



HP SuperSpeed USB 3.0 PCIe x1 Card

User Guide

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About This Guide

This guide provides information on installing the HP SuperSpeed USB 3.0 PCIe x1 Card.




-  **WARNING!** Text set off in this manner indicates that failure to follow directions could result in bodily harm or loss of life.
-  **CAUTION:** Text set off in this manner indicates that failure to follow directions could result in damage to equipment or loss of information.
-  **NOTE:** Text set off in this manner provides important supplemental information.

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1 Product Features

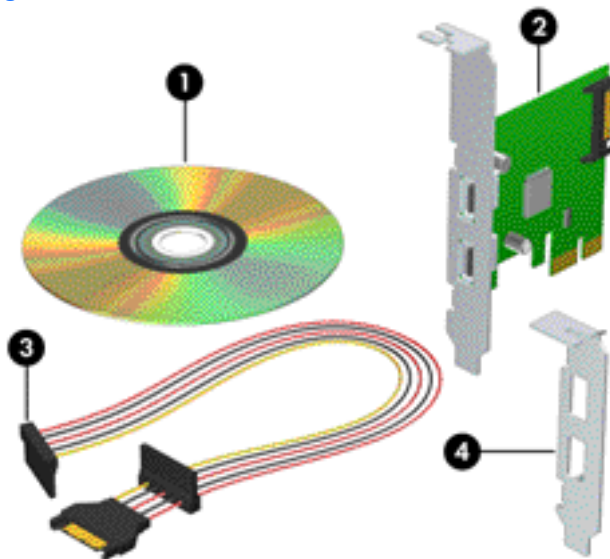
The HP SuperSpeed USB 3.0 PCIe x1 card provides increased data transfer and greater bandwidth to USB devices connected to your computer. The USB 3.0 PCIe card is capable of the following:

- USB 3.0 interface with up to 5Gbps data transfer rate – 10 times faster than USB 2.0 – and is capable of superior performance to transfer high definition content such as video and media players
- Backwards compatible with any existing USB devices
- Fits conveniently in a half-height or full height expansion slot in the computer with convenient half-height bracket as well as the default full-height bracket

To determine the compatibility of this product with your HP computer, see QuickSpecs online at <http://www.hp.com/go/productbulletin>.

Kit Contents



Figure 1-1 Kit Contents




-
- | | |
|---|---|
| 1 | <i>I/O and Security Software and Documentation CD with software drivers and documentation</i> |
| 2 | HP SuperSpeed USB 3.0 PCIe x1 card (with full-height expansion bracket attached) |
| 3 | SATA to SATA split power extension cable |
| 4 | Low profile expansion bracket to replace the full-height expansion bracket required on some computer models |
-

2 Installing the USB 3.0 PCIe x1 Card

Warnings and Cautions


 **WARNING!**  Any surface or area of the equipment marked with this symbol indicates the presence of a hot surface or hot component. If this surface is contacted, the potential for injury exists. To reduce the risk of injury from a hot component, enable the surface to cool before touching.

WARNING!  Any surface or area of the equipment marked with this symbol indicates the presence of an electrical shock hazard. To reduce the risk of injury from electrical shock, do not open any enclosed area marked with this symbol.

WARNING! To reduce the risk of electric shock or damage to your equipment:


- Do not disable the power cord grounding plug. The grounding plug is an important safety feature.
- Plug the power cord in a grounded (earthed) outlet that is easily accessible at all times.
- Disconnect power from the equipment by unplugging the power cord from the electrical outlet.

WARNING! To reduce the risk of serious injury, read the *Safety & Comfort Guide*. It describes proper computer setup, posture, health, and work habits for computer users, and provides important electrical and mechanical safety information. This guide is located at <http://www.hp.com/ergo> and on the documentation CD (if one is included with the product).

 **CAUTION:** Static electricity can damage the electronic components of the computer. Before beginning these procedures, be sure you discharge static electricity by briefly touching a grounded metal object.

CAUTION: To prevent damage to the computer, observe the following Electrostatic Discharge (ESD) precautions while performing the system parts removal and replacement procedures:

- Work on a static-free mat.
- Wear a static strap to ensure that any accumulated electrostatic charge is discharged from your body to the ground.
- Create a common ground for the equipment you are working on by connecting the static-free mat, static strap, and peripheral units to that piece of equipment.

 **NOTE:** HP accessories are for use in HP computer products. They have been extensively tested for reliability and are manufactured to high quality standards.


Installing the USB 3.0 Driver

1. For Microsoft Windows Vista and Windows 7 operating systems, you must disable the User Account Control (UAC) before installing the driver.

To turn off the UAC in Windows Vista, go to **Start > Control Panel > User Accounts > User Accounts > Turn User Account Control on or off**. Clear the check mark from the box next to **Use User Account Control (UAC) to help protect your computer**.

To turn off the UAC in Windows 7, go to **Start > Control Panel > User Accounts and Family Safety > User Accounts > Change User Account Control Settings**. Set the slider to **Never Notify**.

2. Restart the computer to allow the system to recognize that the UAC has been disabled.
3. Insert the CD included with your USB 3.0 PCIe kit.
4. Navigate to and click **USB 3.0 Drivers** and follow the on-screen instructions to install the driver.
5. After installing the driver, return the User Account Control (UAC) to its default setting in the Control Panel.

 **NOTE:** HP recommends that you periodically check for driver updates. To download driver updates go to <http://www.hp.com/support>.

Accessing the Internal Components of the Computer

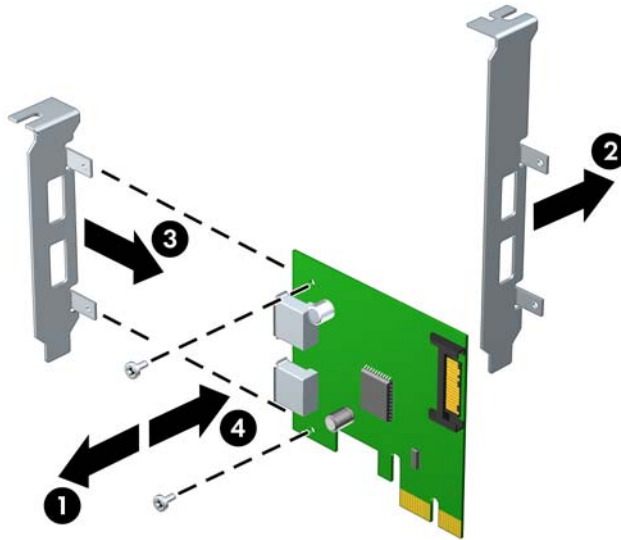
To prepare the computer for installation of the HP USB 3.0 PCIe x1 card, refer to the documentation included with your computer for detailed instructions to:

1. Power off and unplug the computer from the power source.
2. Remove the computer cover or access panel.


Installing the USB 3.0 PCIe x1 Card

1. A full-height expansion cover bracket is attached to the USB 3.0 PCIe card. If your computer requires a half-height bracket, remove two screws that secure the full-height bracket to the card (1), remove the bracket from the card (2), place the low-profile bracket on the card (3), and secure the bracket with the two screws (4).

Figure 2-1 Installing the Expansion Cover Bracket



2. Remove the appropriate expansion slot cover from the rear of the computer.
3. Insert the USB 3.0 PCIe x1 card into an available PCIe expansion slot in the computer.

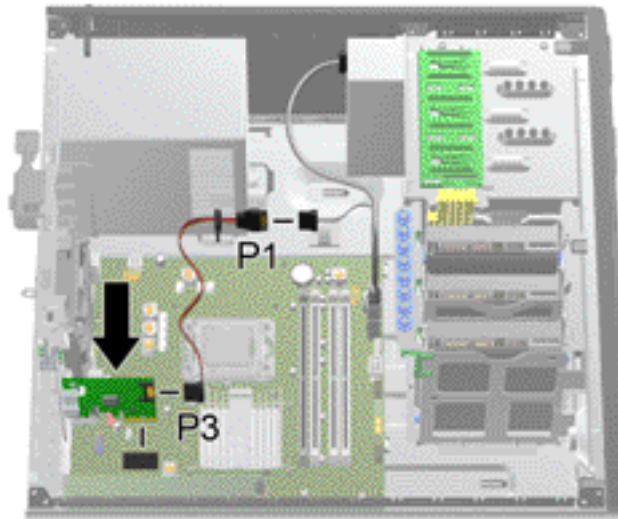
 **NOTE:** The USB 3.0 PCIe x1 card has a PCIe 2.0 5 GHz interface. For optimal performance, install this card in a PCIe 2.0 slot. Installing it in a PCIe 1.0 slot could cause the card to run at a reduced 2.5 GHz throughput.

Refer to the documentation included with your computer for detailed instructions on installing an expansion card.

4. Look for an available SATA Power connector inside the chassis. If one is available, do the following:

- Using the SATA power cable provided, plug the far end of the cable labeled **P3** into the USB 3.0 PCIe card. Plug the other end of the cable labeled **P1** into the available SATA power cable.

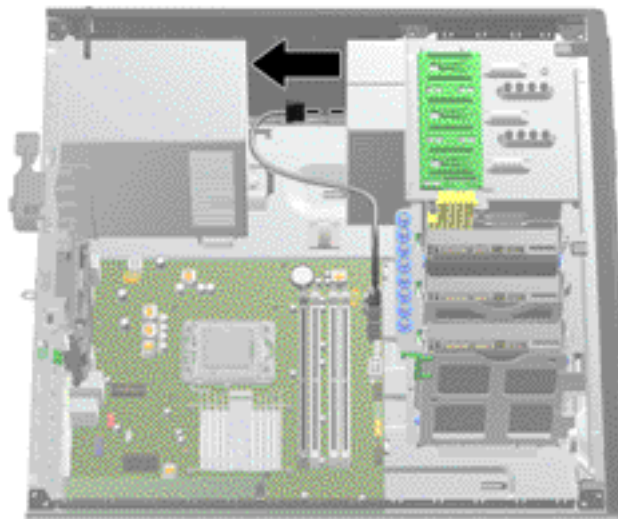
Figure 2-2 Installing the USB 3.0 PCIe x1 Card with Available Power Connector



If there is no available SATA power connector inside the chassis, do the following:

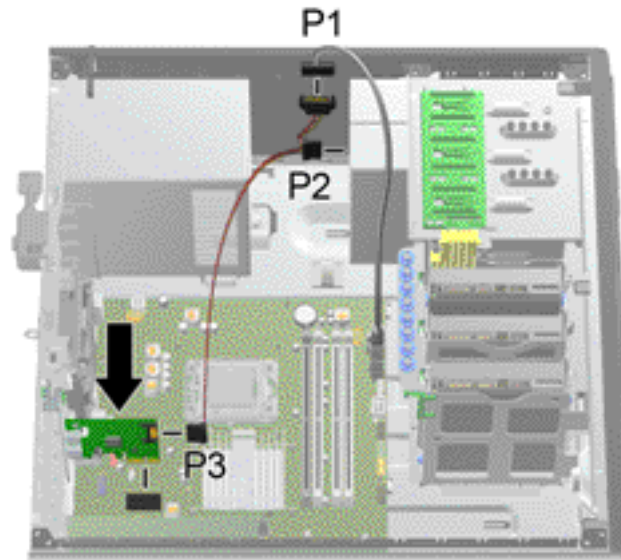
- Disconnect the SATA power cable from the rear of any available SATA drive, such as a hard drive or optical drive.

Figure 2-3 Disconnecting a SATA Power Cable



- Using the SATA power cable provided, plug the far end of the cable labeled **P3** into the USB 3.0 PCIe card. Plug the middle connector on the cable labeled **P2** into the rear of the drive that was disconnected in the previous step. Plug the other end of the cable labeled **P1** into the SATA power cable that was disconnected from the drive.

Figure 2-4 Installing the USB 3.0 PCIe x1 Card with No Available Power Connector



Reassembling the Computer

After installing the USB 3.0 PCIe x1 card:

1. Replace the computer cover or access panel.
2. Plug in and power on the computer.
3. After powering on the computer, make sure the card is being recognized by the system (a popup message should be displayed in the system tray on the Windows taskbar).
4. Connect your USB device(s) to the USB port(s) on the USB 3.0 PCIe card. Refer to the device manufacturer's documentation for specific instructions on connecting a device.

Compatible USB 3.0 Devices

For a brief list of manufacturer-tested USB 3.0 devices, refer to the compatible USB 3.0 devices list available on the CD included with this kit.

The card is tested for inter-operability and compatibility with USB devices posted on the <http://www.USB.org> website.

NOTE: If a mouse or keyboard is connected to the USB 3.0 ports on the USB 3.0 PCIe card, the computer will not wake from Sleep mode by clicking the mouse or pressing any key on the keyboard. Therefore, HP does not recommend plugging a keyboard or mouse into the USB 3.0 ports.

A Troubleshooting

Solving Common Problems

The following table lists possible problems, the possible cause for each problem, and the recommended solution.

Problem	Possible Cause	Solution
USB connected device is not recognized.	USB 3.0 drivers are not installed.	Install the driver software for the new USB 3.0 PCIe card. Try another USB port on the computer, preferably a USB port built into the PC. If the built-in USB port recognizes the device, be sure you install the driver software for the new USB 3.0 PCIe card before you connect the USB devices to your system.
	Device drivers are not installed.	Test the device by plugging it into a built-in USB port on the computer. If the device is not working, you may need to install drivers for the device. Check with the device manufacturer for driver installation instructions.
	Device is defective.	If the you have installed all required drivers and the device does not function, the device may be defective. Replace the device or contact the device manufacturer.
	USB port is not working.	Plug the device into a different USB port on the computer.
Device plugged into a USB 3.0 port does not operate at expected speed	The USB 3.0 PCIe card is installed in a PCIe 1.0 slot on the computer	Install the card in a PCIe 2.0 slot on the computer. The card will operate up to 5 GHz if installed in a PCIe 2.0 slot but will only operate up to 2.5 GHz if installed in a PCIe 1.0 slot.
Computer will not wake from Sleep mode after clicking the mouse or pressing any key on the keyboard	The computer will not wake from Sleep mode if the mouse or keyboard is connected to the USB 3.0 PCIe card.	Plug the mouse or keyboard into a built-in USB 2.0 connector on the computer.

Online Technical Support

For the online access to technical support information, self-solve tools, online assistance, community forums or IT experts, broad multivendor knowledge base, monitoring and diagnostic tools, go to <http://www.hp.com/support>.

Preparing to Call Technical Support

If you cannot solve a problem using the troubleshooting tips in this section, you may call technical support. Refer to the *Support Telephone Numbers* guide on the *I/O and Security Software and Documentation* CD. Have the following information available when you call:

Have the following information available when you call:

- Serial number of the computer in which the accessory is installed
- Purchase date on invoice
- Condition under which the problem occurred
- Error messages received
- Hardware configuration
- Hardware and software you are using

B Agency Regulatory Notices

Federal Communications Commission Notice

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and the receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio or television technician for help.

Modifications

The FCC requires the user to be notified that any changes or modifications made to this device that are not expressly approved by Hewlett Packard Company may void the user's authority to operate the equipment.

Cables

Connections to this device must be made with shielded cables with metallic RFI/EMI connector hoods to maintain compliance with FCC Rules and Regulations.

Declaration of Conformity for Products Marked with the FCC Logo (United States Only)

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:

1. This device may not cause harmful interference.
2. This device must accept any interference received, including interference that may cause undesired operation.

For questions regarding the product, contact:

Hewlett Packard Company
P. O. Box 692000, Mail Stop 530113
Houston, Texas 77269-2000
Or, call 1-800-HP-INVENT (1-800 474-6836)

For questions regarding this FCC declaration, contact:

Hewlett Packard Company
P. O. Box 692000, Mail Stop 510101
Houston, Texas 77269-2000
Or, call (281) 514-3333

To identify this product, refer to the Part, Series, or Model number found on the product.

Canadian Notice

This Class B digital apparatus meets all requirements of the Canadian Interference-Causing Equipment Regulations.

Avis Canadien

Cet appareil numérique de la classe B respecte toutes les exigences du Règlement sur le matériel brouilleur du Canada.

European Union Regulatory Notice


This product complies with the following EU Directives:

- Low Voltage Directive 2006/95/EC
- EMC Directive 2004/108/EC
- EuP Directive 2005/32/EC, where applicable

Compliance with these directives implies conformity to applicable harmonized European standards (European Norms) which are listed on the EU Declaration of Conformity issued by Hewlett-Packard for this product or product family.

This compliance is indicated by the following conformity marking placed on the product:

CE
This marking is valid for non-Telecom products
and EU harmonized Telecom products (e.g. Bluetooth).

CE XXXXX* 
This marking is valid for EU non-harmonized Telecom products.
*Notified body number (used only if applicable - refer to the product label)

This marking is valid for non-Telecom products and EU harmonized Telecom products (e.g. Bluetooth)

This marking is valid for EU non-harmonized Telecom products.

*Notified body number (used only if applicable — refer to the product label).

Hewlett-Packard GmbH, HQ-TRE, Herrenberger Strasse 140, 71034 Boeblingen, Germany

The official EU CE declaration of conformity for this device may be found at <http://www.hp.com/go/certificates>.

Product Environmental Notices

Disposal of Waste Equipment by Users in Private Household in the European Union



This symbol on the product or on its packaging indicates that this product must not be disposed of with your household waste. Instead, it is your responsibility to dispose of your waste equipment by handing it over to a designated collection point for the recycling or waste electrical and electronic equipment. The separate collection and recycling of your waste equipment at the time of disposal will help to conserve natural resources and ensure that it is recycled in a manner that protects human health and the environment. For more information about where you can drop off your waste equipment for recycling, please contact the local city office, the household waste disposal service or the shop where you purchased the product.

Chemical Substances

HP is committed to providing our customers with information about the chemical substances in our products as needed to comply with legal requirements such as REACH (*Regulation EC No 1907/2006 of the European Parliament and the Council*). A chemical information report for this product can be found at: <http://www.hp.com/go/reach>

Restriction of Hazardous Substances (RoHS)

A Japanese regulatory requirement, defined by specification JIS C 0950, 2005, mandates that manufacturers provide Material Content Declarations for certain categories of electronic products offered for sale after July 1, 2006. To view the JIS C 0950 material declaration for this product, visit <http://www.hp.com/go/jisc0950>.

2008年、日本における製品含有表示方法、JISC0950が公示されました。製造事業者は、2006年7月1日以降に販売される電気・電子機器の特定化学物質の含有につきまして情報提供を義務付けられました。製品の部材表示につきましては、www.hp.com/go/jisc0950を参照してください。

有毒有害物质/元素的名称及含量表

根据中国
(电子信息产品污染控制管理办法)



部件名称	有毒有害物质和元素					
	铅 (Pb)	汞 (Hg)	镉 (Cd)	六价铬 (Cr(VI))	多溴联苯 (PBB)	多溴二苯醚 (PBDE)
扬声器	X	○	○	○	○	○
其它 I/O PCA	X	○	○	○	○	○
机箱/其它	X	○	○	○	○	○
风扇	X	○	○	○	○	○
鼠标	X	○	○	○	○	○
键盘	X	○	○	○	○	○
内存	X	○	○	○	○	○
电缆/其它	X	○	○	○	○	○
处理器	X	○	○	○	○	○
电源	X	○	○	○	○	○
主 PCA	X	○	○	○	○	○
内部/外部介质读取设备	X	○	○	○	○	○
外部控制设备	X	○	○	○	○	○
硬盘驱动器	X	○	○	○	○	○

O: 表示该有毒或有害物质在该部件所有均质材料中的含量均在 SJ/T11363-2006 标准规定的限量要求以下。

X: 表示该有毒或有害物质至少在该部件所用的某一均质材料中的含量超出 SJ/T11363-2006 标准规定的限量要求。

表中标有“X”的所有部件都符合欧盟 RoHS 法规 — “欧洲议会和欧盟理事会 2003 年 1 月 27 日关于电子电器设备中限制使用某些有害物质的 2002/95/EC 号指令”。

注: 环保使用期限的参考标识取决于产品正常工作的温度和湿度等条件。

Turkey EEE Regulation

In Conformity with the EEE Regulation

EEE Yönetmeliğine Uygundur

HP Recycling Program

HP encourages customers to recycle used electronic hardware, HP original print cartridges, and rechargeable batteries. For more information about recycling programs, go to <http://www.hp.com/recycle>.