temperature Condition has been Removed for Processor.

May also be shown as 816f01070302ffff or 0x816f01070302ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0 CIM Information Prefix: PLAT ID: 0037

User Response No action; information only.

### • 816f0107-2584ffff : An Over-Temperature Condition has been removed on [ProcessorElementName]. (All CPUs)

This message is for the use case when an implementation has detected a Over-Temperature Condition has been Removed for Processor.

May also be shown as 816f01072584ffff or 0x816f01072584ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0 CIM Information

Prefix: PLAT ID: 0037

#### User Response

No action; information only. One of CPUs :

 816f010c-2001ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 1)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2001ffff or 0x816f010c2001ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

#### User Response

No action; information only.

 816f010c-2002ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 2)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2002ffff or 0x816f010c2002ffff

Severity

Info

Serviceable

No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41 CIM Information

Prefix: PLAT ID: 0139

**User Response** 

No action; information only.

• 816f010c-2003ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 3)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2003ffff or 0x816f010c2003ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

User Response No action; information only.

• 816f010c-2004ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 4)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2004ffff or 0x816f010c2004ffff

Severity

Info

### Serviceable

No

#### Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

User Response No action; information only.

 816f010c-2005ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 5)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2005ffff or 0x816f010c2005ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

#### User Response

No action; information only.

## • 816f010c-2006ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 6)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2006ffff or 0x816f010c2006ffff

Severity Info Serviceable

No

Automatically notify support No

**Alert Category** 

#### Critical - Memory

#### SNMP Trap ID 41

41

### CIM Information Prefix: PLAT ID: 0139

#### **User Response**

No action; information only.

#### 816f010c-2007ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 7)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2007ffff or 0x816f010c2007ffff

Severity Info Serviceable No Automatically notify support No

Alert Category Critical - Memory

**SNMP Trap ID** 41

CIM Information Prefix: PLAT ID: 0139

User Response No action; information only.

#### 816f010c-2008ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 8)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2008ffff or 0x816f010c2008ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID

41

**CIM Information** 

Prefix: PLAT ID: 0139

#### **User Response**

No action; information only.

• 816f010c-2009ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 9)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2009ffff or 0x816f010c2009ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

### User Response

No action; information only.

• 816f010c-200affff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 10)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c200affff or 0x816f010c200affff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0139 User Response No action; information only.  816f010c-200bffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 11)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c200bffff or 0x816f010c200bffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

Ontioal Mente

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0139

User Response No action; information only.

 816f010c-200cffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 12)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c200cffff or 0x816f010c200cffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

**User Response** 

No action; information only.

 816f010c-200dffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 13)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c200dffff or 0x816f010c200dffff

Severity

Info

Serviceable No

Automatically notify support

Alert Category Critical - Memory

SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0139

#### **User Response**

No action; information only.

• 816f010c-200effff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 14)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c200effff or 0x816f010c200effff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

User Response No action; information only.

• 816f010c-200fffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 15)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c200fffff or 0x816f010c200fffff

Severity Info

Serviceable

No

#### Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

User Response No action; information only.

 816f010c-2010ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 16)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2010ffff or 0x816f010c2010ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

**User Response** 

No action; information only.

#### 816f010c-2011ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 17)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2011ffff or 0x816f010c2011ffff

Severity Info

Serviceable No

Automatically notify support No

**Alert Category** 

Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

User Response

No action; information only.

 816f010c-2012ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 18)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2012ffff or 0x816f010c2012ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

User Response No action; information only.

 816f010c-2013ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 19)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2013ffff or 0x816f010c2013ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory

SNMP Trap ID 41

**CIM Information** 

Prefix: PLAT ID: 0139

#### **User Response**

No action; information only.

• 816f010c-2014ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 20)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2014ffff or 0x816f010c2014ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

### User Response

No action; information only.

 816f010c-2015ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 21)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2015ffff or 0x816f010c2015ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0139 User Response No action; information only.

#### 816f010c-2016ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 22)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2016ffff or 0x816f010c2016ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category

Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

User Response

No action; information only.

 816f010c-2017ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 23)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2017ffff or 0x816f010c2017ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

#### User Response

No action; information only.

• 816f010c-2018ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 24)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2018ffff or 0x816f010c2018ffff

Severity

Info

Serviceable

No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0139

User Response

No action; information only.

• 816f010c-2581ffff : Uncorrectable error recovery detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (All DIMMs)

This message is for the use case when an implementation has detected a Memory uncorrectable error recovery.

May also be shown as 816f010c2581ffff or 0x816f010c2581ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0139

#### **User Response**

No action; information only. One of the DIMMs :

#### • 816f010d-0400ffff : The [StorageVolumeElementName] has been enabled. (Drive 0)

This message is for the use case when an implementation has detected a Drive was Enabled.

May also be shown as 816f010d0400ffff or 0x816f010d0400ffff

Severity Info Serviceable No

### Automatically notify support

No

Alert Category Critical - Hard Disk drive

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0167

User Response No action; information only.

### • 816f010d-0401ffff : The [StorageVolumeElementName] has been enabled. (Drive 1)

This message is for the use case when an implementation has detected a Drive was Enabled.

May also be shown as 816f010d0401ffff or 0x816f010d0401ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0167

User Response No action; information only.

### • 816f010d-0402ffff : The [StorageVolumeElementName] has been enabled. (Drive 2)

This message is for the use case when an implementation has detected a Drive was Enabled.

May also be shown as 816f010d0402ffff or 0x816f010d0402ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Hard Disk drive

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0167 **User Response** 

No action; information only.

#### • 816f010d-0403ffff : The [StorageVolumeElementName] has been enabled. (Drive 3)

This message is for the use case when an implementation has detected a Drive was Enabled.

May also be shown as 816f010d0403ffff or 0x816f010d0403ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0167

User Response No action; information only.

#### 816f010d-0404ffff : The [StorageVolumeElementName] has been enabled. (Drive 4)

This message is for the use case when an implementation has detected a Drive was Enabled.

May also be shown as 816f010d0404ffff or 0x816f010d0404ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Hard Disk drive SNMP Trap ID

5

CIM Information Prefix: PLAT ID: 0167

User Response No action; information only.

#### 816f010d-0405ffff : The [StorageVolumeElementName] has been enabled. (Drive 5)

This message is for the use case when an implementation has detected a Drive was Enabled.

May also be shown as 816f010d0405ffff or 0x816f010d0405ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0167

User Response

No action; information only.

### • 816f010d-0406ffff : The [StorageVolumeElementName] has been enabled. (Drive 6)

This message is for the use case when an implementation has detected a Drive was Enabled.

May also be shown as 816f010d0406ffff or 0x816f010d0406ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0167

User Response

No action; information only.

### • 816f010d-0407ffff : The [StorageVolumeElementName] has been enabled. (Drive 7)

This message is for the use case when an implementation has detected a Drive was Enabled.

May also be shown as 816f010d0407ffff or 0x816f010d0407ffff

Severity Info

**Serviceable** No

Automatically notify support No

Alert Category Critical - Hard Disk drive

### SNMP Trap ID

5

CIM Information Prefix: PLAT ID: 0167

### User Response

No action; information only.

• 816f010f-2201ffff : The System [ComputerSystemElementName] has recovered from a firmware hang. (Firmware Error)

This message is for the use case when an implementation has recovered from a System Firmware Hang.

May also be shown as 816f010f2201ffff or 0x816f010f2201ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Other

SNMP Trap ID

50

CIM Information Prefix: PLAT ID: 0187

User Response No action; information only.

### • 816f0125-1f05ffff : [ManagedElementName] detected as present. (LOM)

This message is for the use case when an implementation has detected a Managed Element is now Present.

May also be shown as 816f01251f05ffff or 0x816f01251f05ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0390

User Response No action; information only.

#### • 816f0207-0301ffff : [ProcessorElementName] has Recovered from FRB1/BIST condition. (CPU 1)

This message is for the use case when an implementation has detected a Processor Recovered - FRB1/ BIST condition.

May also be shown as 816f02070301ffff or 0x816f02070301ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0045

User Response No action; information only.

#### • 816f0207-0302ffff : [ProcessorElementName] has Recovered from FRB1/BIST condition. (CPU 2)

This message is for the use case when an implementation has detected a Processor Recovered - FRB1/ BIST condition.

May also be shown as 816f02070302ffff or 0x816f02070302ffff

Severity Info

Serviceable No

Automatically notify support

No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0045

User Response No action; information only.

#### • 816f0207-2584ffff : [ProcessorElementName] has Recovered from FRB1/BIST condition. (All CPUs)

This message is for the use case when an implementation has detected a Processor Recovered - FRB1/ BIST condition.

May also be shown as 816f02072584ffff or 0x816f02072584ffff

Severity

Info

Serviceable No

Automatically notify support

No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0045

**User Response** 

No action; information only. One of CPUs :

• 816f020d-0400ffff : Failure no longer Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 0)

This message is for the use case when an implementation has detected an Array Failure is no longer Predicted.

May also be shown as 816f020d0400ffff or 0x816f020d0400ffff

Severity Info Serviceable No Automatically notify support No

Alert Category System - Predicted Failure

SNMP Trap ID 27

CIM Information Prefix: PLAT ID: 0169

User Response No action; information only.

• 816f020d-0401ffff : Failure no longer Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 1)

This message is for the use case when an implementation has detected an Array Failure is no longer Predicted.

May also be shown as 816f020d0401ffff or 0x816f020d0401ffff

Severity Info Serviceable No

Automatically notify support

No

Alert Category System - Predicted Failure

SNMP Trap ID 27

CIM Information Prefix: PLAT ID: 0169

User Response

No action; information only.

• 816f020d-0402ffff : Failure no longer Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 2)

This message is for the use case when an implementation has detected an Array Failure is no longer Predicted.

May also be shown as 816f020d0402ffff or 0x816f020d0402ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category System - Predicted Failure

SNMP Trap ID 27

CIM Information Prefix: PLAT ID: 0169

User Response No action; information only.

• 816f020d-0403ffff : Failure no longer Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 3)

This message is for the use case when an implementation has detected an Array Failure is no longer Predicted.

May also be shown as 816f020d0403ffff or 0x816f020d0403ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Predicted Failure

**SNMP** Trap ID

27

CIM Information Prefix: PLAT ID: 0169

User Response

No action; information only.

## • 816f020d-0404ffff : Failure no longer Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 4)

This message is for the use case when an implementation has detected an Array Failure is no longer Predicted.

May also be shown as 816f020d0404ffff or 0x816f020d0404ffff

Severity Info Serviceable No Automatically notify support

No

Alert Category System - Predicted Failure

SNMP Trap ID 27

CIM Information Prefix: PLAT ID: 0169

User Response No action; information only.

## • 816f020d-0405ffff : Failure no longer Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 5)

This message is for the use case when an implementation has detected an Array Failure is no longer Predicted.

May also be shown as 816f020d0405ffff or 0x816f020d0405ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Predicted Failure SNMP Trap ID 27 CIM Information Prefix: PLAT ID: 0169

**User Response** 

No action; information only.

## • 816f020d-0406ffff : Failure no longer Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 6)

This message is for the use case when an implementation has detected an Array Failure is no longer Predicted.

May also be shown as 816f020d0406ffff or 0x816f020d0406ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Predicted Failure

SNMP Trap ID

27

CIM Information Prefix: PLAT ID: 0169

User Response No action; information only.

## • 816f020d-0407ffff : Failure no longer Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 7)

This message is for the use case when an implementation has detected an Array Failure is no longer Predicted.

May also be shown as 816f020d0407ffff or 0x816f020d0407ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Predicted Failure

SNMP Trap ID 27

CIM Information Prefix: PLAT ID: 0169

User Response No action; information only.

### • 816f0225-0f02ffff : [ManagedElementName] has been enabled. (M5215 RAID Card)

This message is for the use case when an implementation has detected a Managed Element was Enabled.

May also be shown as 816f02250f02ffff or 0x816f02250f02ffff

**Severity** Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0395

User Response No action; information only.

### 816f030c-2001ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 1)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2001ffff or 0x816f030c2001ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0137 User Response No action; information only. 816f030c-2002ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem

[MemoryElementName] has recovered. (DIMM 2)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2002ffff or 0x816f030c2002ffff

Severity Info Serviceable No

•

### Automatically notify support

No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

# • 816f030c-2003ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 3)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2003ffff or 0x816f030c2003ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

# • 816f030c-2004ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 4)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2004ffff or 0x816f030c2004ffff

Severity Info Serviceable

No

Automatically notify support

No

Alert Category Critical - Memory

SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

## • 816f030c-2005ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 5)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2005ffff or 0x816f030c2005ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0137 User Response No action; information only.

## • 816f030c-2006ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 6)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2006ffff or 0x816f030c2006ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID

41 CIM Information Prefix: PLAT ID: 0137

User Response

No action; information only.

# • 816f030c-2007ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 7)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2007ffff or 0x816f030c2007ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

#### User Response

No action; information only.

## • 816f030c-2008ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 8)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2008ffff or 0x816f030c2008ffff

**Severity** Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

### • 816f030c-2009ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 9)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2009ffff or 0x816f030c2009ffff

Severity Info

Serviceable

No

#### Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

### • 816f030c-200affff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 10)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c200affff or 0x816f030c200affff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

# • 816f030c-200bffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 11)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c200bffff or 0x816f030c200bffff

Severity Info Serviceable No Automatically notify support No Alert Category

Critical - Memory

**SNMP** Trap ID

41

### CIM Information Prefix: PLAT ID: 0137

### User Response

No action; information only.

# • 816f030c-200cffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 12)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c200cffff or 0x816f030c200cffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

### **User Response**

No action; information only.

• 816f030c-200dffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 13)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c200dffff or 0x816f030c200dffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

## • 816f030c-200effff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 14)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c200effff or 0x816f030c200effff

Severity Info Serviceable No Automatically notify support

No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

## • 816f030c-200fffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 15)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c200fffff or 0x816f030c200fffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

• 816f030c-2010ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 16)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2010ffff or 0x816f030c2010ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

### • 816f030c-2011ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 17)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2011ffff or 0x816f030c2011ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

## 816f030c-2012ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 18)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2012ffff or 0x816f030c2012ffff

Severity Info Serviceable No Automatically notify support No Alert Category

#### Critical - Memory

#### SNMP Trap ID 41

41

#### CIM Information Prefix: PLAT ID: 0137

#### **User Response**

No action; information only.

# • 816f030c-2013ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 19)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2013ffff or 0x816f030c2013ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

# • 816f030c-2014ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 20)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2014ffff or 0x816f030c2014ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0137 User Response No action; information only.

## • 816f030c-2015ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 21)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2015ffff or 0x816f030c2015ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0137

User Response

No action; information only.

 816f030c-2016ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 22)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2016ffff or 0x816f030c2016ffff

Severity Info

Serviceable No

Automatically notify support

No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

#### User Response

No action; information only.

### • 816f030c-2017ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 23)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2017ffff or 0x816f030c2017ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

User Response No action; information only.

# • 816f030c-2018ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (DIMM 24)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2018ffff or 0x816f030c2018ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0137 User Response No action; information only.

# • 816f030c-2581ffff : Scrub Failure for [PhysicalMemoryElementName] on Subsystem [MemoryElementName] has recovered. (All DIMMs)

This message is for the use case when an implementation has detected a Memory Scrub failure recovery.

May also be shown as 816f030c2581ffff or 0x816f030c2581ffff

Severity Info Serviceable No Automatically notify support No

#### Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0137

# User Response

No action; information only. One of the DIMMs :

# • 816f030d-0400ffff : Hot spare disabled for [ComputerSystemElementName]. (Drive 0)

This message is for the use case when an implementation has detected a Hot Spare has been Disabled.

May also be shown as 816f030d0400ffff or 0x816f030d0400ffff

Severity Info

Serviceable No

Automatically notify support

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0171

#### User Response No action; information only.

# • 816f030d-0401ffff : Hot spare disabled for [ComputerSystemElementName]. (Drive 1)

This message is for the use case when an implementation has detected a Hot Spare has been Disabled.

May also be shown as 816f030d0401ffff or 0x816f030d0401ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other SNMP Trap ID

CIM Information Prefix: PLAT ID: 0171

User Response No action; information only.

### • 816f030d-0402ffff : Hot spare disabled for [ComputerSystemElementName]. (Drive 2)

This message is for the use case when an implementation has detected a Hot Spare has been Disabled.

May also be shown as 816f030d0402ffff or 0x816f030d0402ffff

Severity Info Serviceable No Automatically notify support No Alert Category

System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0171

User Response No action; information only.

## • 816f030d-0403ffff : Hot spare disabled for [ComputerSystemElementName]. (Drive 3)

This message is for the use case when an implementation has detected a Hot Spare has been Disabled.

May also be shown as 816f030d0403ffff or 0x816f030d0403ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0171

User Response No action; information only.

## • 816f030d-0404ffff : Hot spare disabled for [ComputerSystemElementName]. (Drive 4)

This message is for the use case when an implementation has detected a Hot Spare has been Disabled.

May also be shown as 816f030d0404ffff or 0x816f030d0404ffff

Severity Info Serviceable No

# Automatically notify support

No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0171

User Response No action; information only.

# • 816f030d-0405ffff : Hot spare disabled for [ComputerSystemElementName]. (Drive 5)

This message is for the use case when an implementation has detected a Hot Spare has been Disabled.

May also be shown as 816f030d0405ffff or 0x816f030d0405ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0171

User Response No action; information only.

# • 816f030d-0406ffff : Hot spare disabled for [ComputerSystemElementName]. (Drive 6)

This message is for the use case when an implementation has detected a Hot Spare has been Disabled.

May also be shown as 816f030d0406ffff or 0x816f030d0406ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0171

#### **User Response**

No action; information only.

#### • 816f030d-0407ffff : Hot spare disabled for [ComputerSystemElementName]. (Drive 7)

This message is for the use case when an implementation has detected a Hot Spare has been Disabled.

May also be shown as 816f030d0407ffff or 0x816f030d0407ffff

Severity Info Serviceable No Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0171

User Response No action; information only.

 816f0313-1701ffff : System [ComputerSystemElementName] has recovered from an NMI. (NMI State)

This message is for the use case when an implementation has detected a Software NMI has been Recovered from.

May also be shown as 816f03131701ffff or 0x816f03131701ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0230

User Response

No action; information only.

• 816f040c-2001ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 1)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2001ffff or 0x816f040c2001ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0130

User Response

No action; information only.

# • 816f040c-2002ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 2)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2002ffff or 0x816f040c2002ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-2003ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 3)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2003ffff or 0x816f040c2003ffff

Severity Info

Serviceable No Automatically notify support No

Alert Category System - Other

### **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-2004ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 4)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2004ffff or 0x816f040c2004ffff

Severity Info Serviceable No Automatically notify support No

Alert Category System - Other

### SNMP Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-2005ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 5)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2005ffff or 0x816f040c2005ffff

Severity Info Serviceable No

Automatically notify support

No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-2006ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 6)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2006ffff or 0x816f040c2006ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0130

# User Response

No action; information only.

# • 816f040c-2007ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 7)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2007ffff or 0x816f040c2007ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

• 816f040c-2008ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 8)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2008ffff or 0x816f040c2008ffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response

No action; information only.

# • 816f040c-2009ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 9)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2009ffff or 0x816f040c2009ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-200affff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 10)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c200affff or 0x816f040c200affff

Severity Info

Serviceable

No

#### Automatically notify support No

Alert Category System - Other

#### **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-200bffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 11)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c200bffff or 0x816f040c200bffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-200cffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 12)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c200cffff or 0x816f040c200cffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

# CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-200dffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 13)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c200dffff or 0x816f040c200dffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# 816f040c-200effff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 14)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c200effff or 0x816f040c200effff

Severity Info Serviceable No Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

### 816f040c-200fffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 15)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c200fffff or 0x816f040c200fffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-2010ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 16)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2010ffff or 0x816f040c2010ffff

Severity Info

Serviceable No

Automatically notify support

No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

• 816f040c-2011ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 17)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2011ffff or 0x816f040c2011ffff

Severity

Info

Serviceable No

Automatically notify support

No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-2012ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 18)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2012ffff or 0x816f040c2012ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-2013ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 19)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2013ffff or 0x816f040c2013ffff

Severity Info Serviceable No Automatically notify support No Alert Category

#### System - Other

### **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

#### 816f040c-2014ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 20)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2014ffff or 0x816f040c2014ffff

Severity Info

Serviceable No

Automatically notify support

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-2015ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 21)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2015ffff or 0x816f040c2015ffff

Severity Info Serviceable No Automatically notify support No Alert Category

System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0130

**User Response** 

No action; information only.

# • 816f040c-2016ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 22)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2016ffff or 0x816f040c2016ffff

Severity Info Serviceable No Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

 816f040c-2017ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 23)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2017ffff or 0x816f040c2017ffff

Severity Info

Serviceable

No

Automatically notify support

No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

### 816f040c-2018ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (DIMM 24)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2018ffff or 0x816f040c2018ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0130

User Response No action; information only.

# • 816f040c-2581ffff : [PhysicalMemoryElementName] Enabled on Subsystem [MemoryElementName]. (All DIMMs)

This message is for the use case when an implementation has detected that Memory has been Enabled.

May also be shown as 816f040c2581ffff or 0x816f040c2581ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0130

#### User Response

No action; information only. One of the DIMMs :

### • 816f0413-2582ffff : A PCI PERR recovery has occurred on system [ComputerSystemElementName]. (All PCI Error)

This message is for the use case when an implementation has detected a PCI PERR recovered.

May also be shown as 816f04132582ffff or 0x816f04132582ffff

Severity Info Serviceable No

Automatically notify support No

### Alert Category

Critical - Other

# SNMP Trap ID

50

CIM Information Prefix: PLAT ID: 0233

# User Response

No action; information only. One of PCI Error : PCIs :

# 816f0507-0301ffff : [ProcessorElementName] has Recovered from a Configuration Mismatch. (CPU 1)

This message is for the use case when an implementation has Recovered from a Processor Configuration Mismatch.

May also be shown as 816f05070301ffff or 0x816f05070301ffff

**Severity** Info

Serviceable No

Automatically notify support No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0063

User Response No action; information only.

# 816f0507-0302ffff : [ProcessorElementName] has Recovered from a Configuration Mismatch. (CPU 2)

This message is for the use case when an implementation has Recovered from a Processor Configuration Mismatch.

May also be shown as 816f05070302ffff or 0x816f05070302ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - CPU

SNMP Trap ID 40 CIM Information Prefix: PLAT ID: 0063

#### User Response

No action; information only.

816f0507-2584ffff : [ProcessorElementName] has Recovered from a Configuration Mismatch. (All CPUs)

This message is for the use case when an implementation has Recovered from a Processor Configuration Mismatch.

May also be shown as 816f05072584ffff or 0x816f05072584ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0063

#### **User Response**

No action; information only. One of CPUs :

### 816f050c-2001ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 1)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2001ffff or 0x816f050c2001ffff

Severity Info

Serviceable No

Automatically notify support No Alert Category

Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

User Response

No action; information only.

#### 816f050c-2002ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 2)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2002ffff or 0x816f050c2002ffff

Severity Info Serviceable No Automatically notify support No Alert Category Warning - Memory SNMP Trap ID 43 CIM Information Prefix: PLAT ID: 0145 User Response No action; information only. 816f050c-2003ffff : Memory Logging Lii

## 816f050c-2003ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 3)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2003ffff or 0x816f050c2003ffff

Serviceable No Automatically notify support No Alert Category Warning - Memory SNMP Trap ID

43

Severity Info

CIM Information Prefix: PLAT ID: 0145

**User Response** 

No action; information only.

#### 816f050c-2004ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 4)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2004ffff or 0x816f050c2004ffff

Severity

Info

Serviceable No

Automatically notify support

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

#### **User Response**

No action; information only.

• 816f050c-2005ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 5)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2005ffff or 0x816f050c2005ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

User Response No action; information only.

# • 816f050c-2006ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 6)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2006ffff or 0x816f050c2006ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

User Response No action; information only.

 816f050c-2007ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 7)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2007ffff or 0x816f050c2007ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

User Response

No action; information only.

# • 816f050c-2008ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 8)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2008ffff or 0x816f050c2008ffff

Severity Info Serviceable

No

Automatically notify support No

**Alert Category** 

Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

User Response No action; information only.

• 816f050c-2009ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 9)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2009ffff or 0x816f050c2009ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category Warning - Memory

**SNMP Trap ID** 43

CIM Information Prefix: PLAT ID: 0145

User Response No action; information only.

 816f050c-200affff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 10)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c200affff or 0x816f050c200affff

Severity Info Serviceable No Automatically notify support No Alert Category Warning - Memory

SNMP Trap ID 43

**CIM Information** 

Prefix: PLAT ID: 0145

User Response

No action; information only.

• 816f050c-200bffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 11)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c200bffff or 0x816f050c200bffff

Severity Info Serviceable No Automatically notify support No

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

User Response

No action; information only.

 816f050c-200cffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 12)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c200cffff or 0x816f050c200cffff

Severity Info Serviceable No Automatically notify support No Alert Category Warning - Memory SNMP Trap ID 43 CIM Information Prefix: PLAT ID: 0145 User Response No action; information only.

#### 816f050c-200dffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 13)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c200dffff or 0x816f050c200dffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category

Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

User Response No action; information only.

# • 816f050c-200effff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 14)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c200effff or 0x816f050c200effff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

### User Response

No action; information only.

# • 816f050c-200fffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 15)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c200fffff or 0x816f050c200fffff

Severity Info Serviceable No Automatically notify support No

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

**User Response** 

No action; information only.

• 816f050c-2010ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 16)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2010ffff or 0x816f050c2010ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

User Response No action; information only.

 816f050c-2011ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 17)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2011ffff or 0x816f050c2011ffff

Severity

Info

Serviceable

No

#### Automatically notify support No

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

User Response No action; information only.

#### 816f050c-2012ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 18)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2012ffff or 0x816f050c2012ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

#### User Response

No action; information only.

# • 816f050c-2013ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 19)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2013ffff or 0x816f050c2013ffff

Severity Info Serviceable No

Automatically notify support No

**Alert Category** 

#### Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

**User Response** 

No action; information only.

### 816f050c-2014ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 20)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2014ffff or 0x816f050c2014ffff

Severity Info Serviceable No Automatically notify support No Alert Category Warning - Memory

SNMP Trap ID

43

CIM Information Prefix: PLAT ID: 0145

User Response No action; information only.

### 816f050c-2015ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 21)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2015ffff or 0x816f050c2015ffff

Severity Info Serviceable No Automatically notify support No Alert Category Warning - Memory SNMP Trap ID 43

**CIM Information** 

Prefix: PLAT ID: 0145

#### **User Response**

No action; information only.

• 816f050c-2016ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 22)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2016ffff or 0x816f050c2016ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Warning - Memory

SNMP Trap ID 43

CIM Information Prefix: PLAT ID: 0145

#### User Response No action; information only.

- 816f050c-2017ffff : Memory Logging Limit Removed for [Ph
- 816f050c-2017ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 23)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2017ffff or 0x816f050c2017ffff

Severity Info Serviceable No Automatically notify support No Alert Category Warning - Memory SNMP Trap ID 43 CIM Information Prefix: PLAT ID: 0145 User Response No action; information only.

#### 816f050c-2018ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 24)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2018ffff or 0x816f050c2018ffff

Severity Info Serviceable No Automatically notify support No Alert Category Warning - Memory SNMP Trap ID 43 CIM Information Prefix: PLAT ID: 0145 User Response No action; information only. 816f050c-2581ffff : Memory Logging Limit Removed for [PhysicalMemoryElementName] on

# Subsystem [MemoryElementName]. (All DIMMs)

This message is for the use case when an implementation has detected that the Memory Logging Limit has been Removed.

May also be shown as 816f050c2581ffff or 0x816f050c2581ffff

Info Serviceable No Automatically notify support No Alert Category Warning - Memory SNMP Trap ID

Severity

43

CIM Information Prefix: PLAT ID: 0145

#### **User Response**

No action; information only. One of the DIMMs :

#### 816f050d-0400ffff : Critical Array [ComputerSystemElementName] has deasserted. (Drive 0)

This message is for the use case when an implementation has detected that an Critiacal Array has deasserted.

May also be shown as 816f050d0400ffff or 0x816f050d0400ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0175

# User Response

No action; information only.

## • 816f050d-0401ffff : Critical Array [ComputerSystemElementName] has deasserted. (Drive 1)

This message is for the use case when an implementation has detected that an Critiacal Array has deasserted.

May also be shown as 816f050d0401ffff or 0x816f050d0401ffff

Severity Info

**Serviceable** No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0175

User Response No action; information only.

• 816f050d-0402ffff : Critical Array [ComputerSystemElementName] has deasserted. (Drive 2)

This message is for the use case when an implementation has detected that an Critiacal Array has deasserted.

May also be shown as 816f050d0402ffff or 0x816f050d0402ffff

Severity Info Serviceable No

Automatically notify support No

### Alert Category

Critical - Hard Disk drive

### **SNMP** Trap ID

5

# CIM Information

Prefix: PLAT ID: 0175

### **User Response**

No action; information only.

### • 816f050d-0403ffff : Critical Array [ComputerSystemElementName] has deasserted. (Drive 3)

This message is for the use case when an implementation has detected that an Critiacal Array has deasserted.

May also be shown as 816f050d0403ffff or 0x816f050d0403ffff

Severity Info Serviceable No Automatically notify support No Alert Category

Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0175

User Response No action; information only.

## • 816f050d-0404ffff : Critical Array [ComputerSystemElementName] has deasserted. (Drive 4)

This message is for the use case when an implementation has detected that an Critiacal Array has deasserted.

May also be shown as 816f050d0404ffff or 0x816f050d0404ffff

Severity Info Serviceable No Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5 CIM Information Prefix: PLAT ID: 0175 **User Response** 

No action; information only.

• 816f050d-0405ffff : Critical Array [ComputerSystemElementName] has deasserted. (Drive 5)

This message is for the use case when an implementation has detected that an Critiacal Array has deasserted.

May also be shown as 816f050d0405ffff or 0x816f050d0405ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0175

User Response No action; information only.

#### • 816f050d-0406ffff : Critical Array [ComputerSystemElementName] has deasserted. (Drive 6)

This message is for the use case when an implementation has detected that an Critiacal Array has deasserted.

May also be shown as 816f050d0406ffff or 0x816f050d0406ffff

Severity Info

Serviceable No

Automatically notify support

No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0175

User Response

No action; information only.

### 816f050d-0407ffff : Critical Array [ComputerSystemElementName] has deasserted. (Drive 7)

This message is for the use case when an implementation has detected that an Critiacal Array has deasserted.

May also be shown as 816f050d0407ffff or 0x816f050d0407ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Hard Disk drive SNMP Trap ID 5 CIM Information Prefix: PLAT ID: 0175

User Response No action; information only.

• 816f0607-0301ffff : An SM BIOS Uncorrectable CPU complex error for [ProcessorElementName] has deasserted. (CPU 1)

This message is for the use case when an SM BIOS Uncorrectable CPU complex error has deasserted.

May also be shown as 816f06070301ffff or 0x816f06070301ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - CPU SNMP Trap ID 40 CIM Information Prefix: PLAT ID: 0817 User Response No action; information only. 816f0607-0302ffff : An SM BIOS Uncorrectable CPU complex error for [ProcessorElementName]

has deasserted. (CPU 2)

This message is for the use case when an SM BIOS Uncorrectable CPU complex error has deasserted.

May also be shown as 816f06070302ffff or 0x816f06070302ffff

Severity Info Serviceable No

•

# Automatically notify support

No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0817

User Response No action; information only.

# • 816f0607-2584ffff : An SM BIOS Uncorrectable CPU complex error for [ProcessorElementName] has deasserted. (All CPUs)

This message is for the use case when an SM BIOS Uncorrectable CPU complex error has deasserted.

May also be shown as 816f06072584ffff or 0x816f06072584ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - CPU

SNMP Trap ID 40

CIM Information Prefix: PLAT ID: 0817

User Response No action; information only. One of CPUs :

## • 816f060d-0400ffff : Array in system [ComputerSystemElementName] has been restored. (Drive 0)

This message is for the use case when an implementation has detected that a Failed Array has been Restored.

May also be shown as 816f060d0400ffff or 0x816f060d0400ffff

Severity Info

Serviceable No

# Automatically notify support

No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

# CIM Information Prefix: PLAT ID: 0177

**User Response** 

No action; information only.

• 816f060d-0401ffff : Array in system [ComputerSystemElementName] has been restored. (Drive 1)

This message is for the use case when an implementation has detected that a Failed Array has been Restored.

May also be shown as 816f060d0401ffff or 0x816f060d0401ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0177

## User Response

No action; information only.

## • 816f060d-0402ffff : Array in system [ComputerSystemElementName] has been restored. (Drive 2)

This message is for the use case when an implementation has detected that a Failed Array has been Restored.

May also be shown as 816f060d0402ffff or 0x816f060d0402ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0177

User Response No action; information only.

• 816f060d-0403ffff : Array in system [ComputerSystemElementName] has been restored. (Drive 3)

This message is for the use case when an implementation has detected that a Failed Array has been Restored.

May also be shown as 816f060d0403ffff or 0x816f060d0403ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Hard Disk drive

**SNMP** Trap ID

5

CIM Information Prefix: PLAT ID: 0177

User Response

No action; information only.

## • 816f060d-0404ffff : Array in system [ComputerSystemElementName] has been restored. (Drive 4)

This message is for the use case when an implementation has detected that a Failed Array has been Restored.

May also be shown as 816f060d0404ffff or 0x816f060d0404ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0177

User Response No action; information only.

## • 816f060d-0405ffff : Array in system [ComputerSystemElementName] has been restored. (Drive 5)

This message is for the use case when an implementation has detected that a Failed Array has been Restored.

May also be shown as 816f060d0405ffff or 0x816f060d0405ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0177

User Response No action; information only.

## 816f060d-0406ffff : Array in system [ComputerSystemElementName] has been restored. (Drive 6)

This message is for the use case when an implementation has detected that a Failed Array has been Restored.

May also be shown as 816f060d0406ffff or 0x816f060d0406ffff

Severity Info

•

Serviceable No

Automatically notify support No

Alert Category Critical - Hard Disk drive

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0177

## **User Response**

No action; information only.

## • 816f060d-0407ffff : Array in system [ComputerSystemElementName] has been restored. (Drive 7)

This message is for the use case when an implementation has detected that a Failed Array has been Restored.

May also be shown as 816f060d0407ffff or 0x816f060d0407ffff

Severity Info Serviceable No Automatically notify support No

Alert Category Critical - Hard Disk drive

### SNMP Trap ID 5

CIM Information Prefix: PLAT ID: 0177

### User Response

No action; information only.

• 816f070c-2001ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 1)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2001ffff or 0x816f070c2001ffff

Severity Info Serviceable No Automatically notify support No Alert Category

Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

User Response

No action; information only.

• 816f070c-2002ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 2)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2002ffff or 0x816f070c2002ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127 **User Response** 

No action; information only.

• 816f070c-2003ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 3)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2003ffff or 0x816f070c2003ffff

Severity Info

Serviceable No

Automatically notify support

No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

#### **User Response**

No action; information only.

 816f070c-2004ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 4)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2004ffff or 0x816f070c2004ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID

41

CIM Information Prefix: PLAT ID: 0127

User Response No action; information only.

• 816f070c-2005ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 5)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2005ffff or 0x816f070c2005ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID

41

CIM Information Prefix: PLAT ID: 0127

#### User Response

No action; information only.

## • 816f070c-2006ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 6)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2006ffff or 0x816f070c2006ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

User Response No action; information only.

## • 816f070c-2007ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 7)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2007ffff or 0x816f070c2007ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

User Response No action; information only.

## • 816f070c-2008ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 8)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2008ffff or 0x816f070c2008ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0127

User Response No action; information only.

## • 816f070c-2009ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 9)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2009ffff or 0x816f070c2009ffff

Severity Info Serviceable No

### Automatically notify support

No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

User Response No action; information only.

## • 816f070c-200affff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 10)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c200affff or 0x816f070c200affff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

User Response No action; information only.

## • 816f070c-200bffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 11)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c200bffff or 0x816f070c200bffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

### SNMP Trap ID

41

CIM Information Prefix: PLAT ID: 0127

### **User Response**

No action; information only.

• 816f070c-200cffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 12)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c200cffff or 0x816f070c200cffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information Prefix: PLAT ID: 0127 User Response No action; information only.

• 816f070c-200dffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 13)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c200dffff or 0x816f070c200dffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41 CIM Information

Prefix: PLAT ID: 0127

**User Response** 

No action; information only.

• 816f070c-200effff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 14)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c200effff or 0x816f070c200effff

Severity Info

Serviceable No

Automatically notify support

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

#### User Response

No action; information only.

• 816f070c-200fffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 15)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c200fffff or 0x816f070c200fffff

Severity Info Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

#### User Response

No action; information only.

• 816f070c-2010ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 16)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2010ffff or 0x816f070c2010ffff

#### Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

**SNMP** Trap ID

41

CIM Information Prefix: PLAT ID: 0127

#### User Response

No action; information only.

## • 816f070c-2011ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 17)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2011ffff or 0x816f070c2011ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category

Critical - Memory

### SNMP Trap ID

41

CIM Information Prefix: PLAT ID: 0127

User Response No action; information only.

### • 816f070c-2012ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 18)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2012ffff or 0x816f070c2012ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

User Response

No action; information only.

• 816f070c-2013ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 19)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2013ffff or 0x816f070c2013ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

User Response No action; information only.

## • 816f070c-2014ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 20)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2014ffff or 0x816f070c2014ffff

Severity Info

Serviceable No

#### Automatically notify support No

Alert Category Critical - Memory

#### SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

User Response No action; information only.

## • 816f070c-2015ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 21)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2015ffff or 0x816f070c2015ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

User Response No action; information only.

## • 816f070c-2016ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 22)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2016ffff or 0x816f070c2016ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Memory

#### SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

### User Response

No action; information only.

• 816f070c-2017ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 23)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2017ffff or 0x816f070c2017ffff

Severity Info Serviceable No Automatically notify support No

Alert Category Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

User Response

No action; information only.

• 816f070c-2018ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (DIMM 24)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2018ffff or 0x816f070c2018ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Memory SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127 **User Response** 

No action; information only.

• 816f070c-2581ffff : Configuration error for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]has deasserted. (All DIMMs)

This message is for the use case when an implementation has detected a Memory DIMM configuration error has deasserted.

May also be shown as 816f070c2581ffff or 0x816f070c2581ffff

Severity Info

Serviceable

No

Automatically notify support

No

Alert Category

Critical - Memory

SNMP Trap ID 41

CIM Information Prefix: PLAT ID: 0127

#### **User Response**

No action; information only. One of the DIMMs :

816f070d-0400ffff : Rebuild completed for Array in system [ComputerSystemElementName]. (Drive 0)

This message is for the use case when an implementation has detected that an Array Rebuild has Completed.

May also be shown as 816f070d0400ffff or 0x816f070d0400ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0179

**User Response** 

No action; information only.

816f070d-0401ffff : Rebuild completed for Array in system [ComputerSystemElementName]. (Drive 1)

This message is for the use case when an implementation has detected that an Array Rebuild has Completed.

May also be shown as 816f070d0401ffff or 0x816f070d0401ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

Prefix: PLAT ID: 0179

#### User Response

No action; information only.

816f070d-0402ffff : Rebuild completed for Array in system [ComputerSystemElementName]. (Drive 2)

This message is for the use case when an implementation has detected that an Array Rebuild has Completed.

May also be shown as 816f070d0402ffff or 0x816f070d0402ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0179

User Response No action; information only.

## 816f070d-0403ffff : Rebuild completed for Array in system [ComputerSystemElementName]. (Drive 3)

This message is for the use case when an implementation has detected that an Array Rebuild has Completed.

May also be shown as 816f070d0403ffff or 0x816f070d0403ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0179

User Response No action; information only.

816f070d-0404ffff : Rebuild completed for Array in system [ComputerSystemElementName]. (Drive 4)

This message is for the use case when an implementation has detected that an Array Rebuild has Completed.

May also be shown as 816f070d0404ffff or 0x816f070d0404ffff

Severity Info Serviceable No

Automatically notify support No Alert Category

System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0179

User Response No action; information only.

## • 816f070d-0405ffff : Rebuild completed for Array in system [ComputerSystemElementName]. (Drive 5)

This message is for the use case when an implementation has detected that an Array Rebuild has Completed.

May also be shown as 816f070d0405ffff or 0x816f070d0405ffff

Severity Info Serviceable No

### Automatically notify support

No

Alert Category System - Other

### **SNMP** Trap ID

### **CIM Information**

Prefix: PLAT ID: 0179

#### **User Response**

No action; information only.

# • 816f070d-0406ffff : Rebuild completed for Array in system [ComputerSystemElementName]. (Drive 6)

This message is for the use case when an implementation has detected that an Array Rebuild has Completed.

May also be shown as 816f070d0406ffff or 0x816f070d0406ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

### SNMP Trap ID

CIM Information Prefix: PLAT ID: 0179

#### User Response

No action; information only.

## • 816f070d-0407ffff : Rebuild completed for Array in system [ComputerSystemElementName]. (Drive 7)

This message is for the use case when an implementation has detected that an Array Rebuild has Completed.

May also be shown as 816f070d0407ffff or 0x816f070d0407ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

#### **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0179

**User Response** 

No action; information only.

#### • 816f0807-0301ffff : [ProcessorElementName] has been Enabled. (CPU 1)

This message is for the use case when an implementation has detected a Processor has been Enabled.

May also be shown as 816f08070301ffff or 0x816f08070301ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0060

User Response

No action; information only.

#### 816f0807-0302ffff : [ProcessorElementName] has been Enabled. (CPU 2)

This message is for the use case when an implementation has detected a Processor has been Enabled.

May also be shown as 816f08070302ffff or 0x816f08070302ffff

Severity Info Serviceable No Automatically notify support No Alert Category

System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0060

User Response No action; information only.

• 816f0807-2584ffff : [ProcessorElementName] has been Enabled. (All CPUs)

This message is for the use case when an implementation has detected a Processor has been Enabled.

May also be shown as 816f08072584ffff or 0x816f08072584ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0060

#### User Response

No action; information only. One of CPUs :

#### 816f0813-2581ffff : Bus [SensorElementName] has recovered from an Uncorrectable Error. (DIMMs)

This message is for the use case when an implementation has detected a that a system has recovered from a Bus Uncorrectable Error.

May also be shown as 816f08132581ffff or 0x816f08132581ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0241

User Response No action; information only.

#### • 816f0813-2584ffff : Bus [SensorElementName] has recovered from an Uncorrectable Error. (CPUs)

This message is for the use case when an implementation has detected a that a system has recovered from a Bus Uncorrectable Error.

May also be shown as 816f08132584ffff or 0x816f08132584ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0241

User Response No action; information only.

#### 816f090c-2001ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 1)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2001ffff or 0x816f090c2001ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

#### **SNMP Trap ID**

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

## • 816f090c-2002ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 2)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2002ffff or 0x816f090c2002ffff

Severity Info Serviceable No Automatically notify support No Alert Category

System - Other

#### **SNMP Trap ID**

CIM Information Prefix: PLAT ID: 0143

#### User Response No action; information only.

 816f090c-2003ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 3)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2003ffff or 0x816f090c2003ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0143

#### User Response No action; information only.

 816f090c-2004ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 4)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2004ffff or 0x816f090c2004ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

#### 816f090c-2005ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 5)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2005ffff or 0x816f090c2005ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

#### 816f090c-2006ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 6)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2006ffff or 0x816f090c2006ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

 816f090c-2007ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 7)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2007ffff or 0x816f090c2007ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

## • 816f090c-2008ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 8)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2008ffff or 0x816f090c2008ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

## • 816f090c-2009ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 9)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2009ffff or 0x816f090c2009ffff

Severity Info Serviceable No Automatically notify support No Alert Category

#### System - Other

#### **SNMP** Trap ID

#### CIM Information Prefix: PLAT ID: 0143

User Response

No action; information only.

#### 816f090c-200affff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 10)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c200affff or 0x816f090c200affff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

### 816f090c-200bffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 11)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c200bffff or 0x816f090c200bffff

Severity Info Serviceable No Automatically notify support No Alert Category System - Other SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

**User Response** 

No action; information only.

• 816f090c-200cffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 12)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c200cffff or 0x816f090c200cffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

 816f090c-200dffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 13)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c200dffff or 0x816f090c200dffff

Severity Info

Serviceable No

Automatically notify support

No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

#### User Response

No action; information only.

#### 816f090c-200effff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 14)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c200effff or 0x816f090c200effff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

## • 816f090c-200fffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 15)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c200fffff or 0x816f090c200fffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

### 816f090c-2010ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 16)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2010ffff or 0x816f090c2010ffff

Severity Info Serviceable No Automatically notify support No

### Alert Category System - Other

#### SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

#### User Response

No action; information only.

# • 816f090c-2011ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 17)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2011ffff or 0x816f090c2011ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

• 816f090c-2012ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 18)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2012ffff or 0x816f090c2012ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category System - Other

**SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0143 **User Response** 

No action; information only.

 816f090c-2013ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 19)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2013ffff or 0x816f090c2013ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category System - Other

#### SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

#### 816f090c-2014ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 20)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2014ffff or 0x816f090c2014ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

 816f090c-2015ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 21)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2015ffff or 0x816f090c2015ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0143

User Response

No action; information only.

 816f090c-2016ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 22)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2016ffff or 0x816f090c2016ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category System - Other

**SNMP Trap ID** 

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

 816f090c-2017ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 23)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2017ffff or 0x816f090c2017ffff

Severity Info

Serviceable No Automatically notify support No

Alert Category System - Other

#### **SNMP** Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

#### 816f090c-2018ffff : [PhysicalMemoryElementName] on Subsystem [MemoryElementName] is no longer Throttled. (DIMM 24)

This message is for the use case when an implementation has detected Memory is no longer Throttled.

May also be shown as 816f090c2018ffff or 0x816f090c2018ffff

Severity Info Serviceable No Automatically notify support No

Alert Category System - Other

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0143

User Response No action; information only.

• 816f0a07-0301ffff : The Processor [ProcessorElementName] is no longer operating in a Degraded State. (CPU 1)

This message is for the use case when an implementation has detected a Processor is no longer running in the Degraded state.

May also be shown as 816f0a070301ffff or 0x816f0a070301ffff

Severity Info Serviceable No Automatically notify support No

Alert Category Warning - CPU

**SNMP** Trap ID

42

CIM Information Prefix: PLAT ID: 0039

#### User Response

No action; information only.

• 816f0a07-0302ffff : The Processor [ProcessorElementName] is no longer operating in a Degraded State. (CPU 2)

This message is for the use case when an implementation has detected a Processor is no longer running in the Degraded state.

May also be shown as 816f0a070302ffff or 0x816f0a070302ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category Warning - CPU

SNMP Trap ID 42

CIM Information Prefix: PLAT ID: 0039

#### User Response No action; information only.

• 816f0a07-2584ffff : The Processor [ProcessorElementName] is no longer operating in a Degraded State. (All CPUs)

This message is for the use case when an implementation has detected a Processor is no longer running in the Degraded state.

May also be shown as 816f0a072584ffff or 0x816f0a072584ffff

Severity Info Serviceable No Automatically notify support No Alert Category Warning - CPU SNMP Trap ID 42 CIM Information Prefix: PLAT ID: 0039

**User Response** 

No action; information only. One of CPUs :

#### 816f0a0c-2001ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 1)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2001ffff or 0x816f0a0c2001ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

0

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

#### 816f0a0c-2002ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 2)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2002ffff or 0x816f0a0c2002ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0 CIM Information Prefix: PLAT ID: 0147 User Response

No action; information only.

#### 816f0a0c-2003ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 3)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2003ffff or 0x816f0a0c2003ffff

Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

. . . .

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

#### • 816f0a0c-2004ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 4)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2004ffff or 0x816f0a0c2004ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

#### 816f0a0c-2005ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 5)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2005ffff or 0x816f0a0c2005ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID 0

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

#### • 816f0a0c-2006ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 6)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2006ffff or 0x816f0a0c2006ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0 CIM Information Prefix: PLAT ID: 0147 User Response

No action; information only.

#### 816f0a0c-2007ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 7)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2007ffff or 0x816f0a0c2007ffff

Severity Info Serviceable No

### Automatically notify support

No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

#### • 816f0a0c-2008ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 8)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2008ffff or 0x816f0a0c2008ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

#### • 816f0a0c-2009ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 9)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2009ffff or 0x816f0a0c2009ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Temperature

#### **SNMP** Trap ID

0

CIM Information Prefix: PLAT ID: 0147

User Response

No action; information only.

• 816f0a0c-200affff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 10)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c200affff or 0x816f0a0c200affff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature **SNMP Trap ID** 0 **CIM Information** Prefix: PLAT ID: 0147 **User Response** No action; information only. 816f0a0c-200bffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 11)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c200bffff or 0x816f0a0c200bffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0 CIM Information Prefix: PLAT ID: 0147 **User Response** 

No action; information only.

 816f0a0c-200cffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 12)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c200cffff or 0x816f0a0c200cffff

Severity Info Serviceable

No

Automatically notify support

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0147

#### User Response

No action; information only.

### • 816f0a0c-200dffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 13)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c200dffff or 0x816f0a0c200dffff

Severity Info Serviceable No Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0147

#### User Response

No action; information only.

• 816f0a0c-200effff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 14)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c200effff or 0x816f0a0c200effff

#### Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Temperature

**SNMP** Trap ID

0

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

#### • 816f0a0c-200fffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 15)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c200fffff or 0x816f0a0c200fffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

0

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

## • 816f0a0c-2010ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 16)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2010ffff or 0x816f0a0c2010ffff

Severity Info

Serviceable No

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

### 816f0a0c-2011ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 17)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2011ffff or 0x816f0a0c2011ffff

Severity Info Serviceable No

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID 0

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

### 816f0a0c-2012ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 18)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2012ffff or 0x816f0a0c2012ffff

Severity Info

Serviceable No

# Automatically notify support

No

Alert Category Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

# • 816f0a0c-2013ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 19)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2013ffff or 0x816f0a0c2013ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Critical - Temperature

SNMP Trap ID

0

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

# • 816f0a0c-2014ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 20)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2014ffff or 0x816f0a0c2014ffff

Severity Info Serviceable

No

Automatically notify support No

Alert Category Critical - Temperature

# SNMP Trap ID

CIM Information Prefix: PLAT ID: 0147

# User Response

No action; information only.

• 816f0a0c-2015ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 21)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2015ffff or 0x816f0a0c2015ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

# • 816f0a0c-2016ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 22)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2016ffff or 0x816f0a0c2016ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature SNMP Trap ID 0 CIM Information Prefix: PLAT ID: 0147

Chapter 6. Troubleshooting 641

**User Response** 

No action; information only.

• 816f0a0c-2017ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 23)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2017ffff or 0x816f0a0c2017ffff

Severity Info

Serviceable No

Automatically notify support

No

Alert Category

Critical - Temperature

SNMP Trap ID

CIM Information Prefix: PLAT ID: 0147

#### **User Response**

No action; information only.

# • 816f0a0c-2018ffff : An Over-Temperature Condition has been removed on the [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 24)

This message is for the use case when an implementation has detected an Over Temperature Condition for Memory that has been Removed.

May also be shown as 816f0a0c2018ffff or 0x816f0a0c2018ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Temperature

SNMP Trap ID

0

CIM Information Prefix: PLAT ID: 0147

User Response No action; information only.

• 816f0a13-2401ffff : Bus [SensorElementName] has recovered from a Fatal Bus Error. (SMBus)

This message is for the use case when an implementation has detected that a system has recovered from a Bus Fatal Error.

May also be shown as 816f0a132401ffff or 0x816f0a132401ffff

#### Severity

Info

Serviceable No

Automatically notify support No

Alert Category Critical - Other

**SNMP Trap ID** 

50

CIM Information Prefix: PLAT ID: 0245

#### **User Response**

- 1. (Trained technician only) Replace microprocessor n (see Removing a microprocessor and heat sink and Replacing a microprocessor and heat sink).
- 2. If the problem persists and there is no other CPU with the same error indication, replace the system board.
- 3. (Trained technician only) Replace the system board (see Removing the system board and Replacing the system board). (n = microprocessor number)

• 816f0a13-2582ffff : Bus [SensorElementName] has recovered from a Fatal Bus Error. (All PCI Error)

This message is for the use case when an implementation has detected that a system has recovered from a Bus Fatal Error.

May also be shown as 816f0a132582ffff or 0x816f0a132582ffff

Severity Info Serviceable No Automatically notify support No Alert Category Critical - Other

SNMP Trap ID 50

CIM Information Prefix: PLAT ID: 0245

#### **User Response**

- 1. (Trained technician only) Replace microprocessor n (see Removing a microprocessor and heat sink and Replacing a microprocessor and heat sink).
- 2. If the problem persists and there is no other CPU with the same error indication, replace the system board.

3. (Trained technician only) Replace the system board (see Removing the system board and Replacing the system board). (n = microprocessor number)

One of PCI Error : PCIs :

816f0b13-0701ffff : Bus [SensorElementName] is no longer operating in a degraded state. (DMI Links)

This message is for the use case when an implementation has detected a Bus is No Longer Degraded.

May also be shown as 816f0b130701ffff or 0x816f0b130701ffff

Severity Info

Serviceable

No

Automatically notify support No

Alert Category Warning - Other

SNMP Trap ID 60

CIM Information Prefix: PLAT ID: 0247

### **User Response**

No action; information only.

# IMM Events that automatically notify Support

You can configure the IBM Flex System Manager or the CMM to automatically notify Support (also known as *call home*) if certain types of errors are encountered. If you have configured this function, see the table for a list of events that automatically notify Support.

Table 9. Events that automatically notify Support
---

Event ID	Message String	Automatically Notify Support
40000086-00000000	Test Call Home Generated by user [arg1]. ()	Yes
40000087-00000000	Manual Call Home by user [arg1]: [arg2]. ()	Yes
80010202-0701ffff	Numeric sensor [NumericSensorElementName] going low (lower critical) has asserted. (SysBrd 12V)	
80010202-2801ffff	Numeric sensor [NumericSensorElementName] going low (lower critical) has asserted. (CMOS Battery)	Yes
80010902-0701ffff	Numeric sensor [NumericSensorElementName] going high (upper critical) has asserted. (SysBrd 12V)Yes	
806f0021-2201ffff	Fault in slot [PhysicalConnectorSystemElementName] on system [ComputerSystemElementName]. (No Op ROM Space)Yes	
806f0021-2582ffff	Fault in slot [PhysicalConnectorSystemElementName] on system [ComputerSystemElementName]. (PCIe Error)	Yes

Table 9. Events that automatically notify Support (continued)

Event ID	Message String	Automatically Notify Support
806f010c-2001ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 1)	Yes
806f010c-2002ffff	Uncorrectable error detected for Yes [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 2)	
806f010c-2003ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 3)	Yes
806f010c-2004ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 4)	Yes
806f010c-2005ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 5)	Yes
806f010c-2006ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 6)	Yes
806f010c-2007ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 7)	Yes
806f010c-2008ffff	Uncorrectable error detected for Yes [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 8)	
806f010c-2009ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 9)	Yes
806f010c-200affff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 10)	Yes
806f010c-200bffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 11)	Yes
806f010c-200cffff	Uncorrectable error detected for Yes [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 12)	
806f010c-200dffff	Uncorrectable error detected for Yes [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 13)	
806f010c-200effff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 14)	Yes
806f010c-200fffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 15)	Yes

Table 9. Events that automatically notify Support (continued)

Event ID	Message String	Automatically Notify Support
806f010c-2010ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 16)	Yes
806f010c-2011ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 17)	Yes
806f010c-2012ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 18)	Yes
806f010c-2013ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 19)	Yes
806f010c-2014ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 20)	Yes
806f010c-2015ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 21)	Yes
806f010c-2016ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 22)	Yes
806f010c-2017ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 23)	Yes
806f010c-2018ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 24)	Yes
806f010c-2581ffff	Uncorrectable error detected for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (All DIMMs)	Yes
806f010d-0400ffff	The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 0)	Yes
806f010d-0401ffff	The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 1)	Yes
806f010d-0402ffff	The [StorageVolumeElementName] has been disabled Yes due to a detected fault. (Drive 2)	
806f010d-0403ffff	The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 3)	Yes
806f010d-0404ffff	The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 4)	Yes
806f010d-0405ffff	The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 5)	Yes
806f010d-0406ffff	The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 6)	Yes

Table 9. Events that automatically notify Support (continued)

Event ID	Message String	Automatically Notify Support
6f010d-0407ffff       The [StorageVolumeElementName] has been disabled due to a detected fault. (Drive 7)		Yes
806f0207-0301ffff	[ProcessorElementName] has Failed with FRB1/BIST condition. (CPU 1)	Yes
806f0207-0302ffff	[ProcessorElementName] has Failed with FRB1/BIST condition. (CPU 2)	Yes
806f0207-2584ffff	[ProcessorElementName] has Failed with FRB1/BIST condition. (All CPUs)	Yes
806f020d-0400ffff	Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 0)	Yes
806f020d-0401ffff	Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 1)	Yes
806f020d-0402ffff	Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 2)	Yes
806f020d-0403ffff	Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 3)	Yes
806f020d-0404ffff	Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 4)	Yes
806f020d-0405ffff	Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 5)	Yes
806f020d-0406ffff	Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 6)	Yes
806f020d-0407ffff	Failure Predicted on [StorageVolumeElementName] for array [ComputerSystemElementName]. (Drive 7)	Yes
806f050c-2001ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 1)	Yes
806f050c-2002ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 2)	Yes
806f050c-2003ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 3)	Yes
806f050c-2004ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 4)	Yes
806f050c-2005ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 5)	Yes
806f050c-2006ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 6)	Yes

Table 9. Events that automatically notify Support (continued)

Event ID	Message String	Automatically Notify Support
806f050c-2007ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 7)	Yes
806f050c-2008ffff	Memory Logging Limit Reached for Yes [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 8)	
806f050c-2009ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 9)	Yes
806f050c-200affff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 10)	Yes
806f050c-200bffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 11)	Yes
806f050c-200cffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 12)	Yes
806f050c-200dffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 13)	Yes
806f050c-200effff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 14)	Yes
806f050c-200fffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 15)	Yes
806f050c-2010ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 16)	Yes
806f050c-2011ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 17)	Yes
806f050c-2012ffff	Memory Logging Limit Reached for Yes [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 18)	
806f050c-2013ffff	Memory Logging Limit Reached for Yes [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 19)	
806f050c-2014ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 20)	Yes
806f050c-2015ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 21)	Yes

Event ID	Message String	Automatically Notify Support
806f050c-2016ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 22)	Yes
806f050c-2017ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 23)	Yes
806f050c-2018ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (DIMM 24)	Yes
806f050c-2581ffff	Memory Logging Limit Reached for [PhysicalMemoryElementName] on Subsystem [MemoryElementName]. (All DIMMs)	Yes
806f060d-0400ffff	Array [ComputerSystemElementName] has failed. (Drive 0)	Yes
806f060d-0401ffff	Array [ComputerSystemElementName] has failed. (Drive 1)	Yes
806f060d-0402ffff	Array [ComputerSystemElementName] has failed. (Drive 2)	Yes
806f060d-0403ffff	Array [ComputerSystemElementName] has failed. (Drive 3)	Yes
806f060d-0404ffff	Array [ComputerSystemElementName] has failed. (Drive 4)	Yes
806f060d-0405ffff	Array [ComputerSystemElementName] has failed. (Drive 5)	Yes
806f060d-0406ffff	Array [ComputerSystemElementName] has failed. (Drive 6)	Yes
806f060d-0407ffff	Array [ComputerSystemElementName] has failed. (Drive 7)	Yes
806f0813-2581ffff	An Uncorrectable Error has occurred on [SensorElementName]. (DIMMs)	Yes
806f0813-2584ffff	An Uncorrectable Error has occurred on [SensorElementName]. (CPUs)	Yes

# **UEFI** diagnostic codes

UEFI diagnostic codes can be generated when the compute node starts up or while the compute node is running. UEFI diagnostic codes are logged in the IMM event log in the compute node.

# **UEFI** diagnostic code fields

For each event code, the following fields are displayed:

# **Event identifier**

An identifier that uniquely identifies an event.

# **Event description**

The logged message string that appears for an event. When the event description is displayed in the event log, information such as a specific component is displayed. In this documentation, that additional information appears as variables, indicated by a percent sign (%).

### Explanation

Additional information to explain why the event occurred.

#### Severity

An indication of the level of concern for the condition. The severity is abbreviated in the event log to the first character. The following severities can be displayed.

Table 10. Severity levels

Severity	Description
Informational	An informational message is something that was recorded for audit purposes, usually a user action or a change of states that is normal behavior.
Warning	A warning is not as severe as an error, but if possible, the condition should be corrected before it becomes an error. It might also be a condition that requires additional monitoring or maintenance.
Error	An error typically indicates a failure or critical condition that impairs service or an expected function.

### User response

Indicates what actions you should perform to resolve the event.

Perform the steps listed in this section in the order shown until the problem is solved. After you perform all of the actions that are described in this field, if you cannot solve the problem, contact Lenovo Support.

# Finding the UEFI diagnostic code

This topic provides information about finding the UEFI diagnostic code.

Several methods are available to locate the UEFI diagnostic code based on the systems-management platform you are using or if you are viewing test results generated by the DSA Preboot diagnostic program.

Note: Not all events have a UEFI diagnostic code associated with the event.

Interface to the UEFI diagnostic code	Action
Logged on to Flex System Manager management software (if installed)	<ol> <li>Go to the Problems (Active Status) view and click the name of the problem.</li> </ol>
	2. Click on the <b>Recommendations</b> tab and locate the UEFI diagnostic code.
Logged on to the IMM or CMM web interface	<ol> <li>Open the Events menu and click Event Log.</li> <li>Click more next to the event message and locate the UEFI diagnostic code.</li> </ol>
Viewing the DSA Preboot diagnostic program test results	<ol> <li>Go to the Chassis Event log.</li> <li>Scroll to the right and look in the Auxillary Data Column to find the UEFI diagnostic code.</li> </ol>

# List of UEFI events

This section lists all messages that can be sent from UEFI.

 11002: [11002] A processor mismatch has been detected between one or more processors in the system.

[11002] A processor mismatch has been detected between one or more processors in the system.

Severity: Info

User Response:

Complete the following steps:

- 1. This message could occur with messages about other processor configuration problem Resolve those messages first.
- 2. If the problem persists, ensure that matching processors are installed (e., matching option part numbers, etc)
- 3. Verify that the processors are installed in the correct socket If not, correct that problem.
- 4. Check the IBM support site for an applicable service bulletin or firmware update that applies to this processor error.
- 5. Replace mismatching processor. Inspect the processor socket and replace the system board first if the socket is damaged.
- 11004: [11004] A processor within the system has failed the BIST.

[11004] A processor within the system has failed the BIST.

Severity: Warning

User Response:

Complete the following steps:

- 1. If the processor or firmware was just updated, check the IBM support site for an applicable service bulletin or firmware update that applies to this processor error.
- 2. If there are multiple processors, swap processors to move affected processor to another processor socket and retry. If problem follows the affected processor, or this is a single processor system, replace the processor. Inspect the processor socket on each processor removal and replace system board first if the processor socket is damaged or mis-aligned pins are found.
- 3. Replace the system board.
- 1100C: [1100C] An uncorrectable error has been detected on processor %.

[1100C] An uncorrectable error has been detected on processor %.

Severity: Error

User Response:

Complete the following steps:

- 1. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 2. Reboot the system. If problem persists, contact Support.
- 18005: [18005] A discrepancy has been detected in the number of cores reported by one or more processor packages within the system.

[18005] A discrepancy has been detected in the number of cores reported by one or more processor packages within the system.

Severity: Info

#### User Response:

Complete the following steps:

- 1. If this is a newly installed option, ensure that matching processors are installed in the correct processor socket
- 2. Check the IBM support site for an applicable service bulletin that applies to this processor error.
- 3. Replace the processor. Inspect the processor socket and replace the system board first if the socket is damaged.
- 18006: [18006] A mismatch between the maximum allowed QPI link speed has been detected for one or more processor package

[18006] A mismatch between the maximum allowed QPI link speed has been detected for one or more processor package

Severity: Info

User Response:

Complete the following steps:

- 1. If this is a newly installed option, ensure that matching processors are installed in the correct processor socket
- 2. Check the IBM support site for an applicable service bulletin or firmware update that applies to this processor error.
- 3. Replace the processor. Inspect the processor socket and replace the system board first if the socket is damaged.
- 18007: [18007] A power segment mismatch has been detected for one or more processor package

[18007] A power segment mismatch has been detected for one or more processor package

Severity: Info

User Response:

Complete the following steps:

- 1. Processors installed do not have the same power requirements
- 2. Ensure that all Processors have matching power requirements (such as 65, 95, or 130 Watts)
- 3. If power requirements match, check the IBM support site for an applicable service bulletin or firmware update that applies to this processor error.
- 4. Replace the processor. Inspect the processor socket and replace the system board first if the socket is damaged.
- 18009: [18009] A core speed mismatch has been detected for one or more processor package

[18009] A core speed mismatch has been detected for one or more processor package

Severity: Info

User Response:

- 1. Verify that matching processors are installed in the correct processor socket Correct any mismatch issues found.
- 2. Check the IBM support site for an applicable service bulletin or firmware update that applies to this processor error.
- 3. Replace the processor. Inspect the processor socket and replace the system board first if the socket is damaged.

# • 1800A: [1800A] A mismatch has been detected between the speed at which a QPI link has trained between two or more processor package

[1800A] A mismatch has been detected between the speed at which a QPI link has trained between two or more processor package

Severity: Info

User Response:

Complete the following steps:

- 1. Verify that the processor is a valid option that is listed as a Server Proven device for this system. If not, remove the Processor and install one listed on the Server Proven website.
- 2. Verify that matching processors are installed in the correct processor socket Correct any mismatch found.
- 3. Check the IBM support site for an applicable service bulletin or firmware update that applies to this processor error.
- 4. Replace the processor. Inspect the processor socket and replace the system board first if the socket is damaged.
- 1800B: [1800B] A cache size mismatch has been detected for one or more processor package

[1800B] A cache size mismatch has been detected for one or more processor package

Severity: Info

User Response:

Complete the following steps:

- 1. Verify that matching processors are installed in the correct processor socket Correct any mismatch found.
- 2. Check the IBM support site for an applicable service bulletin or firmware update that applies to this processor error.
- 3. Replace the system board.
- 1800C: [1800C] A cache type mismatch has been detected for one or more processor package

[1800C] A cache type mismatch has been detected for one or more processor package

Severity: Info

User Response:

Complete the following steps:

- 1. Verify that matching processors are installed in the correct processor socket Correct any mismatch found.
- 2. Check the IBM support site for an applicable service bulletin or firmware update that applies to this processor error.
- 3. Replace the system board.
- 1800D: [1800D] A cache associativity mismatch has been detected for one or more processor package

[1800D] A cache associativity mismatch has been detected for one or more processor package

Severity: Info

User Response:

- 1. Verify that matching processors are installed in the correct processor socket Correct any mismatch found.
- 2. Check the IBM support site for an applicable service bulletin or firmware update that applies to this processor error.
- 3. Replace the system board.
- 1800E: [1800E] A processor model mismatch has been detected for one or more processor package

[1800E] A processor model mismatch has been detected for one or more processor package

Severity: Info

User Response:

Complete the following steps:

- 1. Verify that matching processors are installed in the correct processor socket Correct any mismatch found.
- 2. Check the IBM support site for an applicable service bulletin or firmware update that applies to this Processor error.
- 3. Replace the system board.
- 1800F: [1800F] A processor family mismatch has been detected for one or more processor package

[1800F] A processor family mismatch has been detected for one or more processor package

Severity: Info

User Response:

Complete the following steps:

- 1. Verify that matching processors are installed in the correct processor socket Correct any mismatch found.
- 2. Check the IBM support site for an applicable service bulletin or firmware update that applies to this processor error.
- 3. Replace the system board.
- 18010: [18010] A processor stepping mismatch has been detected for one or more processor package

[18010] A processor stepping mismatch has been detected for one or more processor package

Severity: Info

User Response:

Complete the following steps:

- 1. Verify that matching processors are installed in the correct processor socket Correct any mismatch found.
- 2. Check the IBM support site for an applicable service bulletin or firmware update that applies to this processor error.
- 3. Replace the system board.
- 2011001: [2011001] An Uncorrected PCIe Error has Occurred at Bus % Device % Function %. The Vendor ID for the device is % and the Device ID is %.

[2011001] An Uncorrected PCIe Error has Occurred at Bus % Device % Function %. The Vendor ID for the device is % and the Device ID is %.

#### Severity: Error

User Response:

Complete the following steps:

- 1. If this compute node and/or any attached cables were recently installed, moved, serviced or upgraded,
  - a. Reseat the adapter and any attached cable
  - b. Reload the device driver.
  - c. If device is not recognized, reconfiguring slot to Gen1 or Gen2 may be required. Gen1/Gen2 settings can be configured via F1 Setup -> System Settings -> Devices and I/O Ports -> PCIe Gen1/Gen2/Gen3 Speed Selection, or the ASU Utility.
- 2. Check the IBM support site for an applicable device driver, firmware update, or other information that applies to this error. Load the new device driver and install any required firmware update
- 3. If the problem persists, remove the adapter. If system reboots successfully without the adapter, replace that adapter.
- 4. Replace the processor.
- 2018001: [2018001] An Uncorrected PCIe Error has Occurred at Bus % Device % Function %. The Vendor ID for the device is % and the Device ID is %.

[2018001] An Uncorrected PCIe Error has Occurred at Bus % Device % Function %. The Vendor ID for the device is % and the Device ID is %.

Severity: Error

User Response:

Complete the following steps:

- 1. If this compute node and/or any attached cables were recently installed, moved, serviced or upgraded:
  - a. Reseat the adapter and any attached cable
  - b. Reload the device driver.
  - c. If device is not recognized, reconfiguring slot to Gen1 or Gen2 may be required. Gen1/Gen2 settings can be configured via F1 Setup -> System Settings -> Devices and I/O Ports -> PCle Gen1/Gen2/Gen3 Speed Selection, or the ASU Utility.
- 2. Check the IBM support site for an applicable device driver, firmware update, or other information that applies to this error. Load the new device driver and install any required firmware update
- 3. If the problem persists, remove the adapter. If the system reboots successfully without the adapter, replace that adapter.
- 4. Replace the processor.
- 2018002: [2018002] The device found at Bus % Device % Function % could not be configured due to resource constraint The Vendor ID for the device is % and the Device ID is %.

[2018002] The device found at Bus % Device % Function % could not be configured due to resource constraint The Vendor ID for the device is % and the Device ID is %.

Severity: Info

User Response:

Complete the following steps:

1. If this PCIe device and/or any attached cables were recently installed, moved, serviced or upgraded, reseat the adapter and any attached cable

- 2. Check the IBM support site for any applicable service bulletin or UEFI or adapter firmware update that applies to this error. NOTE: It may be necessary to disable unused option ROMs from UEFI F1 setup or ASU or using adapter manufacturer utilities so that adapter firmware can be updated.
- 3. Move the adapter to a different slot. If a slot is not available or error recurs, replace the adapter.
- 4. If the adapter was moved to a different slot and the error did not recur, verify that this is not a system limitation. Then replace the system board. Also, if this is not the initial installation and the error persists after adapter replacement, replace the system board.
- 2018003: [2018003] A bad option ROM checksum was detected for the device found at Bus % Device % Function %. The Vendor ID for the device is % and the Device ID is %.

[2018003] A bad option ROM checksum was detected for the device found at Bus % Device % Function %. The Vendor ID for the device is % and the Device ID is %.

Severity: Info

User Response:

Complete the following steps:

- 1. If this PCIe device and/or any attached cables were recently installed, moved, serviced or upgraded, reseat the adapter and any attached cable
- 2. Move the adapter to a different system slot, if available.
- Check the IBM support site for any applicable service bulletin or UEFI or adapter firmware update that applies to this error. NOTE: It may be necessary to configure slot to Gen1 or to use special utility software so that adapter firmware can be upgraded. Gen1/Gen2 settings can be configured via F1 Setup -> System Settings -> Devices and I/O Ports -> PCIe Gen1/Gen2/Gen3 Speed Selection, or the ASU Utility.
- 4. Replace the adapter.

#### • 3020007: [3020007] A firmware fault has been detected in the UEFI image.

[3020007] A firmware fault has been detected in the UEFI image.

Severity: Error

User Response:

Complete the following steps:

- 1. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 2. Update the UEFI image.
- 3. Replace the system board.
- 3028002: [3028002] Boot permission timeout detected.

[3028002] Boot permission timeout detected.

Severity: Error

User Response:

Complete the following steps:

- 1. Check CMM/IMM logs for communication errors and resolve.
- 2. Reseat the system.
- 3. If problem persists, contact Support.

#### • 3030007: [3030007] A firmware fault has been detected in the UEFI image.

[3030007] A firmware fault has been detected in the UEFI image.

Severity: Error

User Response:

Complete the following steps:

- 1. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 2. Update the UEFI image.
- 3. Replace the system board.
- 3040007: [3040007] A firmware fault has been detected in the UEFI image.

[3040007] A firmware fault has been detected in the UEFI image.

Severity: Error

User Response:

Complete the following steps:

- 1. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 2. Update the UEFI image.
- 3. Replace the system board.
- 3048005: [3048005] UEFI has booted from the backup flash bank.

[3048005] UEFI has booted from the backup flash bank.

Severity: Info

User Response:

Complete the following steps:

Return the system to primary bank.

• 3048006: [3048006] UEFI has booted from the backup flash bank due to an Automatic Boot Recovery (ABR) event.

[3048006] UEFI has booted from the backup flash bank due to an Automatic Boot Recovery (ABR) event.

Severity: Warning

User Response:

Complete the following steps:

- 1. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 2. Update the primary UEFI image.
- 3. Replace the system board.
- 3050007: [3050007] A firmware fault has been detected in the UEFI image.

[3050007] A firmware fault has been detected in the UEFI image.

Severity: Error

User Response:

- 1. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 2. Update the UEFI image.

- 3. Replace the system board.
- 305000A: [305000A] An invalid date and time have been detected.

[305000A] An invalid date and time have been detected.

Severity: Warning

User Response:

Complete the following steps:

- 1. Check IMM/chassis event log. This event should immediately precede 0068002 error. Resolve that event or any other battery related error
- 2. Use F1 Setup to reset date and time. If problem returns after a system reset, replace CMOS battery.
- 3. If problem persists then check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 4. Replace the system board.
- 3058004: [3058004] A Three Strike boot failure has occurred. The system has booted with default UEFI setting

[3058004] A Three Strike boot failure has occurred. The system has booted with default UEFI setting

Severity: Error

User Response:

Complete the following steps:

- 1. This event resets UEFI to the default settings for the next boot. If successful, the Setup Utility is displayed. The original UEFI settings are still present.
- 2. If you did not intentionally trigger the reboots, check logs for probable cause.
- 3. Undo recent system changes (settings or devices added). If there were no recent system changes, remove all options, and then remove the CMOS battery for 30 seconds to clear CMOS content Verify that the system boot Then, re-install the options one at a time to locate the problem.
- 4. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 5. Update the UEFI firmware.
- 6. Remove and re-install CMOS battery for 30 seconds to clear CMOS contents
- 7. Replace the system board.
- 3058009: [3058009] DRIVER HEALTH PROTOCOL: Missing Configuration. Requires Change Settings From F1.

[3058009] DRIVER HEALTH PROTOCOL: Missing Configuration. Requires Change Settings From F1.

Severity: Warning

User Response:

Complete the following steps:

- 1. Go to the Setup Utility (System Settings -> Settings -> Driver Health Status List) and find a driver/ controller reporting Configuration Required statu
- 2. Search for the driver menu from System Settings and change settings appropriately.
- 3. Save settings and restart system.
- 305800A: [305800A] DRIVER HEALTH PROTOCOL: Reports 'Failed' Status Controller.

[305800A] DRIVER HEALTH PROTOCOL: Reports 'Failed' Status Controller.

## Severity: Warning

User Response:

Complete the following steps:

- 1. Reboot the system.
- 2. If problem persists, switch to backup UEFI or update the current UEFI image.
- 3. Replace the system board.
- 305800B: [305800B] DRIVER HEALTH PROTOCOL: Reports 'Reboot' Required Controller.

[305800B] DRIVER HEALTH PROTOCOL: Reports 'Reboot' Required Controller.

Severity: Warning

User Response:

Complete the following steps:

- 1. No action required. The system will reboot at the end of POST.
- 2. If the problem persists, switch to the backup UEFI image or update the current UEFI image.
- 3. Replace the system board.
- 305800C: [305800C] DRIVER HEALTH PROTOCOL: Reports 'System Shutdown' Required Controller.

[305800C] DRIVER HEALTH PROTOCOL: Reports 'System Shutdown' Required Controller.

Severity: Warning

User Response:

Complete the following steps:

- 1. Reboot the system.
- 2. If problem persists, switch to the backup UEFI image or update the current UEFI image.
- 3. Replace system board.
- 305800D: [305800D] DRIVER HEALTH PROTOCOL: Disconnect Controller Failed. Requires 'Reboot'.

[305800D] DRIVER HEALTH PROTOCOL: Disconnect Controller Failed. Requires 'Reboot'.

Severity: Warning

User Response:

Complete the following steps:

- 1. Reboot the system to reconnect the controller.
- 2. If problem persists, switch to the backup UEFI image or update the current UEFI image.
- 3. Replace the system board.
- 305800E: [305800E] DRIVER HEALTH PROTOCOL: Reports Invalid Health Status Driver.

[305800E] DRIVER HEALTH PROTOCOL: Reports Invalid Health Status Driver.

Severity: Warning

User Response:

- 1. Reboot the system.
- 2. If problem persists, switch to the backup UEFI image or update the current UEFI image.

# 3. Replace the system board.

## • 3060007: [3060007] A firmware fault has been detected in the UEFI image.

[3060007] A firmware fault has been detected in the UEFI image.

Severity: Error

User Response:

Complete the following steps:

- 1. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 2. Update the UEFI image.
- 3. Replace the system board.

### • 3070007: [3070007] A firmware fault has been detected in the UEFI image.

[3070007] A firmware fault has been detected in the UEFI image.

Severity: Error

User Response:

Complete the following steps:

- 1. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 2. Update the UEFI image.
- 3. Replace the system board.

### • 3108007: [3108007 ] The default system settings have been restored.

[3108007] The default system settings have been restored.

Severity: Error

User Response:

Complete the following steps:

Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.

## • 3808000: [3808000] An IMM communication failure has occurred.

[3808000] An IMM communication failure has occurred.

Severity: Warning

User Response:

Complete the following steps:

- 1. Reset the IMM from the CMM.
- 2. Use the CMM to remove auxilliary power from the compute node. This will reboot the compute node.
- 3. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 4. Update the UEFI Firmware.
- 5. Replace the system board.

# • 3808002: [3808002] An error occurred while saving UEFI settings to the IMM.

[3808002] An error occurred while saving UEFI settings to the IMM.

Severity: Warning

## User Response:

Complete the following steps:

- 1. Use the Setup Utility to verify and save the settings (which will recover the settings).
- 2. Reset the IMM from the CMM.
- 3. Use CMM to remove auxilliary power from the compute node. This will reboot the compute node.
- 4. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 5. Update the IMM Firmware.
- 6. Remove and re-install CMOS battery for 30 seconds to clear CMOS content
- 7. Replace the system board.

# • 3808003: .[3808003] Unable to retrieve the system configuration from the IMM.

.[3808003] Unable to retrieve the system configuration from the IMM.

Severity: Warning

User Response:

Complete the following steps:

- 1. Use the Setup Utility to verify and save the settings (which will recover the settings).
- 2. Reset the IMM from the CMM.
- 3. Use CMM to remove auxilliary power from the compute node. This will reboot the compute node.
- 4. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 5. Update the IMM Firmware.
- 6. Remove and re-install CMOS battery for 30 seconds to clear CMOS content
- 7. Replace the system board.
- 3808004: [3808004] The IMM System Event log (SEL) is full.

[3808004] The IMM System Event log (SEL) is full.

Severity: Info

User Response:

Complete the following steps:

- 1. Use the IMM Web Interface to clear the event log.
- 2. If IMM communication is unavailable, use the Setup Utility to access the System Event Logs Menu and choose Clear IMM System Event Log and Restart Server.
- 3818001: [3818001] The firmware image capsule signature for the currently booted flash bank is invalid.

[3818001] The firmware image capsule signature for the currently booted flash bank is invalid.

Severity: Info

User Response:

- 1. Reboot the system. Will come up on backup UEFI image. Update the primary UEFI image.
- 2. If error does not persist no additional recovery action is required.
- 3. If error persists, or boot is unsuccessful, replace the system board.

# • 3818002: [3818002] The firmware image capsule signature for the non-booted flash bank is invalid.

[3818002] The firmware image capsule signature for the non-booted flash bank is invalid.

Severity: Info

User Response:

Complete the following steps:

- 1. Update the backup UEFI image.
- 2. If error does not persist, no additional recovery action is required.
- 3. If error persists, or boot is unsuccessful, replace the system board.

# • 3818003: [3818003] The CRTM flash driver could not lock the secure flash region.

[3818003] The CRTM flash driver could not lock the secure flash region.

Severity: Info

User Response:

Complete the following steps:

- 1. If system failed to boot successfully, DC cycle the system.
- 2. If system boots to F1 setup, update the UEFI image and reset bank to primary (if required). If the system boots without error, recovery is complete and no additional action is required.
- 3. If system fails to boot, or if the firmware update attempt fails, replace the system board.
- 3818004: [3818004] The CRTM flash driver could not successfully flash the staging area. A failure occurred.

[3818004] The CRTM flash driver could not successfully flash the staging area. A failure occurred.

Severity: Error

User Response:

Complete the following steps:

- 1. Continue booting the system. If the system does not reset, manually reset the system.
- 2. If the error is not reported on the subsequent boot, no additional recovery action is required.
- 3. If the error persists, continue booting system and update the UEFI image.
- 4. Replace the system board.
- 3818005: [3818005] The CRTM flash driver could not successfully flash the staging area. The update was aborted

[3818005] The CRTM flash driver could not successfully flash the staging area. The update was aborted

# Severity: Warning

User Response:

Complete the following steps:

- 1. Continue booting system. If system does not reset, manually reset the system.
- 2. If the error is not reported on the subsequent boot, no additional recovery action is required.
- 3. If the event persists, continue booting system and update the UEFI image.
- 4. Replace the system board.
- 3818007: [3818007] The firmware image capsules for both flash banks could not be verified.

[3818007] The firmware image capsules for both flash banks could not be verified.

Severity: Error

User Response:

Complete the following steps:

- 1. If system failed to boot successfully, DC cycle system.
- 2. If system boots to F1 setup, update the UEFI image and reset bank to primary (if required). If the system boots without error, recovery is complete and no additional action is required.
- 3. If system fails to boot, or if the firmware update attempt fails, replace the system board.

## • 3818009: [3818009] The TPM could not be properly initialized.

[3818009] The TPM could not be properly initialized.

Severity: Error

User Response:

Complete the following steps:

- 1. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 2. Reboot the system.
- 3. If the error continues, replace the system-board assembly (see Removing the system-board assembly and Installing the system-board assembly).

## • 3868000: [3868000] IFM: System reset performed to reset adapter

[3868000] IFM: System reset performed to reset adapter

Severity: Info

User Response:

Complete the following steps:

Information only; no action is required.

• 3868001: [3868001] IFM: Reset loop avoided - Multiple resets not allowed.

[3868001] IFM: Reset loop avoided - Multiple resets not allowed.

Severity: Warning

User Response:

Complete the following steps:

- 1. Update all firmware (including adapter firmware) to the latest level
- 2. If problem persists, contact Support.
- 3868002: [3868002] BOFM: Error communicating with the IMM BOFM may not be deployed correctly.

[3868002] BOFM: Error communicating with the IMM - BOFM may not be deployed correctly.

Severity: Warning

User Response:

- 1. Update all firmware (including adapter firmware) to the latest level
- 2. If problem persists, contact Support.
- 3868003: [3868003] BOFM: Configuration to large for compatibility mode.

[3868003] BOFM: Configuration to large for compatibility mode.

Severity: Info

User Response:

Complete the following steps:

Information only; no action is required.

# • 3938002: [3938002] A boot configuration error has been detected.

[3938002] A boot configuration error has been detected.

Severity: Warning

User Response:

Complete the following steps:

- 1. F1 Setup -> Save Setting
- 2. Retry the configuration update.

### • 50001: [50001] A DIMM has been disabled due to an error detected during POST.

[50001] A DIMM has been disabled due to an error detected during POST.

Severity: Warning

#### User Response:

Complete the following steps:

- 1. If the DIMM was disabled because of a memory fault, follow the procedure for that event.
- 2. If no memory fault is recorded in the logs and no DIMM connector error LEDs are lit, re-enable the DIMM through the Setup utility or the Advanced Settings Utility (ASU).
- 3. If the problem persists, Power cycle the compute node from the management console.
- 4. Reset the IMM to default setting
- 5. Reset UEFI to default setting
- 6. Update IMM and UEFI firmware.
- 7. Replace the system board.

#### • 51003: [51003] An uncorrectable memory error was detected in DIMM slot % on rank %.

[51003] An uncorrectable memory error was detected in DIMM slot % on rank %.

Severity: Error

User Response:

- If the compute node has recently been installed, moved, serviced, or upgraded, verify that the DIMM is properly seated and visually verify that there is no foreign material in any DIMM connector on that memory channel. If either of these conditions is found, correct and retry with the same DIMM. (Note: The event Log might contain a recent 00580A4 event denoting detected change in DIMM population that could be related to this problem.)
- 2. If no problem is observed on the DIMM connectors or the problem persists, replace the DIMM identified by LightPath and/or event log entry.
- 3. If problem recurs on the same DIMM connector, replace the other DIMMs on the same memory channel.
- 4. Check the IBM support site for an applicable service bulletin or firmware update that applies to this memory error.

- 5. If problem recurs on the same DIMM connector, inspect connector for damage. If found, replace the system board.
- 6. Replace the affected processor.
- 7. Replace system board.
- 51006: [51006] A memory mismatch has been detected. Please verify that the memory configuration is valid.

[51006] A memory mismatch has been detected. Please verify that the memory configuration is valid.

Severity: Error

User Response:

Complete the following steps:

- 1. Could follow an uncorrectable memory error or failed memory test. Check the log and service that event first. DIMMs disabled by other errors or actions could cause this event.
- 2. Verify that the DIMMs are installed in the correct population sequence.
- 3. Disable memory mirroring and sparing. If this action eliminates the mismatch, check the IBM Support site for information related to this problem.
- 4. Update UEFI firmware.
- 5. Replace the DIMM
- 6. Replace the processor.
- 51009: [51009] No system memory has been detected.

[51009] No system memory has been detected.

Severity: Error

User Response:

Complete the following steps:

- 1. If any memory errors are logged other than this one, take actions indicated for those codes first.
- 2. If no other memory diagnostic codes appear in the logs, verify that all DIMM connectors are enabled using the Setup utility or the Advanced Settings Utility (ASU).
- 3. If the problem remains, shut down and remove node from chassis and physically verify that one or more DIMMs are installed and that all DIMMs are installed in the correct population sequence.
- 4. If DIMMs are present and properly installed, check for any lit DIMM-connector LEDs, and if found, reseat those DIMM
- 5. Reinstall node in chassis, power on node, then check logs for memory diagnostic code
- 6. If the problem remains, replace the processor.
- 7. If the problem remains, replace the system board.
- 5100B: [5100B] An unqualified DIMM serial number has been detected: serial number % found in slot % of memory card %.

[5100B] An unqualified DIMM serial number has been detected: serial number % found in slot % of memory card %.

Severity: Info

User Response:

Complete the following steps:

1. If this information event is logged in the IMM event log, the server does not have qualified memory installed.

- 2. The memory installed may not be covered under warranty.
- 3. Without qualified memory, speeds supported above industry standards will not be enabled.
- 4. Please contact your Local Sales Representative or Authorized Business Partner to order qualified memory to replace the unqualified DIMM(s).
- 5. After you install qualified memory and power up the server, check to make sure this informational event is not logged again.
- 58001: [58001] The PFA Threshold limit (correctable error logging limit) has been exceeded on DIMM number % at address %. MCx\_Status contains % and MCx\_Misc contains %.

[58001] The PFA Threshold limit (correctable error logging limit) has been exceeded on DIMM number % at address %. MCx\_Status contains % and MCx\_Misc contains %.

Severity: Warning

User Response:

Complete the following steps:

- If the compute node has recently been installed, moved, serviced, or upgraded, verify that the DIMM is properly seated and visually verify that there is no foreign material in any DIMM connector on that memory channel. If either of these conditions is found, correct and retry with the same DIMM. (Note: The event Log might contain a recent 00580A4 event denoting detected change in DIMM population that could be related to this problem.)
- 2. Check the IBM support site for an applicable firmware update that applies to this memory error. The release notes will list the known problems the update addresse
- 3. If the previous steps do not resolve the problem, at the next maintenance opportunity, replace the affected DIMM (as indicated by LightPath and/or failure log entry).
- 4. If PFA re-occurs on the same DIMM connector, swap the other DIMMs on the same memory channel one at a time to a different memory channel or processor. If PFA follows a moved DIMM to any DIMM connector on the different memory channel, replace the moved DIMM.
- 5. Check the IBM support site for an applicable Service Bulletins (Service bulletins) that applies to this memory error. (Link to IBM support service bulletins)
- 6. If problem continues to re-occur on the same DIMM connector, inspect DIMM connector for foreign material and remove, if found. If connector is damaged, replace system board.
- 7. Remove the affected processor and inspect the processor socket pins for damaged or mis-aligned pin If damage is found or the processor is an upgrade part, replace the system board.
- 8. Replace affected processor.
- 9. Replace the system board.
- 58007: [58007] Invalid memory configuration (Unsupported DIMM Population) detected. Please verify memory configuration is valid.

[58007] Invalid memory configuration (Unsupported DIMM Population) detected. Please verify memory configuration is valid.

Severity: Warning

User Response:

- 1. This event could follow an uncorrectable memory error or failed memory test. Check the log and resolve that event first. DIMMs disabled by other errors or actions could cause this event.
- 2. Ensure that the DIMM connectors are populated in the correct sequence.
- 58008: [58008] A DIMM has failed the POST memory test.

[58008] A DIMM has failed the POST memory test.

Severity: Error

User Response:

Complete the following steps:

- 1. You must AC-cycle the system to re-enable the affected DIMM connector or re-enable manually using the Setup utility.
- If the compute node has been recently installed, serviced, moved, or upgraded, check to ensure that DIMMs are firmly seated and that no foreign material can be seen in the DIMM connector. If either condition is observed, correct and retry with the same DIMM. (Note: The event Log might contain a recent 00580A4 event denoting detected change in DIMM population that could be related to this problem.)
- 3. If problem persists, replace the DIMM identified by LightPath and/or event log entry.
- 4. If problem recurs on the same DIMM connector, swap the other DIMMs on the same memory channel across channels one at a time to a different memory channel or processor. If problem follows a moved DIMM to a different memory channel, replace that DIMM.
- 5. Check the IBM support site for an applicable service bulletin or firmware update that applies to this memory error.
- 6. If problem stays with the original DIMM connector, re-inspect DIMM connector for foreign material and remove, if found. If connector is damaged, replace system board.
- 7. Remove the affected processor and inspect the processor socket pins for damaged or mis-aligned pin If damage is found, or this is an upgrade processor, replace the system board. If there are multiple processors, swap them to move affected processor to another processor socket and retry. If problem follows the affected processor (or there is only one processor), replace the affected processor.
- 8. Replace the system board.
- 58015: [58015] Memory spare copy initiated.

[58015] Memory spare copy initiated.

Severity: Info

User Response:

Complete the following steps:

Information only; no action is required.

• 580A1: [580A1] Invalid memory configuration for Mirror Mode. Please correct memory configuration.

[580A1] Invalid memory configuration for Mirror Mode. Please correct memory configuration.

Severity: Warning

User Response:

Complete the following steps:

- 1. If a DIMM connector error LED is lit, resolve the failure.
- 2. Make sure that the DIMM connectors are correctly populated for mirroring mode.
- 580A2: [580A2] Invalid memory configuration for Sparing Mode. Please correct memory configuration.

[580A2] Invalid memory configuration for Sparing Mode. Please correct memory configuration.

Severity: Warning

User Response:

Complete the following steps:

Make sure that the DIMM connectors are correctly populated for sparing mode.

# • 580A4: [580A4] Memory population change detected.

[580A4] Memory population change detected.

Severity: Info

User Response:

Complete the following steps:

Check system event log for uncorrected DIMM failures and replace those DIMM

# • 580A5: [580A5] Mirror Fail-over complete. DIMM number % has failed over to to the mirrored copy.

[580A5] Mirror Fail-over complete. DIMM number % has failed over to to the mirrored copy.

Severity: Info

User Response:

Complete the following steps:

Check the system-event log for uncorrected DIMM failures and replace those DIMM

# • 580A6: [580A6] Memory spare copy has completed successfully.

[580A6] Memory spare copy has completed successfully.

Severity: Info

User Response:

Complete the following steps:

Check system log for related DIMM failures and replace those DIMM

# • 68002: [68002] A CMOS battery error has been detected

[68002] A CMOS battery error has been detected

Severity: Warning

User Response:

Complete the following steps:

- 1. If the system was recently installed, moved, or serviced, make sure the battery is properly seated.
- 2. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 3. Replace the CMOS battery.
- 4. Replace the system board.
- 68005: [68005] An error has been detected by the the IIO core logic on Bus %. The Global Fatal Error Status register contains %. The Global Non-Fatal Error Status register contains %. Please check error logs for the presence of additional downstream device error data.

[68005] An error has been detected by the the IIO core logic on Bus %. The Global Fatal Error Status register contains %. The Global Non-Fatal Error Status register contains %. Please check error logs for the presence of additional downstream device error data.

Severity: Error

User Response:

Complete the following steps:

- 1. Check the log for a separate error related to an associated PCIe device and resolve that error.
- 2. Check the IBM support site for an applicable service bulletin or firmware update for the system or adapter that applies to this error.
- 3. Replace the system board.
- 680B8: [680B8] Internal QPI Link Failure Detected.

[680B8] Internal QPI Link Failure Detected.

Severity: Error

User Response:

Complete the following steps:

- 1. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 2. Inspect the processor socket for foreign debris or damage. If debris is found, remove the debri
- 3. If error recurs, or socket damage is found, replace the system board.

# • 680B9: [680B9] External QPI Link Failure Detected.

[680B9] External QPI Link Failure Detected.

Severity: Error

User Response:

Complete the following steps:

- 1. Check the IBM support site for an applicable service bulletin or firmware update that applies to this error.
- 2. Inspect the processor socket for foreign debris or damage. If debris is found, remove the debri
- 3. If error recurs, or socket damage is found, replace the system board.

# Troubleshooting by symptom

Use this information to find solutions to problems that have identifiable symptoms.

To use the symptom-based troubleshooting information in this section, complete the following steps:

- 1. Check the IMM event log and follow the suggested actions to resolve any event codes (see "IMM event log" on page 66).
- 2. Find the symptoms that you are experiencing in the troubleshooting tables in this section and follow the suggested actions to resolve any problems.
- 3. If the problem remains, submit a service request (see Appendix A "Getting help and technical assistance" on page 773).

# Compute node start problems

Use this information to resolve compute node start problems.

# Embedded hypervisor is not in the boot list

Complete the following steps until the problem is solved.

1. If the compute node has recently been installed, moved, or serviced, or if this is the first time the embedded hypervisor is being used, make sure that the device is connected properly and that there is no physical damage to the connectors.

- 2. Check <a href="http://www.lenovo.com/serverproven/">http://www.lenovo.com/serverproven/</a> to validate that the embedded hypervisor device is supported for the compute node.
- 3. Use the Setup utility to make sure that the embedded hypervisor device (SD card USB device) is in the startup sequence. From the Setup utility, select **Start Options**.
- 4. Check <u>http://datacentersupport.lenovo.com/</u> for any service bulletins related to the embedded hypervisor and the compute node.
- 5. Make sure that other software works on the compute node to ensure that the compute node is working properly.

# **Connectivity problems**

Use this information to solve connectivity problems.

# Cannot communicate with the Flex System Manager management node

Use the information in this section to troubleshoot the compute node when you cannot communicate with the optional Flex System Manager management node on the data network.

Complete the following steps until the problem is solved:

- 1. Make sure that all ports for the connection path are enabled and that you can ping the Flex System Manager management node. If you are unable to ping the Flex System Manager management node, see "Cannot ping the Flex System Manager management node on the data network" on page 677.
- 2. Make sure that the protocols you are using are enabled.

Note: By default, only secure protocols are enabled, for example, SSH and HTTPS.

3. If you cannot log into the Flex System Manager management node, see "Cannot log in to the Flex System Manager management node" on page 673.

# Cannot communicate with the CMM

Use the information in this section to troubleshoot the compute node when you cannot communicate with the CMM on the data network.

**Note:** reCommunications errors from compute nodes can take up to 20 minutes to appear in the CMM event log.

Complete the following steps until the problem is solved:

- 1. Make sure that all ports in the connection path are enabled and that you can ping the CMM. If you are unable to ping the CMM, see "Cannot ping the CMM on the management network" on page 673.
- 2. Make sure that the protocols that you are using are enabled.

Note: By default, only secure protocols are enabled, for example, SSH and HTTPS.

- 3. Make sure that you can log into the CMM. If you are unable to log in to the CMM, see "Cannot log in to the CMM" on page 673.
- 4. Reset the CMM to the default settings by pressing the reset button on the CMM.

**Note:** Press and hold the button for 10 seconds to reset the CMM configuration settings. All user modified configuration settings are reset to the factory default values.

# Cannot communicate with the I/O module

Use the information in this section to troubleshoot the compute node when you cannot communicate with the I/O module.

Complete the following steps until the problem is solved:

- 1. Make sure that all ports in the connection path are enabled and that you can ping the I/O module. If you are unable to ping the I/O module, see "Cannot ping the I/O module" on page 675.
- 2. Make sure that the protocols that you are using are enabled.

Note: By default, only secure protocols are enabled, for example, SSH and HTTPS.

- 3. Make sure that you can log into the I/O module. If you are unable to log into the I/O module, see "Cannot log in to the I/O module" on page 673.
- 4. Use a serial cable to connect to the I/O module to further isolate the problem. You can also link to the I/O module through an external Ethernet port.

# One or more compute nodes are unable to communicate with SAN

Use the information in this section to troubleshoot one or more compute nodes are unable to communicate with SAN.

Complete the following steps until the problem is solved:

- 1. Make sure that:
  - a. The I/O module is powered on and the appropriate ports are enabled on the I/O module.
  - b. The CMM has reported that the I/O module has completed POST and that no errors have been reported in the logs.
  - c. The SAN device is powered on and is functional.
  - d. All cables between the I/O module and the SAN device are properly connected and secure, and that the activity LEDs are lit on the appropriate ports.
- 2. See the documentation for the I/O module for additional information about troubleshooting SAN connectivity or network connectivity issues.

# Cannot connect to the data network (Ethernet)

Use the information in this section to troubleshoot the compute node when you cannot connect to the data network (Ethernet).

#### One compute node is unable to connect to the data network (Ethernet) during initial setup

Use the information in this section to troubleshoot one compute node is unable to connect to the data network (Ethernet) during initial setup.

Complete the following steps until the problem is solved:

- 1. Make sure that:
  - a. The I/O module is powered on and the appropriate ports are enabled on the I/O module.
  - b. All cables between the I/O module and the network device (switch or router) are properly connected and secure, and that the activity LEDs are lit on the appropriate ports.
- 2. From the compute node operating system, verify the network settings, such as IP address, subnet mask (if using IPv4), DHCP settings, and vLAN settings, to ensure that the settings match the settings of the network device. See the documentation for the operating system for information about checking network settings.
- 3. From the compute node operating system, make sure that the network device is active. See the documentation for the operating system for information about viewing network devices.
- 4. Make sure that the proper device drivers are installed for the compute node Ethernet device.
- 5. Check the Lenovo support Web site for any firmware updates that might apply to this issue. You can view the release notes for a firmware update to determine the issues addressed by the update.

- 6. Remove the compute node from the chassis and check the connectors at the back of the node for bent pins. If the pins are bent, contact Lenovo Support. See "Removing a compute node from a chassis" on page 692.
- 7. Install the compute node in another compute node bay to see if the problem persists. See "Installing a compute node in a chassis" on page 693. If the problem persists, make sure that this compute node is connected to a port that has been enabled and that the vLAN settings enable that port to connect to the network.
- 8. Check the Lenovo support Web site for any service bulletins that are related to network connectivity.
- 9. (Trained service technician only) Perform the following steps:
  - a. Force the Link/duplex speed.
  - b. Check the connectors on the I/O module to ensure that there are no bent pins.
  - c. Check the connectors on the chassis midplane to ensure there are no bent pins. See <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.common.nav.doc/chassis.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.common.nav.doc/chassis.html</a>.
  - d. Remove the I/O module and install a working I/O module in the same I/O module bay.
  - e. If the problem is resolved, replace the I/O module that you removed.

#### One compute node experiences a sudden loss of network (Ethernet) connectivity

Use the information in this section to troubleshoot one compute node experiences a sudden loss of network (Ethernet) connectivity.

The event is logged in the event log. See the event log for the management node (if installed) or see event log of the CMM to determine what actions might be required to resolve this issue. See "IMM event log" on page 66.

#### Two or more compute nodes are unable to connect to the data network (Ethernet) during initial setup

Use the information in this section to troubleshoot two or more compute nodes are unable to connect to the data network (Ethernet) during initial setup.

Complete the following steps until the problem is solved:

- 1. If you have just updated the firmware for one or more devices in the chassis (I/O module, CMM, etc), install the previous level of firmware.
- 2. Make sure that:
  - a. The I/O module is powered on and the appropriate ports are enabled on the I/O module.
  - b. All cables between the I/O module and the network device (switch or router) are properly connected and secure, and that the activity LEDs are lit on the appropriate ports.
- 3. From the compute node operating system, verify the network settings, such as IP address, subnet mask (if using IPv4), DHCP settings, and vLAN settings, to ensure that the settings match the settings of the network device. See the documentation for the operating system for information about checking network settings.
- 4. From the compute node operating system, make sure that the network device is active. See the documentation for the operating system for information about viewing network devices.
- 5. Check the Lenovo support Web site for any firmware updates that might apply to this issue. You can view the release notes for a firmware update to determine the issues addressed by the update.
- 6. Check the Lenovo support Web site for any service bulletins that are related to network connectivity.
- 7. (Trained service technician only) Perform the following steps:
  - a. Force the Link/duplex speed.
  - b. Check the connectors on the I/O module to ensure that there are no bent pins.

- c. Check the connectors on the chassis midplane to ensure there are no bent pins. See <u>http://</u><u>flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.common.nav.doc/chassis.html</u>.
- d. Remove the I/O module and install a working I/O module in the same I/O module bay.
- e. If the problem is resolved, replace the I/O module that you removed.

### Two or more compute nodes experience a sudden loss of network (Ethernet) connectivity

Use the information in this section to troubleshoot two or more compute nodes experience a sudden loss of network (Ethernet) connectivity.

The event is logged in the event log. See the event log for the management node (if installed) or see event log of the CMM to determine what actions might be required to resolve this issue. See "IMM event log" on page 66.

# Cannot log in

Use the information in this section to troubleshoot the compute node when you cannot log in to the management node, the CMM, or the I/O module.

### Cannot log in to the Flex System Manager management node

Use the information in this section to troubleshoot the compute node when you cannot log in to the optional management node.

Complete the following steps until the problem is solved:

- 1. Make sure that you are using the correct password and that the capitals lock is off.
- 2. Contact Lenovo Support for further assistance if you have forgotten the password.

For additional information about Login problems, see <u>"Flex System Chassis Management Module: User's</u> <u>Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_user</u> <u>guide.html</u>.

#### Cannot log in to the CMM

Use the information in this section to troubleshoot the compute node when you cannot log in to the CMM.

Complete the following steps until the problem is solved:

- 1. Make sure that you are using the correct password and that the capitals lock is off.
- 2. Restore the CMM default settings by pressing the reset button on the CMM.

#### Cannot log in to the I/O module

Use the information in this section to troubleshoot the compute node when you cannot log in to the I/O module.

Complete the following steps until the problem is solved:

- 1. Make sure that you are using the correct password and that the capitals lock is off.
- 2. Contact Lenovo Support for further assistance if you have forgotten the password.

# Cannot ping the CMM on the management network

Use the information in this section to troubleshoot the compute node when one or more compute nodes cannot ping the CMM on the management network.

#### Single node cannot ping the CMM in the same chassis

Use the information in this section to troubleshoot a single compute node that cannot ping the CMM on the management network in the same chassis.

Complete the following steps until the problem is solved:

- 1. Make sure that the Chassis Management Module is powered on and the applicable ports are enabled on the CMM.
- 2. Make sure that the compute node IMM has acquired an IP address from the CMM by using the Setup utility on the node.

**Note:** If the CMM recently lost connection to the DCHP server, you must reset the IMM by using the CMM interface so that a new IP address can be acquired.

- 3. In the CMM user interface, click Chassis Management > Component IP Configuration and make sure that the IP address that is listed is the same as the IP address that is displayed in the Setup utility. If it is not the same IP address, configure the IMM network settings correctly or reset the IMM to automatically acquire a new IP address.
- 4. Check <u>https://support.lenovo.com</u> for any firmware updates that might apply to this problem. You can view the release notes for a firmware update to determine the issues that the update addresses.
- 5. Remove the compute node from the chassis and check the connectors on the back of the node for bent pins. If the pins are bent, contact Lenovo Support.
- 6. Install the compute node in another node bay to determine whether the problem remains. If the problem remains, make sure that the compute node is connected to a port that has been enabled and that the vLAN settings allow that port to connect to the network.
- 7. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to network connectivity.
- 8. (Trained service technician only) Complete the following steps:
  - a. Force the link/duplex speed.
  - b. Check the connectors on the I/O module to make sure that no pins are bent.
  - c. Check the connectors on the chassis midplane to make sure that no pins are bent.
  - d. Remove the CMM and install a working CMM in the same bay.
  - e. If the problem is solved, replace the CMM that you removed.

#### Multiple nodes cannot ping the CMM in the same chassis

Use the information in this section to troubleshoot multiple nodes that cannot ping the CMM on the management network in the same chassis.

Complete the following steps until the problem is solved:

- 1. Make sure that the Chassis Management Module is powered on and the applicable ports are enabled on the CMM. If the CMM is hung, reset the CMM.
- 2. Reset the CMM.
- 3. Check for firmware updates for the CMM.
- 4. Reset the CMM to factory defaults and attempt to discover the nodes again. Allow enough time for the IMMs to acquire a network address.
- 5. Replace the CMM.
- 6. Make sure that the compute node IMM has acquired an IP address from the CMM by using the Setup utility on the node.

**Note:** If the CMM recently lost connection to the DCHP server, you must reset the IMM by using the CMM interface so that a new IP address can be acquired.

7. In the CMM user interface, click Chassis Management > Component IP Configuration and make sure that the IP address that is listed is the same as the IP address that is displayed in the Setup utility. If it is not the same IP address, configure the IMM network settings correctly or reset the IMM to automatically acquire a new IP address.

- 8. Check <u>https://support.lenovo.com</u> for any firmware updates that might apply to this problem. You can view the release notes for a firmware update to determine the issues that the update addresses.
- 9. Remove the compute node from the chassis and check the connectors on the back of the node for bent pins. If the pins are bent, contact Lenovo Support.
- 10. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to network connectivity.
- 11. (Trained service technician only) Complete the following steps:
  - a. Force the link/duplex speed.
  - b. Check the connectors on the CMM to make sure that no pins are bent.
  - c. Check the connectors on the chassis midplane to make sure that no pins are bent.
  - d. Remove the CMM and install a working CMM in the same bay.
  - e. If the problem is solved, replace the CMM that you removed.

#### CMM cannot ping the CMM in a different chassis

Use the information in this section to troubleshoot a CMM that cannot ping the CMM in a different chassis.

Complete the following steps until the problem is solved:

- 1. Make sure that the Chassis Management Modules are powered on and the applicable ports are enabled.
  - a. If the CMM is powered on and hung, reset the CMM.
  - b. Make sure that the IMM, the management node, and the CMMs are all on the same subnet.
- 2. Verify that the cables between the CMMs and the top-of-rack switch are correctly connected and that the activity LEDs are lit on the applicable ports.
- 3. Make sure that the management node has a correct IP address and is on the same subnet as the CMMs.
- 4. Make sure that the compute node IMM has acquired an IP address from the CMM by using the Setup utility on the node.

**Note:** If the CMM recently lost connection to the DCHP server, you must to reset the IMM by using the CMM interface so that a new IP address can be acquired.

- 5. In the CMM user interface, click Chassis Management > Component IP Configuration and make sure that the IP address that is listed is the same as the IP address that is displayed in the Setup utility. If it is not the same IP address, configure the IMM network settings correctly or reset the IMM to automatically acquire a new IP address.
- 6. Check <u>https://support.lenovo.com</u> for any firmware updates that might apply to this problem. You can view the release notes for a firmware update to determine the issues that the update addresses.
- 7. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to network connectivity.
- 8. Remove the compute node from the chassis and check the connectors on the back of the node and on the midplane for bent pins. If the pins are bent, contact Lenovo Support.
- 9. (Trained service technician only) Complete the following steps:
  - a. Force the link/duplex speed.
  - b. Check the connectors on the nodes and on the midplane to make sure that no pins are bent.
  - c. Replace the I/O expansion card in the management node.
  - d. Replace the management node.

#### Cannot ping the I/O module

Use the information in this section to troubleshoot the compute node when one or more compute nodes cannot ping the I/O module.

#### Single node cannot ping the I/O module

Use the information in this section to troubleshoot a single compute node that cannot ping the I/O module.

Complete the following steps until the problem is solved:

- 1. If you have recently updated the firmware for one or more devices in the chassis (I/O module) and have verified the network settings, install the previous level of firmware.
- 2. Make sure that the I/O module is powered on and the applicable ports are enabled on the I/O module.
- 3. Make sure that all network cables are correctly connected and that the activity LEDs are lit. If the cables are correctly connected and the LEDs are not lit, replace the cable.
- 4. Check <u>https://support.lenovo.com</u> for any firmware updates that might apply to this problem. You can view the release notes for a firmware update to determine the issues that are addressed by the update.
- 5. Remove the node from the chassis and check the connectors at the back of the node for bent pins. If the pins are bent, go to <a href="https://support.lenovo.com">https://support.lenovo.com</a> to submit a service request.
- 6. Install the compute node in another node bay, if one is available. If the problem remains, make sure that the compute node is connected to a port that has been enabled and that the vLAN settings allow that port to connect to the network.
- 7. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to I/O-module connectivity.
- 8. If the problem remains, replace the I/O module, and go to <a href="https://support.lenovo.com">https://support.lenovo.com</a> to submit a service request.
- 9. (Trained service technician only) Complete the following steps:
  - a. Force the link/duplex speed.
  - b. Check the connectors on the I/O module to make sure that no pins are bent.
  - c. Check the connectors on the chassis midplane to make sure that no pins are bent.
  - d. Remove the I/O module and install a working I/O module in the same I/O bay.
  - e. If the problem is solved, replace the I/O module that you removed.

#### Multiple nodes cannot ping the I/O module

Use the information in this section to troubleshoot multiple nodes that cannot ping the I/O module.

- 1. If you have recently updated the firmware for one or more devices in the chassis (I/O module or CMM), install the previous level of firmware.
- 2. Make sure that the I/O module is powered on and the applicable ports are enabled on the I/O module.
- 3. Make sure that all network cables are correctly connected and that the activity LEDs are lit.
- 4. From the compute node operating system, verify that the network device is active. Check also the network settings, such as IP address, subnet mask (if you are using IPv4), DNS, DHCP settings, and vLAN settings to make sure that the settings match the settings of the network device. See the documentation that comes with the operating system for information about viewing network devices and checking the network settings.
- 5. Check <u>https://support.lenovo.com</u> for any firmware updates that might apply to this problem. You can view the release notes for a firmware update to determine the issues that are addressed by the update.
- 6. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to network connectivity.
- 7. (Trained service technician only) Complete the following steps:
  - a. Force the link/duplex speed.
  - b. Check the connectors on the I/O module to make sure that no pins are bent.
  - c. Check the connectors on the chassis midplane to make sure that no pins are bent.

- d. Remove the I/O module and install a working I/O module in the same I/O bay.
- e. If the problem is solved, replace the I/O module that you removed.

#### Cannot ping the Flex System Manager management node on the data network

Use the information in this section to troubleshoot the compute node when one or more compute nodes cannot ping the optional management node on the data network.

#### Single node cannot ping the management node in the same chassis

Use the information in this section to troubleshoot a single compute node that cannot ping the optional Flex System Manager management node in the same chassis on the data network.

Complete the following steps until the problem is solved:

- 1. Make sure that the management node is powered on and is not hung, by logging in to the management node. If you are unable to log in from the management network, attempt to log in from the data network. If the management node is powered on and hung, perform a virtual reseat of the management node from the CMM.
- 2. Make sure that the I/O module is powered on and is not hung, by pinging the I/O module from the management node. If the I/O module is powered on and hung, reset the I/O module. Make sure that the correct ports are enabled for the node on the I/O module.
- 3. Make sure that the compute node is the only one in the chassis that the management node cannot ping. If it is not, follow the steps in "Multiple nodes cannot ping the management node in the same chassis" on page 678.
- 4. Make sure that the configuration settings in the node are correct and that the port is enabled.
- 5. Check <u>https://support.lenovo.com</u> for any firmware updates that might apply to this issue. You can view the release notes for a firmware update to determine the issues that are addressed by the update.
- 6. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to network connectivity.
- 7. Remove the compute node and make sure that the connectors on the midplane and the node are not damaged.
- 8. (Trained service technician only) Complete the following steps:
  - a. Force the link/duplex speed.
  - b. Check the connectors on the node and the midplane to make sure that no pins are bent.

#### Single node cannot ping the management node in a different chassis

Use the information in this section to troubleshoot a single compute node that cannot ping the optional Flex System Manager management node in a different chassis on the data network.

- 1. Make sure that the management node is powered on and is not hung, by logging in to the management node. If you are unable to log in from the management network, attempt to log in from the data network. If the management node is powered on and hung, perform a virtual reseat of the management node from the CMM.
- 2. Make sure that the I/O module is powered on and is not hung, by pinging the I/O module from the management node. If the I/O module is powered on and hung, reset the I/O module. Make sure that the correct ports are enabled for the node on the I/O module.
- 3. Make sure that the compute node is the only one in the chassis that the management node cannot ping. If it is not, follow the steps in "Multiple nodes cannot ping the management node in the same chassis" on page 678.
- 4. Make sure that the IP configuration settings on the node are correct and that the port is enabled.

- 5. Check <u>https://support.lenovo.com</u> for any firmware updates that might apply to this issue. You can view the release notes for a firmware update to determine the issues that are addressed by the update.
- 6. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to network connectivity.
- 7. Remove the compute node and make sure that the connectors on the midplane and the node are not damaged.
- 8. (Trained service technician only) Complete the following steps:
  - a. Force the link/duplex speed.
  - b. Check the connectors on the node and the midplane to make sure that no pins are bent.

#### Multiple nodes cannot ping the management node in the same chassis

Use the information in this section to troubleshoot multiple nodes that cannot ping the optional Flex System Manager management node in the same chassis on the data network.

Complete the following steps until the problem is solved:

- 1. Make sure that the management node is powered on and is not hung, by logging in to the management node. If you are unable to log in from the management network, attempt to log in from the data network. If the management node is powered on and hung, perform a virtual reseat of the management node from the CMM.
- 2. Make sure that the I/O module is powered on and is not hung, by pinging the I/O module from the management node. If the I/O module is powered on and hung, reset the I/O module. Make sure that the correct ports are enabled for the node on the I/O module.
- 3. Make sure that the management network port (eth1) is enabled in the management node. Make sure that the port configuration settings are correct for the data network.
- 4. Make sure that the configuration settings for each node are correct and that the data network ports are enabled.
- 5. Make sure that the configuration settings in the I/O module are correct and that the appropriate ports are enabled for your compute nodes and the management node on the I/O module. If the problem remains, complete the following steps:
  - a. Restart the I/O module.
  - b. Check <u>https://support.lenovo.com</u> for any firmware updates that might apply to this issue. You can view the release notes for a firmware update to determine the issues that are addressed by the update.
  - c. Perform a virtual reseat of the I/O module.
  - d. Replace the I/O module.
- 6. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to network connectivity.
- 7. Remove the management node and make sure that the connectors on the midplane and the management node are not damaged.
- 8. (Trained service technician only) Complete the following steps:
  - a. Force the link/duplex speed.
  - b. Check the connectors on the nodes and the midplane to make sure that no pins are bent.
  - c. Replace the I/O expansion card in the management node.

#### Multiple nodes cannot ping the management node in a different chassis

Use the information in this section to troubleshoot multiple nodes that cannot ping the optional Flex System Manager management node in a different chassis on the data network.

- 1. Make sure that the management node is powered on and is not hung, by logging in to the management node. If you are unable to log in from the management network, attempt to log in from the data network. If the management node is powered on and hung, perform a virtual reseat of the management node from the CMM.
- 2. Make sure that the I/O module is powered on and is not hung, by pinging the I/O module from the management node. If the I/O module is powered on and hung, reset the I/O module. Make sure that the correct ports are enabled for the node on the I/O module.
- 3. Make sure that the management network port (eth1) in the management node is enabled. Make sure that the port configuration settings are correct for the data network.
- 4. Make sure that the configuration settings for each node are correct and that the data network ports are enabled.
- 5. Make sure that the configuration settings in the I/O module are correct and that the applicable ports are enabled for your compute nodes and the management node on the I/O module. If the problem remains, complete the following steps:
  - a. Restart the I/O module.
  - b. Check <u>https://support.lenovo.com</u> for any firmware updates that might apply to this issue. You can view the release notes for a firmware update to determine the issues that are addressed by the update.
  - c. Perform a virtual reseat of the I/O module.
  - d. Replace the I/O module.
- 6. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to network connectivity.
- 7. Remove the management node and make sure that the connectors on the midplane and the node are not damaged.
- 8. (Trained service technician only) Complete the following steps:
  - a. Force the link/duplex speed.
  - b. Check the connectors on the nodes and the midplane to make sure that no pins are bent.
  - c. Replace the I/O expansion card in the management node.

#### Multiple nodes cannot ping the management node in the same chassis or a different chassis

Use the information in this section to troubleshoot multiple nodes that cannot ping the optional Flex System Manager management node in the same chassis or a different chassis on the data network.

Complete the following steps until the problem is solved:

- 1. Follow the steps in "Multiple nodes cannot ping the management node in the same chassis" on page 678.
- 2. Follow the steps in "Multiple nodes cannot ping the management node in a different chassis" on page 678.

## Cannot ping the Flex System Manager management node on the management network

Use the information in this section to troubleshoot the compute node when one or more compute nodes cannot ping the optional management node on the management network.

#### Single node cannot ping the management node in the same chassis

Use the information in this section to troubleshoot a single compute node that cannot ping the optional Flex System Manager management node in the same chassis on the management network.

- 1. Make sure that the management node is powered on and is not hung, by logging in to the management node. If you are unable to log in from the management network, attempt to log in from the data network. If the management node is powered on and hung, perform a virtual reseat of the management node from the CMM.
- 2. Make sure that the CMM is powered on and is not hung, by pinging the CMM from the management node. If the CMM is powered on and hung, reset the CMM. Make sure that the IMM, the management node, and CMM are all on the same subnet.
- 3. Make sure that the compute node is the only one in the chassis that the management node cannot ping. If it is not, follow the steps in "Multiple nodes cannot ping the management node in the same chassis" on page 681. Make sure that the compute node appears on the chassis map (it might not be fully discovered by the management node software).
- 4. Make sure that the system-management processor in each compute node has a valid IP address by checking the chassis map of the remote chassis.

**Note:** If the CMM recently lost connection to the DCHP server, you must reset the IMM by using the CMM interface so that a new IP address can be acquired.

- 5. In the CMM user interface, click **Chassis Management > Component IP Configuration** and make sure that the IP address that is listed is the same as the IP address that is displayed in the Setup utility. If it is not the same, configure the IMM network settings correctly.
- 6. Check <u>https://support.lenovo.com</u> for any firmware updates that might apply to this issue. You can view the release notes for a firmware update to determine the issues that are addressed by the update.
- 7. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to network connectivity.
- 8. Remove the compute node and make sure that the connectors on the midplane and the node are not damaged.
- 9. (Trained service technician only) Complete the following steps:
  - a. Force the link/duplex speed.
  - b. Check the connectors on the node and the midplane to make sure that no pins are bent.
  - c. Replace the system-board assembly (see "Removing and replacing the system-board assembly" on page 761).

#### Single node cannot ping the management node in a different chassis

Use the information in this section to troubleshoot a single compute node that cannot ping the optional Flex System Manager management node in a different chassis on the management network.

- 1. Make sure that the management node is powered on and is not hung, by logging in to the management node. If you are unable to log in from the management network, attempt to log in from the data network. If the management node is powered on and hung, perform a virtual reseat of the management node from the CMM.
- 2. Make sure that the CMM is powered on and is not hung, by pinging the CMM from the management node:
  - a. If the CMM is powered on and hung, reset the CMM
  - b. Make sure that the IMM, the management node, and CMM are all on the same subnet.
- 3. Make sure that the compute node is the only one in the chassis that the management node cannot ping. If it is not, follow the steps in "Multiple nodes cannot ping the management node in the same chassis" on page 681. Make sure that the compute node appears on the chassis map (it might not be fully discovered by the management node software).
- 4. Make sure that the IMM has acquired an IP address from the CMM by using the Setup utility on the compute node.

**Note:** If the CMM recently lost connection to the DCHP server, you must reset the IMM by using the CMM interface so that a new IP address can be acquired.

5. Make sure that the system-management processor in each compute node has a valid IP address by checking the chassis map of the remote chassis.

**Note:** If the CMM recently lost connection to the DCHP server, you must reset the IMM by using the CMM interface so that a new IP address can be acquired.

- 6. Check <u>https://support.lenovo.com</u> for any firmware updates that might apply to this issue. You can view the release notes for a firmware update to determine the issues that are addressed by the update.
- 7. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to network connectivity.
- 8. Remove the compute node and make sure that the connectors on the midplane and the node are not damaged.
- 9. (Trained service technician only) Check the connectors on the node and the midplane to make sure that no pins are bent.

#### Multiple nodes cannot ping the management node in the same chassis

Use the information in this section to troubleshoot multiple nodes that cannot ping the optional Flex System Manager management node in the same chassis on the management network.

Complete the following steps until the problem is solved:

- 1. Make sure that the management node is powered on and is not hung, by logging in to the management node. If you are unable to log in from the management network, attempt to log in from the data network. If the management node is powered on and hung, perform a virtual reseat of the management node from the CMM.
- 2. Make sure that the CMM is powered on and is not hung, by pinging the CMM from the management node:
  - a. If the CMM is powered on and hung, reset the CMM.
  - b. Make sure that the IMM, the management node, and CMM are all on the same subnet.
- 3. Make sure that the management network port (eth0) in the management node is enabled.
- 4. Make sure that the management node has an IP address, is on the same subnet as the CMM, and is able to ping the CMM.
- 5. Make sure that the system-management processor in each compute node has a valid IP address by checking the chassis map of the remote chassis.

**Note:** If the CMM recently lost connection to the DCHP server, you must reset the IMM by using the CMM interface so that a new IP address can be acquired.

If a system-management processor does not have a valid IP address, complete the following steps:

- a. Restart the CMM.
- b. Check <u>https://support.lenovo.com</u> for any firmware or software updates that might apply to this issue. You can view the release notes for a firmware update to determine the issues that are addressed by the update.
- c. Remove and reinstall CMM.
- d. Replace the CMM.
- 6. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to network connectivity.
- 7. Remove the management node and make sure that the connectors on the midplane and the management node are not damaged.
- 8. (Trained service technician only) Complete the following steps:
  - a. Force the link/duplex speed.

- b. Check the connectors on the nodes and the midplane to make sure that no pins are bent.
- c. Replace the I/O expansion card in the management node.
- d. Replace the management node.

#### Multiple nodes cannot ping the management node in a different chassis

Use the information in this section to troubleshoot multiple nodes that cannot ping the optional Flex System Manager management node in a different chassis on the management network.

Complete the following steps until the problem is solved:

- 1. Make sure that the management node is powered on and is not hung, by logging in to the management node. If you are unable to log in from the management network, attempt to log in from the data network. If the management node is powered on and hung, perform a virtual reseat of the management node from the CMM.
- 2. Make sure that the CMM is powered on and is not hung by pinging the CMM from the management node:
  - a. If the CMM is powered on and hung, reset the CMM.
  - b. Make sure that the IMM, the management node, and the CMM are all on the same subnet.
- 3. Make sure that all cables between the CMMs and the top-of-rack switch are correctly connected and secure and that the activity LEDs are lit on the applicable ports
- 4. Make sure that the CMMs (the CMM in the same chassis as the management node and the CMM in the remote chassis) have the same subnet address and can ping one another. If they cannot, make sure that the ports on the top-of-rack switch are enabled. Attempt to connect the CMMs directly if possible.
- 5. Make sure that the management node has fully discovered the nodes within its chassis by viewing the chassis map. If it has not fully discovered the nodes, follow the steps in "Multiple nodes cannot ping the management node in the same chassis" on page 681.
- 6. Make sure that the management processor for each compute node has a valid IP address by checking the chassis map of the remote chassis.

**Note:** If the CMM recently lost connection to the DCHP server, you must reset the IMM by using the CMM interface so that a new IP address can be acquired.

If a system-management processor does not have a valid IP address, complete the following steps:

- a. Restart the CMM in the remote chassis.
- b. Check <u>https://support.lenovo.com</u> for any firmware or software updates that might apply to this issue. You can view the release notes for a firmware update to determine the issues that are addressed by the update.
- c. Remove and reinstall CMM.
- d. Replace the CMM.
- 7. Check https://support.lenovo.com for any service bulletins that are related to network connectivity.
- 8. Remove the node and make sure that the connectors on the midplane and the node are not damaged.
- 9. (Trained service technician only) Complete the following steps:
  - a. Force the link/duplex speed.
  - b. Check the connectors on the nodes and the midplane to make sure that no pins are bent.
  - c. Replace the I/O expansion card in the management node.

#### Multiple nodes cannot ping the management node in the same chassis or a different chassis

Use the information in this section to troubleshoot multiple nodes that cannot ping the optional Flex System Manager management node in the same chassis or a different chassis on the management network.

Complete the following steps until the problem is solved:

- 1. Follow the steps in "Multiple nodes cannot ping the management node in the same chassis" on page 681.
- 2. Follow the steps in "Multiple nodes cannot ping the management node in a different chassis" on page 682.

## Hard disk drive problems

Use this information to resolve hard disk drive problems.

#### Compute node fails to recognize one drive

Complete the following steps until the problem is solved.

- 1. Verify that the drive is supported for this compute node. See <a href="http://www.lenovo.com/serverproven/">http://www.lenovo.com/serverproven/</a> for a list of supported hard drives.
- 2. Make sure that the drive is seated in the drive bay properly and that there is no physical damage to the drive connectors.
- 3. Run the DSA SAS Fixed Disk or SAS Attached Disk diagnostic tests (see "Lenovo Dynamic System Analysis " on page 68).
  - a. If the drive fails the diagnostic test, replace the drive.
  - b. If the drive passes the diagnostic tests but is still not recognized, complete the following steps:
    - 1) Replace the drive.
    - 2) Replace the hard drive backplane (see "Removing a hard disk drive backplane" on page 724 and "Installing a hard disk drive backplane" on page 725).
    - 3) Replace the system-board assembly (see "Removing and replacing the system-board assembly" on page 761).

## Intermittent problems

Use this information to solve intermittent problems.

#### Intermittent external device problems

Complete the following steps until the problem is solved.

- 1. Make sure that the correct device drivers are installed. See the manufacturer's website for documentation.
- 2. For a USB device:
  - a. Make sure that the device is configured correctly (see "Using the Setup utility" on page 24).
  - b. Connect the device to another port. If using a USB hub, remove the hub and connect the device directly to the compute node. Make sure that the device is configured correctly for the port (see "Using the Setup utility" on page 24).
  - c. Run DSA Preboot USB diagnostics (see "Lenovo Dynamic System Analysis " on page 68).

#### Intermittent KVM problems

Complete the following steps until the problem is solved.

#### Video problems:

- 1. Make sure that all cables and the console breakout cable are properly connected and secure.
- 2. Make sure that the monitor is working properly by testing it on another compute node.

3. Test the console breakout cable on a working compute node to ensure that it is operating properly. Replace the console breakout cable if it is defective.

#### Keyboard problems:

Make sure that all cables and the console breakout cable are properly connected and secure.

#### Mouse problems:

Make sure that all cables and the console breakout cable are properly connected and secure.

#### Intermittent unexpected reboots

Check for an event code that indicates a reboot. See the event log for the management node (if installed) or see event log of the CMM to determine what actions might be required to resolve this issue. See "IMM event log" on page 66. Some correctable errors require that the compute node reboot so that it can disable a device, such as a memory DIMM or a microprocessor to allow the machine to boot up properly.

## Intermittent connectivity problems

Use this information to solve intermittent connectivity problems.

#### Single compute node cannot connect intermittently

Complete the following steps until the problem is solved.

- 1. Make sure that the network cables are correctly connected in the switch module ports and the switch module is correctly seated.
- 2. Update the NIC device driver, or the storage device controller device driver.
- 3. See the documentation for the I/O module for resolving connectivity issues.

#### Two or more compute nodes cannot connect intermittently

Complete the following steps until the problem is solved.

- 1. Using the diagnostic tools that are provided by the device manufacturer, test the I/O module that the devices are connected to.
- 2. Attempt to connect one compute node to the network first, and connect other compute nodes, one by one, to try to isolate the problem.
- 3. Update the I/O module firmware, if necessary.

**Note:** Restarting the compute node and running POST diagnostics on the I/O module might also help isolate the problem; however, this might have other ramifications to the network.

## **Memory problems**

Use this information to solve memory problems.

#### The amount of system memory that is displayed is less than the amount of installed physical memory

- 1. Make sure that:
  - a. You have installed the correct type of memory (see "Installing a DIMM " on page 715).
  - b. Memory mirroring or memory sparing mode does not account for the discrepancy. You can check the memory configuration in the Setup utility (see "Using the Setup utility" on page 24).
- 2. If new memory has recently been installed, make sure that no configuration events are reported in the event log. If there are any events, resolve them.

**Note:** DIMMs are verified as authentic Lenovo modules by the UEFI software. If any non-authentic DIMMs are detected, an informational message appears in the system event log and memory performance might be limited. Non-authentic DIMMs are not covered by your Lenovo warranty.

- 3. If the compute node was recently installed, moved, or serviced, make sure that the DIMMs are correctly seated in the connectors (see "Installing a DIMM " on page 715).
- 4. Make sure that all DIMMs are enabled. The compute node might have automatically disabled a DIMM when it detected a problem, or a DIMM might have been manually disabled (see "Using the Setup utility" on page 24).
- 5. Run memory diagnostics (see "Lenovo Dynamic System Analysis " on page 68).
- 6. Remove DIMMs until the compute node is showing the correct amount of memory. Install one DIMM at a time until you can determine which DIMM is not working properly. Remove that DIMM and replace it with a good DIMM (see "Removing a DIMM" on page 713 and "Installing a DIMM" on page 715).

**Note:** After you install or remove a DIMM, you must change and save the new configuration information by using the Setup utility. When you turn on the compute node, a message indicates that the memory configuration has changed. Start the Setup utility and select **Save Settings** (see "Using the Setup utility" on page 24 for more information) to save changes.

7. If the problem remains, contact Lenovo Support.

## **Observable problems**

Use this information to solve observable problems.

#### Compute node is unresponsive (POST is complete and operating system is running)

Complete the following steps until the problem is solved.

If you are in the same location as the compute node, complete the following steps:

- 1. If you are using a KVM connection, make sure that the connection is operating correctly. Otherwise, make sure that the keyboard and mouse are operating correctly.
- 2. If possible, log in to the compute node and verify that all applications are running (no applications are hung).
- 3. Restart the compute node.
- 4. If the problem remains, make sure that any new software has been installed and configured correctly.
- 5. Contact your place of purchase of the software or your software provider.

If you are accessing the compute node from a remote location, complete the following steps:

- 1. Make sure that all applications are running (no applications are hung).
- 2. Attempt to log out of the system and log back in.
- 3. Validate the network access by pinging or running a trace route to the compute node from a command line.
  - a. If you are unable to get a response during a ping test, attempt to ping another compute node in the chassis to determine whether it is a connection problem or compute node problem.
  - b. Run a trace route to determine where the connection breaks down. Attempt to resolve a connection issue with either the VPN or the point at which the connection breaks down.
- 4. Restart the compute node remotely through the management interface.
- 5. If the problem remains, verify that any new software has been installed and configured correctly.
- 6. Contact your place of purchase of the software or your software provider.

#### Unusual smell

Complete the following steps until the problem is solved.

- 1. An unusual smell might be coming from newly installed equipment.
- 2. If the problem remains, contact Lenovo Support.

#### Compute node seems to be running hot

Complete the following steps until the problem is solved.

Multiple compute nodes or chassis:

- 1. Make sure that the room temperature is within the specified range (see "Features and specifications" on page 4).
- 2. Check the Flex System Manager management software (if installed) or CMM log for rising temperature events. If there are no events, the compute node is running within normal operating temperatures. Note that you can expect some variation in temperature.

Single compute node:

Check the Flex System Manager management software (if installed) or CMM log for rising temperature events. If there are no events, the compute node is running within normal operating temperatures. Note that you can expect some variation in temperature.

#### Cracked parts or cracked chassis

Contact Lenovo Support.

## Optional device and replaceable component installation problems

Use this information to resolve optional device and replaceable component installation problems.

#### External USB device not recognized

Complete the following steps until the problem is solved.

- 1. Make sure that the proper drivers are installed on the compute node. See the product documentation for the USB device for information about device drivers.
- 2. Use the Setup utility to make sure that the device is configured correctly.
- 3. If the USB device is plugged into a hub or the console breakout cable, unplug the device and plug it directly into the USB port on the front of the compute node.
- 4. Run the DSA USB diagnostic tests

#### PCIe adapters not recognized/functioning

- 1. Check the event log and resolve any issues related to the device.
- 2. See <u>http://www.lenovo.com/serverproven/</u> to validate that the adapter is supported.
- 3. Make sure that the adapter is installed in a correct slot.
- 4. Make sure that the proper device drivers are installed for the device.
- 5. Resolve any resource conflicts if running legacy mode (UEFI).
- 6. Check <u>http://datacentersupport.lenovo.com/</u> for any service bulletins.
- 7. Ensure any adapter external connections are correct and that the connectors are not physically damaged.

## **Performance problems**

Use this information to solve performance problems.

#### Poor or slow network performance

Complete the following steps until the problem is solved.

- 1. Isolate which network is operating slowly (such as storage, data, and management). You might find it helpful to use ping tools or operating-system tools such as task manager or resource manager.
- 2. Check for traffic congestion on the network.
- 3. Update the NIC device driver, or the storage device controller device driver.
- 4. Use the traffic-diagnostic tools that are provided by the IO-module manufacturer.

#### Operating system performance

Complete the following steps until the problem is solved.

- 1. If you have recently made changes to the compute node (for example updated device drivers or installed software applications) remove the changes.
- 2. Check for any networking issues.
- 3. Check the operating system logs for performance related errors.
- 4. Check for events related to high temperatures and power issues as the compute node might be throttled to help with cooling. If it is throttled, reduce the workload on the compute node to help improve performance.
- 5. Check for events related to disabled DIMMs. If you do not have enough memory for the application workload, your operating system will have poor performance.
- 6. Ensure that the workload is not too high for the configuration.

## **Power-on problems**

Use this information to resolve power-on problems.

#### Single node does not power on

- If you recently installed, moved, or serviced the computer node, reseat the compute node in the bay. If the compute node was not recently installed, moved, or serviced, perform a virtual reseat through the CMM service command. For more information about the CMM service command, see <u>"Flex System Chassis Management Module: Command-Line Interface Reference Guide" at http://pic.dhe.ibm.com/ infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cli\_command\_service.html.
  </u>
- 2. Check the event logs for any events that are related to the compute node, and solve them. If an Flex System Manager management node is installed, check the event log on the management node. Otherwise, check the event log on the Chassis Management Module.
- 3. Make sure that the CMM can recognize the compute node. Log in to the CMM user interface and verify that the compute node appears in the chassis view. If the CMM cannot recognize the compute node, remove the compute node and inspect the compute node and the back of the node bay to make sure there is no physical damage to the connectors.
- 4. Make sure that the power policy that is implemented on the CMM is sufficient to enable the compute node to power on. You can view the power policy from the CMM **pmpolicy** command and CMM web interface.
  - For more information about the CMM **pmpolicy** command, see the <u>"Flex System Chassis Management Module: Command-Line Interface Reference Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/ information/topic/com.lenovo.acc.cmm.doc/cli\_command \_pmpolicy.html.</u>

- From the CMM web interface, select **Power Modules and Management** from the Chassis Management menu. For more information, see <u>"Flex System Chassis Management Module: User's Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_user\_guide.html</u>. All fields and options are described in the CMM web interface online help.
- 5. Make sure that the Flex System Manager management node has completed the discovery of the compute node. Log in to the Flex System Manager user interface and verify that the compute node appears in the chassis view from the CMM.
- 6. Replace the system-board assembly (see "Removing and replacing the system-board assembly" on page 761).

**Note:** Until you are able to replace the system-board assembly, you can attempt to power on the compute node from the CMM or from the Flex System Manager user interface.

For additional information, see <a href="http://download.lenovo.com/servers/mig/systems/support/system\_x/">http://download.lenovo.com/servers/mig/systems/support/system\_x/</a> introducing\_uefi-compliant\_firmware\_on\_ibm\_system\_x.1.2.pdf and <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.commontasks.doc/commontasks\_intro.html">http://flexsystems/support/system\_x/</a> com.lenovo.acc.commontasks.doc/commontasks\_intro.html.

#### Multiple nodes do not power on

Complete the following steps until the problem is solved.

- 1. If you recently installed, moved, or serviced the computer nodes, reseat the compute nodes in the bays. If the compute nodes were not recently installed, moved, or serviced, perform a virtual reseat through the CMM **service** command. For more information about the CMM **service** command, see <u>"Flex System</u> Chassis Management Module: Command-Line Interface Reference Guide" at http://pic.dhe.ibm.com/ infocenter/flexsys/information/topic/com.lenovo.acc.cmm.doc/cli\_command\_service.html.
- 2. Check the event logs for any events that are related to the compute nodes, and solve them. If an Flex System Manager management node is installed, check the event log on the management node. Otherwise, check the event log on the Chassis Management Module.

#### Compute node does not power off

Complete the following steps until the problem is solved.

- 1. Attempt to power off the compute node through the Flex System Manager user interface, if an Flex System Manager management node is installed. Otherwise, attempt to power off the compute node through the CMM user interface.
- 2. Attempt to restart the system-management processor for the compute node. You can restart the system-management processor through the CMM user interface. Click the compute node in the chassis view and then click **Restart System Mgmt Processor**. After the system-management processor has been restarted, attempt to power off the compute node from the CMM.
- 3. Attempt to power off the compute node by using the power button on the front of the node.
- 4. Attempt to reset the compute node from the CMM command-line interface (CLI) by using the **reset** command.
- 5. Reseat the CMM; then, perform steps 1-5 again.

## Software problems

Use this information to solve software problems.

- 1. To determine whether the problem is caused by the software, make sure that:
  - The compute node has the minimum memory that is needed to use the software. For memory requirements, see information that comes with the software.

**Note:** If you have just installed an adapter or memory, the compute node might have a memory-address conflict.

- The software is designed to operate on the compute node.
- Other software works on the compute node.
- The software works on another compute node.
- 2. If you receive any error messages while you use the software, see information that comes with the software for a description of the messages and suggested solutions to the problem.
- 3. Contact your place of purchase of the software.

## **Undetermined problems**

Use this information to solve undetermined problems.

#### Any undetermined problem

Complete the following steps until the problem is solved.

- 1. Check the IMM event log and follow the suggested actions to resolve any event codes (see "IMM event log" on page 66).
- 2. Find the symptoms that you are experiencing in the troubleshooting tables in this section and follow the suggested actions to resolve any problems.
- 3. If the problem remains, submit a service request (see Appendix A "Getting help and technical assistance" on page 773).

#### Compute nodes are not discovered by the Flex System Manager management node or the CMM

Complete the following steps until the problem is solved.

- 1. Make sure that the compute node is recognized by the Flex System Manager management node (if installed) or the CMM. It may appear as an unknown device in the chassis map. If it is not recognized, perform the following steps.
  - a. Remove the compute node and inspect both the compute node and the back of the compute node bay to ensure there is no physical damage to connectors.
  - b. Move the compute node to another bay.
  - c. Replace the system-board assembly (see "Removing and replacing the system-board assembly" on page 761).
- 2. Make sure that the Flex System Manager management node or the CMM can ping the compute nodes, if they cannot, see "Cannot ping the Flex System Manager management node on the management network" on page 679.
- 3. If the compute nodes are in another chassis, make sure that you have the proper software entitlements to manage that chassis with the Flex System Manager management node.
- 4. Check <u>https://support.lenovo.com</u> for any firmware updates that might apply to this issue. You can view the release notes for a firmware update to determine the issues that are addressed by the update.
- 5. Check <u>https://support.lenovo.com</u> for any service bulletins that are related to network connectivity.

## **Collecting service data**

This topic provides information about collecting service data.

You can use the Electronic Service Agent or the first-failure data capture (FFDA) tool to monitor, track, and capture system hardware errors and hardware and software inventory information, and report serviceable problems directly to Lenovo Support. You can also choose to collect data manually. Using the Electronic Service Agent or the FFDA tool, all information sent to Lenovo is encrypted and stored in a secure Lenovo database and used for improved problem determination.

- The Electronic Service Agent is integrated into the Flex System Manager Service and Support Manager and is available if you have installed the Flex System Manager management software. For more information about the Electronic Service Agent and how to set it up, see documentation at <a href="http://pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.ibm.acc.8731.doc/setting\_up\_electronic\_service\_agent.html">http://pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.ibm.acc.8731.doc/setting\_up\_electronic\_service\_agent.html</a>.
- The FFDA tool is integrated into the IMM2. For more information about accessing the IMM2, see Chapter 4 "Accessing the IMM2" on page 41.

# Chapter 7. Installing, removing, and replacing compute node components

Use this information to install, remove, and replace replaceable components and optional devices in the compute node.

See Chapter 5 "Parts listing, Types 9532 and 2951" on page 51 to determine whether a component is a consumable part, structural part, Tier 1 CRU, or Tier 2 CRU.

For information about the terms of the warranty and getting service and assistance, see *Warranty Information* document.

## Installing an optional device

Some compute node components are available as both an optional device and a replaceable component. The installation procedure is the same for the optional device and the replaceable component.

## Installation guidelines

Before you remove or replace a replaceable component or install an optional device, read the following information:

- Before you begin, read "Safety" on page iii and "Handling static-sensitive devices" on page 692. This information will help you work safely.
- When you install your new compute node, take the opportunity to download and apply the most recent firmware updates. This step will help to ensure that any known issues are addressed and that your compute node is ready to function at maximum levels of performance. To download the latest firmware and device drivers, go to <a href="http://datacentersupport.lenovo.com/products/servers/flex/x240-m5-compute-node/9532/downloads">http://datacentersupport.lenovo.com/products/servers/flex/x240-m5-compute-node/9532/downloads</a> and select Lenovo Flex System x240 M5 compute node.
- Observe good housekeeping in the area where you are working. Place removed covers and other parts in a safe place.
- Back up all important data before you make changes to hard disk drives.
- Before you remove a compute node from the Lenovo Flex System chassis, you must shut down the operating system and turn off the compute node. You do not have to shut down the chassis itself.
- Blue on a component indicates touch points, where you can grip the component to remove it from or install it in the compute node, open or close a latch, and so on.
- For a list of supported optional devices for the compute node, see http://www.lenovo.com/serverproven/.

## System reliability guidelines

Use these guidelines to ensure that the compute node meets the cooling and system reliability requirements:

- The Lenovo Flex System chassis is not operated without a compute node or node bay filler in each node bay. See <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.common.nav.doc/chassis.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.common.nav.doc/chassis.html</a> for additional information.
- Each microprocessor socket always contains a heat-sink filler or a microprocessor and heat sink. If the compute node has only one microprocessor, it must be installed in microprocessor socket 1.
- The air baffles are installed over the DIMM connectors.
- The ventilation holes on the compute node are not blocked.

## Handling static-sensitive devices

To reduce the possibility of damage from electrostatic discharge, observe these precautions.

**Attention:** Static electricity can damage the compute node and other electronic devices. To avoid damage, keep static-sensitive devices in their static-protective packages until you are ready to install them.

- When you work on a Lenovo Flex System chassis that has an electrostatic discharge (ESD) connector, use a wrist strap, especially when you handle modules, optional devices, or compute nodes. To work correctly, the wrist strap must have a good contact at both ends (touching your skin at one end and firmly connected to the ESD connector on the front or back of the Lenovo Flex System chassis).
- Limit your movement. Movement can cause static electricity to build up around you.
- Handle the device carefully, holding it by its edges or its frame.
- Do not touch solder joints, pins, or exposed circuitry.
- Do not leave the device where others can handle and damage it.
- While the device is still in its static-protective package, touch it to an *unpainted* metal part of the Lenovo Flex System chassis or any *unpainted* metal surface on any other grounded rack component in the rack in which you are installing the device for at least 2 seconds. This drains static electricity from the package and from your body.
- Remove the device from its package and install it directly into the compute node without setting down the device. If it is necessary to set down the device, put it back into its static-protective package. Do not place the device on the compute node cover or on a metal surface.
- Take additional care when you handle devices during cold weather. Heating reduces indoor humidity and increases static electricity.

## Returning a device or component

If you are instructed to return a device or component, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

## Updating the compute node configuration

Use this information to update the compute node configuration.

When the compute node starts for the first time after you add or remove an internal device, you might receive a message that the configuration has changed. The Setup utility automatically starts so that you can save the new configuration settings. See "Using the Setup utility" on page 24 for more information about the Setup utility.

Some devices have device drivers that you must install. See the documentation that comes with each device for information about installing device drivers.

The compute node operates as a symmetric multiprocessing (SMP) compute node, regardless of how many microprocessors are installed. For optimum performance, you must upgrade the operating system to support SMP. See Chapter 3 "Installing the operating system" on page 37 and your operating-system documentation for additional information.

## Removing a compute node from a chassis

Use this information to remove a compute node from a Lenovo Flex System chassis.

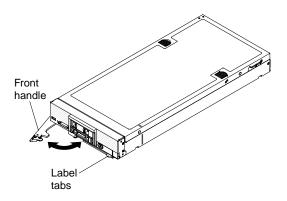
Before you remove a compute node, complete the following steps:

1. Read "Safety" on page iii and "Installation guidelines" on page 691.

- 2. If the compute node is operating, shut down the operating system.
- 3. Press the power button to turn off the compute node (see "Turning off the compute node" on page 17 for more information).

To remove the compute node from a chassis, complete the following steps:

Step 1. Open the front handle as shown in the illustration. The compute node moves out of the node bay approximately 0.6 cm (0.25 inch).



#### Attention:

- To maintain proper system cooling, do not operate the Lenovo Flex System chassis without a compute node or node bay filler installed in each node bay.
- When you remove the compute node, note the node bay number. Reinstalling a compute node into a different node bay from the one it was removed from can have unintended consequences. Some configuration information and update options are established according to node bay number. If you reinstall the compute node into a different node bay, you might have to reconfigure the compute node.
- Step 2. Pull the compute node out of the node bay.
- Step 3. Install either a node bay filler or another compute node in the node bay.

If you are instructed to return the compute node, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

## Installing a compute node in a chassis

Use this information to install a compute node in a Lenovo Flex System chassis.

Before you install the compute node in a chassis, read "Safety" on page iii and "Installation guidelines" on page 691.

#### Statement 21

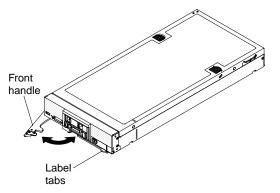


#### CAUTION:

Hazardous energy is present when the compute node is connected to the power source. Always replace the compute node cover before installing the compute node.

If you are using optional Flex System Manager management software to manage the operating system, you must have a network interface adapter for management network communication. For a list of supported optional devices for the compute node, see <u>http://www.lenovo.com/serverproven/</u>.

To install the compute node in a chassis, complete the following steps.



Step 1. Select the node bay.

#### Notes:

- If you are reinstalling a compute node that you removed, you must install it in the same node bay from which you removed it. Some compute node configuration information and update options are established according to node bay number. Reinstalling a compute node into a different node bay can have unintended consequences. If you reinstall the compute node into a different node bay, you might have to reconfigure the compute node.
- 2. To maintain proper system cooling, do not operate the Lenovo Flex System chassis without a compute node, or node bay filler in each node bay.
- Step 2. Make sure that the front handle on the compute node is in the open position.
- Step 3. Slide the compute node into the node bay until it stops.
- Step 4. Push the front handle on the front of the compute node to the closed position.

**Note:** After the compute node is installed, the IMM2 in the compute node initializes and synchronizes with the Chassis Management Module. The time required for a compute node to initialize varies by system configuration. The power LED flashes rapidly; the power button on the compute node does not respond until the power LED flashes slowly, indicating that the initialization process is complete.

- Step 5. Turn on the compute node (see "Turning on the compute node" on page 16 for instructions).
- Step 6. Make sure that the power LED on the compute node control panel is lit continuously, indicating that the compute node is receiving power and is turned on.
- Step 7. If you have other compute nodes to install, do so now.
- Step 8. You can place identifying information on the label tabs that are accessible from the front of the compute node.

**Important:** If an Attention label is on the front panel of the compute node above the power button, read it; then, remove the label and discard it before turning on the compute node.

If this is the initial installation of the compute node in the chassis, you must configure the compute node through the Setup utility and install the compute node operating system. See Chapter 3 "Installing the operating system" on page 37 and "Updating the compute node configuration" on page 692 for details.

If you have changed the configuration of the compute node or if you are installing a different compute node from the one that you removed, you must configure the compute node through the Setup utility, and you might have to install the compute node operating system (see "Using the Setup utility" on page 24).

## Removing and replacing consumable and structural parts

Use this information to remove and replace consumable and structural parts.

Replacement of the consumable and structural parts that are described in this section is your responsibility. If Lenovo installs a consumable and structural part at your request, you will be charged for the installation.

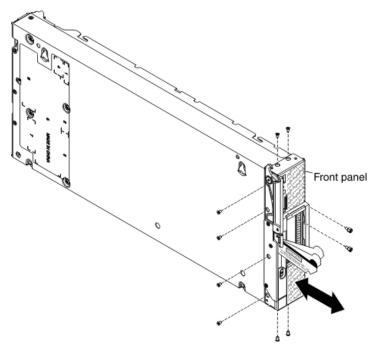
## **Removing the front panel**

Use this information to remove the front panel.

Before you remove the front panel, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.
- 4. Obtain a T8 Torx screwdriver and a 5 mm (3/16-inch) nut driver.

To remove the front panel, complete the following steps.



Step 1. If you are replacing the front panel, remove the ID label plate that has machine type and serial number information from the front panel and set it aside (see "Removing the ID label plate" on page 709).

Note: If your compute node has an RFID tag, it is already attached to the ID label plate.

Step 2. Remove any storage drives, optional drive components, and hard disk drive bay fillers and set them aside on a static-protective surface (see "Removing a hot-swap hard disk drive" on page 726,

"Removing a 1.8-inch solid state drive" on page 730, or "Removing a solid state drive mounting sleeve" on page 727.

- Step 3. If your compute node has a drive-type-specific storage drive bezel, such as a 1.8 inch solid-state drive bezel, remove it and set it aside (see "Removing the bezel" on page 708).
- Step 4. Remove the cover and air baffles (see "Removing the compute node cover" on page 699).
- Step 5. Carefully place the compute node to the up-side-down orientation.
- Step 6. Using a 5 mm (3/16-inch) nut driver, remove the two nuts from the KVM connector.
- Step 7. Rotate the customer information and network access tags to the open position.
- Step 8. Using a T8 Torx screwdriver, remove the four screws that secure the front panel to the bottom of the compute node chassis. One of the screws is accessed through a hole in the tag retainer.
- Step 9. Carefully return the compute node to the bottom-side-down orientation.
- Step 10. Using a T8 Torx screwdriver, remove the two screws that secure the front panel from each side of the compute node chassis (four screws, total).
- Step 11. Carefully slide the front panel forward and away from the compute node chassis.

If you are instructed to return the front panel, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

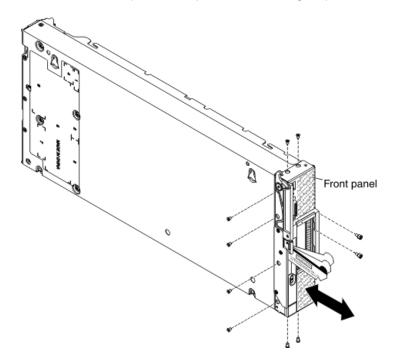
## Installing the front panel

Use this information to install the front panel.

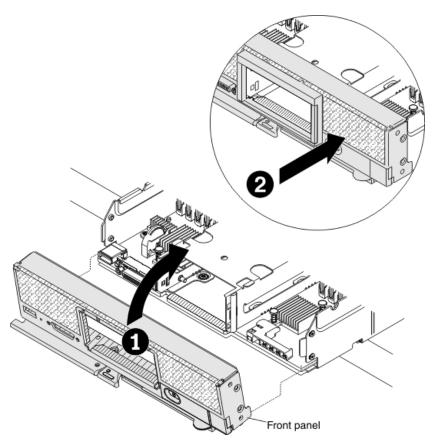
Before you install the front panel, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

To install the front panel, complete the following steps.



Step 1. Remove the cover and air baffles, if they are not already removed (see "Removing the compute node cover" on page 699).



- Step 2. With the front edge of the compute node protruding slightly past the edge of the work surface, align the bottom edge of the front panel with the front of the compute node chassis; then, carefully rotate the front panel into place on the compute node.
- Step 3. Using a T8 Torx screwdriver, install the two screws that secure the front panel to each side of the compute node chassis (four screws, total).
- Step 4. Carefully place the compute node to the up-side-down orientation.
- Step 5. Rotate the customer information and network access tags to the open position.
- Step 6. Using a T8 Torx screwdriver, install the four screws that secure the front panel to the bottom of the compute node chassis. One of the screws is accessed through a hole in the tag retainer.
- Step 7. Using a 5 mm (3/16-inch) nut driver, install the two nuts on the KVM connector.
- Step 8. Carefully return the compute node to the bottom-side-down orientation.
- Step 9. Install the air baffles, if you removed them.
- Step 10. Install the cover (see "Installing the compute node cover" on page 701).
- Step 11. If the compute node you are replacing had a drive-type-specific storage drive bezel, such as a 1.8 inch solid-state drive bezel, remove the original bezel from the new front panel and install the bezel that you removed from the old front panel on the new front panel (see "Removing the bezel" on page 708 and "Installing the bezel" on page 708). Retain the original bezel for later use.
- Step 12. Install any removed storage drives, optional drive components, and hard disk drive bay fillers (see "Installing a hot-swap hard disk drive" on page 726, "Installing a solid state drive mounting sleeve" on page 729, or "Installing a 1.8-inch solid state drive" on page 732)

- Step 13. If you are replacing the front panel, install the ID label plate that has machine type and serial number information that you removed from the front panel you are replacing:
  - a. If a blank ID label plate is on the new front panel, remove it and discard (see "Removing the ID label plate" on page 709).
  - b. Install the ID label plate from the front panel you are replacing on the new front panel (see "Installing the ID label plate" on page 710).

Note: If your compute node has an RFID tag, it is already attached to the ID label plate.

Step 14. If any information is entered on the customer information tags on the front panel you are replacing, transfer this information to the tags on the new front panel.

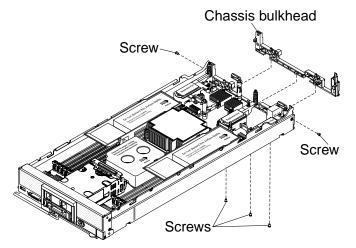
## Removing the chassis bulkhead

Use this information to remove the chassis bulkhead.

Before you remove the chassis bulkhead, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

To remove the chassis bulkhead, complete the following steps.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Remove the I/O expansion adapters (see "Removing an I/O expansion adapter" on page 740).
- Step 3. Carefully place the chassis on its side with the front handle side up.

**Note:** You might find it helpful to remove the air baffles.

- Step 4. Using a T8 Torx screwdriver, remove the screws that secure the bulkhead from the bottom of the chassis.
- Step 5. Carefully return the chassis to the bottom-side-down orientation.
- Step 6. Using a T8 Torx screwdriver, remove the screws that secure the bulkhead from the sides of the chassis.
- Step 7. Lift the chassis bulkhead from the chassis.

If you are instructed to return the chassis bulkhead, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

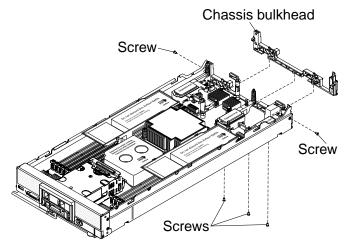
## Installing the chassis bulkhead

Use this information to install the chassis bulkhead.

Before you install the chassis bulkhead, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

To install the chassis bulkhead, complete the following steps.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Position the bulkhead in the chassis.
- Step 3. Using a T8 Torx screwdriver, install the screws that secure the bulkhead to the sides of the chassis.
- Step 4. Carefully place the chassis on its side with the front handle side up.
- Step 5. Using a T8 Torx screwdriver, install the screws that secure the bulkhead to the bottom of the chassis.
- Step 6. Carefully return the chassis to the bottom-side-down orientation.
- Step 7. Install the I/O expansion adapters (see "Installing an I/O expansion adapter" on page 741).
- Step 8. Install the air baffles, if you removed them.

After you install the chassis bulkhead, complete the following steps:

- 1. Install the cover onto the compute node (see "Installing the compute node cover" on page 701 for instructions).
- 2. Install the compute node into the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).

## Removing the compute node cover

Use this information to remove the cover from a compute node.

Before you remove the compute node cover, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

#### Statement 12



#### CAUTION:

The following label indicates a hot surface nearby.



#### Statement 21

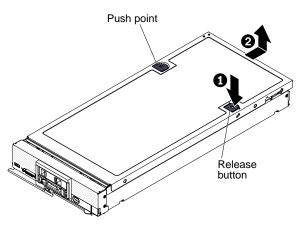


#### CAUTION:

Hazardous energy is present when the compute node is connected to the power source. Always replace the compute node cover before installing the compute node.

To remove the compute node cover, complete the following steps:

- Step 1. Press on the release button and the push point at the same time and slide the cover toward the rear of the compute node.
- Step 2. Lift the cover away from the compute node.



Step 3. Lay the cover flat or store it for future use.

If you are instructed to return the cover, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

## Installing the compute node cover

Use this information to install the compute node cover.

Before you install the compute node cover, read "Safety" on page iii and "Installation guidelines" on page 691.

If you are replacing the cover, make sure that you have the system service label kit on hand for use during the replacement procedure (see Chapter 5 "Parts listing, Types 9532 and 2951" on page 51).

**Attention:** You cannot insert the compute node into the Lenovo Flex System chassis until the cover is installed and closed. Do not attempt to override this protection.

#### Statement 21



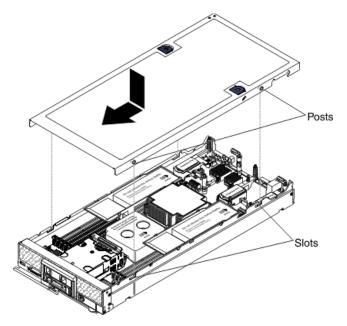
#### CAUTION:

Hazardous energy is present when the compute node is connected to the power source. Always replace the compute node cover before installing the compute node.

To install the compute node cover, complete the following steps:

- Step 1. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.
- Step 2. Orient the cover so that the posts on the inside of the cover slide into the slots on the compute node.

**Note:** Before you close the cover, make sure that the air baffles and all components are installed and seated correctly and that you have not left loose tools or parts inside the compute node. Retention clips that secure the I/O expansion adapters must be in the closed position to install the cover.



- Step 3. Hold the front of the compute node and slide the cover forward to the closed position, until it clicks into place.
- Step 4. To install a system service label, align the label on the cover, remove the backing, and press the label on the cover.

After you install the compute node cover, install the compute node into the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).

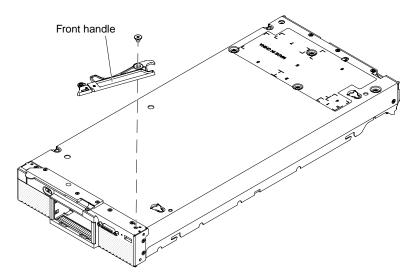
## **Removing the front handle**

Use this information to remove the front handle.

Before you remove the front handle, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface with the cover side down, orienting the compute node with the bezel pointing toward you.

To remove the front handle, complete the following steps.



- Step 1. Locate the screw that attaches the handle to the compute node.
- Step 2. Using a T15 Torx screwdriver, remove the screw from the front handle and save the screw in a safe place. Use the same screw when you install a front handle.

If you are instructed to return the front handle, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

## Installing the front handle

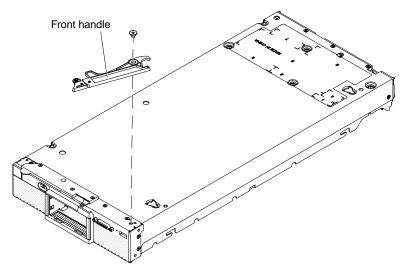
Use this information to install the front handle.

Before you install the front handle, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).

3. Carefully lay the compute node on a flat, static-protective surface with the cover side down, orienting the compute node with the bezel pointing toward you.

To install the front handle, complete the following steps.



- Step 1. Orient the front handle so that the blue release latch is toward the middle of the compute node.
- Step 2. Align the hole in the handle with the hole on the compute node where the handle is installed.
- Step 3. Using a T15 Torx screwdriver, install the screw that secures the handle. Install the screw that you removed when you removed the handle.

After you install the front handle, install the compute node into the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).

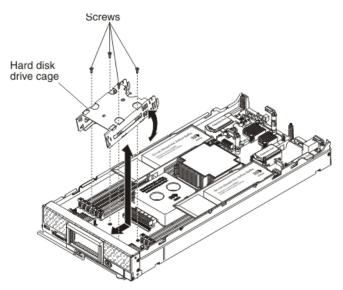
## Removing the hard disk drive cage

Use this information to remove the hard disk drive cage.

Before you remove the hard disk drive cage, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

To remove the hard disk drive cage, complete the following steps.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Remove storage drives, optional drive components, and hard disk drive bay fillers. See "Removing a hot-swap hard disk drive" on page 726, "Removing a 1.8-inch solid state drive" on page 730, or "Removing a solid state drive mounting sleeve" on page 727.
- Step 3. Remove the hard disk drive backplane (see "Removing a hard disk drive backplane" on page 724).
- Step 4. Using a T10 Torx screwdriver, remove the four screws from the cage and rotate the cage from under the compute node front panel; then, remove the cage from the compute node at an angle.

If you are instructed to return the hard disk drive cage, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

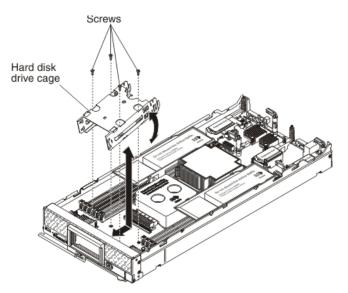
## Installing the hard disk drive cage

Use this information to install the hard disk drive cage.

Before you install the hard disk drive cage, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

To install the hard disk drive cage, complete the following steps.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Position the cage in the compute node front panel at an angle and rotate the cage into position on the system board.
- Step 3. Align the cage with the screw holes on the system board.
- Step 4. Using a T10 Torx screwdriver, insert the four screws and secure the cage in the compute node.
- Step 5. Install the hard disk drive backplane (see "Installing a hard disk drive backplane" on page 725).
- Step 6. Insert the storage drives, optional drive components, and hard disk drive bay fillers. See "Installing a hot-swap hard disk drive" on page 726, "Installing a solid state drive mounting sleeve" on page 729, or "Installing a 1.8-inch solid state drive" on page 732.

After you install the hard disk drive cage, complete the following steps:

- 1. Install the cover onto the compute node (see "Installing the compute node cover" on page 701 for instructions).
- 2. Install the compute node into the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).

## Removing and replacing Tier 1 customer replaceable units (CRUs)

Use this information for removing and replacing Tier 1 CRUs.

Replacement of Tier 1 CRUs is your responsibility. If Lenovo installs a Tier 1 CRU at your request, you will be charged for the installation.

## Removing the adapter-retention assembly

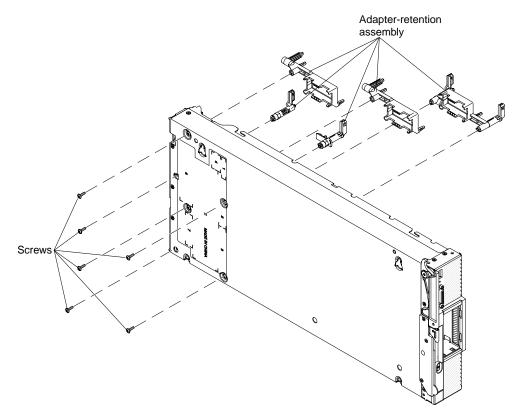
Use this information to remove the adapter-retention assembly.

Before you remove the adapter-retention assembly, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

The adapter-retention assembly consists of five separate parts. You can replace only the parts that you choose and save the unused parts for future use.

To remove the adapter-retention assembly, complete the following steps.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Remove the air baffles.
- Step 3. If necessary, remove the I/O expansion adapters and Adapter for SD Media (see "Removing an I/O expansion adapter" on page 740 and "Removing the SD Media Adapter for System x" on page 744).
- Step 4. Carefully place the chassis on its side with the front handle side up.
- Step 5. Using a T10 Torx screwdriver, remove the screws that secure each part of the adapter-retention assembly that you are removing.

**Note:** All adapter-attention assembly parts are shown. Replace the parts that are needed and save the unused parts for future use.

- Step 6. Lift each part of the adapter-retention assembly that you are removing from the system board.
- Step 7. Carefully return the chassis to the bottom-side-down orientation.

If you are instructed to return the adapter-retention assembly, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

## Installing the adapter-retention assembly

Use this information to install the adapter-retention assembly.

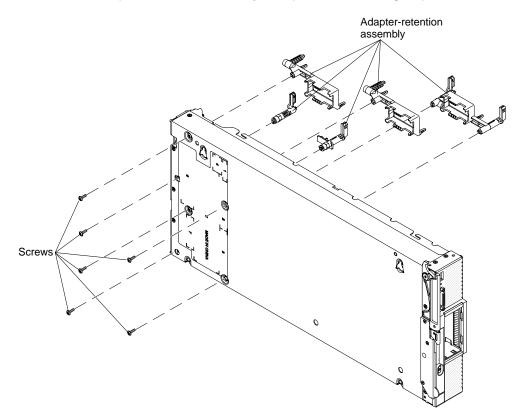
Before you install the adapter-retention assembly, complete the following steps:

1. Read "Safety" on page iii and "Installation guidelines" on page 691.

- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

The adapter-retention assembly consists of five separate parts. You can replace only the parts that you choose and save the unused parts for future use.

To install the adapter-retention assembly, complete the following steps.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Remove the air baffles.
- Step 3. Carefully place the chassis on its side with the front handle side up.
- Step 4. Align each part of the adapter-retention assembly on the system board.

**Note:** All adapter-attention assembly parts are shown. Replace the parts that are needed and save the unused parts for future use.

- Step 5. Using a T10 Torx screwdriver, install the screws that secure each part of the adapter-retention assembly that you are installing.
- Step 6. Carefully return the chassis to the bottom-side-down orientation.
- Step 7. Install the Adapter for SD Media and I/O expansion adapters, if you removed them (see "Installing the SD Media Adapter for System x" on page 745 and "Installing an I/O expansion adapter" on page 741).
- Step 8. Install the air baffles.

After you install the adapter-retention assembly, complete the following steps:

- 1. Install the cover onto the compute node (see "Installing the compute node cover" on page 701 for instructions).
- 2. Install the compute node into the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).

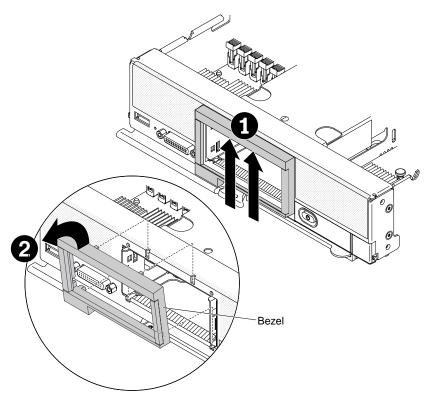
## **Removing the bezel**

Use this information to remove the bezel.

Before you remove the bezel, read "Safety" on page iii and "Installation guidelines" on page 691.

**Note:** Several different types of bezel can be installed in the compute node: all are removed and installed in a similar manner. The bezel shown in the illustrations might differ slightly from the bezel installed in your compute node.

To remove the bezel, complete the following steps.



- Step 1. If any hard disk drives, fillers, or SSD sleeves are installed, remove them.
- Step 2. Press up on the inside top of the bezel; then, rotate the top edge of the bezel away from the compute node.
- Step 3. Lift the bezel from the compute node.

If you are instructed to return the bezel, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

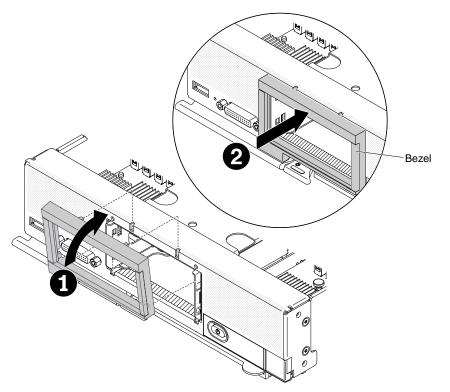
## Installing the bezel

Use this information to install the bezel.

Before you install the bezel, read "Safety" on page iii and "Installation guidelines" on page 691.

**Note:** Several different types of bezel can be installed in the compute node: all are removed and installed in a similar manner. The bezel shown in the illustrations might differ slightly from the bezel installed in your compute node.

To install the bezel, complete the following steps.



- Step 1. Position the bezel on the front of the compute node.
- Step 2. Hook the bottom edge of the bezel on the front of the compute node; then, rotate the top of the bezel toward the chassis.
- Step 3. Press the bezel securely against the chassis.

**Note:** Make sure that the bezel is pressed flat against the chassis. Lifting up slightly on the top edge of the bezel as you press it might make it easier to seat the clips.

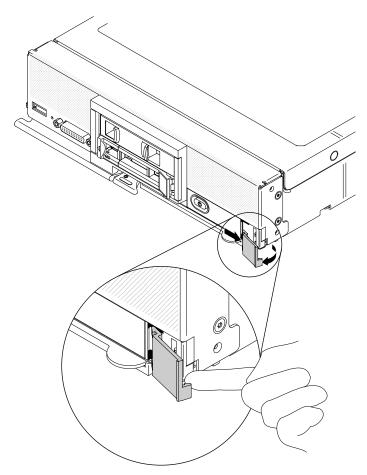
Step 4. Install any hard disk drives, fillers, or SSD sleeves that were removed.

## Removing the ID label plate

Use this information to remove the identification (ID) label plate from the front panel.

Before you remove the ID label plate, read "Safety" on page iii and "Installation guidelines" on page 691.

To remove the ID label plate, complete the following steps.



- Step 1. Using a finger nail or flat-blade screwdriver under the lower outside corner of the label plate, pull the outer edge of the ID label plate away from the compute node front panel.
- Step 2. Rotate the ID label plate away from the front panel; then, remove the ID label plate.

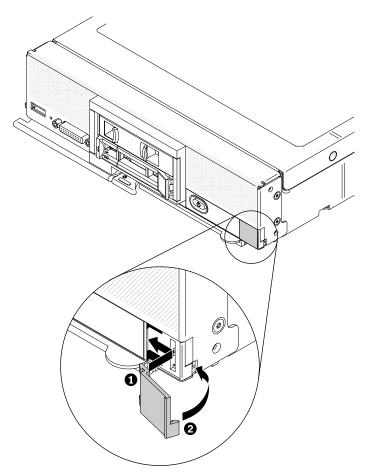
If you are instructed to return the ID label plate, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

## Installing the ID label plate

Use this information to install the identification (ID) label plate on the front panel.

Before you install the ID label plate, read "Safety" on page iii and "Installation guidelines" on page 691.

To install the ID label plate, complete the following steps.



- Step 1. Place the clips on the ID label plate into the slots on the compute node front panel.
- Step 2. Rotate the outer edge of the ID label plate toward the compute node front panel; then, press the ID label plate securely against the front panel.

## **Removing the CMOS battery**

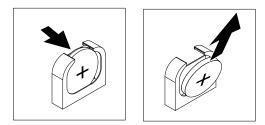
Use this information to remove the CMOS battery.

Before you remove the CMOS battery, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

To remove the CMOS battery, complete the following steps:

- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Locate the CMOS battery on the system board (see "System-board connectors" on page 18).
- Step 3. If a cover is over the CMOS battery, remove the cover.
- Step 4. Pivot the CMOS battery toward the middle of the compute node.



Step 5. Lift the CMOS battery from the socket.

After you remove the CMOS battery, dispose of the CMOS battery as required by local ordinances or regulations.

# Installing the CMOS battery

Use this information to install a CMOS battery.

Before you install the CMOS battery, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

The following notes describe information that you must consider when you are replacing the CMOS battery in the compute node:

- You must replace the CMOS battery with a lithium CMOS battery of the same type.
- To order replacement batteries, call 1-800-426-7378 within the United States, and 1-800-465-7999 or 1-800-465-6666 within Canada. Outside the U.S. and Canada, call your Lenovo marketing representative or authorized reseller.
- After you replace the CMOS battery, you must reconfigure the compute node and reset the system date and time.
- To avoid possible danger, read and follow the following safety statement.

#### Statement 2



#### CAUTION:

When replacing the lithium battery, use only Part Number 33F8354 or an equivalent type battery recommended by the manufacturer. If your system has a module containing a lithium battery, replace it only with the same module type made by the same manufacturer. The battery contains lithium and can explode if not properly used, handled, or disposed of. *Do not:* 

- Throw or immerse into water
- Heat to more than 100° C (212° F)
- Repair or disassemble

Dispose of the battery as required by local ordinances or regulations.

**Attention:** Touching the CMOS battery on a metal surface, such as the side of the compute node, when you replace the CMOS battery can cause it to fail.

To install a CMOS battery, complete the following steps:

- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Follow any special handling and installation instructions that come with the CMOS battery.
- Step 3. Locate the CMOS battery socket on the system board (see "System-board connectors" on page 18).
- Step 4. Orient the CMOS battery so that the positive (+) side faces in toward the center of the compute node.



- Step 5. Pivot the CMOS battery so that you can insert it into the bottom of the socket.
- Step 6. As you slide the CMOS battery into place, press the top of the CMOS battery into the socket.
- Step 7. If you removed a cover from the battery, replace the cover.

After you install the CMOS battery, complete the following steps:

- 1. Install the cover onto the compute node (see "Installing the compute node cover" on page 701 for instructions).
- 2. Install the compute node into the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).
- 3. Turn on the compute node, start the Setup utility, and reset the configuration (see "Using the Setup utility" on page 24 for instructions).

## **Removing a DIMM**

Use this information to remove a dual inline memory module (DIMM).

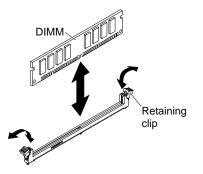
Before you remove a DIMM, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

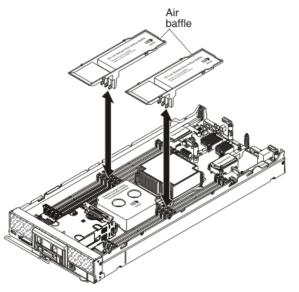
After you install or remove a DIMM, you must change and save the new configuration information by using the Setup utility. When you turn on the compute node, a message indicates that the memory configuration has changed. Start the Setup utility and select **Save Settings** (see "Using the Setup utility" on page 24 for more information) to save changes.

To remove a DIMM, complete the following steps.

**Note:** Remove or install DIMMs for one microprocessor at a time.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Remove the air baffle installed over the DIMM connector.

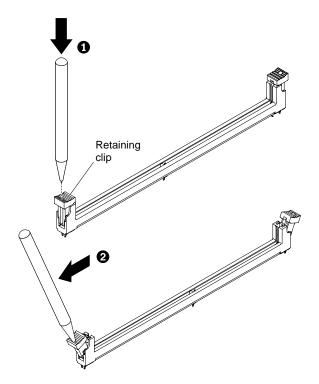


Step 3. Locate the DIMM connectors (see "System-board connectors" on page 18). Determine which DIMM you want to remove from the compute node.

**Attention:** To avoid breaking the retaining clips or damaging the DIMM connectors, handle the clips gently.

**Note:** The retaining clips for adjacent DIMM connectors of microprocessor one and microprocessor two can not be open at the same time. Remove or install the DIMMs for each microprocessor one at a time and close the retaining clips after removing a DIMM.

Step 4. Carefully open the retaining clips on each end of the DIMM connector.



**Note:** If necessary due to space constraints, you can use a pointed tool to open the retaining clips. Place the tip of the tool in the recess on the top of the retaining clip; then, carefully rotate the retaining clip away from the DIMM connector.

- Step 5. Make sure that both retaining clips on the DIMM connector from which you are removing the DIMM are in the fully-open position; then, pull the DIMM out of the connector.
- Step 6. If you are not immediately replacing the DIMM, install the air baffle.

**Attention:** To maintain proper system cooling, do not operate the compute node without air baffles installed over the DIMM connectors.

**Note:** Retaining clips on the DIMM connectors must be in the closed position to install the air baffles.

If you are instructed to return the DIMM, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

#### **Installing a DIMM**

Use this information to install a DIMM.

Before you install a DIMM, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. Read the documentation that comes with the DIMMs.
- 3. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 4. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

This component can be installed as an optional device or as a CRU. The installation procedure is the same for the optional device and the CRU.

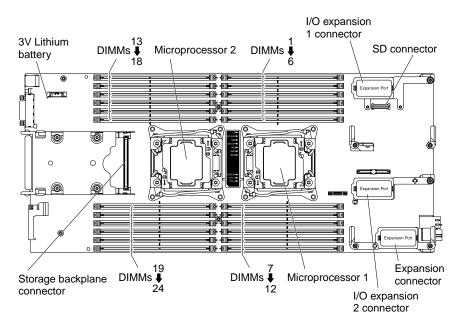
After you install or remove a DIMM, you must change and save the new configuration information by using the Setup utility. When you turn on the compute node, a message indicates that the memory configuration has changed. Start the Setup utility and select **Save Settings** (see "Using the Setup utility" on page 24 for more information) to save changes.

If you are installing a DIMM as a result of a DIMM failure, you might have to reenable the DIMM. To re-enable the DIMM, complete the following steps:

- 1. Verify that the amount of installed memory is the expected amount of memory through the operating system, by watching the monitor as the compute node starts, by using the CMM **sol** command, or through Flex System Manager management software (if installed).
  - For more information about the CMM **sol** command, see <u>"Flex System Chassis Management Module:</u> <u>Command-Line Interface Reference Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/information/topic/</u> <u>com.lenovo.acc.cmm.doc/cli\_command\_sol.html</u>.
  - For more information about Flex System Manager management software, see <a href="http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html">http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.8731.doc/product\_page.html</a>.
- 2. Run the Setup utility to reenable the DIMMs (see "Using the Setup utility" on page 24 for more information).

The compute node has a total of 24 dual inline memory module (DIMM) connectors. The compute node supports low-profile (LP) DDR4 DIMMs with error-correcting code (ECC) in 4 GB, 8 GB, 16 GB, 32 GB and 64 GB capacity.

The following illustration shows the system-board components, including DIMM connectors.



The memory is accessed internally through four channels. Each memory channel has three DIMM connectors for each microprocessor (six total). Each channel can have a maximum of eight ranks. The following table lists the memory channels and shows which DIMM connectors are in the channel for each microprocessor.

Table 12. Memory-channel configuration

Microprocessor	Memory channel	DIMM connectors
Microprocessor 1	Channel A	4, 5, and 6
	Channel B	1, 2, and 3

Table 12. Memory-channel configuration (continued)

Microprocessor	Memory channel	DIMM connectors
	Channel C	7, 8, and 9
	Channel D	10, 11, and 12
Microprocessor 2	Channel A	19, 20, and 21
	Channel B	22, 23, and 24
	Channel C	16, 17, and 18
	Channel D	13, 14, and 15

Depending on the memory mode that is set in the Setup utility, the compute node can support a minimum of 4 GB and a maximum of 768 GB of system memory in a compute node with one microprocessor. If two microprocessors are installed, the compute node can support a minimum of 8 GB and a maximum of 1536 GB of system memory.

Depending on the memory mode that is set in the Setup utility, the compute node can support a minimum of 4 GB and a maximum of 384 GB of system memory in a compute node with one microprocessor. If two microprocessors are installed, the compute node can support a minimum of 8 GB and a maximum of 768 GB of system memory.

The following notes describe information that you must consider when you install memory:

- Use only registered (RDIMM) DDR4 DIMMs.
- Maximum DIMM capacity:
  - Registered DIMMs (RDIMMs): 768 GB (using 32 GB RDIMMs)
  - Load Reduced DIMMs (LRDIMMs): 1536 GB (using 64 GB LRDIMMs)
- RDIMM sizes supported (GB): 4, 8, 16, 32
- LRDIMM sizes supported (GB): 32, 64
- You cannot mix RDIMMs and LRDIMMs in the same compute node.
- DIMMs are verified as authentic Lenovo modules by the UEFI software. If any non-authentic DIMMs are detected, an informational message appears in the system event log and memory performance might be limited. Non-authentic DIMMs are not covered by your Lenovo warranty.
- Install DIMMs in sets of four to optimize performance.
- Installing an equal amount of memory for each microprocessor is recommended.
- If DIMMs of different speeds are installed, memory on a channel operates at the speed of the lowestspeed DIMM in the channel.
- A total of eight ranks on each channel is supported.
- If multi-rank DIMMs are installed, install higher ranking DIMMS first starting in the connector at the end of the memory channel.
- Quad-rank RDIMMs are not supported.
- Rank multiplication is supported allowing up to three DIMMs per channel.
- If you install LRDIMMs in a 3 DIMM per channel configuration, performance might be reduced compared to standard DIMMs.
- Mixing of mirrored and non-mirrored modes is not supported.
- Lock-step channel mode is not supported.

The compute node supports the following DIMM speeds based on the number of DIMMs installed per channel:

Table 13. DIMM per channel speeds

Memory Description	DIMMs per channel	Speed (MHz)
4 GB (1Rx8, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	1	2133 MHz
4 GB (1Rx8, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	2	2133 MHz
4 GB (1Rx8, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	3	1600 MHz
8 GB (1Rx8, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	1	2133 MHz
8 GB (1Rx8, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	2	2133 MHz
8 GB (1Rx8, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	3	1600 MHz
8 GB (2Rx8, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	1	2133 MHz
8 GB (2Rx8, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	2	2133 MHz
8 GB (2Rx8, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	3	1600 MHz
16 GB (2Rx4, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	1	2133 MHz
16 GB (2Rx4, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	2	2133 MHz
16 GB (2Rx4, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	3	1866 MHz
32 GB (2Rx4, 8 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	1	2133 MHz
32 GB (2Rx4, 8 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	2	2133 MHz
32 GB (2Rx4, 8 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz RDIMM	3	1600 MHz / 1866 MHz
32 GB (2Rx4, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz LRDIMM	1	2133 MHz
32 GB (2Rx4, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz LRDIMM	2	2133 MHz
32 GB (2Rx4, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz LRDIMM	3	1866 MHz
64 GB (2Rx4, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz LRDIMM	1	2133 MHz
64 GB (2Rx4, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz LRDIMM	2	2133 MHz
64 GB (2Rx4, 4 Gbit, 1.2V) PC4-17000 TruDDR4 2133 MHz LRDIMM	3	1600 MHz / 1866 MHz

Table 14. DIMM per channel speeds

Memory Description	DIMMs per channel	Speed (MHz)
8 GB (1Rx4, 4 Gbit, 1.2V) PC4-19200 DDR4 2400 MHz LP RDIMM	1	2400 MHz
8 GB (1Rx4, 4 Gbit, 1.2V) PC4-19200 DDR4 2400 MHz LP RDIMM	2	2400 MHz
8 GB (1Rx4, 4 Gbit, 1.2V) PC4-19200 DDR4 2400 MHz LP RDIMM	3	1866 MHz
8 GB (2Rx8, 4 Gbit, 1.2V) PC4-19200 DDR4 2400 MHz LP RDIMM	1	2400 MHz
8 GB (2Rx8, 4 Gbit, 1.2V) PC4-19200 DDR4 2400 MHz LP RDIMM	2	2133 MHz
8 GB (2Rx8, 4 Gbit, 1.2V) PC4-19200 DDR4 2400 MHz LP RDIMM	3	1866 MHz
16 GB (2Rx4, 4 Gbit, 1.2V) PC4-19200 DDR4 2400 MHz LP RDIMM	1	2400 MHz

Table 14. DIMM per channel speeds (continued)

Memory Description	DIMMs per channel	Speed (MHz)
16 GB (2Rx4, 4 Gbit, 1.2V) PC4-19200 DDR4 2400 MHz LP RDIMM	2	2400 MHz
16 GB (2Rx4, 4 Gbit, 1.2V) PC4-19200 DDR4 2400 MHz LP RDIMM	3	1866 MHz
32 GB (2Rx4, 4 Gbit, 1.2V) PC4-19200 DDR4 2400 MHz LP RDIMM	1	2400 MHz
32 GB (2Rx4, 4 Gbit, 1.2V) PC4-19200 DDR4 2400 MHz LP RDIMM	2	2400 MHz
32 GB (2Rx4, 4 Gbit, 1.2V) PC4-19200 DDR4 2400 MHz LP RDIMM	3	1866 MHz

There are three memory modes:

- Independent-channel mode: Independent-channel mode provides a maximum of 768 GB of usable memory with one installed microprocessor, and 1536 GB of usable memory with two installed microprocessors (using 64 GB DIMMs).
- Independent-channel mode: Independent-channel mode provides a maximum of 384 GB of usable memory with one installed microprocessor, and 768 GB of usable memory with two installed microprocessors (using 32 GB DIMMs).
- **Rank-sparing mode:** In rank-sparing mode, one memory DIMM rank serves as a spare of the other ranks on the same channel. The spare rank is held in reserve and is not used as active memory. The spare rank must have identical or larger memory capacity than all the other active DIMM ranks on the same channel. After an error threshold is surpassed, the contents of that rank is copied to the spare rank. The failed rank of DIMMs is taken offline, and the spare rank is put online and used as active memory in place of the failed rank.

The memory rank sparing mode requires an even number of DIMMs. If your server has an odd number of DIMMs installed, ensure that you disable the memory rank sparing mode from the Memory menu in Setup Utility. See "Using the Setup utility" on page 24.

**Note:** After disabling the memory rank sparing mode, if a message prompts that the memory configuration is not valid, restart the IMM2. Alternatively, you can turn off the server, disconnect it from and then reconnect it to ac power, and then turn on the server again.

The following notes describe additional information that you must consider when you select rank-sparing memory mode:

- Rank-sparing on one channel is independent of the sparing on all other channels.
- To use rank sparing, install at least one DIMM pair for each microprocessor. If a channel has only one DIMM and it is single-rank or dual-rank, do not attempt to use memory sparing.
- The effective memory that is available to the system is less than what is installed.
- You can use the Setup utility to determine the status of the DIMM ranks.
- **Mirrored-channel mode:** In mirrored-channel mode, memory is installed in pairs. Each DIMM in a pair must be identical in size and architecture. The channels are grouped in pairs with each channel receiving the same data. One channel is used as a backup of the other, which provides redundancy. The memory contents on channel A are duplicated in channel B, and the memory contents of channel C are duplicated in channel D. The effective memory that is available to the system is only half of what is installed.

One DIMM for each microprocessor is the minimum requirement. However, for optimal performance, install DIMMs in sets of four so that you distribute memory equally across all four channels. If two microprocessors are installed, distribute memory across all channels and equally between the microprocessors.

Install DIMMs in order as indicated in the following table for independent-channel mode.

Number of	1 microprocessor installed		2 microprocessors installed	
installed DIMMs	DIMM slot number	DIMMs per channel	DIMM slot number	DIMMs per channel
1	4	1	4	1
2	9		16	
3	1		9	
4	12		21	
5	5	2	1	
6	8		13	
7	2		12	
8	11		24	
9	6	3	5	2
10	7		17	
11	3		8	
12	10		20	
13	Not used - maximum of 12 DIMMs in systems		2	
14	with 1 microprocessor		14	
15			11	
16			23	
17	]		6	3
18	]		18	
19	]		7	
20	]		19	
21	1		3	
22	]		15	
23	]		10	
24	1		22	

Table 15. DIMM population sequence for independent-channel mode

Install DIMMs in order as indicated in the following table for rank-sparing mode.

Table 16.	DIMM population sequence for rank-sparing mode
-----------	--

DIMM pair	2 DIMMs per channel		3 DIMMs per channel	
installation order	1 microprocessor installed	2 microprocessors installed	1 microprocessor installed	2 microprocessors installed
1	4 and 5	4 and 5	4, 5, and 6	4, 5, and 6
2	8 and 9	20 and 21	7, 8, and 9	19, 20, and 21
3	1 and 2	8 and 9	1, 2, and 3	7, 8, and 9
4	11 and 12	16 and 17	10, 11, and 12	16, 17 and 18
5	n/a	1 and 2	n/a	1, 2, and 3
6	1	23 and 24	]	22, 23, and 24

Table 16. DIMM population sequence for rank-sparing mode (continued)

DIMM pair	2 DIMMs per channel		3 DIMMs per channel	
installation order	1 microprocessor installed	2 microprocessors installed	1 microprocessor installed	2 microprocessors installed
7		11 and 12		10, 11, and 12
8	]	13 and 14		13, 14, and 15

Install DIMMs in order as indicated in the following table for mirrored-channel mode.

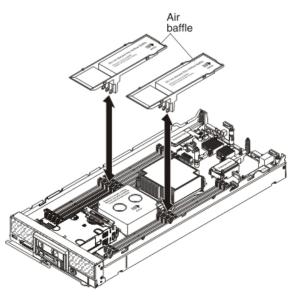
 Table 17. DIMM population sequence for mirrored-channel mode

	1 microprocessor installed		2 microprocessors installed	
DIMM pair	DIMM slot numbers	DIMMs per channel	DIMM slot numbers	DIMMs per channel
1	4 and 1 <sup>1</sup>	1	4 and 1 <sup>1</sup>	1
2	9 and 12 <sup>1</sup>		21 and 24 <sup>1</sup>	
3	2 and 5 <sup>1</sup>	2	9 and 12 <sup>1</sup>	
4	8 and 11 <sup>1</sup>		13 and 16 <sup>1</sup>	
5	3 and 6 <sup>1</sup>		2 and 5 <sup>1</sup>	2
6	7 and 10 <sup>1</sup>		20 and 23 <sup>1</sup>	
7	none		8 and 11 <sup>1</sup>	
8	none		14 and 17 <sup>1</sup>	1
9	none		3 and 6 <sup>1</sup>	3
10	none		19 and 22 <sup>1</sup>	
11	none		7 and 10 <sup>1</sup>	
12	none		15 and 18 <sup>1</sup>	
1. For mirrored-channel mode, the DIMM pair must be identical in size, type, and rank count.				

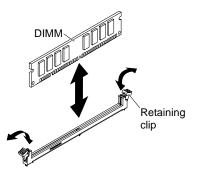
To install a DIMM, complete the following steps:

**Note:** Remove or install DIMMs for one microprocessor at a time.

- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Read the documentation that comes with the DIMM.
- Step 3. Remove the air baffle installed over the DIMM connector.



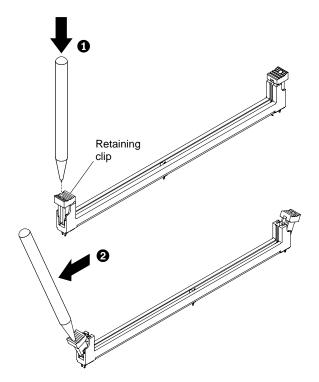
- Step 4. Locate the DIMM connectors (see "System-board connectors" on page 18). Determine in which DIMM connector you want to install the DIMM.
- Step 5. Touch the static-protective package that contains the DIMM to any *unpainted* metal surface on the Lenovo Flex System chassis or any *unpainted* metal surface on any other grounded rack component in the rack in which you are installing the DIMM for at least 2 seconds; then, remove the DIMM from its package.



Step 6. Make sure that both retaining clips on the DIMM connector are in the open position.

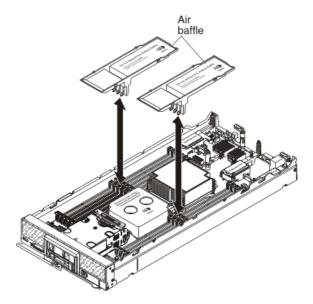
**Attention:** To avoid breaking the retaining clips or damaging the DIMM connector, handle the clips gently.

**Note:** The retaining clips for adjacent DIMM connectors of microprocessor one and microprocessor two can not be open at the same time. Remove or install the DIMMs for each microprocessor one at a time.



**Note:** If necessary due to space constraints, you can use a pointed tool to open the retaining clips. Place the tip of the tool in the recess on the top of the retaining clip; then, carefully rotate the retaining clip away from the DIMM connector.

- Step 7. Turn the DIMM so that the DIMM keys align correctly with the DIMM connector on the system board.
- Step 8. Press the DIMM into the DIMM connector. The retaining clips lock the DIMM into the connector.
- Step 9. Make sure that the small tabs on the retaining clips engage the notches on the DIMM. If there is a gap between the DIMM and the retaining clips, the DIMM has not been correctly installed. Press the DIMM firmly into the connector, and then press the retaining clips toward the DIMM until the tabs are fully seated. When the DIMM is correctly installed, the retaining clips are parallel to the sides of the DIMM.



**Note:** Retaining clips on the DIMM connectors must be in the closed position to install the air baffles.

Step 10. Install the air baffle over the DIMM connector.

**Attention:** To maintain proper system cooling, do not operate the compute node without air baffles installed over the DIMM connectors.

After you install the DIMM, complete the following steps:

- 1. Install the cover onto the compute node (see "Installing the compute node cover" on page 701 for instructions).
- 2. Install the compute node into the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).

## Removing a hard disk drive backplane

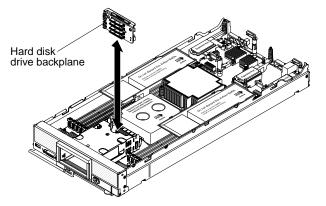
Use this information to remove a hard disk drive backplane.

Before you remove the hard disk drive backplane, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

**Note:** Several different types of hard disk drive backplane can be installed in the compute node: all are removed and installed in a similar manner. See the documentation that comes with an optional hard disk drive backplane for device-specific information and information about removing other components that might be included as part of the option. The hard disk drive backplane shown in the illustrations might differ slightly from the backplane installed in your compute node.

To remove a hard disk drive backplane, complete the following steps.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. If an optional RAID adapter is installed that has a cable connected to the hard disk drive backplane, disconnect the cable (see the documentation for your RAID adapter for additional information).
- Step 3. Remove any hard disk drive bay fillers; then, pull the hard disk drives or solid state drive mounting sleeves out slightly from the bays to disengage them from the backplane.
- Step 4. Lift out the hard disk drive backplane.

If you are instructed to return the hard disk drive backplane, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

# Installing a hard disk drive backplane

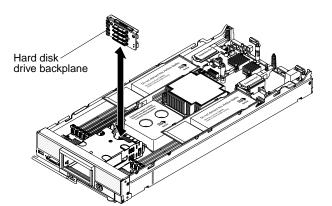
Use this information to install a hard disk drive backplane.

Before you install a hard disk drive backplane, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

#### Notes:

- Several different types of hard disk drive backplane can be installed in the compute node: all are removed and installed in a similar manner. The hard disk drive backplane shown in the illustrations might differ slightly from the backplane installed in your compute node.
- See the documentation that comes with an optional hard disk drive backplane for device-specific information and information about installing other components that might be included as part of the option or about other components or modules that must be installed to use the option. For example, some optional hard disk drive backplanes might require installation of a second microprocessor.



To install a hard disk drive backplane, complete the following steps.

Step 1. Remove the cover (see "Removing the compute node cover" on page 699).

**Important:** If you are installing a hard disk drive backplane that uses a solid state drive mounting sleeve, install the backplane before you install the mounting sleeve.

**Note:** All hard disk drive backplanes use the same connector on the system board; however, there are two alignment slots in the hard disk drive cage to accommodate different backplane types. Make sure that you align the backplane and system board connectors when inserting the backplane in the hard disk drive cage.

- Step 2. Align the backplane with the hard disk drive cage and the connector on the system board and press the backplane into position until it is fully seated in the connector.
- Step 3. If an optional RAID adapter is installed that has a cable that connects to the hard disk drive backplane, connect the cable (see documentation for your RAID adapter for additional information).
- Step 4. Insert the hot-swap hard disk drives, solid state drive mounting sleeves, and hard disk drive bay fillers.

After you install the hard disk drive backplane, complete the following steps:

- 1. Install the cover onto the compute node (see "Installing the compute node cover" on page 701 for instructions).
- 2. Install the compute node into the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).

## Removing a hot-swap hard disk drive

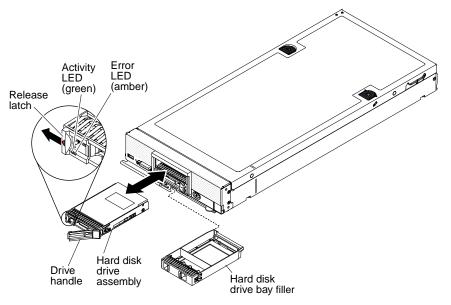
Use this information to remove a hot-swap hard disk drive.

Before you remove a hot-swap hard disk drive, complete the following steps:

**Note:** For information about removing optional 1.8-inch hot-swap solid-state drives, see "Removing a 1.8-inch solid state drive" on page 730.

- 1. Back up all important data before you make changes to hard disk drives.
- 2. Read "Safety" on page iii and "Installation guidelines" on page 691.

To remove a hot-swap hard disk drive, complete the following steps.



Step 1. Press the release latch (orange) on the hard disk drive to release the drive handle.

Step 2. Pull the release handle to remove the drive from the bay.

If you are instructed to return the hard disk drive, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

# Installing a hot-swap hard disk drive

Use this information to install a hot-swap hard disk drive.

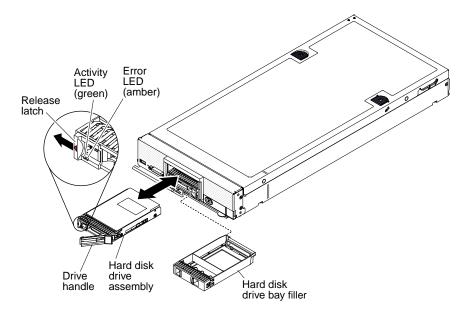
Before you install the hot-swap hard disk drive, read "Safety" on page iii and "Installation guidelines" on page 691.

The compute node has two SAS hard disk drive bays for installing hot-swap hard disk drives. One hard disk drive might already be installed in the compute node. If the compute node is equipped with one hard disk drive, you can install an additional drive. RAID level-0 (striping) can be configured on a compute node with a

single hard disk drive installed. A minimum of two disk drives of the same interface type must be installed to implement and manage RAID level-1 (mirroring) arrays. See "Configuring a RAID array" on page 35 for information about RAID configuration.

**Note:** For information about installing optional 1.8-inch hot-swap solid-state drives, see "Installing a 1.8-inch solid state drive" on page 732.

To install a hot-swap hard disk drive or hard disk drive bay filler, complete the following steps.



- Step 1. Identify the hard disk drive bay in which you plan to install the hot-swap hard disk drive.
- Step 2. If a hard disk drive bay filler is installed, remove it from the compute node by pulling the release lever and sliding the filler away from the compute node.
- Step 3. Touch the static-protective package that contains the hot-swap hard disk drive to any *unpainted* metal surface on the Lenovo Flex System chassis or any *unpainted* metal surface on any other grounded rack component; then, remove the hard disk drive from the package.
- Step 4. Open the release lever on the hot-swap hard disk drive and slide the drive into the bay until it is firmly seated in the connector.
- Step 5. Lock the hot-swap hard disk drive into place by closing the release lever.
- Step 6. Check the hard disk drive status LEDs to make sure that the hard disk drive is operating correctly.

See "Configuring a RAID array" on page 35 for information about SAS RAID configuration.

## Removing a solid state drive mounting sleeve

Use this information to remove an optional solid state drive mounting sleeve.

The solid state drive mounting sleeve is required to install optional 1.8-inch hot-swap solid-state drives (SSDs). Each mounting sleeve can hold up to two 1.8-inch hot-swap SSDs. When solid state drive mounting sleeves are used, two sleeves are installed in the compute node.

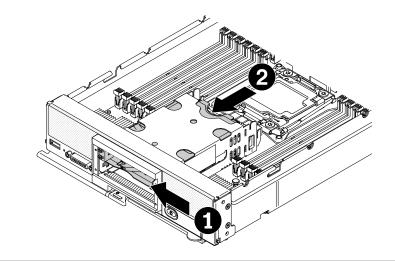
Before you remove a solid state drive mounting sleeve, complete the following steps:

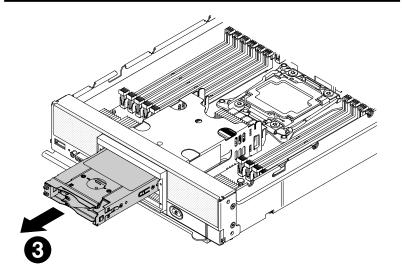
1. Read "Safety" on page iii and "Installation guidelines" on page 691.

- 2. If the Lenovo Flex System x240 M5 compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward the left.

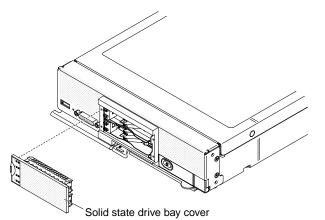
**Note:** There are two solid state drive mounting sleeves. The upper solid state drive mounting sleeve must be removed first.

To remove the solid state drive mounting sleeves, complete the following steps.





- Step 1. Remove the compute node cover (see "Removing the compute node cover" on page 699).
- Step 2. Locate the solid state drive mounting sleeves on the compute node.



Step 3. Remove the solid state drive bay cover.

- Step 4. Remove any SSD disk drives (see "Removing a 1.8-inch solid state drive" on page 730).
- Step 5. Press the tab at the front right side of the upper SSD mounting sleeve; then, press the top rear of the upper solid state drive mounting sleeve froward, slide it away from the compute node, and remove the sleeve from the bay.

**Note:** Use your finger nail or a flat-blade screwdriver to press the tab at the front right side of the SSD mounting sleeve. It might be easier to press the tab if the bezel is removed.

Step 6. Press the tab at the front right side of the lower SSD mounting sleeve; then, press the top rear of the lower solid state drive mounting sleeve froward, slide it away from the compute node, and remove the sleeve from the bay.

**Important:** Do not pry against the hard disk drive backplane or its connectors when sliding the lower SSD mounting sleeve forward.

If you are instructed to return a solid state drive mounting sleeve, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

If you are no longer planning to install SSD disk drives in the compute node, replace the hard disk drive backplane and compute node bezel, and hard disk drives or fillers with the components that were originally installed in the compute node. For information about replacing the hard disk drive backplane, see "Removing a hard disk drive backplane" on page 724 and "Installing a hard disk drive backplane" on page 725. For information about replacing the bezel, see "Removing the bezel" on page 708 and "Installing the bezel" on page 708.

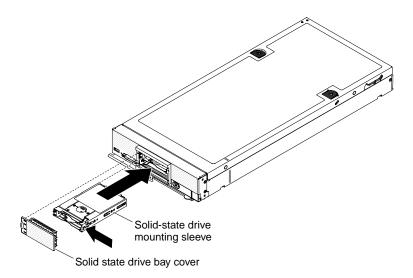
#### Installing a solid state drive mounting sleeve

Use this information to install an optional solid state drive mounting sleeve.

The solid state drive mounting sleeve is required to install optional 1.8-inch hot-swap solid-state drives (SSDs). Each mounting sleeve can hold up to two 1.8-inch hot-swap SSDs. When solid state drive mounting sleeves are used, two sleeves are installed in the compute node.

Before you install a hot-swap hard disk drive, read "Safety" on page iii and "Installation guidelines" on page 691.

To install a solid state drive mounting sleeve, complete the following steps.



**Important:** Installation of a solid state drive mounting sleeve requires installation of a compatible solid-state drive backplane, bezel, and solid state drive bay cover.

- Step 1. Remove the compute node cover (see "Removing the compute node cover" on page 699).
- Step 2. Identify the hard disk drive bay in which you plan to install the solid state drive mounting sleeve.

**Important:** If you are installing a hard disk drive backplane that uses a solid state drive mounting sleeve, install the backplane before you install the mounting sleeve (see "Installing a hard disk drive backplane" on page 725).

- Step 3. Touch the static-protective package that contains the solid state drive mounting sleeve to any *unpainted* metal surface on the Lenovo Flex System chassis or any *unpainted* metal surface on any other grounded rack component; then, remove the solid state drive mounting sleeve from the package.
- Step 4. Orient the solid state drive mounting sleeve so that the status LEDs are toward the left.
- Step 5. Slide the solid state drive mounting sleeve into the bay until it is firmly seated in the connector.
- Step 6. Install any SSD disk drives (see "Installing a 1.8-inch solid state drive" on page 732).
- Step 7. Install the solid state drive bay cover.

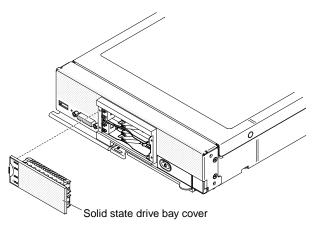
## Removing a 1.8-inch solid state drive

Use this information to remove a 1.8-inch hot-swap solid state drive (SSD). Solid state drives can be installed in the compute node, only if an SSD enablement kit is installed.

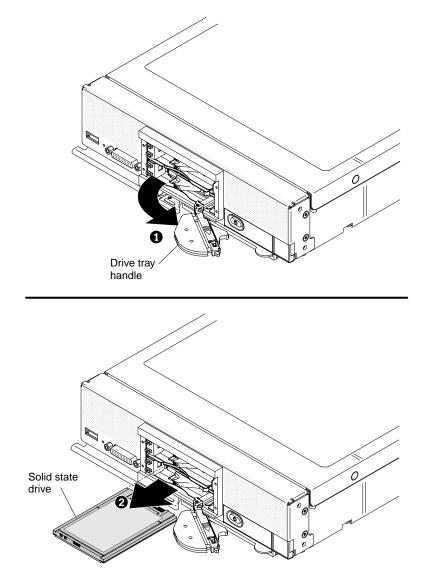
Before you remove a hot-swap solid state drive, complete the following steps:

- 1. Back up all important data before you make changes to solid state drives.
- 2. Read "Safety" on page iii and "Installation guidelines" on page 691.

To remove a hot-swap solid state drive, complete the following steps:



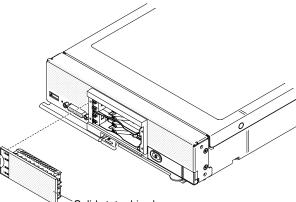




- Step 2. For the solid state drive that you want to remove, slide the release latch and rotate the loose end of the drive tray handle away from the compute node.
- Step 3. Pull forward on the drive tray handle to disengage the solid state drive; then, slide the solid state drive out of the drive bay.

**Note:** When you remove a drive from the compute node, consider labeling the drive to indicate the drive bay from which the drive was removed so that you can install the drive back in to the same drive bay.

- Step 4. Close the drive tray handle and secure it with the latch.
  - Note: You might have to press the latch before you close the drive tray handle.



Solid state drive bay cover

- Step 5. Orient the solid state drive bay cover so that the LED label is toward the left.
- Step 6. Press the solid state drive bay cover into the front of the compute node until it is firmly seated.

If you are instructed to return the solid state drive, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

## Installing a 1.8-inch solid state drive

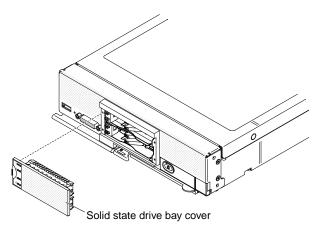
Use this information to install a 1.8-inch hot-swap solid state drive (SSD). Solid state drives can be installed in both the upper and lower compute nodes, if an SSD mounting sleeve is installed.

You can install up to four 1.8-inch solid state drives (SSDs) in a compute node if an optional SSD mounting sleeve is installed in the compute node. At least one 1.8-inch solid state drive must be installed in the SSD mounting sleeve. The 1.8-inch solid-state drives used in the Lenovo Flex System x240 M5 compute node are hot-swap drives.

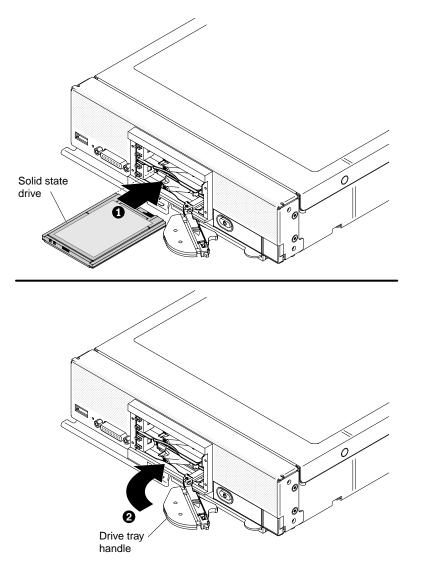
RAID level-0 (striping) can be configured on a compute node with a single hard disk drive installed. A minimum of two disk drives of the same interface type must be installed to implement and manage RAID level-1 (mirroring) arrays. See "Configuring a RAID array" on page 35 for information about RAID configuration. Additional RAID levels are supported if an optional RAID controller is installed in the compute node.

Before you install a 1.8-inch hot-swap solid state drive, read "Safety" on page iii and "Installation guidelines" on page 691.

To install a 1.8-inch hot-swap solid state drive, complete the following steps:



- Step 1. Remove the solid state drive bay cover.
- Step 2. For the solid state drive that you want to install, slide the release latch and rotate the loose end of the drive tray handle away from the compute node. Hook the recess on the drive tray handle on the tab on the right side of the solid state drive mounting sleeve to hold the drive tray handle in the open position.



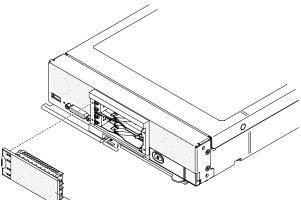
- Step 3. Touch the static-protective package that contains the solid state drive to any *unpainted* metal surface on the chassis or any *unpainted* metal surface on any other grounded rack component; then, remove the solid state drive from the package.
- Step 4. Orient the solid state drive so that the label on the drive is facing up (solid state drive connector contacts are facing down).

**Note:** There are no keys to prevent the drive from being inserted in the drive bay upside down. If the drive is inserted upside down, it will not seat in the connector and you will not be able to fully close the drive tray handle.

- Step 5. Slide the solid state drive into the drive bay until it is firmly seated in the connector.
- Step 6. Close the drive tray handle and secure it with the latch.

Note: You might have to press the latch before you close the drive tray handle.

Step 7. Repeat Step 3 step 3 on page 734 to Step 6 step 6 on page 734 for each solid state drive being installed.



Solid state drive bay cover

- Step 8. Orient the solid state drive bay cover so that the LED label is toward the left.
- Step 9. Press the solid state drive bay cover into the front of the compute node until it is firmly seated.

See "Configuring a RAID array" on page 35 for information about RAID configuration.

## **Removing a ServeRAID M5215 controller**

Use this information to remove a ServeRAID M5215 controller.

When the ServeRAID controller is removed, software RAID is not supported. The compute node does not support downgrading to the software RAID function from the hardware RAID configuration.

Before you remove the ServeRAID M5215 controller, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in an Lenovo Flex System chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

The ServeRAID M5215 controller uses a specific hard disk drive backplane.

 If you are removing the ServeRAID M5215 option from your compute node, you need to remove both the ServeRAID controller and its backplane, replacing the ServeRAID M5215 backplane with the hard disk drive backplane that came with your compute node. • If you are removing only the ServeRAID M5215 controller to replace it, there is no need to remove the ServeRAID M5215 backplane.

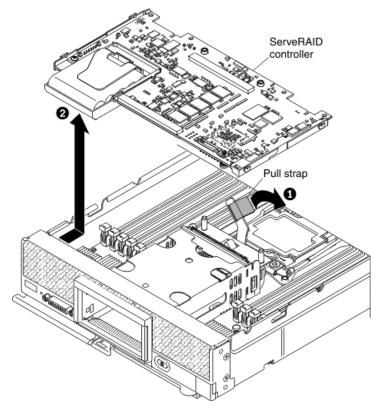
To remove the ServeRAID M5215 controller, complete the following steps.

**Note:** For additional information about removing a ServeRAID M5215 controller, see <u>"ServeRAID M5215 with</u> 2GB Flash Enablement - Lenovo Flex System x240 M5 Installation Guide" at http://pic.dhe.ibm.com/infocenter/ flexsys/information/topic/com.ibm.acc.common.nav.doc/options.html.

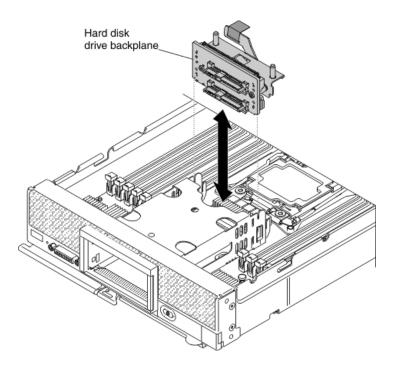
- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. If you are removing the ServeRAID M5215 controller and backplane, remove any storage drives and hard disk drive bay fillers and set them aside on a static-protective surface. (see "Removing a hot-swap hard disk drive" on page 726).

**Note:** Install storage drives and solid state drive mounting sleeves in the same bay locations as from which they were removed.

- Step 3. Locate the ServeRAID controller installed in the compute node.
- Step 4. Remove the ServeRAID controller.



- a. Lift and rotate the lever on the hard disk drive backplane to disengage the ServeRAID controller from its connector.
- b. Lift the ServeRAID controller and remove it from the compute node.
- Step 5. Lift and remove ServeRAID hard disk drive backplane from the system-board assembly (see "Removing a hard disk drive backplane" on page 724).



If you are instructed to return the ServeRAID controller or the ServeRAID controller backplane, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

# Installing a ServeRAID M5215 controller

Use this information to install a ServeRAID M5215 controller.

ServeRAID M5215 controller has an LSI 3108 SAS controller that supports RAID levels 0 and 1 when installed in a Lenovo Flex System x240 M5 compute node. When an optional ServeRAID M5215 controller is installed in the compute node, it overrides the hard disk drive controller that is on the compute node system board.

Before you install the ServeRAID M5215 controller, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in an Lenovo Flex System chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

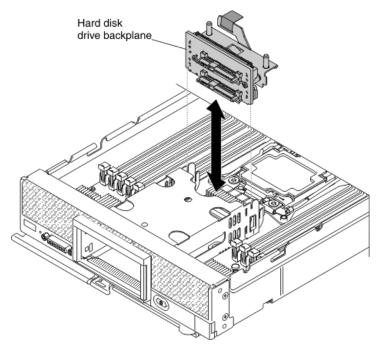
To install the ServeRAID M5215 controller, complete the following steps.

#### Notes:

- While replacing an adapter, backup or record your RAID configuration information beforehand if possible. See the documentation for your RAID adapter for information and instructions. Documentation for ServeRAID adapters can be downloaded from <a href="http://datacentersupport.lenovo.com">http://datacentersupport.lenovo.com</a>.
- For additional information about installing a ServeRAID M5215 controller, see <u>"ServeRAID M5215 with 2GB</u> Flash Enablement - Lenovo Flex System x240 M5 Installation Guide" at http://pic.dhe.ibm.com/infocenter/ flexsys/information/topic/com.ibm.acc.common.nav.doc/options.html.
- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. If a hard disk drive backplane is installed in the compute note that is not compatible with the ServeRAID M5215 controller, remove it (see "Removing a hard disk drive backplane" on page 724).

**Note:** All hard disk drive backplanes use the same connector on the system board; however, there are two alignment slots in the hard disk drive cage to accommodate different backplane types. Make sure that you align the backplane and system board connectors when inserting the backplane in the hard disk drive cage.

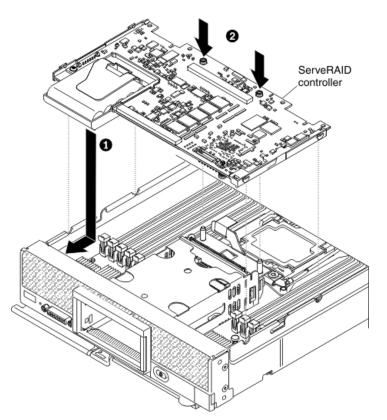
Step 3. If you are installing both the ServeRAID M5215 controller and hard disk drive backplane, install the ServeRAID M5215 hard disk drive backplane in the system-board assembly (see "Installing a hard disk drive backplane" on page 725). The ServeRAID M5215 controller hard disk drive backplane goes in the rear alignment slots on the hard disk drive cage.



Step 4. Touch the static-protective package that contains the ServeRAID controller to an *unpainted* metal surface on any grounded rack component; then, remove the controller from the package.

**Note:** Make sure that the flash power module is installed in the ServeRAID controller before installing the controller in the compute node (see <u>"ServeRAID M5215 with 2GB Flash Enablement -</u> Lenovo Flex System x240 M5 Installation Guide" at http://pic.dhe.ibm.com/infocenter/flexsys/ information/topic/com.ibm.acc.common.nav.doc/options.html for information and instructions.

- Step 5. Locate the ServeRAID controller connector on the hard disk drive backplane.
- Step 6. Orient the connector on the ServeRAID controller with the connector on the hard disk drive backplane; then, press the controller into the connector.



Step 7. Firmly press on the indicated locations to seat the ServeRAID controller.

Note: Install storage drives in the same bay locations as from which they were removed.

- Step 8. Install any removed storage drives and hard disk drive bay fillers (see "Installing a hot-swap hard disk drive" on page 726).
- Step 9. Import your RAID configuration to the replacement ServeRAID adapter as a foreign configuration. See <u>https://download.lenovo.com/servers\_pdf/ibm\_serveraid\_m\_software\_user\_guide\_11th\_edition.pdf</u> for instructions.

After you install the ServeRAID M5215 controller, complete the following steps:

- 1. Install the cover on the compute node (see "Installing the compute node cover" on page 701 for instructions).
- 2. Install the compute node into the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).
- 3. Configure the RAID array using the LSI Logic Configuration Utility program (see "Using the LSI Logic Configuration Utility" on page 35).

#### Removing an interposer cable

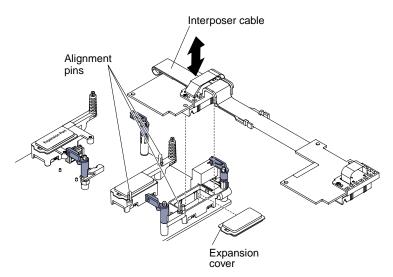
Use this information to remove an interposer cable.

Before you remove the interposer cable, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

To remove an interposer cable, complete the following steps.

**Note:** Some expansion nodes require an interposer cable that might be part of the expansion node. See the documentation that comes with your expansion node for additional information and instructions for removing this type of interposer cable (see <u>http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.common.nav.doc/expansion\_blades.html</u>).



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Locate the interposer connector (see "System-board connectors" on page 18).
- Step 3. If an I/O expansion card is installed over the interposer connector, remove it (see "Removing an I/O expansion adapter" on page 740).
- Step 4. Lift the interposer cable from the connector and remove the cable from the compute node. You might find it helpful to rock the cable connector back and forth, from front to rear, to disengage the connector.

**Important:** Rocking the connector from side to side might damage the interposer connector.

Step 5. If necessary, install the I/O expansion card (see "Installing an I/O expansion adapter" on page 741).

If you are instructed to return the interposer cable, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

#### Installing an interposer cable

Use this information to install an interposer cable.

Before you install an interposer cable, complete the following steps.

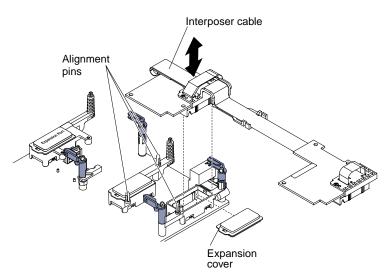
**Note:** Some expansion nodes require an interposer cable that might be part of the expansion node. See the documentation that comes with your expansion node for additional information and instructions for installing this type of interposer cable (see <u>http://flexsystem.lenovofiles.com/help/topic/com.lenovo.acc.common.nav.doc/</u><u>expansion\_blades.html</u>).

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

This component can be installed as an optional device or as a CRU. The installation procedure is the same for the optional device and the CRU.

Two microprocessors must be installed for the compute node to support an interposer cable.

To install an interposer cable, complete the following steps:



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Locate the interposer connector (see "System-board connectors" on page 18).
- Step 3. If an I/O expansion adapter is installed over the interposer connector, remove it (see "Removing an I/O expansion adapter" on page 740).
- Step 4. Touch the static-protective package that contains the interposer cable to any *unpainted* metal surface on the Lenovo Flex System chassis or any *unpainted* metal surface on any other grounded rack component; then, remove the interposer cable from the package.
- Step 5. Remove the plastic cover from the interposer connector, if one is present.
- Step 6. Orient the connector on the interposer cable with the interposer connector and alignment pins on the system board; then, press the cable into the interposer connector.
- Step 7. Firmly press on the indicated locations to seat the interposer cable.
- Step 8. If necessary, install the I/O expansion adapter (see "Installing an I/O expansion adapter" on page 741).

After you install the interposer cable, complete the following steps:

- 1. See the documentation that comes with the optional device that attaches to the interposer cable to complete the installation.
- Install the cover onto the compute node (see "Installing the compute node cover" on page 701 for instructions).

## Removing an I/O expansion adapter

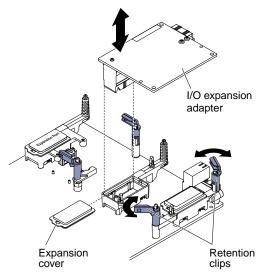
Use this information to remove an I/O expansion adapter.

Before you remove the I/O expansion adapter, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).

3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

To remove an I/O expansion adapter, complete the following steps.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Locate the I/O expansion adapter connectors (see "System-board layouts" on page 18).
- Step 3. Open the retention clips.
- Step 4. Lift the I/O expansion adapter from the connector and remove the I/O expansion adapter from the compute node. You might find it helpful to rock the adapter back and forth, from front to rear, to disengage the adapter.

**Important:** Rocking the adapter from side to side might damage the I/O expansion adapter connector.

If you are instructed to return the I/O expansion adapter, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

## Installing an I/O expansion adapter

Use this information to install an I/O expansion adapter.

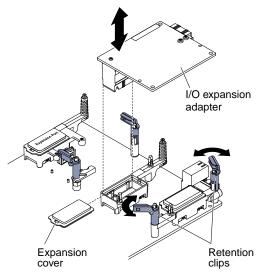
Before you install an I/O expansion adapter, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

This component can be installed as an optional device or as a CRU. The installation procedure is the same for the optional device and the CRU.

The optional Flex System PCIe Expansion Node supports additional PCIe adapters and I/O expansion adapters to provide a cost-effective way for you to increase and customize the capabilities of the compute node. For additional information, see <u>"PCIe Expansion Node" at http://pic.dhe.ibm.com/infocenter/flexsys/information/topic/com.ibm.acc.pme.doc/product\_page.html</u>.

To install an I/O expansion adapter, complete the following steps:



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Locate the I/O expansion connectors (see "System-board connectors" on page 18).
- Step 3. Remove the expansion cover from the connector, if one is present.
- Step 4. Touch the static-protective package that contains the expansion adapter to any *unpainted* metal surface on the Lenovo Flex System chassis or any *unpainted* metal surface on any other grounded rack component; then, remove the expansion adapter from the package.
- Step 5. Open the retention clips.
- Step 6. Orient the connector on the expansion adapter with the I/O expansion connector and alignment pins on the system board; then, press the adapter into the I/O expansion connector.
- Step 7. Firmly press on the indicated locations to seat the expansion adapter in the connector and over the alignment pins.
- Step 8. Close the retention clips.

After you install the I/O expansion adapter, complete the following steps:

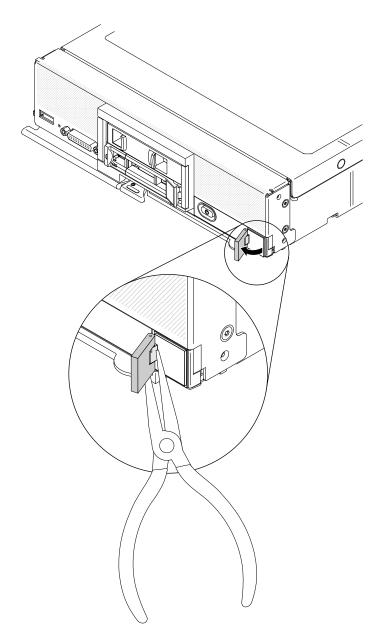
- 1. Install the cover onto the compute node (see "Installing the compute node cover" on page 701 for instructions).
- 2. Install the compute node into the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).
- 3. See the documentation that comes with the expansion adapter for device-driver and configuration information to complete the installation.

## **Removing the RFID tag**

Use this information to remove the RFID tag from the front panel.

Before you remove the RFID tag, read "Safety" on page iii and "Installation guidelines" on page 691.

To remove the RFID tag, complete the following steps.



Step 1. If the RFID tag is still attached to its hinge, open the RFID tag.

Important: Use care when removing the RFID tag to avoid damaging the ID label plate.

Step 2. Use pliers to carefully grip the RFID hinge and gently pull and twist the base of the RFID tag from the ID label plate on the front panel of the compute node. Hold the ID label plate in place on the compute node front panel while removing the RFID tag.

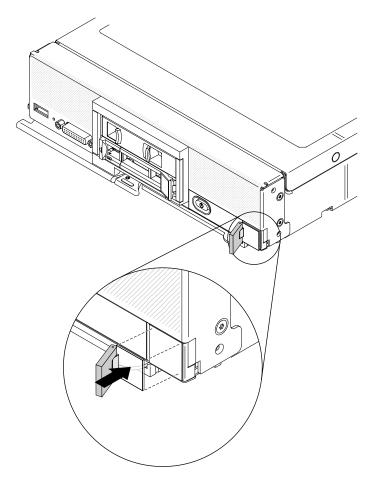
If you are instructed to return the RFID tag, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

## Installing the RFID tag

Use this information to install the RFID tag on the front panel.

Before you install the RFID tag, read "Safety" on page iii and "Installation guidelines" on page 691.

To install the RFID tag, complete the following steps.



- Step 1. Make sure that the surface you are installing the tag on is thoroughly clean and dry.
- Step 2. Open the RFID tag; then, remove the backing from the base of the RFID tag to expose the adhesive.
- Step 3. Position the RFID tag over the ID label on the front panel of the compute node.
- Step 4. Press the RFID tag securely against the bezel and hold firmly in place for 30 seconds.

#### Notes:

- Allow 30 minutes before closing or opening the RFID tag.
- Allow 24 hours to achieve near maximum adhesion.

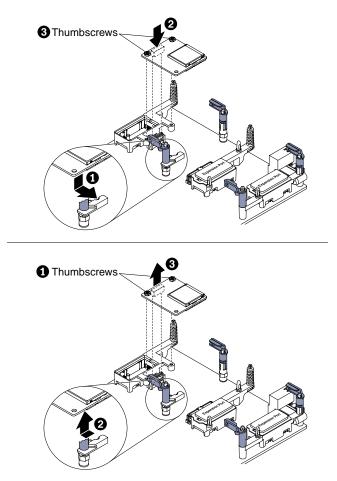
#### Removing the SD Media Adapter for System x

Use this information to remove an optional SD Media Adapter for System x (Adapter for SD Media or SD adapter).

Before you remove the Adapter for SD Media, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.
- 4. Obtain a #1 Phillips screwdriver.

To remove the Adapter for SD Media, complete the following steps.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. If an I/O expansion adapter is installed over the Adapter for SD Media, remove it (see "Removing an I/O expansion adapter" on page 740).
- Step 3. Remove any SD cards that are installed in the Adapter for SD Media (see "Removing an SD card" on page 747).
- Step 4. Using a #1 Phillips screwdriver, loosen the two captive screws that secure the Adapter for SD Media.
- Step 5. Rotate the end of the Adapter for SD Media with the captive screws up; then, remove the adapter from the compute node.

If you are instructed to return the Adapter for SD Media, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

#### Installing the SD Media Adapter for System x

Use this information to install an optional SD Media Adapter for System x (Adapter for SD Media or SD adapter).

Before you install the Adapter for SD Media, complete the following steps.

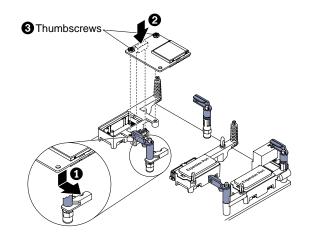
**Important:** If your SD adapter option comes with VMware vSphere ESXi software preloaded, you must make configuration changes to your system UEFI *before* installing the SD adapter in your compute node. See

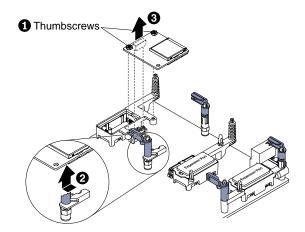
the documentation that comes with the SD adapter and "Using the Setup utility" on page 24 for information and instructions.

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.
- 4. Obtain a #1 Phillips screwdriver.

This component can be installed as an optional device or as a CRU. The installation procedure is the same for the optional device and the CRU.

To install the Adapter for SD Media , complete the following steps:





- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. If an I/O expansion adapter or interposer cable is installed over the Adapter for SD Media location, remove it (see "Removing an I/O expansion adapter" on page 740 or "Removing an interposer cable" on page 738).

**Note:** If an Adapter for SD Media is installed in the compute node, you can not install an interposer cable.

Step 3. Locate the Adapter for SD Media connector on the system board (see "System-board connectors" on page 18).

- Step 4. Install the Adapter for SD Media in the notch on the adapter-retention assembly; then, rotate the adapter into its connector on the system board. You might need to press firmly to seat the Adapter for SD Media in the notch on the adapter-retention assembly to align the connectors.
- Step 5. Using a #1 Phillips screwdriver, tighten the two captive screws to secure the adapter.

**Attention:** Make sure that the Adapter for SD Media is secure, but do not overtighten the screws to avoid damaging the adapter.

- Step 6. Install any SD cards in the connectors (see "Installing an SD card" on page 748).
- Step 7. If you removed the I/O expansion adapter, install it (see "Installing an I/O expansion adapter" on page 741).

After you install the Adapter for SD Media, complete the following steps:

- 1. Install the cover onto the compute node (see "Installing the compute node cover" on page 701 for instructions).
- 2. Install the compute node into the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).
- 3. See <a href="http://systemx.lenovofiles.com/help/topic/com.lenovo.sysx.server.doc/SD\_Media\_Adapter.pdf">http://systemx.lenovofiles.com/help/topic/com.lenovo.sysx.server.doc/SD\_Media\_Adapter.pdf</a>, which comes with the option, for information about how to configure the Adapter for SD Media.

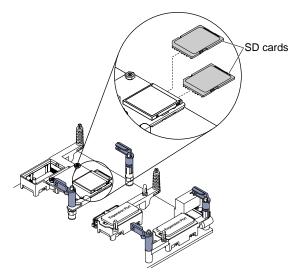
## **Removing an SD card**

Use this information to remove an SD card.

Before you remove an SD card, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

To remove an SD card, complete the following steps.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. If an I/O expansion adapter is installed over the Adapter for SD Media, remove it (see "Removing an I/O expansion adapter" on page 740).

- Step 3. Press the SD card further into its connector and release.
- Step 4. Pull the SD card out of the connector. Most SD cards have a finger-nail slot at the top, rear edge to make them easier to grasp.

**Note:** If you are unable to remove the SD card with the Adapter for SD media installed in the compute node, remove the Adapter for SD media from the compute node (see "Removing the SD Media Adapter for System x" on page 744).

If you are instructed to return an SD card, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

## Installing an SD card

Use this information to install an SD card.

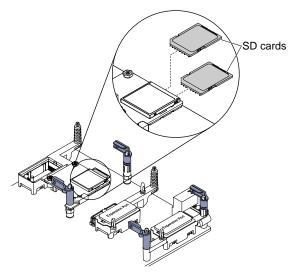
Before you install an SD card, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

Note: Installing an SD card requires an optional Adapter for SD Media (RAID Adapter for SD Media ).

This component can be installed as an optional device or as a CRU. The installation procedure is the same for the optional device and the CRU.

To install an SD card, complete the following steps.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. If an I/O expansion adapter is installed over the Adapter for SD Media (RAID Adapter for SD Media ), remove it (see "Removing an I/O expansion adapter" on page 740).
- Step 3. Locate the SD card connector on the Adapter for SD Media .

**Important:** The SD card must be installed in the correct orientation. If you force the SD card into the connector upside down or backwards, you might damage the connector. See the documentation that comes with the SD card for more information.

Step 4. Hold the SD card with the arrow pointing toward the SD connector; then, carefully press the SD card into the connector until it clicks into place.

**Note:** If you are unable to install an SD card with the Adapter for SD media installed in the compute node, remove the Adapter for SD media from the compute node (see "Removing the SD Media Adapter for System x" on page 744).

After you install an SD card, complete the following steps:

- 1. Install the cover onto the compute node (see "Installing the compute node cover" on page 701 for instructions).
- 2. Install the compute node into the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).

## Removing and replacing Tier 2 customer replaceable units (CRUs)

Use this information for removing and replacing Tier 2 CRUs.

You may install a Tier 2 CRU yourself or request Lenovo to install it, at no additional charge, under the type of warranty service that is designated for the compute node.

### Removing a microprocessor and heat sink

Use this information to remove a microprocessor and heat sink.

**Note:** This procedure should be performed only by trained service technicians.

Before you remove the microprocessor and heat sink, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

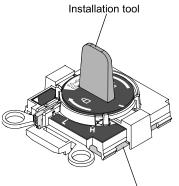
The following notes describe information that you must consider when you remove a microprocessor:

- Each microprocessor socket must always contain a heat-sink filler or a microprocessor and heat sink. If the compute node has only one microprocessor, it must be installed in microprocessor socket 1.
- Do not install the microprocessor socket dust cover, if it is available, when removing a microprocessor.
- The microprocessor installation tool might become worn after several uses. Make sure that the tool can hold the microprocessor securely if you are reusing an existing microprocessor installation tool. Do not return the tool with other parts that you are returning.
- If you are installing a second microprocessor, the option kit comes with a microprocessor installation tool
  that you must use when you install a microprocessor. The microprocessor installation tool comes with the
  replacement microprocessor installed on it and a cover over the microprocessor.
- If you are replacing a defective microprocessor, the CRU kit comes with one installation tool with the replacement microprocessor installed on it and a cover over the microprocessor, and one empty installation tool without a cover.
- If you are replacing a defective microprocessor, you must obtain the following for use during the replacement procedure (see Chapter 5 "Parts listing, Types 9532 and 2951" on page 51).
  - Alcohol wipes
  - Thermal grease

### Attention:

- Remove and install only one microprocessor at a time. When removing or installing a microprocessor, protect the other microprocessor socket with a microprocessor heat sink filler.
- Always use the microprocessor installation tool to remove or install a microprocessor. Failure to use the microprocessor installation tool can damage the microprocessor sockets on the system board. Any damage to the microprocessor sockets might require replacing the system board.

**Note:** Be sure to use the installation tool that comes with your microprocessor. The installation tool has two settings for installing two different sizes of microprocessors. The settings that are marked on the tool are "L" for smaller low core microprocessors, and "H" for larger high core microprocessors. The tool automatically adjusts during use to the correct setting for your microprocessor.



Microprocessor

To remove a microprocessor and heat sink, complete the following steps.

- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. Locate the microprocessor that is to be removed (see "System-board connectors" on page 18).
- Step 3. Remove the heat sink.

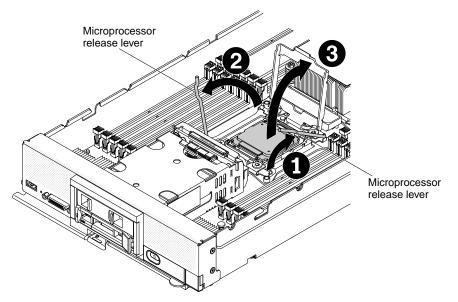
**Attention:** Do not touch the thermal material on the bottom of the heat sink. Touching the thermal material will contaminate it. If the thermal material becomes contaminated, see "Thermal grease" on page 760.

**Important:** The heat sinks for microprocessor 1 and microprocessor 2 are not interchangeable. If both heat sinks are being removed, label them so that they can be reinstalled on the correct microprocessor.

- a. Use a 5 mm (3/16-inch) nut driver to loosen the screw on one side of the heat sink to break the seal with the microprocessor.
- b. Use a 5 mm (3/16-inch) nut driver to loosen the screws on the heat sink, rotating each screw two full turns until each screw is loose.
- c. Gently pull the heat sink from the microprocessor.

**Attention:** Do not use any tools or sharp objects to lift the release levers on the microprocessor socket. Doing so might result in permanent damage to the system board.

Step 4. Open the microprocessor socket release levers and retainer.

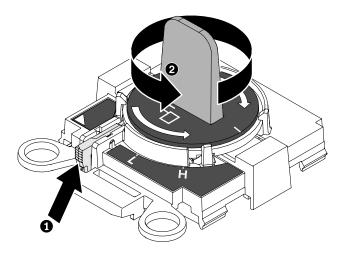


- a. Identify which release lever is labeled as the first release lever to open (labeled on the microprocessor-retention assembly) and open it.
- b. Open the second release lever on the microprocessor socket.
- c. Open the microprocessor retainer.

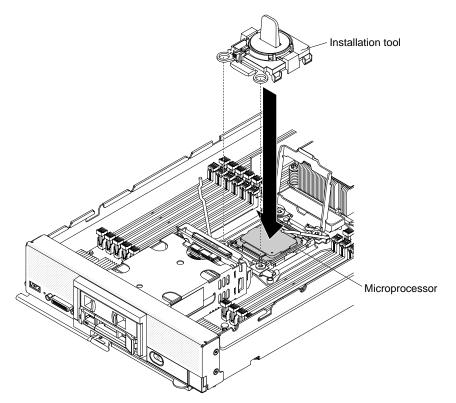
### Attention:

- Dropping the microprocessor during installation or removal can damage the contacts.
- Do not touch the connectors on the microprocessor and the microprocessor socket; handle the microprocessor by the edges only. Contaminants on the microprocessor contacts, such as oil from your skin, can cause connection failures between the contacts and the socket.
- Step 5. Using the microprocessor installation tool, remove the microprocessor from the socket.
  - a. Select the empty installation tool and make sure that the handle is in the open position.

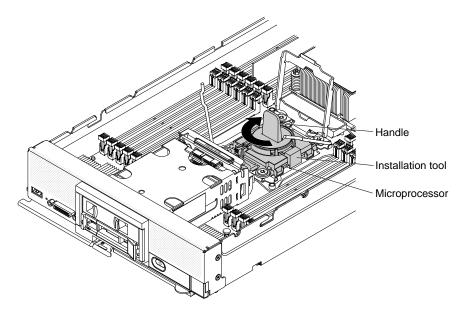
If the installation tool handle is not in the open position: 1) lift the interlock latch and hold it up while you 2) twist the microprocessor installation tool handle counterclockwise to the open position, and then release the interlock latch. The following illustration of the installation tool shows the location of the interlock latch and counterclockwise rotation of the handle before loading the microprocessor.

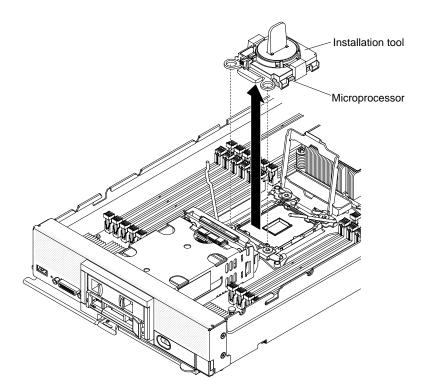


b. Align the installation tool with the screws, as shown in the following graphic, and lower the installation tool on the microprocessor. The installation tool rests flush on the socket only when it is aligned correctly.



c. Gently twist the handle of the installation tool clockwise until it locks in the "H" or "L" position, depending on the size of microprocessor; then, lift the microprocessor out of the socket.





Step 6. If you do not intend to install a microprocessor on the socket, close the microprocessor socket retainer and release levers (first lever to close is labeled on the microprocessor-retention assembly); then, install a heat sink filler on the microprocessor socket.

**Attention:** The pins on the socket are fragile. Any damage to the pins might require replacing the system board.

If you are instructed to return the microprocessor and heat sink, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

### Installing a microprocessor and heat sink

Use this information to install a microprocessor and heat sink.

**Note:** This procedure should be performed only by trained service technicians.

Before you install a microprocessor and heat sink, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- 2. If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the compute node on a flat, static-protective surface, orienting the compute node with the bezel pointing toward you.

The following notes describe the type of microprocessor that the compute node supports and other information that you must consider when you install a microprocessor:

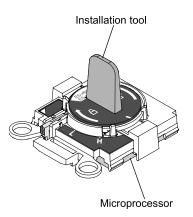
- This component can be installed as an optional device or as a CRU. The installation procedure is the same for the optional device and the CRU.
- The optional microprocessors that Lenovo supports are limited by the capacity and capability of the compute node. Any microprocessors that you install must have the same specifications as the microprocessors that came with the compute node.

- Each microprocessor socket must always contain a heat-sink filler or a microprocessor and heat sink. If the compute node has only one microprocessor, it must be installed in microprocessor socket 1.
- If you are installing a second microprocessor, make sure that the microprocessors are identical.
- Before you install a new microprocessor, download and install the most current level of UEFI code (see "Updating firmware and device drivers" on page 21).
- When you install a second microprocessor, you might have to install additional memory or redistribute memory across the DIMM connectors (see "Installing a DIMM " on page 715).
- Installing microprocessor 2 enables DIMM connectors 13 through 24 and the expansion connector (see "System-board connectors" on page 18). Microprocessor 2 is also required by some optional devices, such as PCIe hard disk drives, that can be installed in the compute node (see documentation that comes with the optional device for additional information and requirements).
- The microprocessor installation tool might become worn after several uses. Make sure that the tool can hold the microprocessor securely if you are reusing an existing microprocessor installation tool. Do not return the tool with other parts that you are returning.
- If you are installing a second microprocessor, the microprocessor option kit comes with a microprocessor installation tool that you must use when you install a microprocessor. The microprocessor installation tool comes with the replacement microprocessor installed on it and a cover over the microprocessor.
- If you are replacing a defective microprocessor, the CRU kit comes with one installation tool with the replacement microprocessor installed on it and a cover over the microprocessor, and one empty installation tool without a cover.
- If you are replacing a defective microprocessor, you must obtain the following for use during the replacement procedure (see Chapter 5 "Parts listing, Types 9532 and 2951" on page 51).
  - Alcohol wipes
  - Thermal grease

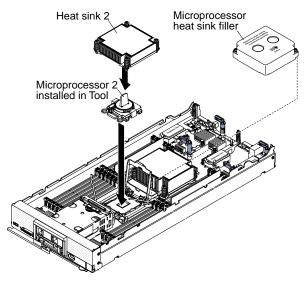
### Attention:

- Remove and install only one microprocessor at a time. When removing or installing a microprocessor, protect the other microprocessor socket with a microprocessor heat sink filler.
- Always use the microprocessor installation tool to remove or install a microprocessor. Failure to use the microprocessor installation tool can damage the microprocessor sockets on the system board. Any damage to the microprocessor sockets might require replacing the system board.
- Different microprocessor types might require a different type of heat sink. To maintain adequate cooling, make sure that you install the heat sink type specified for your microprocessor.
- Thermal grease can stay functional on the heat sink for two years. When installing a new heat sink, make sure to check the manufacturing date to ensure the thermal grease is still functioning. If the date is over two years ago, replace the thermal grease to avoid seating issues.

**Note:** Be sure to use the installation tool that comes with your microprocessor. The installation tool has two settings for installing two different sizes of microprocessors. The settings that are marked on the tool are "L" for smaller low core microprocessors, and "H" for larger high core microprocessors. The tool automatically adjusts during use to the correct setting for your microprocessor.



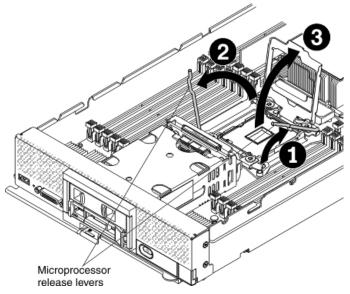
To install a microprocessor and heat sink, complete the following steps.



- Step 1. Remove the cover (see "Removing the compute node cover" on page 699).
- Step 2. If you are not installing a new microprocessor and a new heat sink, remove the thermal grease from the heat sink and microprocessor; then, apply new thermal grease before installation (see "Thermal grease" on page 760).
- Step 3. Remove the heat-sink filler, if one is present.

### Attention:

- Do not use any tools or sharp objects to lift the locking levers on the microprocessor socket. Doing so might result in permanent damage to the system board.
- Do not touch the connectors on the microprocessor socket. Contaminants on the microprocessor contacts, such as oil from your skin, can cause connection failures between the microprocessor contacts and the socket.
- Step 4. Open the microprocessor socket release levers and retainer.



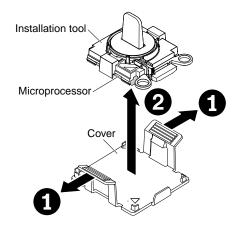
- a. Identify which release lever is labeled as the first release lever to open (labeled on the microprocessor-retention assembly) and open it.
- b. Open the second release lever on the microprocessor socket.
- c. Open the microprocessor retainer.
- Step 5. Install the microprocessor in the microprocessor socket.
  - a. Touch the static-protective package that contains the new microprocessor tool assembly with microprocessor to any *unpainted* on the compute node or any *unpainted* metal surface on any other grounded rack component.

**Attention:** Dropping the microprocessor during installation or removal can damage the contacts.

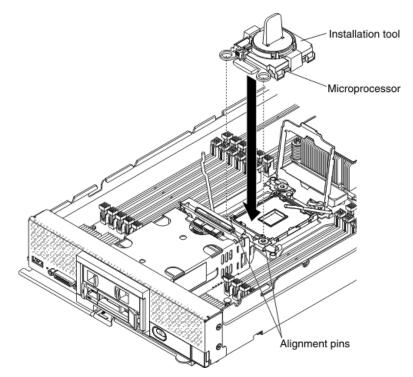
b. Open the packaging that contains the new microprocessor installation tool assembly and carefully remove the installation tool assembly with microprocessor from the package.

**Attention:** Do not touch the connectors on the microprocessor and the microprocessor socket; handle the microprocessor by the edges only. Contaminants on the microprocessor contacts, such as oil from your skin, can cause connection failures between the microprocessor contacts and the socket.

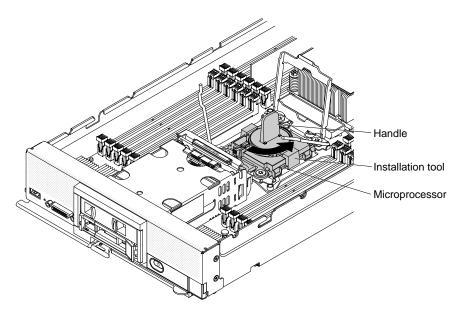
c. Release the sides of the cover and remove the cover from the installation tool. The microprocessor is preinstalled on the installation tool.



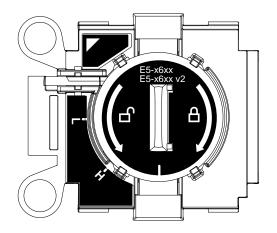
d. Align the installation tool with the microprocessor socket. The installation tool rests flush on the socket only if it is properly aligned.



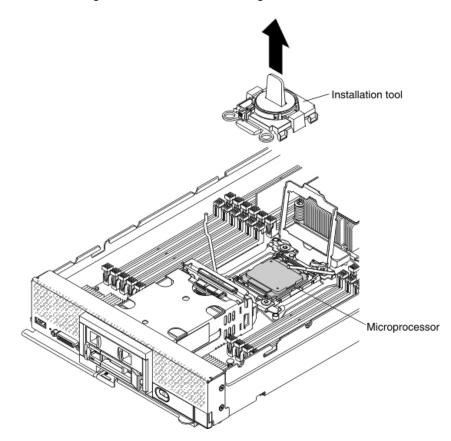
e. Twist the handle of the installation tool assembly counterclockwise until the microprocessor is inserted into the socket, and lift the installation tool out of the socket.



The following illustration shows the installation tool handle in the open position, ready for tool removal.

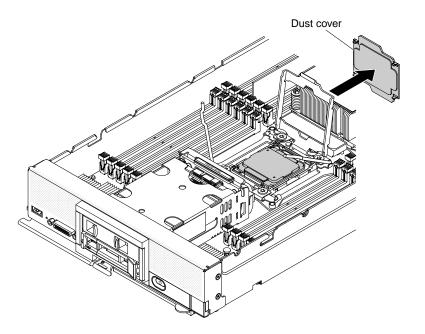


The following illustration shows removing the installation tool handle.



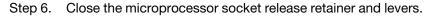
### Attention:

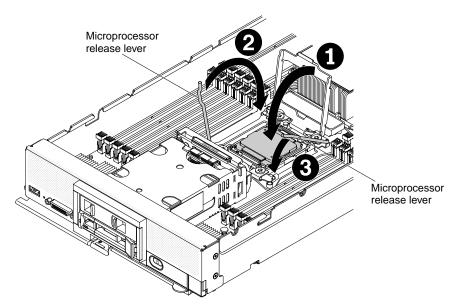
- Do not press the microprocessor into the socket.
- Do not touch the thermal grease on the bottom of the heat sink or on top of the microprocessor. Touching the thermal grease will contaminate it. If the thermal material becomes contaminated, see "Thermal grease" on page 760
- f. Remove the microprocessor protective dust cover, tape, or label from the surface of the microprocessor socket, if one is present.



#### Attention:

- Make sure that the microprocessor is aligned correctly in the socket before you try to close the microprocessor retainer.
- Make sure that the dust cover is removed before you try to close the microprocessor retainer.





- a. Close the microprocessor retainer on the microprocessor socket.
- b. Identify which release lever is labeled as the first release lever to close (labeled on the microprocessor-retention assembly) and close it.
- c. Close the second release lever on the microprocessor socket.

#### Attention:

- If you are installing a new heat sink, do not set down the heat sink after you remove the plastic cover.
- Do not touch the thermal material on the bottom of the heat sink. Touching the thermal material will contaminate it. If the thermal material becomes contaminated, see "Thermal grease" on page 760.

**Important:** The heat sinks for microprocessor 1 and microprocessor 2 are not interchangeable. Make sure that you install each heat sink on the correct microprocessor. The shorter heat sink installs on microprocessor 2 and the taller heat sink installs on microprocessor 1.

- Step 7. If you are installing a new heat sink, remove the plastic protective cover from the bottom of the heat sink. If you are reinstalling a heat sink that you previously removed from the compute node, make sure that the thermal material is still on the bottom of the heat sink and on the top of the microprocessor.
  - a. Position the heat sink over the microprocessor. The a notch on the heat sink is keyed to a tab on the light path diagnostics panel to assist with proper alignment.
  - b. Align and place the heat sink on top of the microprocessor in the retention bracket, thermal material side down.
  - c. Press firmly on the heat sink.
  - d. Align the screws on the heat sink with the holes on the heat-sink retention module.
  - e. Using a 5 mm (3/16-inch) nut driver, start the first captive screw, as shown on the heat sink label, and tighten it two full revolutions; then, press down on the opposite corner of the heat sink with your finger and tighten the captive screw in that corner two full revolutions.
  - f. Press firmly on each of the captive screws and tighten them with a 5 mm (3/16-inch) nut driver, alternating among the screws, as shown on the heat sink label, until they are tight. If possible, each screw should be rotated two full rotations at a time. Repeat until the screws are tight. Do not overtighten the screws by using excessive force. If you are using a torque wrench, tighten the screws to 8 inch-pounds (in-lb) to 10 in-lb (0.9 Newton-meters (Nm) to 1.13 Nm). Refer to the label on the heat sink for more information.

After you install a microprocessor and heat sink, complete the following steps:

- 1. Install the cover (see "Installing the compute node cover" on page 701).
- 2. Install the compute node in a Lenovo Flex System chassis (see "Installing a compute node in a chassis" on page 693 for instructions).

## **Thermal grease**

Use this information to determine the guidelines for using thermal grease on a heat sink and microprocessor.

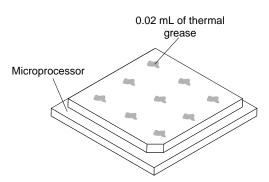
The thermal grease must be replaced whenever the heat sink has been removed from the top of the microprocessor and is going to be reused or when debris is found in the grease.

To replace damaged or contaminated thermal grease on the microprocessor and heat sink, complete the following steps:

- Step 1. Place the heat-sink assembly on a clean work surface.
- Step 2. Remove the cleaning pad from its package and unfold it completely.
- Step 3. Use the cleaning pad to wipe the thermal grease from the bottom of the heat sink.

**Note:** Make sure that all of the thermal grease is removed.

Step 4. Use a clean area of the cleaning pad to wipe the thermal grease from the microprocessor; then, dispose of the cleaning pad after all of the thermal grease is removed.



Step 5. Use the thermal-grease syringe to place nine uniformly spaced dots of 0.02 mL each on the top of the microprocessor.



**Note:** 0.01mL is one tick mark on the syringe. If the grease is properly applied, approximately half (0.22 mL) of the grease will remain in the syringe.

Step 6. Continue with the microprocessor installation instructions in "Installing a microprocessor and heat sink" on page 753.

## Removing and replacing the system-board assembly

Use this information to remove and replace the system-board assembly.

### Notes:

- This procedure should be performed only by trained service technicians.
- If possible, back up all compute node settings, including the settings for any options installed in the compute node. You can backup and restore system settings using the Advanced Setup Utility (ASU) (see <u>https://support.lenovo.com/solutions/Invo-asu</u> for information and instructions).

Before you replace the system-board assembly, complete the following steps:

- 1. Read "Safety" on page iii and "Installation guidelines" on page 691.
- If the compute node is installed in a chassis, remove it (see "Removing a compute node from a chassis" on page 692 for instructions).
- 3. Carefully lay the replacement system-board assembly (system board FRU) and the defective systemboard assembly (defective node) side-by-side on a flat, static-protective surface.
- 4. Obtain the following for use during the replacement procedure (see Chapter 5 "Parts listing, Types 9532 and 2951" on page 51).
  - Alcohol wipes
  - Thermal grease

**Important:** When you replace the system-board assembly, you must update the compute node with the latest firmware or restore the preexisting firmware. Make sure that you have the latest firmware or a copy of the preexisting firmware before you proceed. See "Updating firmware and device drivers" on page 21 for more information.

See "System-board layouts" on page 18 for more information about the locations of the connectors, switches, and LEDs on the system board.

To remove and replace the system-board assembly, complete the following steps:

**Important:** To avoid damage when replacing a defective system-board assembly, transfer internal components between the defective system-board assembly and the replacement system-board assembly one at a time. Unless otherwise noted, install each internal component in the replacement system-board assembly immediately after removing it from the defective system-board assembly.

- Step 1. Remove any storage drives, optional drive components, and hard disk drive bay fillers from the defective system-board assembly and set them aside on a static-protective surface. (see "Removing a hot-swap hard disk drive" on page 726, "Removing a 1.8-inch solid state drive" on page 730, or "Removing a solid state drive mounting sleeve" on page 727).
- Step 2. Remove the storage drive bezel from the defective system-board assembly and immediately install it on the replacement system-board assembly (see "Removing the bezel" on page 708 and "Installing the bezel" on page 708).
- Step 3. Remove the covers from both compute nodes (see "Removing the compute node cover" on page 699). Keep the cover that comes with the replacement system-board assembly for reference and re-install it on the defective system-board assembly prior to returning the defective system-board assembly.
- Step 4. If a ServeRAID controller is installed in the defective system-board assembly, remove it and set it aside on a static-protective surface. (see "Removing a ServeRAID M5215 controller" on page 734).

**Important:** If you are installing a hard disk drive backplane that uses a solid state drive mounting sleeve, remove the mounting sleeve before you remove the backplane and install the backplane before you install the mounting sleeve.

Step 5. Remove hard disk drive backplane from the defective system-board assembly and immediately install it in the replacement system-board assembly (see "Removing a hard disk drive backplane" on page 724 and "Installing a hard disk drive backplane" on page 725).

### Notes:

- Install storage drives and solid state drive mounting sleeves in the same bay locations as from which they were removed.
- Solid state drive mounting sleeves can be moved without removing the solid state drives inside of them.
- Step 6. Install any removed storage drives, optional drive components, and hard disk drive bay fillers into the replacement system-board assembly (see "Installing a hot-swap hard disk drive" on page 726, "Installing a solid state drive mounting sleeve" on page 729, or "Installing a 1.8-inch solid state drive" on page 732)
- Step 7. Remove the DIMM air baffles from defective system-board assembly and set them aside.

### Attention:

- Remove and install only one microprocessor at a time.
- When removing or installing a microprocessor, protect the other microprocessor socket with a microprocessor heat sink filler.
- When transferring a microprocessor to a replacement system-board assembly, install the microprocessor heat sink filler in the defective system-board assembly immediately after installing the microprocessor in the replacement system-board assembly.
- Step 8. Transfer microprocessor 1 (rear microprocessor) and its heat sink from the defective system-board assembly to the replacement system-board assembly. Use the microprocessor installation tool that comes with the replacement system-board assembly to remove the microprocessor from the

defective system-board assembly and install it immediately in the replacement system-board assembly.

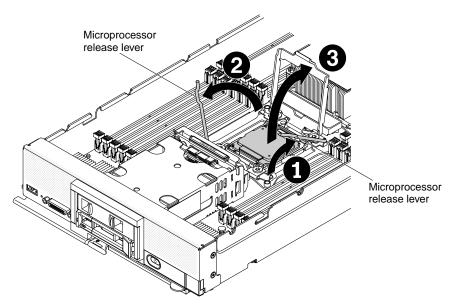
a. Remove the heat sink from the microprocessor on the defective system-board assembly and set it aside, thermal material side up, on a static-protective surface.

**Attention:** Do not touch the thermal material on the bottom of the heat sink. Touching the thermal material will contaminate it. If the thermal material becomes contaminated, see "Thermal grease" on page 760.

**Important:** The heat sinks for microprocessor 1 and microprocessor 2 are not interchangeable. If both heat sinks are being removed, label them so that they can be reinstalled on the correct microprocessor.

- 1. Use a 5 mm (3/16-inch) nut driver to loosen the screw on one side of the heat sink to break the seal with the microprocessor.
- 2. Use a 5 mm (3/16-inch) nut driver to loosen the screws on the heat sink, rotating each screw two full turns until each screw is loose.
- 3. Gently pull the heat sink from the microprocessor.
- b. Open the microprocessor socket release levers and retainer on the defective system-board assembly.

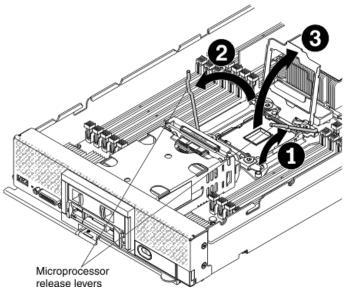
**Attention:** Do not use any tools or sharp objects to lift the release levers on the microprocessor socket. Doing so might result in permanent damage to the system board.



- 1. Identify which release lever is labeled as the first release lever to open (labeled on the microprocessor-retention assembly) and open it.
- 2. Open the second release lever on the microprocessor socket.
- 3. Open the microprocessor retainer.
- c. Remove the heat-sink filler on the replacement system-board assembly and set it aside.

**Attention:** Do not use any tools or sharp objects to lift the release levers on the microprocessor socket. Doing so might result in permanent damage to the system board.

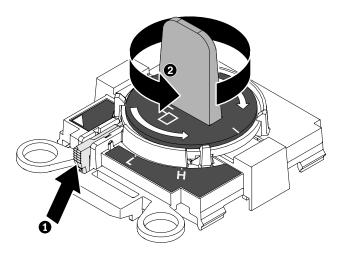
d. Open the microprocessor socket release levers and retainer on the replacement system-board assembly.



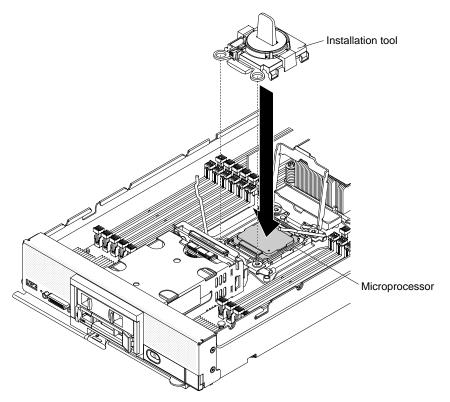
- 1. Identify which release lever is labeled as the first release lever to open (labeled on the microprocessor-retention assembly) and open it.
- 2. Open the second release lever on the microprocessor socket.
- 3. Open the microprocessor retainer.
- e. Using the microprocessor installation tool, remove the microprocessor from the socket on the defective system-board assembly.

#### Attention:

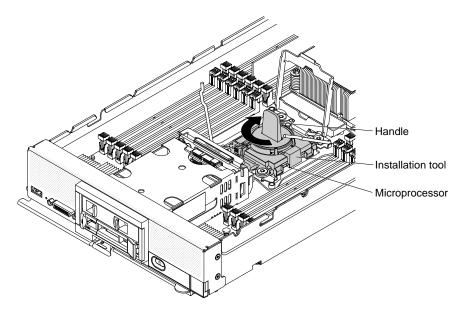
- Dropping the microprocessor during installation or removal can damage the contacts.
- Do not touch the connectors on the microprocessor and the microprocessor socket; handle the microprocessor by the edges only. Contaminants on the microprocessor contacts, such as oil from your skin, can cause connection failures between the contacts and the socket.
  - Select the empty installation tool and make sure that the handle is in the open position. If the installation tool handle is not in the open position: 1) lift the interlock latch and hold it up while you 2) twist the microprocessor installation tool handle counterclockwise to the open position, and then release the interlock latch. The following illustration of the installation tool shows the location of the interlock latch and counterclockwise rotation of the handle before loading the microprocessor.

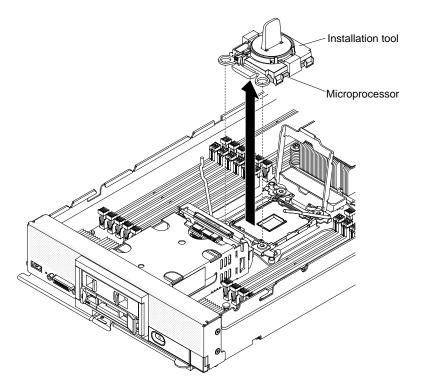


2. Align the installation tool with the screws, as shown in the following graphic, and lower the installation tool on the microprocessor. The installation tool rests flush on the socket only when it is aligned correctly.



3. Gently twist the handle of the installation tool clockwise until it locks in the "H" or "L" position, depending on the size of microprocessor; then, lift the microprocessor out of the socket.

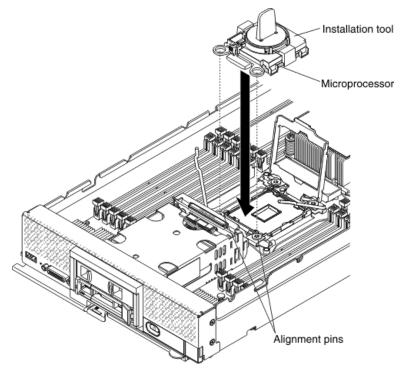




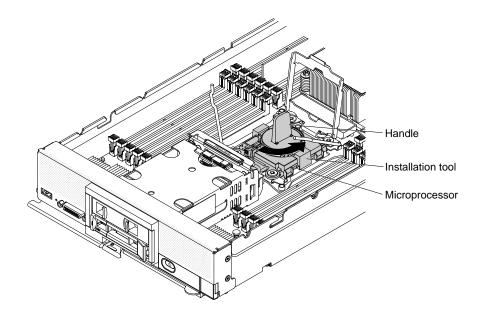
f. Install the microprocessor in the microprocessor socket on the replacement system-board assembly.

Attention: Do not press the microprocessor into the socket.

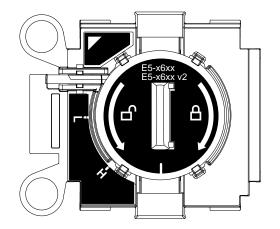
1. Align the installation tool with the microprocessor socket on the replacement systemboard assembly. The installation tool rests flush on the socket only if it is properly aligned.



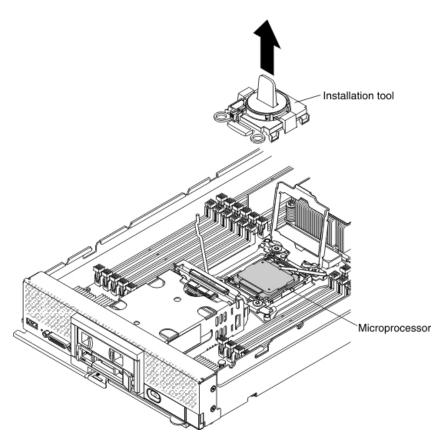
2. Twist the handle of the installation tool assembly counterclockwise until the microprocessor is inserted into the socket, and lift the installation tool out of the socket.



The following illustration shows the installation tool handle in the open position, ready for tool removal.

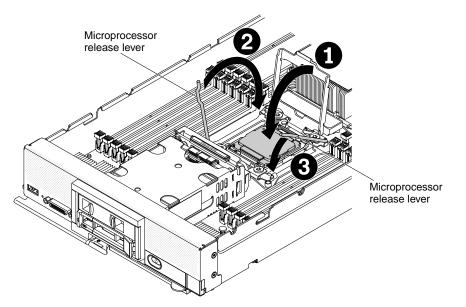


The following illustration shows removing the installation tool handle.



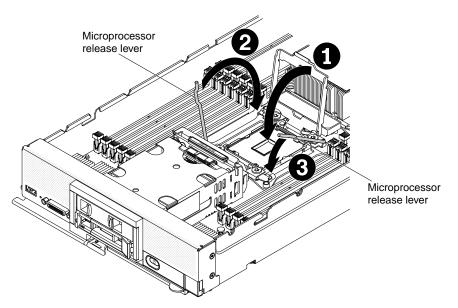
g. Close the microprocessor socket release retainer and levers on the replacement system-board assembly.

**Attention:** Make sure that the microprocessor is aligned correctly in the socket before you try to close the microprocessor retainer.



- 1. Close the microprocessor retainer on the microprocessor socket.
- 2. Identify which release lever is labeled as the first release lever to close (labeled on the microprocessor-retention assembly) and close it.
- 3. Close the second release lever on the microprocessor socket.

h. Close the microprocessor socket release retainer and levers on the defective system-board assembly.



- 1. Close the microprocessor retainer on the microprocessor socket.
- 2. Identify which release lever is labeled as the first release lever to close (labeled on the microprocessor-retention assembly) and close it.
- 3. Close the second release lever on the microprocessor socket.
- i. Install the heat-sink filler that you removed from the replacement system-board assembly on the defective system-board assembly.
- j. Install the heat-sink that you removed from the defective system-board assembly on the replacement system-board assembly.

**Attention:** Do not touch the thermal material on the bottom of the heat sink. Touching the thermal material will contaminate it. If the thermal material becomes contaminated, see "Thermal grease" on page 760.

**Important:** The heat sinks for microprocessor 1 and microprocessor 2 are not interchangeable. Make sure that you install each heat sink on the correct microprocessor. The shorter heat sink installs on microprocessor 2 and the taller heat sink installs on microprocessor 1.

- 1. Make sure that the thermal material is still on the bottom of the heat sink and on the top of the microprocessor.
- 2. Position the heat sink over the microprocessor. The a notch on the heat sink is keyed to a tab on the light path diagnostics panel to assist with proper alignment.
- 3. Align and place the heat sink on top of the microprocessor in the retention bracket, thermal material side down.
- 4. Press firmly on the heat sink.
- 5. Align the screws on the heat sink with the holes on the heat-sink retention module.
- 6. Using a 5 mm (3/16-inch) nut driver, start the first captive screw, as shown on the heat sink label, and tighten it two full revolutions; then, press down on the opposite corner of the heat sink with your finger and tighten the captive screw in that corner two full revolutions.

- 7. Press firmly on each of the captive screws and tighten them with a 5 mm (3/16-inch) nut driver, alternating among the screws, as shown on the heat sink label, until they are tight. If possible, each screw should be rotated two full rotations at a time. Repeat until the screws are tight. Do not overtighten the screws by using excessive force. If you are using a torque wrench, tighten the screws to 8 inch-pounds (in-lb) to 10 in-lb (0.9 Newton-meters (Nm) to 1.13 Nm). Refer to the label on the heat sink for more information.
- Step 9. Repeat Step 8 the previous step on page 762 for microprocessor 2 (front microprocessor), if one is installed.
- Step 10. Remove all of the installed components in the following list from the defective system-board assembly; then, immediately install them on the replacement system-board assembly:
  - DIMMs. See "Removing a DIMM" on page 713 and "Installing a DIMM " on page 715.
  - I/O expansion adapters and other optional components. See procedures such as:
    - "Removing the SD Media Adapter for System x" on page 744 and "Installing the SD Media Adapter for System x" on page 745

**Note:** Install the optional Adapter for SD Media before installing any optional I/O expansion adapters.

 "Removing an I/O expansion adapter" on page 740 and "Installing an I/O expansion adapter" on page 741

"Removing an interposer cable" on page 738 and "Installing an interposer cable" on page 739

- Step 11. If a ServeRAID controller was removed from the defective system-board assembly, install it in the replacement system-board assembly (see "Installing a ServeRAID M5215 controller" on page 736).
- Step 12. Install the DIMM air baffles in the replacement system-board assembly. The DIMM air baffles are required to maintain system cooling.

**Note:** Retaining clips on the DIMM connectors must be in the closed position to install the air baffles.

Step 13. Install the cover that you removed from the original (defective) system-board assembly onto the replacement system-board assembly (see "Installing the compute node cover" on page 701 for instructions).

**Important:** The heat sink fillers protect the microprocessor socket from potential damage during shipping.

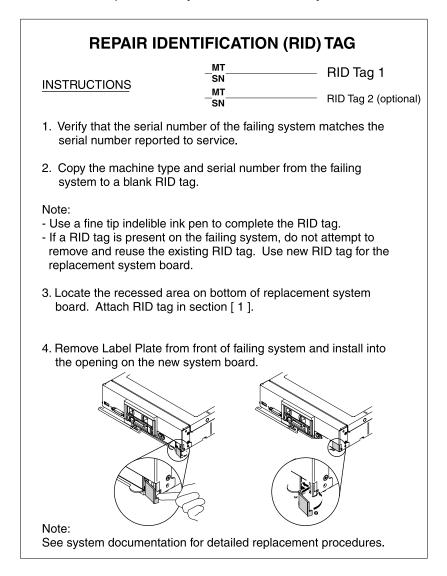
Step 14. Make sure that both microprocessor sockets on defective system-board assembly have heat sink fillers installed; then, install the cover that came with the replacement system-board assembly onto the defective system-board assembly (see "Installing the compute node cover" on page 701 for instructions).

**Note:** Retention clips that secure the I/O expansion adapters must be in the closed position to install the cover.

- Step 15. If a blank ID label plate is on the replacement system-board assembly, remove it and discard (see "Removing the ID label plate" on page 709).
- Step 16. Remove the ID label plate that has machine type and serial number information from the front panel of the defective system-board assembly and immediately install it on the replacement system-board assembly (see "Removing the ID label plate" on page 709 and "Installing the ID label plate" on page 710).

Note: If your compute node has an RFID tag, it is already attached to the ID label plate.

Step 17. The replacement system-board assembly comes with a Repair Identification (RID) tag. Using a fine tip indelible ink pen, transfer the machine type and serial number from the defective system-board assembly to the label on the Repair Identification tag; then, place the tag in the recessed area 1 on the bottom of replacement system-board assembly.



After you transfer components to the replacement system-board assembly, complete the following steps:

- 1. Install the compute node in the chassis (see "Installing a compute node in a chassis" on page 693 for instructions).
- 2. Use the CMM Web Interface to restore the IP address of the compute node IMM. See <u>Starting web</u> <u>interface in "Flex System Chassis Management Module: User's Guide" at http://pic.dhe.ibm.com/infocenter/</u> <u>flexsys/information/topic/com.lenovo.acc.cmm.doc/cmm\_ug\_startwebinterface.html</u> for more information.

**Note:** If you configured static IP addresses, you will not be able to access the node remotely or from a management device until the IP address of the IMM is restored.

 Reactivate any Features on Demand features. Instructions for automating the activation of features and installing activation keys is in the *Lenovo Features on Demand Users Guide*. To download the document, go to <u>https://fod.lenovo.com/lkms</u>, log in, and click **Help**.

- 4. Update the Universally Unique Identifier (UUID) and DMI/SMBIOS data with new vital product data (VPD). Use the Advanced Settings Utility to update the UUID and DMI/SMBIOS data (see "Updating the Universally Unique Identifier (UUID) and DMI/SMBIOS data with vital product data" on page 32).
- 5. Update the compute node with the latest firmware or restore the preexisting firmware (see "Updating firmware and device drivers" on page 21 for more information).

If you are instructed to return the defective system-board assembly, follow all packaging instructions, and use any packaging materials for shipping that are supplied to you.

**Important:** Make sure that both heat-sink fillers are installed on the defective system-board assembly that you are returning, prior to shipment. Use the heat-sink fillers that were removed from the replacement system-board assembly when you installed the microprocessors. Do *not* install the microprocessor socket dust covers in the defective system-board assembly that you are returning.

# Appendix A. Getting help and technical assistance

If you need help, service, or technical assistance or just want more information about Lenovo products, you will find a wide variety of sources available from Lenovo to assist you.

Use this information to obtain additional information about Lenovo and Lenovo products, and determine what to do if you experience a problem with your Lenovo system or optional device.

**Note:** This section includes references to IBM web sites and information about obtaining service. IBM is Lenovo's preferred service provider for the System x, Flex System, and NeXtScale System products.

## Before you call

Before you call, make sure that you have taken these steps to try to solve the problem yourself.

If you believe that you require warranty service for your Lenovo product, the service technicians will be able to assist you more efficiently if you prepare before you call.

- Check all cables to make sure that they are connected.
- Check the power switches to make sure that the system and any optional devices are turned on.
- Check for updated software, firmware, and operating-system device drivers for your Lenovo product. The Lenovo Warranty terms and conditions state that you, the owner of the Lenovo product, are responsible for maintaining and updating all software and firmware for the product (unless it is covered by an additional maintenance contract). Your service technician will request that you upgrade your software and firmware if the problem has a documented solution within a software upgrade.
- If you have installed new hardware or software in your environment, check <a href="http://www.lenovo.com/serverproven/">http://www.lenovo.com/</a> serverproven/ to make sure that the hardware and software is supported by your product.
- Go to <u>https://support.lenovo.com</u> to check for information to help you solve the problem.
- Gather the following information to provide to the service technician. This data will help the service technician quickly provide a solution to your problem and ensure that you receive the level of service for which you might have contracted.
  - Hardware and Software Maintenance agreement contract numbers, if applicable
  - Machine type number (Lenovo 4-digit machine identifier)
  - Model number
  - Serial number
  - Current system UEFI and firmware levels
  - Other pertinent information such as error messages and logs
- Go to <a href="https://www-947.ibm.com/support/servicerequest/Home.action">https://www-947.ibm.com/support/servicerequest/Home.action</a> to submit an Electronic Service Request will start the process of determining a solution to your problem by making the pertinent information available to the service technicians. The IBM service technicians can start working on your solution as soon as you have completed and submitted an Electronic Service Request.

You can solve many problems without outside assistance by following the troubleshooting procedures that Lenovo provides in the online help or in the Lenovo product documentation. The Lenovo product documentation also describes the diagnostic tests that you can perform. The documentation for most systems, operating systems, and programs contains troubleshooting procedures and explanations of error messages and error codes. If you suspect a software problem, see documentation for the operating system or program.

## Using the documentation

Information about your Lenovo system and preinstalled software, if any, or optional device is available in the product documentation. That documentation can include printed documents, online documents, readme files, and help files.

See the troubleshooting information in your system documentation for instructions for using the diagnostic programs. The troubleshooting information or the diagnostic programs might tell you that you need additional or updated device drivers or other software. Lenovo maintains pages on the World Wide Web where you can get the latest technical information and download device drivers and updates. To access these pages, go to <a href="https://support.lenovo.com">https://support.lenovo.com</a>.

## Getting help and information from the World Wide Web

Up-to-date information about Lenovo products and support is available on the World Wide Web.

On the World Wide Web, up-to-date information about Lenovo systems, optional devices, services, and support is available at <u>https://support.lenovo.com</u>. The most current version of the product documentation is available in the following product-specific Information Centers:

Flex System products: http://flexsystem.lenovofiles.com/help/index.jsp

System x products: <u>http://systemx.lenovofiles.com/help/index.jsp</u>

NeXtScale System products: http://nextscale.lenovofiles.com/help/index.jsp

## How to send DSA data

You can use the Enhanced Customer Data Repository to send diagnostic data to IBM.

Before you send diagnostic data to IBM, read the terms of use at <u>http://www.ibm.com/de/support/ecurep/</u>terms.html.

You can use any of the following methods to send diagnostic data:

- Standard upload: <u>http://www.ibm.com/de/support/ecurep/send\_http.html</u>
- Standard upload with the system serial number: http://www.ecurep.ibm.com/app/upload\_hw
- Secure upload: http://www.ibm.com/de/support/ecurep/send\_http.html#secure
- Secure upload with the system serial number: <u>https://www.ecurep.ibm.com/app/upload\_hw</u>

### Creating a personalized support web page

You can create a personalized support web page by identifying Lenovo products that are of interest to you.

To create a personalized support web page, go to <u>https://support.lenovo.com</u>. From this personalized page, you can subscribe to weekly email notifications about new technical documents, search for information and downloads, and access various administrative services.

## Software service and support

Through IBM Support Line, you can get telephone assistance, for a fee, with usage, configuration, and software problems with your Lenovo products.

For more information about Support Line and other IBM services, see <u>http://www.ibm.com/services</u> or see <u>https://datacentersupport.lenovo.com/us/en/supportphonelist</u> for support telephone numbers. In the U.S. and Canada, call 1-800-IBM-SERV (1-800-426-7378).

## Hardware service and support

IBM is Lenovo's preferred service provider for the System x, Flex System and NeXtScale System products.

You can receive hardware service through your Lenovo reseller or from IBM. To locate a reseller authorized by Lenovo to provide warranty service, go to <u>https://datacentersupport.lenovo.com/us/en/serviceprovider</u> and click **Business Partner Locator**. For IBM support telephone numbers, see <u>https://</u><u>datacentersupport.lenovo.com/us/en/supportphonelist</u>. In the U.S. and Canada, call 1-800-IBM-SERV (1-800-426-7378).

In the U.S. and Canada, hardware service and support is available 24 hours a day, 7 days a week. In the U. K., these services are available Monday through Friday, from 9 a.m. to 6 p.m.

## Taiwan product service

Use this information to contact product service for Taiwan.

委製商/進口商名稱:台灣聯想環球科技股份有限公司 進口商地址:台北市南港區三重路 66 號 8 樓 進口商電話: 0800-000-702

# Index

1.8-inch drive installing 732 removing 730

# A

accessing the IMM2 41 activity LED 12 Adapter for SD Media installing 745 removing 744 adapter-retention assembly installing 706 removing 705 adapters and UEFI drivers, Setup utility 24 Advanced Settings Utility (ASU) 32 array, RAID 732 array, SAS 726 assistance, getting 773 Attention notice, meaning 3

# В

bezel installing 708 removing 708 boot manager, Setup utility 24 Boot Selection Menu program 31 Brocade documentation 3 button, power 12

# С

cannot communicate with a compute node 670 cannot communicate with the CMM 670 Cannot communicate with the CMM 670 Cannot communicate with the I/O module 670 Cannot communicate with the management node 670 cannot connect to the data network during initial setup, troubleshooting 671 Cannot log in to the CMM 673 Cannot log in to the I/O module 673 Cannot log in to the management node 673 Cannot log in, troubleshooting 673 Cannot ping the CMM, troubleshooting 673 Cannot ping the I/O module, troubleshooting 675 Cannot ping the management node, troubleshooting 677,679 Caution notice, meaning 3 chassis bulkhead installing 699 removing 698 chassis management module 6 chassis, support for 1 check log LED 12 CMM cannot ping the CMM 675 CMOS battery 18 installing 712 removing 711 collecting service data 689 commands on USB interface preference, Setup utility 24 components compute node, removing and replacing 691 illustrated 11 returning 692

system board 18 compute node installing 693 parts list 51 removing 692 compute node cover installing 701 removing 699 compute node start problems 669 configuration minimum 715 updating 692 configuration summary, viewing 43 configuring compute node 23 LAN over USB manually 47 RAID array 35 configuring a RAID array 35 connectivity problems 670 35 connectors, system board 18 console breakout cable 16 consumable and structural parts, removing and replacing 695 controller memory 6 6 video cover installing 701 removing 699 creating a personalized support web page 774 CRUs, Tier 1, removing and replacing 705 CRUs, Tier 2, removing and replacing 749 custom support web page 774

# D

Danger notice, meaning 3 defective node 761 device drivers, updating 21 device, returning 692 devices and I/O ports, Setup utility 24 diagnostic tools 63 DIMM installing 715 removing 713 DIMM connectors 18 disabling LAN over USB interface 47 DMI/SMBIOS data, updating locally: keyboard controller style 32 locally: LAN over USB 33 remotely over a LAN 34 documentation using 774 documentation, Brocade 3 documentation, related 2 drive option, SAS 726 DSA editions 69 portable 69 preboot 69 running 69 text messages 70 viewing test results 70 DSA diagnostics overview 68 DSA log 203 DSA, sending data 774

Dynamic system analysis diagnostics DSA 68

## Ε

electrical equipment, servicing Electronic Service Agent (ESA) 689 error codes 203 IMM 203 IMM2 203 UEFI diagnostic codes 649 error symptoms hard disk drive 683 software 688 errors connectivity 670 684 memory observable problems 685 software 688 event log IMM2 66 viewing without restarting compute node 67 event logs 203

## F

fabric connector location 18 fault LED 12 features ServerGuide 38 Features on Demand 36 features, compute node 6 filler, node bay 693 finding the UEFI diagnostic code 650 firmware recovering from update failure 22 updating 21 first-failure data capture (FFDA) 689 Force legacy video on boot, Setup utility 24 front handle installing 702 removing 702 front panel 696 installing removing 695

# G

guidelines installation 691 servicing electrical equipment v system reliability 691 trained service technicians iv

## Η

handle, front installing 702 removing 702 hard disk drive problems 683 specifications 6 support 6 hard disk drive backplane installing 725 removing 724 hard disk drive cage installing 704

removing 703 hard disk drives hot swap, installing 726 specifications 6 support 6 hardware service and support telephone numbers 775 HDD backplane connector 18 heat sink installing 753 749 removing thermal grease 760 help from the World Wide Web 774 from World Wide Web 774 sending diagnostic data 774 sources of 773 host compute node startup sequence, changing 43 hot-swap hard disk device SAS hard disk drive 726 hot-swap hard disk drive installing 726 removing 726 hot-swap hard disk drive backplane installing 725 removing 724 hot-swap hard disk drive cage removing 703

### I

I/O expansion adapter installing 741 removing 740 I/O expansion connectors 18 ID label plate installing 710 removing 709 identification label plate installing 710 removing 709 identify LED 12 IMM2 accessing 47 action descriptions 43 clearing the system event log 24 IP addresses, LAN over USB 47 MAC address and hostname 41 network access tag 41 21 reset to defaults Setup utility 24 system event log, viewing through Setup utility 66 using 41 viewing from Setup utility 66 viewing the system event log 24 Important notice, meaning 3 information center 774 inspecting for unsafe conditions iv installation guidelines 691 installing 1.8-inch drive 732 bezel 708 compute node 693 front panel 696 hot-swap hard disk drives 726 ID label plate 710 identification label plate 710 optional devices 691 RFID tag 743 SAS hard disk drive 726 solid state drive mounting sleeve 729 installing an optional device 691 integrated management module IMM2 24

intermittent connectivity problems 684 intermittent problems 683 interposer cable installing 739 removing 738 IP addresses, LAN over USB 47

# J

jumpers, system board 19

# Κ

KCS address, IMM2 47 keyboard controller style address, IMM2 47

# L

LAN over USB configuring manually 47 conflicts 47 disabling interface 47 IP addresses 47 Linux driver installation 49 resolving conflicts 47 Windows driver installation 48 LEDs activity 12 check log 12 CMOS battery error 18 DIMMs 18 fault 12 identify 12 I/O expansion adapter 18 microprocessor 18 power 12 SAS backplane 18 system board 18 viewing 63 legacy support, Setup utility 24 legacy Thunk support, Setup utility 24 Lenovo Flex System x240 M5 compute node specifications 4 Lenovo XClarity Administrator 9 light path diagnostics 63 light path diagnostics panel 18 light path diagnostics, viewing 63 Light driver I AN over USB 49 Linux driver, LAN over USB load-sharing power throttling 6 Logic Configuration Utility, LSI 35 LSI Logic Configuration Utility 35

# Μ

MAC address 41 MAC address label 41 major components system board 11 memory mirroring 715 memory module installing 715 removing 713 specifications 6 memory problems 684 memory, Setup utility 24 messages 203 IMM UEFI diagnostic codes 649

© Copyright Lenovo 2014, and 2014, 2020, 2020

microprocessor installing 753 removing 749 thermal grease 760 microprocessor connector 18 minimum configuration 715 Multiple nodes cannot ping the CMM 674 Multiple nodes cannot ping the I/O module 676 Multiple nodes cannot ping the management node 678–679, 681–682 Multiple nodes cannot ping the management node in a different chassis 678, 682 multiple nodes do not power on 688

## Ν

network access tag 41 network configuration, Setup utility 24 network, Setup utility 24 node bay filler 693 NOS installation without ServerGuide 39 nx boot failure 30

# 0

observable problems 685 one compute node experiences a sudden loss of network (Ethernet) connectivity 672 one compute node is unable to connect to the data network during initial setup 671 one or more compute nodes is unable to communicate with SAN 671 operating modes, Setup utility 24 operating system installing 37–38 operating system installation with ServerGuide 39 optional device and replaceable component installation problems 686 optional devices, installing 691

# Ρ

parts listing 51 performance problems 687 POST event viewer 24 POST event log 203 POST watchdog timer, Setup utility 24 power throttling 6 power button 12 power LED 12 power-on problems 687-688 compute node does not power off 688 single node does not power on 687 power, Setup utility 24 problems 671 compute node start 669 connectivity 670 hard disk drive 683 intermittent 683 intermittent connectivity 684 memory 684 multiple nodes do not power on 688 observable problems 685 686 optional device and replaceable component installation performance 687 power-on 687-688

compute node does not power off 688 single node does not power on 687 software 688 undetermined 689 processors, Setup utility 24 product service, Taiwan 775 publications, Brocade 3 publications, related 2 PXE Boot Agent 43 PXE boot protocol, setting 30

## Q

QR code 1, 6, 51 quick response code 1, 6, 51

## R

RAID array, type supported 732 reboot system on NMI, Setup utility 24 redundant array of independent disks (RAID) 732 SAS array 726 rehook INT, Setup utility 24 related documentation 2 reliability features 11 RAS features 11 removing 1.8-inch drive 730 bezel 708 compute node 692 702 front handle front panel 695 hot-swap hard disk drive 726 ID label plate 709 identification label plate 709 RFID tag 742 solid state drive 730 removing and replacing compute node components 691 removing and replacing consumable and structural parts 695 removing and replacing CRUs 705, 749 replacing thermal grease 760 returning a device or component 692 RFID tag installing 743 removing 742

## S

safety iii safety statements iii, vi SAS array, type supported 726 SAS hard disk drive hot-swap hard disk device 726 installing 726 SAS ID address 41 SCSI 726 SD adapter installing 745 removing 744 SD card installing 748 removing 747 SD Media Adapter for System x installing 745 removing 744 sending diagnostic data 774 Serial Attached SCSI (SAS) hot-swap hard disk drive

installing 726 removing 726 ServeRAID controller installing 736 removing 734 ServerGuide features 38 using to install operating system 39 ServerGuide CD 6 service and support before you call 773 hardware 775 software 774 Service and Support Manager 689 service bulletins 63 servicing electrical equipment setting the PXE boot protocol 30 Setup utility 39 menu 24 overview 24 Single node cannot ping the CMM 673 Single node cannot ping the I/O module 676 Single node cannot ping the management node 677.679 Single node cannot ping the management node, different chassis 677.680 SMBIOS data, updating locally: keyboard controller style 32 locally: LAN over USB 33 remotely over a LAN 34 software problems 688 software service and support telephone numbers 774 solid state drive installing 732 730 removing solid state drive mounting sleeve installing 729 removing 727 SSD installing 732 solid state drive 730 start options, Setup utility 24 starting the compute node 16 startup sequence, changing 43 static electricity 692 static-sensitive devices, handling 692 stopping the compute node 17 storage drive 683 problems support web page, custom 774 switches, system board 19 system board connectors 18 jumpers 19 layouts 18 LÉDs 18 switches 19 system board FRU 761 system event log 203 system event logs, Setup utility 24 system information, Setup utility 24 system reliability guidelines 691 system security, Setup utility system settings, Setup utility 24 24 system summary, Setup utility 24 system-board assembly components 11 761 installing removing 761 replacing 761 systems management chassis management module 6 Flex System Manager management software 6

## Т

Taiwan product service 775 telephone numbers 774–775 thermal grease, replacing 760 Tier 1 CRU 691 Tier 1 CRUs, removing and replacing 705 Tier 2 CRU 691 Tier 2 CRUs, removing and replacing 749 TPM Setup utility 24 trained service technicians, guidelines iv troubleshooting 63 service bulletins 63 troubleshooting tables 669 Troubleshooting, cannot communicate with the CMM 670 Troubleshooting, cannot communicate with the I/O module 670 Troubleshooting, cannot communicate with the management node 670 troubleshooting, cannot connect to the data network during initial setup 671 Troubleshooting, cannot log in 673 Troubleshooting, cannot log in to the CMM 673 Troubleshooting, cannot log in to the I/O module 673 Troubleshooting, cannot log in to the management node 673 Troubleshooting, cannot ping the CMM 673 Troubleshooting, cannot ping the I/O module 675 Troubleshooting, cannot ping the management node 677, 679 Troubleshooting, CMM cannot ping the CMM 675 Troubleshooting, multiple nodes cannot ping the CMM 674 Troubleshooting, multiple nodes cannot ping the I/O module 676 Troubleshooting, multiple nodes cannot ping the management node 678–679, 681–682 Troubleshooting, multiple nodes cannot ping the management node in a different chassis 678, 682 troubleshooting, one compute node experiences a sudden loss of network (Ethernet) connectivity 672 troubleshooting, one compute node is unable to connect to the data network during initial setup 671 troubleshooting, one or more compute nodes is unable to communicate with SAN 671 Troubleshooting, single node cannot ping the CMM 673 Troubleshooting, single node cannot ping the I/O module 676 Troubleshooting, single node cannot ping the management node 677, 679 Troubleshooting, single node cannot ping the management node, different chassis 677, 680

troubleshooting, two or more compute nodes are unable to connect to the data network during initial setup 672 troubleshooting, two or more compute nodes experience a sudden loss of network (Ethernet) connectivity 673 trusted platform module, Setup utility 24 turning off the compute node 17 turning on the compute node 16 two or more compute nodes are unable to connect to the data network during initial setup 672 two or more compute nodes experience a sudden loss of network (Ethernet) connectivity 673

## U

UEFI diagnostic codes 649 UEFI drivers. Setup utility 24 **UEFI** firmware recovering from update failure 22 updating 21 updating using Flex System Manager Chassis Manager 21 updating using Lenovo ToolsCenter Bootable Media Creator 21 updating using UpdateXpress 21 unable to communicate 670 undetermined problems 689 unsafe conditions, inspecting for iv updating configuration 692 device drivers 21 firmware 21 user security, Setup utility 24

## V

viewing DSA test results 70 Virtual Light Path 43

### W

web interface logging on to 42 Windows driver, LAN over USB 48



Part Number: SP47A31680

Printed in China

(1P) P/N: SP47A31680

