

VMware<sup>®</sup> Virtual Infrastructure 3.x  
Software for Dell<sup>™</sup>  
PowerEdge<sup>™</sup> Systems  
**Release Notes**

## Notes and Notices



**NOTE:** A NOTE indicates important information that helps you make better use of your computer.



**NOTICE:** A NOTICE indicates either potential damage to hardware or loss of data and tells you how to avoid the problem.

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# Overview

This document is an addendum to the *Dell VMware Virtual Infrastructure 3.x Deployment Guide* located on the Dell Support website at [support.dell.com](http://support.dell.com). It contains important additional information regarding this release of VMware<sup>®</sup> ESX and ESXi software for Dell<sup>™</sup> PowerEdge<sup>™</sup> systems.

 **NOTE:** For installing the OpenManage software on PowerEdge systems running the ESX and ESXi software and for related known issues, resolutions, and troubleshooting, see the *Dell OpenManage With VMware ESX Installation Guide* available on the Dell Support website at [support.dell.com](http://support.dell.com).

The known issues for VMware Virtual Infrastructure 3.x software running on PowerEdge systems discussed in this document are:

- For PowerEdge M805 and M905 systems running ESX 3.5 Update 2 software, the Broadcom BC5709 network interface card (NIC) is not enabled fully
- SATA optical drive is not accessible from Virtual Machines (VMs) on PowerEdge1950 III, PowerEdge 2950 III, and PowerEdge 2900 III systems
- Unable to install ESX 3.0.3 using the Serial Advanced Technology Attachment (SATA) optical drive
- Unable to install ESX 3.0.3 using the USB drive when another USB drive is connected to the PowerEdge M805 blade system
- PowerEdge 6650 system encounters Pink Screen of Death (PSOD) if you install patch ESX-1003514 on ESX 3.0.2
- External USB optical drive connected to an ESXi host is not accessible from VMs
- Incorrect reporting of QL Channel HBA model numbers
- SATA optical drive is not functional on the PowerEdge R905 system
- SATA optical drive is not functional on the PowerEdge R805 system after ESX installation
- Add-on NICs are enumerated ahead of the integrated NICs in the PowerEdge R900 system
- System hangs when loading megaraid\_sas.o on a PowerEdge 2900 system with PowerEdge Expandable RAID Controller Integrated (PERC 6/i)
- Management logical unit number (LUN) used in the Dell<sup>™</sup> PowerVault<sup>™</sup> MD3000i system is listed under internet SCSI (iSCSI) targets
- Overlapping memory ranges message appears on AMD-based platforms
- VirtualCenter does not show all the optical devices available in the ESX host
- Log file shows hub.c failure message
- Network connectivity is lost after adding or removing Peripheral Component Interconnect (PCI) device(s)

- The ESX software crashes (displays a purple screen) on the PowerEdge 6950 system with more than two PERC 5/E controllers
- The mouse pointer is not functional when installing the ESX software on the PowerEdge 6950 system
- Performance is impacted due to interrupt sharing in the PowerEdge 6850 system
- Keyboard and mouse are not responsive on the PowerEdge 6850 system when using an Avocent Keyboard, Video, or Visual Display Unit (KVM) environment
- SCSI target is unrecognized on PowerEdge systems with PERC 5 controllers
- Log file shows a failed modprobe message
- VMotion is not allowed between hosts with different processors
- Device ID of DRAC 4 adapter 1028:0012 is missing in vmware-devices.map file

# Known Issues and Resolution

**Table 1-1. Known Issues and Resolution**

Issue	Description	Resolution	Applies to
For PowerEdge M805 and M905 systems running ESX 3.5 Update 2 software, the Broadcom BC5709 network interface card (NIC) is not enabled fully	The ESX 3.5 Update 2 software does not have the 1.5.10b.1.1 version of the <b>bnx2</b> driver of the Broadcom BC5709 NIC that enables certain features of the NIC including the Remote PHY feature.	<p>Before installing the ESX 3.5 Update 2 software, follow the steps below:</p> <ol style="list-style-type: none"> <li><b>1</b> Insert the <i>Broadcom BC5709 NIC driver</i> media in the optical drive of the system.</li> <li><b>2</b> Once the Broadcom BC5709 NIC driver is installed successfully, the system automatically prompts you to insert the <i>ESX 3.5 Update 2 Installation</i> media.</li> </ol>	ESX 3.5 Update 2
SATA optical drive is not accessible from Virtual Machines (VMs) on PowerEdge 1950 III, PowerEdge 2950 III, and PowerEdge 2900 III systems	VMs cannot be configured to access the SATA optical drive of the hosts on PowerEdge 1950 III, PowerEdge 2950 III, and PowerEdge 2900 III systems.	<p>Perform the following steps:</p> <ol style="list-style-type: none"> <li><b>1</b> Right-click on the Virtual Machine and select <b>Edit settings</b>.</li> <li><b>2</b> Click the <b>Add</b> button to add a hardware.</li> <li><b>3</b> Select the SCSI device and click <b>Next</b>.</li> <li><b>4</b> The CD ROM device appears as a SCSI device. Click <b>Next</b>.</li> <li><b>5</b> Click <b>Finish</b> to complete the reconfiguration of VMs. You may have to rescan the small computer system interface (SCSI) host bus adapter (HBA) or restart VMs to complete the configuration. The host's optical drive is mapped to the VMs using this SCSI device.</li> </ol> <p><b>NOTE:</b> This workaround allows VMs to access the contents of host's optical drive. However, a VM cannot boot using the device. This is a known limitation with this ESX release.</p>	ESXi 3.5 Update 2
Unable to install ESX 3.0.3 using the Serial Advanced Technology Attachment (SATA) optical drive	ESX 3.0.3 may fail to install on PowerEdge systems with the SATA optical drive. The error <code>No driver found</code> is displayed.	VMware does not support the SATA optical drivers in its ESX 3.0.x series. You can perform a network-based installation or use an external USB drive for the installation of ESX 3.0.x.	ESX 3.0.x

**Table 1-1. Known Issues and Resolution (continued)**

Issue	Description	Resolution	Applies to
Unable to install ESX 3.0.3 using the USB drive when another USB drive is connected to the PowerEdge M805 blade system	If the PowerEdge M805 blade system is already connected to a USB drive, you may be unable to install ESX 3.0.3 using another USB drive. The error <code>No driver found</code> is displayed.	<p>During the installation of ESX 3.0.3 using the USB drive, enable the <b>Dell Remote Access Controller media</b>, or, follow the steps below:</p> <ol style="list-style-type: none"> <li><b>1</b> Follow the on-screen instructions on the <b>No driver found</b> error screen to manually select a driver.</li> <li><b>2</b> Click <b>Select driver</b>. This will bring up the screen <b>Select Device Driver to Load</b>. From the listed drivers, select <b>USB Mass Storage driver for Linux (usb-storage)</b>.</li> <li><b>3</b> Click <b>OK</b>.</li> <li><b>4</b> Proceed with the installation of ESX 3.0.3.</li> </ol>	ESX 3.0.x
PowerEdge 6650 system encounters Pink Screen of Death (PSOD) if you install patch <b>ESX-1003514</b> on ESX 3.0.2	If you install patch <b>ESX-1003514</b> on PowerEdge 6650 systems running ESX 3.0.2, the system crashes.	<p>Do not install patch <b>ESX-1003514</b> on ESX 3.0.2. If you have installed patch <b>ESX-1003514</b> on ESX 3.0.2, roll-back the <b>tg3</b> driver to the version contained in ESX 3.0.2 by following the steps below:</p> <ol style="list-style-type: none"> <li>1. Log in to the mode <b>Service Console only (troubleshooting mode)</b>.</li> <li>2. Place the ESX 3.0.2 media into the optical drive.</li> <li>3. Place the media and change to the folder <b>/VMware/RPMS</b> on the mounted directory.</li> <li>4. Run the below command from the Service Console to roll back the <b>tg3</b> driver: <pre data-bbox="711 1107 1168 1190">rpm -Uvh --oldpackage VMware-esx-drivers-net-tg3-3.43b.1vmw-52542.i386.rpm</pre> </li> <li>5. Remove the media and login into the <b>VMware ESX Server</b> mode.</li> </ol>	ESX 3.0.x

**Table 1-1. Known Issues and Resolution (continued)**

Issue	Description	Resolution	Applies to
External USB optical drive connected to an ESXi host is not accessible from VMs	VMs cannot be configured to access the external USB optical drive of the host.	Perform the following steps: <ol style="list-style-type: none"> <li><b>1</b> Right-click on the Virtual Machine and select <b>Edit settings</b>.</li> <li><b>2</b> Click the <b>Add</b> button to add a hardware.</li> <li><b>3</b> Select the SCSI device and click <b>Next</b>.</li> <li><b>4</b> The optical drive appears as a SCSI device. Click <b>Next</b>.</li> <li><b>5</b> Click <b>Finish</b> to complete the reconfiguration of VM. It may be required to rescan the SCSI HBA or restart the VM to complete the configuration. The optical drive of the host is mapped to the VM using this SCSI device.</li> </ol> <p><b>NOTE:</b> This workaround allows VMs to access the contents of the optical drive of the host. However, the VM cannot boot using the device. This is a known limitation with this ESX release.</p>	ESXi 3.5 Update 2
Incorrect reporting of QLogic™ Fibre Channel HBA model numbers	QLogic Fibre Channel HBA cards QLE2462, QLE2460 and QLE2562 are shown as QLA2432, QLA2432, and QLA2532 respectively, in Virtual Infrastructure client.	This is because QLogic Fiber Channel HBAs QLE2462, QLE2460, and QLE2562 cards are based on chipsets 2432, 2432, and 2532 respectively. This does not impact any system performance and may be safely ignored. This is working as designed in ESX 3.x releases.	ESXi 3.5 Update 2
SATA optical drive is not functional on the PowerEdge R905 system	ESX 3.5 Update 1 does not carry the driver for the SATA controller which makes the SATA optical drive unusable.	<ol style="list-style-type: none"> <li><b>1</b> Before installing VMware Infrastructure 3.5 Update 1 on a PowerEdge R905 system, boot the system using the <i>CD 1—Install First</i> media that is shipped with your system.</li> <li><b>2</b> When prompted, replace this media with the <i>ESX 3.5 Update 1 Installation</i> media and continue the installation of VMware Infrastructure 3.5 software.</li> </ol>	ESX 3.5 Update 1

**Table 1-1. Known Issues and Resolution (continued)**

Issue	Description	Resolution	Applies to
SATA optical drive is not functional on the PowerEdge R805 system after ESX installation	The driver <code>sata_nv.o</code> for the SATA controller on a PowerEdge R805 system does not get loaded automatically after the ESX installation. This makes the SATA optical drive unusable after the ESX installation.	<p>To resolve the issue, follow the steps below:</p> <ol style="list-style-type: none"> <li>1 Edit the file <code>sata_nv.xml</code> under <code>/etc/vmware/pciid</code> directory.</li> <li>2 Add the content below before the end-tag <code>&lt;/vendor&gt;</code> to enable Device Id 037f <pre data-bbox="739 444 1129 612">&lt;device id="037f"&gt; &lt;vmware label="scsi"&gt; &lt;driver&gt;sata_nv&lt;/driver&gt; &lt;/vmware&gt; &lt;name&gt;MCP55 SATA Controller&lt;/name&gt; &lt;/device&gt;</pre> </li> <li>3 Save the file and run the <code>esxcfg-pciid</code> command.</li> <li>4 Reboot the system.</li> </ol>	ESX 3.5 Update 1
Add-on NICs are enumerated ahead of the integrated NICs in the PowerEdge R900 system	On a PowerEdge R900 system, the add-on NICs installed on the slots five or seven are enumerated ahead of the integrated NICs.	<p>NIC enumeration on the PowerEdge R900 system is handled differently in the ESX Installer, than in the ESX kernel. Hence, it is recommended that add-on NICs should not be placed in slots five or seven of the PowerEdge R900 system.</p> <p>If these slots are used, the add-on NICs may be enumerated ahead of the integrated NICs. This issue will be fixed in a future release of the VMware ESX software.</p>	ESX 3.5 ESX 3.0.2
System hangs when loading <code>megaraid_sas.o</code> on a PowerEdge 2900 system with PowerEdge Expandable RAID Controller Integrated (PERC 6/i)	The PowerEdge 2900 system with PERC 6/i integrated controller hangs when loading <code>megaraid_sas.o</code> during ESX boot. This issue is observed in the system with BIOS versions earlier than v2.1.0.	The PowerEdge 2900 system with PERC 6/i integrated controller configuration is supported in the PowerEdge 2900 System BIOS version v2.1.0 and later. To resolve the issue, upgrade the system BIOS version to v2.1.0, available for download from the Dell Support website at <a href="http://support.dell.com">support.dell.com</a> .	ESX 3.5

**Table 1-1. Known Issues and Resolution (continued)**

Issue	Description	Resolution	Applies to
Management logical unit number (LUN) used in the Dell™ PowerVault™ MD3000i system is listed under internet SCSI (iSCSI) targets	Special management LUN in the PowerVault MD3000i system is listed under iSCSI Targets as LUN 31.	Read/Write access to LUN 31 is blocked, which protects the system from any impact. This issue does not affect the functioning of the system. The Management LUN is masked in a future release of ESX software.	ESX 3.5
Overlapping memory ranges message appears on AMD-based platforms	ACPI: 944: Overlapping memory ranges found message appears on the <b>Service Console</b> and in <code>/var/log/vmkernel</code> on systems with AMD Opteron™ processors when <b>Node Interleaving</b> is enabled in the system BIOS.	With <b>Node Interleaving</b> enabled, both processor nodes have equal proximity to the specified memory range.  Implications to the ESX software for this type of memory overlap exists only when <b>Node Interleaving</b> is disabled.  If <b>Node Interleaving</b> is enabled, you may safely ignore this message.	ESX 3.5 ESX 3.0.2
VirtualCenter does not show all the optical devices available in the ESX host	When connecting a USB optical drive to a system running ESX VirtualCenter does not update the optical drive list for the host.	Reboot the system with the USB optical device connected.  VirtualCenter lists only those USB optical devices that are connected to the host during system boot up.  This feature works as designed in ESX software.	ESX 3.5 ESX 3.0.2
Log file shows <code>hub.c</code> failure message	The following error appears in <code>/var/log/messages</code> on rebooting the system:  <code>kernel: hub.c: connect-debounce failed, port 1 disabled.</code>	This error message may be ignored.	ESX 3.5 ESX 3.0.2
Network connectivity is lost after adding or removing Peripheral Component Interconnect (PCI) device(s)	If the ethernet interfaces are renamed after adding or removing a PCI device(s) (For example, PERC storage card), the network connection of the <b>Service Console</b> may be lost.	After changing the status of PCI device(s) in the system, re-enumeration of the PCI bus may result in ESX renaming labels for the network connections. To restore the network connectivity of the <b>Service Console</b> , manually connect the vSwitch associated with the <b>Service Console</b> to the newly-named Ethernet interface.	ESX 3.5 ESX 3.0.2

**Table 1-1. Known Issues and Resolution (continued)**

<b>Issue</b>	<b>Description</b>	<b>Resolution</b>	<b>Applies to</b>
The ESX software crashes (displays a purple screen) on the PowerEdge 6950 system with more than two PERC 5/E controllers	The ESX software crashes on the PowerEdge 6950 system with more than two PERC 5/E controllers (excluding integrated PERC). The number of PERC 5/E controllers exceeds the maximum number of controllers supported by the driver in the ESX release.	Configure the system with only two PERC 5/E controllers.	ESX 3.0.2 ESX 3.0.1
The mouse pointer is not functional when installing the ESX software on the PowerEdge 6950 system	When installing the ESX software on the PowerEdge 6950 system with console redirection through Dell Remote Access Controller (DRAC) 5, the mouse pointer fails to move. This is because of a USB scheduler limitation in the 2.4 Linux kernel used by the VMware ESX installer.	Perform a text-based installation, or use the <Tab> key to move between fields in the graphical installation.	ESX 3.5 ESX 3.0.2 ESX 3.0.1
Performance is impacted due to interrupt sharing in the PowerEdge 6850 system	The ESX software running on the PowerEdge 6850 system using PERC 5/i Integrated controller may have shared interrupt lines between the USB controller and PERC.  To avoid any performance impact due to the shared interrupts, configure the ESX software to avoid loading the USB drivers.  For more information on shared interrupts in ESX, see the Knowledge Base article 1290 on the VMware Knowledge Base website at <a href="http://www.vmware.com/kb">www.vmware.com/kb</a> .	Perform the following steps:  <b>1</b> Configure the USB controller setting in the PowerEdge 6850 BIOS to <code>USB on with BIOS support</code> (default setting). This enables support for USB devices both during and after ESX boot process even if the USB drivers are not loaded by the ESX software.  <b>2</b> Remove the following USB module aliases from <code>/etc/modules.conf</code> : <b>a</b> <code>alias usb-controller usb-uhci</code> <b>b</b> <code>alias usb-controller1 ehci-hcd</code>  <b>3</b> Save <code>/etc/modules.conf</code> and reboot the system.	ESX 3.5 ESX 3.0.2 ESX 3.0.1
Keyboard and mouse are not responsive on the PowerEdge 6850 system when using an Avocent Keyboard, Video, or Visual Display Unit (KVM) environment	This issue is seen when using an Avocent KVM environment, specifically when KVM switches are cascaded with the system connected to the lowest tier. The BIOS setting in the system for the USB controller is set to <b>On</b> without BIOS support.  In such a configuration, the USB drivers are not loaded in <code>/etc/modules.conf</code> .	Configure the USB controller setting in the PowerEdge 6850 BIOS to <code>USB on with BIOS support</code> (default setting). This enables support for USB devices both during and after the ESX boot process even if USB drivers are not loaded by the ESX software.	ESX 3.5 ESX 3.0.2 ESX 3.0.1

**Table 1-1. Known Issues and Resolution (continued)**

Issue	Description	Resolution	Applies to
SCSI target is unrecognized on PowerEdge systems with PERC 5 controllers	The ESX software lists an unrecognized SCSI target for the PERC 5 controller. The SCSI target is typically identified as <code>vmhba0:264:0</code> . The target cannot be configured to create Virtual Machine File System (VMFS) partitions.	This target represents the backplane for the PowerEdge systems with SAS drives. This can be ignored.	ESX 3.0.2 ESX 3.0.1
Log file shows a failed modprobe message	The following error appears in <code>/var/log/messages</code> on a system reboot: <code>kernel: kmod: failed to exec /sbin/modprobe -s -k scsi_hostadapter, errno = 2</code>	The modules loaded with ESX are generic across all installations of ESX and the modules that do not apply to a particular system model fails to load. This error message can be ignored.	ESX 3.5 ESX 3.0.2 ESX 3.0.1
VMotion is not allowed between hosts with different processors	For certain combinations of processors, especially those in which one processor of the pair is new, VirtualCenter may refuse to allow VMotion between two systems running ESX software. The following error message appears: <code>Error: Cannot migrate between hosts with different processors. Supported extended features differ. (Source: 0x0000019d, 0x0000001d)</code>	VMotion between processors with different settings and features is not supported. For more information on VMotion compatibility, see the <i>VMotion and 64-bit VM Compatibility with Dell PowerEdge Servers</i> available on the Dell Support website at <a href="http://support.dell.com">support.dell.com</a> .	ESX 3.5 ESX 3.0.2 ESX 3.0.1
Device ID of DRAC 4 adapter 1028:0012 is missing in <code>vmware-devices.map</code> file	Device ID of DRAC 4 adapter 1028:0012 is missing in the <code>vmware-devices.map</code> file. As a result, it is listed as an unknown device in the output of the <code>lspci</code> command that lists the PCI devices in the system.	This issue will be fixed in a future release of ESX software.	ESX 3.5 ESX 3.0.2 ESX 3.0.1

## Additional References

- VMware Knowledge Base — [www.vmware.com/kb](http://www.vmware.com/kb)
- VMware Community Access — [www.vmware.com/communities/content](http://www.vmware.com/communities/content)
- VMware Virtual Infrastructure Documents— [www.vmware.com/support/pubs](http://www.vmware.com/support/pubs)
- *Dell OpenManage With VMware ESX Installation Guide* — [support.dell.com](http://support.dell.com)

