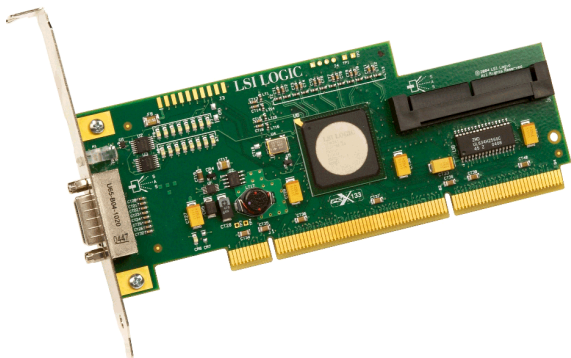


LSI Logic SAS3442X Host Adapter Quick Installation Guide

LSI LOGIC®



Thank you for purchasing the LSI Logic SAS3442X Serial Attached SCSI (SAS) to PCI-X Host Bus Adapter (HBA). Please take a few minutes to read this *Quick Installation Guide* before you install the SAS3442X.

If you need more information about any topic covered in this guide, please refer to the other documents on the accompanying LSI Logic Device Drivers & Utilities CD.

CONTENTS OF THE LSI LOGIC DEVICE DRIVERS & UTILITIES CD

The LSI Logic HBA CD contains utility programs, device drivers for various operating systems, and the following documentation:

- LSI Logic Serial Attached SCSI (SAS) to PCI-X Host Adapters User's Guide
- LSI Logic Fusion-MPT Device Management User's Guide
- LSI Logic HBA technical product briefs

QUICK HOST ADAPTER INSTALLATION

To install the SAS3442X host adapter, follow these steps:

Step 1 Unpack the host adapter and inspect it for damage.

Unpack the host adapter in a static-free environment. Remove the host adapter from the antistatic bag and inspect it for damage. If it appears to be damaged, or if any component is missing, contact LSI Logic or your reseller support representative.

Make a backup of your data before changing your system configuration.

Step 2 Prepare the computer.

Turn off the computer and remove the power cord from the back of the power supply. Remove the cover from the chassis.

Be certain to disconnect the computer from the power supply and from any networks before installing the controller card.

Step 3

Insert the SAS3442X in an available PCI/PCI-X slot.

Locate an empty PCI/PCI-X slot. Remove the blank bracket panel on the back of the computer that is aligned with the PCI/PCI-X slot you have selected. Save the bracket screw when present.

Align the host adapter with a PCI/PCI-X slot. Press down gently but firmly to properly seat the host adapter in the slot. The following figure illustrates how to insert the host adapter in a PCI/PCI-X slot.

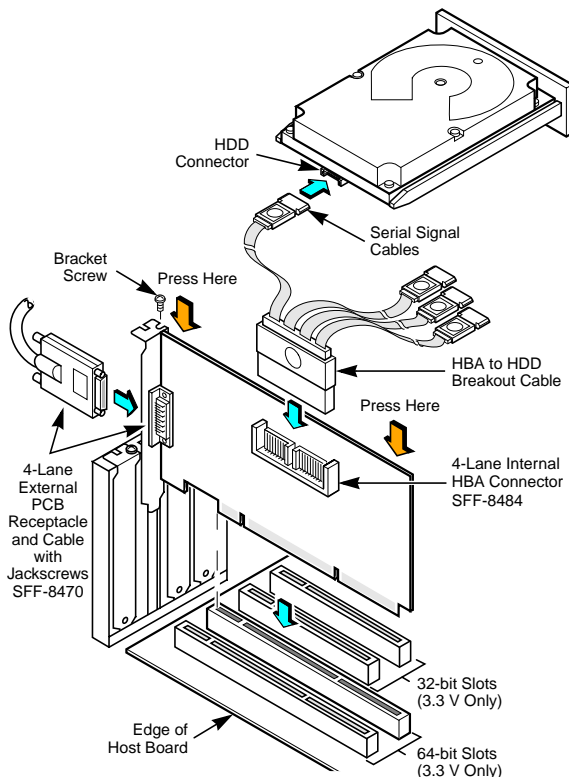
Note:

The SAS3442X is keyed for a 3.3 V slot. The keying of edge connector J1 prevents the card from being installed in a 5 V slot.

Step 4

Secure the bracket to the system chassis.

Install the bracket screw, when present, or engage the system's retention mechanism to secure the host adapter to the system's chassis.



Note:

The HBA shape, size, and locations of components may vary from this illustration.



Step 5 **Connect the serial cable(s) between the host adapter and the serial hard disk drive(s) (HDD).**

The SAS3442X has two SAS signal connectors (one external and one internal), each connecting to four 3 Gbit/s SAS ports. The HBA needs to be connected to SAS storage devices using the appropriate cable. A SAS External Cable with a standard SAS External Plug connector (SFF-8470) is required to connect to external devices.

For connection to internal drives or backplanes, an internal cable with a standard SAS Internal Wide Port connector (SFF-8484) on the controller side of the cable is required. The other end of the cable may fan out into four cables with either SATA-style signal connectors or SAS device connectors at the end for direct connection to disk drives (and some backplanes) or single SAS Internal Wide Port connector for backplane attachment. The preceding figure illustrates the connector locations on the SAS3442X HBA and use of controller-based, fan-out cable to connect to drives requiring a SATA-style signal connector.

Step 6 **Replace the cover, the power cord(s) and power-up the system.**

Replace the system's cover, reconnect the power cord(s) and any network cables. Turn power on to the system.

The SAS3442 host adapter hardware installation is complete, and you are ready to install the operating system drivers.

WINDOWS DRIVER INSTALLATION

To load the `SYMMPT.SYS` miniport driver during a new Windows 2000 or Windows XP system installation or to load the `LSI_SAS.SYS` driver during a new Windows 2003 installation, you can boot directly from the Microsoft installation CD-ROM. The Windows drivers are not interchangeable; however, the instructions are very similar.

To install a new Windows operating system and its appropriate device driver, follow these steps:

Step 1 Using another computer, copy the appropriate driver files supplied on the LSI Logic Device Drivers and Utilities CD onto a diskette. This will be needed in Step 6.

To create the driver diskette, open the driver folder on the CD, then open the folder for the version of Windows to be installed on the new system. Next, select all folders and files within the directory and copy to the root director of a clean floppy diskette.

Step 2 Boot the computer from the Microsoft Windows CD-ROM.

Step 3 Shortly after Windows Setup begins, press F6 when the words Setup is inspecting your computer's hardware configuration appear, or when prompted to press F6 if you need to install a third-party SCSI or RAID driver.

Important: You must press F6 for the new driver to be recognized. Otherwise, the system does not recognize the devices controlled by the driver during the Windows setup.

Step 4 Follow the instructions until a screen displaying the words Setup could not determine the type of one or more mass storage device... appears.

Step 5 Press S to Specify Additional Devices.

Step 6 Follow the prompts and insert the Windows driver diskette when prompted to insert the hardware support disk. Select the driver version appropriate for your system.

Step 7 Follow the Microsoft Windows installation procedure to complete the installation. Microsoft provides documentation with its installation CD-ROM.

Note: Refer to the *Fusion-MPT™ Device Management User's Guide* for detailed configuration and installation instructions for all firmware and drivers.

LINUX DRIVER INSTALLATION

Consult the Linux *ReadMe.txt* file on the LSI Logic Device Drivers & Utilities CD. LSI Logic provides Open Source drivers that may be implemented in the following ways:

Step 1 Adding precompiled binaries to an existing installation using driver update disks or RPMs for selected distributions.

Step 2 Adding or updating the Fusion-MPT™ source in the Linux kernel for any distribution.

Technical Support

For assistance installing, configuring, or running the SAS3442X, contact LSI Logic Technical Support:

Phone Support

1-800-633-4545 (North America)
+44 1344 413 441 (Europe)

Web Site

<http://www.lsillogic.com/support/>



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Find a list of LSI Logic Corporation's U.S. distributors, international distributors, sales offices, and design resource centers on the LSI Logic web site at:

<http://www.lsillogic.com/contacts/index.html>

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