

**Sun InfiniBand Dual Port 4x QDR PCIe Low
Profile Host Channel Adapter M2**

Product Notes



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Product Notes

This document provides late-breaking news and issues about the installation and use of Oracle's Sun InfiniBand Dual Port 4x QDR PCIe Low Profile Host Channel Adapter M2.

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- “Download Firmware” on page 2
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- “Related Documentation” on page 4
- “Feedback” on page 4

Note – Currently, the radiated emissions will pass if the rack door is closed.

Supported Platforms and Operating Systems

Before installing an adapter, ensure that your platform and OS are supported. Go to:

<http://www.oracle.com/us/products/servers-storage/networking/infiniband/index.html>

Note – OFED software version 1.5.1 or higher must be used with any Linux distribution. For the latest BXOFED software, go to:

<https://support.oracle.com/CSP/ui/flash.html>

The preceding information is up-to-date at the time this document was written. For the latest information, go to:

<http://docs.oracle.com/cd/E19241-01/>

Subsequent versions of this document have a higher number following the final dash. That is, E23922-02 becomes E23922-03.

Download Firmware

1. Go to the My Oracle Support web site for the most recent firmware for this InfiniBand adapter (part number 375-3696-01):

<https://support.oracle.com/CSP/ui/flash.html>

Note – The latest firmware version is currently 2.11.2010.

2. Select the software and documentation downloads in the row of the table with this product description:

“Sun InfiniBand Dual Port 4x QDR PCIe Low Profile HCA M2”

To install the firmware, refer to the *Sun InfiniBand Dual Port 4x QDR PCIe Low Profile Host Channel Adapter M2 User’s Guide*.

Known Issues

g5 Experiences CATERR After Updating CX2 EM FW to 2.11.2000 (Bug 15826772)

This CX-2 firmware is SR-IOV enabled by default and the Server BIOS must have both SR-IOV support and PCI MMIO 64 bits support enabled, even if the Linux driver is not SR-IOV enabled. Failing to correctly configure BIOS can cause the server to hard hang during reboot.

Oracle Enterprise Linux Issues

SR-IOV Enabled Linux IB Driver (Bug 16309590)

g5plus MMIO issue with three or more CX2 IB HCAs with FW 2.11.2010. In such situations, do not use all HCAs because the driver fails to load on top of one or more HCAs.

Oracle Solaris 10 Issues

Hot-Swap Feature Not Supported in Oracle Solaris 10 10/09: (Bug 15646725)

On Oracle Solaris 10 10/09, hot-swapping the adapter is not supported.

Workaround: Upgrade to Solaris 10 9/10 to enable hot-swapping in Sun SPARC Enterprise M3000, M5000, and M8000 Servers. For these servers, hot-swapping is supported with Oracle Solaris 10 9/10.

Third-Party HCA Firmware Issue (Bug 15614160)

This issue applies to third-party HCAs (QDR HCAs) that are equivalent to the Sun InfiniBand Dual Port 4x QDR PCIe Low Profile Host Channel Adapter M2.

In some cases, running with less than the most current firmware on a QDR HCA could result in a panic, because the firmware incorrectly reports an error. If the error occurs, you see a message similar to the following:

```
panic[cpu3]/thread=fffffe80000d1c60: Hermon Fatal Internal Error.  
Hermon state=0xfffffffff800e2000
```

In the message log a message similar to the following is displayed:

```
NOTICE: hermon0: Device Error: EQE hca internal error
```

Workaround: This issue is unlikely to occur with legacy Sun HCAs or new HCAs from Oracle, because these HCAs ship with the current firmware. If this error does occur, reboot the system and use the `firmwareflash` command to display the current firmware version. The minimum firmware version must be 2.7.8130.

If the firmware is not at Version 2.7.8130 or higher, refer to the HCA user's guide and product notes for obtaining and updating the firmware on all HCAs in the system. Once updated, reboot the system to enable the new firmware.

If this problem occurs on a system in which all HCAs are at this minimum firmware revision, inform your authorized Oracle service representative of the failure and provide the available details.

Related Documentation

Documentation	Links
All Oracle products	http://docs.oracle.com
Sun InfiniBand Dual Port 4x QDR PCIe ExpressModule Host Channel Adapter M2	http://docs.oracle.com/cd/E19157-01/
Sun InfiniBand Dual Port 4x QDR PCIe Low Profile Host Channel Adapter M2	http://docs.oracle.com/cd/E19241-01/
Oracle Integrated Lights Out Manager (ILOM)	http://www.oracle.com/goto/ILOM/docs
Oracle Solaris 11 OS	http://www.oracle.com/goto/Solaris11/docs
Oracle Solaris 10 OS	http://www.oracle.com/goto/Solaris10/docs
Oracle VM Server for SPARC	http://www.oracle.com/goto/VM-SPARC/docs
Oracle VTS	http://www.oracle.com/goto/VTS/docs

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