

I/O Compatibility Guide For ESX Server 3.x

Last Updated: January 31, 2007

What's New

Changes since the last edition of this guide include:

- Modified information for the IBM Emulex 4GB FC Single Port PCIe HBA for IBM SystemX, Emulex 4GB FC Dual Port PCIe HBA for IBM SystemX, Emulex 4GB FC Single Port PCIx HBA for IBM SystemX, Emulex 4GB FC Dual Port PCIx HBA for IBM SystemX, QLogic 4GB FC Single Port PCIe HBA for IBM SystemX, and QLogic 4GB FC Dual Port PCIe HBA for IBM SystemX. See [“IBM Storage IO Devices”](#) on page 8.
- Added support for IBM MegaRAID 8480. See [“IBM Storage IO Devices”](#) on page 8.
- Added support for the IBM PRO/1000 GT Server Adapter by Intel, PRO/1000 GT Dual Port Server Adapter by Intel, PRO/1000 GT Quad Port Server Adapter by Intel, PRO/1000 MT Server Ethernet Adapter by Intel, PRO/1000 MT Dual Port Server Adapter by Intel, PRO/1000 PF Server Adapter by Intel, PRO/1000 PT Dual Port Server Adapter by Intel, PRO/1000 PT Quad Port Server Adapter by Intel, and the PRO/1000 XT Server Adapter by Intel. See [“IBM Networking Devices \(Intel OEM\)”](#) on page 14.
- Added support for the Dell Intel PRO/1000 PT Quad Port Server Adapter. See [“Dell Networking Devices \(Intel or Broadcom OEM\)”](#) on page 13.

Introduction

VMware® ESX Server software delivers high performance I/O for PCI-based SCSI, RAID, Fibre Channel, and Ethernet controllers. To achieve high performance, these devices are accessed directly through device drivers in the ESX Server host, and not through a host operating system, as with VMware Workstation and VMware Server products.

NOTE IDE RAID and SATA RAID are not supported for the VMFS file system.

This document includes the following topics:

- [“Storage I/O Drivers and Devices”](#) on page 2
- [“Network I/O Drivers and Devices”](#) on page 12

Linux Driver Compatibility

While ESX Server software itself is not derived from Linux, it includes a Linux compatibility module to allow Linux storage and networking drivers to be adapted and recompiled for ESX Server hosts. This enables VMware and VMware partners to more easily support a wide range of high-performance devices and eases the driver porting effort on the storage and networking device vendors. VMware or VMware partners typically modifies these drivers for one or more of the following reasons:

- To make the driver compatible with the ESX Server host
- To tune the driver for performance
- To add I/O resource governing or QoS support to the driver

- To fix generic bugs in the driver

It is not possible to directly load existing, precompiled, Linux device driver binaries onto an ESX Server host.

Storage I/O Drivers and Devices

This section discusses storage I/O devices in the following sections:

- “Storage I/O Driver Versions” on page 2
- “Storage I/O Device and Model Information” on page 2

Storage I/O Driver Versions

The following table summarizes the driver versions shipped with the current release of ESX Server software:.

Table 1. Driver Version

Class	Vendor	ESX Server 3.0		ESX Server 3.0.1	
		Driver	Version	Driver	Version
SCSI	Adaptec	aic7xxx	6.3.9	aic7xxx	6.3.9
	Adaptec	aic79xx	2.0.12	aic79xx	2.0.12
	Adaptec	adp94xx	1.0.7-11	adp94xx	1.0.7-11
	LSI Logic	mptscsi ¹	2.05.16		
	LSI Logic	mptscsi_2xx ¹	2.06.34.01	mptscsi_2xx ¹	2.06.34.13
iSCSI	QLogic	qla4010	3.10 ²		
	QLogic			qla4022	3.24
RAID	Adaptec	aacraid ³	1.1-5-2372		
	Adaptec	aacraid_esx30 ³	1.1.5-2415	aacraid_esx30 ³	1.1.5-2415
	Adaptec	ips	7.10.17	ips	7.10.17
	HP	cciss	2.4.54-14VMS	cciss	2.4.54-14VMS
	LSI Logic	megaraid2 ⁴	2.10.7	megaraid2 ⁴	2.10.7
	LSI Logic	megaraid_sas ⁴	00.00.02.00	megaraid_sas ⁴	00.00.02.00
	Mylex	dac960	2.4.11	dac960	2.4.11
Fibre Channel	Emulex	lpfcdd_7xx ⁷	7.1.14		
	Emulex	lpfcdd_732 ^{5,7}	7.3.2_vmw1	lpfcdd_732(default) ^{5,7}	7.3.2_vmw2
	QLogic	qla2x00_7xx ⁸	7.04.00		
	QLogic	qla2x00_707 ^{5,6,8}	7.07.00	qla2x00_707	7.07.04

¹ You cannot simultaneously run devices using the mptscsi driver and ones using the mptscsi_2xx driver.

² QLogic 4010 iSCSI adapter requires BIOS v1.09 and firmware v02.00.00.05, or later. In ESX Server 3.0, qla4010 is considered an experimental driver. VMware will provide limited support for devices using this driver.

³ You cannot simultaneously run devices using the aacraid driver and ones using the aacraid_esx30 driver.

⁴ You cannot simultaneously run devices using the megaraid2 driver and ones using the megaraid_sas driver.

⁵ MSCS is not supported with this driver/HBA.

⁶ IBM F10/F20 is not supported with QLogic firmware version 4.00.12. An upgrade is required to firmware version 4.00.18.

⁷ You cannot simultaneously run devices using the lpfcdd_7xx driver and ones using the lpfcdd_732 driver.

⁸ You cannot simultaneously run devices using the qla2x00_7xx driver and ones using the qla2x00_707 driver.

⁹ For MCSC only.

Storage I/O Device and Model Information

The detailed lists show actual vendor devices that are either physically tested or are similar to the devices tested by VMware or VMware partners. VMware provides support only for the devices that are listed in this document

- “Adaptec Storage IO Devices” on page 3

- “Dell Storage IO Devices” on page 5
- “Emulex Storage IO Devices” on page 6
- “Hewlett Packard Storage IO Devices” on page 7
- “Hitachi Data Storage IO Device” on page 8
- “IBM Storage IO Devices” on page 8
- “iSCSI Software Initiator” on page 9
- “LSILogic Storage IO Devices” on page 9
- “Sun Storage IO Devices” on page 10
- “QLogic Storage IO Devices - Fibre Channel HBA” on page 10

Table 2. Adaptec Storage IO Devices

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
1480A Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
SCSI RAID 2200S PCI SCSI 2ch	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
2902/04/10/15/20/30C	aic7xxx	6.3.9	aic7xxx	6.3.9
29160 Ultra160 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
29160B Ultra160 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
29160C Ultra160 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
29160N Ultra160 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2930 Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2930 Ultra2 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2930C Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2930CU SCSI adapter	aic7xxx	6.3.9	aic7xxx	6.3.9
2940 Pro Ultra	aic7xxx	6.3.9	aic7xxx	6.3.9
2940 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2940 Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2940 Ultra2 SCSI ¹	aic7xxx	6.3.9	aic7xxx	6.3.9
2940/CN Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2940/DUAL Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2940A Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2940A/CN Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2940B Ultra2 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2944 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2944 Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
2950 Ultra2 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
3230S	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
3240S	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
3940 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
3940 Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
3940A Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
3944 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
3944 Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9

¹ Please see VMware knowledge base article 2166(http://www.vmware.com/support/kb/enduser/std_adp.php?p_faqid=2166) for information on AHA 2940 Ultra2 SCSI performance issues.

Table 2. Adaptec Storage IO Devices (Continued)

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
3944A Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
3950B Ultra2 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
3950D Ultra2 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
3960D Ultra160 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
398X SCSI RAID	aic7xxx	6.3.9	aic7xxx	6.3.9
398X Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
4944 SCSI adapter	aic7xxx	6.3.9	aic7xxx	6.3.9
4944 Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
5400S	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
AAA-131 Ultra2 RAID	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7810 RAID memory	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7815 RAID memory	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7850 SCSI adapter	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7855 SCSI adapter	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7859 SCSI adapter	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7860 Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7870 SCSI adapter	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7880 Ultra SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7890/91 Ultra2 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7892 Ultra160 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7895 Ultra2 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7896/97 Ultra2 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7899 Ultra160 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
AIC-7901W Ultra320 SCSI	aic79xx	2.0.12	aic79xx	2.0.12
29160 Ultra160 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
29320ALP-R Ultra320 SCSI	aic79xx	2.0.12	aic79xx	2.0.12
29320A Ultra320 SCSI	aic79xx	2.0.12	aic79xx	2.0.12
29320LP Ultra320 SCSI	aic79xx	2.0.12	aic79xx	2.0.12
AHA29320LP_IROC	aic79xx	2.0.12	aic79xx	2.0.12
39320 Ultra320 SCSI	aic79xx	2.0.12	aic79xx	2.0.12
39320A Ultra320 SCSI	aic79xx	2.0.12	aic79xx	2.0.12
39320B Ultra320 SCSI	aic79xx	2.0.12	aic79xx	2.0.12
39320D Ultra320 SCSI	aic79xx	2.0.12	aic79xx	2.0.12
39320DB Ultra320 SCSI	aic79xx	2.0.12	aic79xx	2.0.12
AIC-7901A_IROC	aic79xx	2.0.12	aic79xx	2.0.12
AIC-7901B Ultra320 SCSI	aic79xx	2.0.12	aic79xx	2.0.12
AIC-7902 Ultra320 SCSI	aic79xx	2.0.12	aic79xx	2.0.12
AIC-7902	aic79xx	2.0.12	aic79xx	2.0.12
AIC-7902 (Dual Ultra320 SCSI)	aic79xx	2.0.12	aic79xx	2.0.12
AIC-7902_B_IROC	aic79xx	2.0.12	aic79xx	2.0.12
AIC-7902_IROC	aic79xx	2.0.12	aic79xx	2.0.12
AIC-7902W Ultra320 SCSI	aic79xx	2.0.12	aic79xx	2.0.12

¹ Please see VMware knowledge base article 2166 (http://www.vmware.com/support/kb/enduser/std_adp.php?p_faqid=2166) for information on AHA 2940 Ultra2 SCSI performance issues.

Table 2. Adaptec Storage IO Devices (Continued)

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
AIC-9410W SAS	adp94xx.o	0.0.5-7	adp94xx.o	0.0.5-7
19160B Ultra160 SCSI	aic7xxx	6.3.9	aic7xxx	6.3.9
SCSI RAID 2120S	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415

¹ Please see VMware knowledge base article 2166 (http://www.vmware.com/support/kb/enduser/std_adp.php?p_faqid=2166) for information on AHA 2940 Ultra2 SCSI performance issues.

Table 3. Dell Storage IO Devices

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
AIC-7899P U160/m (PowerEdge 1750)	mptscsi	2.05.16	mptscsi_2xx	2.06.34.13
AIC-7899P U160/m (PowerEdge 2600)	mptscsi	2.05.16	mptscsi_2xx	2.06.34.13
Dell 2342M	qla2300_7xx	7.04.00	qlax2x_707	7.04.04
Dell 2362M	qla2300_7xx	7.04.00	qlax2x_707	7.04.04
Dell DISCOVERY	megaraid2	2.10.7	megaraid2	2.10.7
LP10000	lpfcdd_7xx	7.1.14	lpfcdd_732	7.3.2_vmw2
LP1050EX	lpfcdd_7xx	7.1.14	lpfcdd_732	7.3.2_vmw2
LP9802	lpfcdd_7xx	7.1.14	lpfcdd_732	7.3.2_vmw2
LP982	lpfcdd_7xx	7.1.14	lpfcdd_732	7.3.2_vmw2
LPe1105-DL	lpfcdd_732	7.3.2_vmw1	lpfcdd_732	7.3.2_vmw2
LPe1105-M	lpfcdd_732	7.3.2_vmw1	lpfcdd_732	7.3.2_vmw2
LPe1150	lpfcdd_7xx	7.3.2_vmw1	lpfcdd_732	7.3.2_vmw2
PERC 3/Di	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
PERC 3/Di (Boxster/PERC3DiB)	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
PERC 3/Di (Dagger/PERC3DiD)	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
PERC 3/Di (Iguana FlipChip/PERC3DiF)	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
PERC 3/Di (Jaguar/PERC3DiJ)	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
PERC 3/Di (Lexus/PERC3DiL)	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
PERC 3/Di (Opal/PERC3Di)	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
PERC 3/Di (Viper/PERC3DiV)	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
PERC 3/Si	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
PERC 320/DC	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
PERC 4/DC, U320, 128MB ¹	megaraid2	2.10.7	megaraid2	2.10.7
PERC 4/iM	mptscsi	2.05.16	mptscsi_2xx	2.05.16
PERC 4e/DC	megaraid2	2.10.7	megaraid2	2.10.7
PERC 4e/Di ²	megaraid2	2.10.7	megaraid2	2.10.7
PERC 4e/Si	megaraid2	2.10.7	megaraid2	2.10.7
PERC 5/E	megaraid_sas	00.00.02.00	megaraid_sas	00.00.02.00
PERC 5/I	megaraid_sas	00.00.02.00	megaraid_sas	00.00.02.00
PERC4 DI	megaraid2	2.10.7	megaraid2	2.10.7
PERC4_DI_YSTONE	megaraid2	2.10.7	megaraid2	2.10.7
PERC4E DC/SC	megaraid2	2.10.7	megaraid2	2.10.7

PERC = PowerEdge Raid Controller

¹ Firmware upgrade 352B is not supported. For further details, refer to KB 5966817 at <http://kb.vmware.com/kb/5966817>

² Firmware upgrade 522A is not supported. For further details, refer to KB 5966817 at <http://kb.vmware.com/kb/5966817>

Table 3. Dell Storage IO Devices (Continued)

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
PERC4E QC VERDE	megaraid2	2.10.7	megaraid2	2.10.7
PERC4E SE/DI	megaraid2	2.10.7	megaraid2	2.10.7
QLA2340	qla2300_7xx	7.04.00	qla2x00_707	7.04.00
QLA2342 (Quad.)	qla2300_7xx	7.04.00	qla2x00_707	7.04.00
QLE2360 (2Gbs)	qla2300_7xx	7.04.00	qla2x00_707	7.04.00
QLE2362 (2Gbs)	qla2300_7xx	7.04.00	qla2x00_707	7.04.00
QLE2460	qla2300_7xx	7.04.00	qla2x00_707	7.04.00
QLE2462	qla2300_7xx	7.04.00	qla2x00_707	7.04.00
QME2452	qla2300_707	7.07.00	qla2x00_707	7.07.00
QME2462	qla2300_7xx	7.04.00	qla2x00_707	7.04.00
SAS 5/i	mptscsi_2xx	2.06.34.01	mptscsi_2xx	2.06.34.13
SAS 5/iR	mptscsi_2xx	2.06.34.01	mptscsi_2xx	2.06.34.13

PERC = PowerEdge Raid Controller

¹ Firmware upgrade 352B is not supported. For further details, refer to KB 5966817 at <http://kb.vmware.com/kb/5966817>

² Firmware upgrade 522A is not supported. For further details, refer to KB 5966817 at <http://kb.vmware.com/kb/5966817>

Table 4. Emulex Storage IO Devices

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
LP002DC	lpfcdd_7xx	7.1.14		
LP10000	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP10000 ExDC	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP10000DC	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP10000DC-M2	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP1005DC	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP1050	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP1050DC	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP1050Ex	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP1050-F2	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP11000	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
LP11002	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
LP11002-M4	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
LP1150	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
LP1150-F4	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
LP9000/LP9002L	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP952L	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP9802	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP9802DC	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP982	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LPe1050Ex	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LPe11000	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
LPe11002	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2

Emulex HBAs directly connected to an AX100 should be using firmware version 1.91a1 and BootBIOS version 1.70a3 for Boot-From-SAN. VMware supports only direct-connect topology for the AX100, so this does not apply to other arrays.

Table 4. Emulex Storage IO Devices (Continued)

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
LPe1105	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
LPe1105-DL	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
LPe1150	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
X1085A-R5	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
X1086A-R6	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
X1087A-R6	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2

Emulex HBAs directly connected to an AX100 should be using firmware version 1.91a1 and BootBIOS version 1.70a3 for Boot-From-SAN. VMware supports only direct-connect topology for the AX100, so this does not apply to other arrays.

Table 5. Hewlett Packard Storage IO Devices

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
394588-B21	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
394797-B21	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
A7387A	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
A7388A	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
A7560A	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
FC1142SR	qla2300_707	7.07	qla2x00_707	7.07.04
FC1143	qla2300_707	7.07	qla2x00_707	7.07.04
FC1242SR	qla2300_707	7.07	qla2x00_707	7.07.04
FC1243	qla2300_707	7.07	qla2x00_707	7.07.04
FC2142SR	lpfcdd_732	7.3.2_vmw1	lpfcdd_732	7.3.2_vmw2
FC2143	lpfcdd_732	7.3.2_vmw1	lpfcdd_732	7.3.2_vmw2
FC2242SR	lpfcdd_732	7.3.2_vmw1	lpfcdd_732	7.3.2_vmw2
FC2243	lpfcdd_732	7.3.2_vmw1	lpfcdd_732	7.3.2_vmw2
FCA2101	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
FCA2210	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
FCA2214	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
FCA2214DC	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
FCA2404	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
FCA2404DC	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
FCA2408	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
HP NetRAID-4M	aacraid	1.1.5-2372	aacraid_esx30	1.1.5-2415
403621-B21 (LPe1105-HP)	lpfcdd_732	7.3.2_VMW1	lpfcdd_732	7.3.2_vmw2
QLA2460	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLA2462	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLE2460	qla2300_707	7.07.00	qla2x00_707	7.07.04
QlogQLE2462	qla2300_707	7.07.00	qla2x00_707	7.07.04
QMH2462	qla2300_707	7.07.00	qla2x00_707	7.07.04
QMH2462 4G Dual-port Fibre Channel HBA, BC DC	qla2300_707	7.07.00	qla2x00_707	7.07.04
Smart Array 5300	cciss	2.4.54	cciss	2.4.54
Smart Array 5312	cciss	2.4.54	cciss	2.4.54
Smart Array 532	cciss	2.4.54	cciss	2.4.54
Smart Array 5i	cciss	2.4.54	cciss	2.4.54

Table 5. Hewlett Packard Storage IO Devices (Continued)

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
Smart Array 6400	cciss	2.4.54	cciss	2.4.54
Smart Array 6400 EM	cciss	2.4.54	cciss	2.4.54
Smart Array 6402	cciss	2.4.54	cciss	2.4.54
Smart Array 6404	cciss	2.4.54	cciss	2.4.54
Smart Array 641	cciss	2.4.54	cciss	2.4.54
Smart Array 642	cciss	2.4.54	cciss	2.4.54
Smart Array 6i	cciss	2.4.54	cciss	2.4.54
Smart Array E200	cciss	2.4.54	cciss	2.4.54
Smart Array E200i	cciss	2.4.54	cciss	2.4.54
Smart Array P400	cciss	2.4.54	cciss	2.4.54
Smart Array P400i	cciss	2.4.54	cciss	2.4.54
Smart Array P600	cciss	2.4.54	cciss	2.4.54
Smart Array V100	cciss	2.4.54	cciss	2.4.54
Smart Array V100	cciss	2.4.54	cciss	2.4.54

Table 6. Hitachi Data Storage IO Device

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
QLA2340-HDS-SP	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
QLA2342-HDS-SP	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
QLA2460-HDS-SP	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLA2462-HDS-SP	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLE2460-HDS-SP	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLE2462-HDS-SP	qla2300_707	7.07.00	qla2x00_707	7.07.04

Table 7. IBM Storage IO Devices

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
Dual-port U320 SCSI Controller	mptscsi	2.05.16	mptscsi_2xx	2.06.34.13
LP1005DC	lpfcdd_7xx	7.1.14	lpfcdd_732 (default)	7.3.2_vmw2
LP1105-BC	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
Emulex 4GB FC Single Port PCIx for IBM SystemX	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
Emulex 4GB FC Dual Port PCIx for IBM SystemX	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
Emulex 4GB FC Single Port PCIe for IBM SystemX	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
Emulex 4GB FC Dual Port PCIe for IBM SystemX	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
QLA2460	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLA2462	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLogic 4GB FC Single Port PCIe for IBM SystemX	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLogic 4GB FC Dual Port PCIe for IBM SystemX	qla2300_707	7.07.00	qla2x00_707	7.07.04
QMC2462s	qla2300_707	7.07.00	qla2x00_707	7.07.04
QMC2462	qla2300_707	7.07.00	qla2x00_707	7.07.04
QMC2462 4GB Dual port FC HBA, BC DC	qla2300_707	7.07.00	qla2x00_707	7.07.04
MegaRAID 8480			megaraid_sas	00.00.02.00

Table 7. IBM Storage IO Devices (Continued)

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
ServeRAID 4Lx Ultra 160 SCSI Controller	ips	7.10.17	ips	7.10.17
ServeRAID 4Mx Ultra 160 SCSI Controller	ips	7.10.17	ips	7.10.17
serveRAID 5i Integrated RAID Controller	ips	7.10.17	ips	7.10.17
ServeRAID 6i (Sebring refresh)	ips	7.10.17	ips	7.10.17
ServeRAID 6i+ Integrated RAID Cont.	ips	7.10.17	ips	7.10.17
ServeRAID 6M (128MB Cache)	ips	7.10.17	ips	7.10.17
ServeRAID 6M Ultra 320 SCSI Controller (256MB Cache)	ips	7.10.17	ips	7.10.17
ServeRAID 7k	ips	7.10.17	ips	7.10.17
ServeRAID 8i	aacraid	1.1.5-2372	aacraid	1.1.5-2372
ServeRAID 8k	aacraid_esx30	1.1.5-2415	aacraid_esx30	1.1.5-2415
ServeRAID 8k-L	aacraid_esx30	1.1.5-2415	aacraid_esx30	1.1.5-2415
IBM Ultra320 SCSI Controller	aic79xx		aic79xx	
IBM Ultra320 SCSI Controller 2	aic79xx		aic79xx	
IBM SMB 2-Gbps Fibre Channel HBA	qla2300_707		qla2300_707	
IBM ServeRAID-6M Controller (256MB Cache)	ips	7.10.17	ips	7.10.17
IBM ServeRAID-6M Controller (128MB Cache)	ips	7.10.17	ips	7.10.17
IBM iSCSI Server Adapter	qla4010, Experimental support only	3.10		

Table 8. iSCSI Software Initiator

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
Software iSCSI ¹	iscsimod	3.4.2	iscsimod	3.4.2

¹ Supported on Intel E1000 and Broadcom running on a gigabit link only.

Table 9. LSILogic Storage IO Devices

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
53C1020 PCI-X to Ultra320 SCSI	mptscsi	2.05.16	mptscsi_2xx	2.06.34.13
53c1030 PCI-X Fusion-MPT Dual Ultra320 SCSI	mptscsi	2.05.16	mptscsi_2xx	2.06.34.13
53c1035 PCI-X Fusion-MPT Dual Ultra320 SCSI	mptscsi	2.05.16	mptscsi_2xx	2.06.34.13
AMI MEGARAID	megaraid2	2.10.7	megaraid2	2.10.7
AMI MEGARAID2	megaraid2	2.10.7	megaraid2	2.10.7
AMI MEGARAID3	megaraid2	2.10.7	megaraid2	2.10.7
DISCOVERY	megaraid2	2.10.7	megaraid2	2.10.7
LSI MegaRAID 320-2	megaraid2	2.10.7	megaraid2	2.10.7
LSI MegaRAID 320-2x	megaraid2	2.10.7	megaraid2	2.10.7
LSI MegaRAID 320-4x	megaraid2	2.10.7	megaraid2	2.10.7
LSI MegaRAID 320-E ROMB	megaraid2	2.10.7	megaraid2	2.10.7
LSI MEGARAID3	megaraid2	2.10.7	megaraid2	2.10.7
LSI MegaRAID SAS1064/68R	megaraid_sas	00.00.02.00	megaraid_sas	00.00.02.00
LSI U320 SCSI Controller	mptscsi	2.05.16	mptscsi_2xx	2.06.34.13

Table 9. LSILogic Storage IO Devices (Continued)

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
LSI53C1030	megaraid2	2.10.7	megaraid2	2.10.7
LSI53C1030 (MegaRAID)	mptscsi	2.05.16	mptscsi_2xx	2.06.34.13
LSISAS3041E	mptscsi_2xx	2.06.18	mptscsi_2xx	2.06.34.13
LSISAS3041x	mptscsi_2xx	2.06.18	mptscsi_2xx	2.06.34.13
LSISAS3080x	mptscsi_2xx	2.06.18	mptscsi_2xx	2.06.34.13
LSISASS3442E	mptscsi_2xx	2.06.18	mptscsi_2xx	2.06.34.13
MegaRAID SCSI 320-1(Elite 1700)	megaraid2	2.10.7	megaraid2	2.10.7
MegaRAID SCSI 320-2X (Elite 1700 Series518)	megaraid2	2.10.7	megaraid2	2.10.7
SAS3442x	mptscsi_2xx	2.06.18	mptscsi_2xx	2.06.34.13
LSI1064	mptscsi_2xx	2.06.34/01	mptscsi_2xx	2.06.34.13
LSI1064E	mptscsi_2xx	2.06.34/01	mptscsi_2xx	2.06.34.13
LSI1068	mptscsi_2xx	2.06.34/01	mptscsi_2xx	2.06.34.13
LSI1068E			mptscsi_2xx	2.06.34.13

Table 10. Sun Storage IO Devices

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
SG-XPCI1FC-EM2			lpfcdd_732 (default)	7.3.2_vmw2
SG-XPCI1FC-EM4-Z	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
SG-XPCI1FC-QF2 ¹	qla2300_707	7.07.00	qla2x00_707	7.07.04
SG-XPCI1FC-QF4	qla2300_707	7.07.00	qla2x00_707	7.07.04
SG-XPCI1FC-QLC ¹	qla2300_707	7.07.00	qla2x00_707	7.07.04
SG-XPCI1FC-QLC-Z ¹	qla2300_707	7.07.00	qla2x00_707	7.07.04
SG-XPCI2FC-EM2			lpfcdd_732 (default)	7.3.2_vmw2
SG-XPCI2FC-EM4-Z	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
SG-XPCI2FC-QF2 ¹	qla2300_707	7.07.00	qla2x00_707	7.07.04
SG-XPCI2FC-QF2-Z ¹	qla2300_707	7.07.00	qla2x00_707	7.07.04
SG-XPCI2FC-QF4	qla2300_707	7.07.00	qla2x00_707	7.07.04
SG-XPCIE1FC-EM4	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
SG-XPCIE1FC-QF4	qla2300_707	7.07.00	qla2x00_707	7.07.04
SG-XPCIE2FC-EM4	lpfcdd_732	7.3.2_vmw1	lpfcdd_732 (default)	7.3.2_vmw2
SG-XPCIE2FC-QB4-Z	qla2300_707	7.07.00	qla2x00_707	7.07.04
SG-XPCIE2FC-QF4	qla2300_707	7.07.00	qla2x00_707	7.07.04
SG-XPCI1FC-QL2	qla2300_707	7.07.00	qla2x00_707	7.07.04
StorageTek HBAQ032	qla2300_707	7.04.00	qla2x00_707	7.07.04

¹ This OEM version of the QLogic adapter does not support boot-from-SAN.

Table 11. QLogic Storage IO Devices - Fibre Channel HBA

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
QLA2310	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
QLA2310F	qla2300_7xx	7.04.00	qla2x00_707	7.07.04

Table 11. QLogic Storage IO Devices - Fibre Channel HBA (Continued)

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
QLA2310FL	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
QLA2312	qla2300_7xx	7.04.00	qla2300_707	7.07.04
QLA2340	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
QLA2340L	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
QLA2342	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
QLA2342L	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
QLA2344	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
QLA2362	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
QLA2460-E-FRU	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLA2460-E-SP	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLA2462-E-FRU	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLA2462-E-SP	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLE2360	qla2300_7xx	7.07.00	qla2x00_707	7.07.04
QLE2460-E-FRU	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLE2460-E-SP	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLE2462-E-FRU	qla2300_707	7.07.00	qla2x00_707	7.07.04
QLE2462-E-SP	qla2300_707	7.07.00	qla2x00_707	7.07.04
QMA2312	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
QMC2462	qla2300_707	7.07.00	qla2x00_707	7.07.04
QMC2462s	qla2300_707	7.07.00	qla2x00_707	7.07.04
QME2462	qla2300_707	7.07.00	qla2x00_707	7.07.04
QMH2462	qla2300_707	7.07.00	qla2x00_707	7.07.04
SANblade QEM2462 4G PCI-E ExpressModule	qla2300_707	7.07.00	qla2x00_707	7.07.04
SANblade QLA2440 4G PCI-X2	qla2300_707	7.07.00	qla2x00_707	7.07.04
SANblade QLA2460 4G PCI-X2	qla2300_707	7.07.00	qla2x00_707	7.07.04
SANblade QLA2462 4G PCI-X2	qla2300_707	7.07.00	qla2x00_707	7.07.04
SANblade QLE2440 4G PCI-E	qla2300_707	7.07.00	qla2x00_707	7.07.04
SANblade QLE2460 4G PCI-E	qla2300_707	7.07.00	qla2x00_707	7.07.04
SANblade QLE2462 4G PCI-E	qla2300_707	7.07.00	qla2x00_707	7.07.04
SANblade QMA2312	qla2300_7xx	7.04.00	qla2x00_707	7.07.04
SANblade QMC2462	qla2300_707	7.07.00	qla2x00_707	7.07.04
SANblade QMC2462s	qla2300_707	7.07.00	qla2x00_707	7.07.04
SANblade QME2462	qla2300_707	7.07.00	qla2x00_707	7.07.04
SANblade QMH2462	qla2300_707	7.07.00	qla2x00_707	7.07.04

Table 12. QLogic Storage Devices - iSCSI

Device Model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
QLogic QLA4010 ¹	qla4010	3.10		
QLA4050C/QLA4052C ²			qla4022	3.24

¹ QLogic 4010 iSCSI adapter requires BIOS v1.09 and firmware v02.00.00.05, or later. In ESX Server 3.0.x, qla4010 is considered an experimental driver. VMware will provide limited support for devices using this driver.

² QLogic iSCSI adapters require minimum BIOS v1.09 and minimum firmware v2.00.00.38.

Network I/O Drivers and Devices

This section discusses network I/O devices and drivers in the following sections:

- [“Network I/O Drivers and Versions”](#) on page 12
- [“Network I/O Device and Model Information”](#) on page 12

Network I/O Drivers and Versions

The following table summarizes the driver versions shipped with the stated release of ESX Server software, listing the device models and driver versions.

Table 13. Drivers shipped with ESX Server software

Class	Vendor	ESX Server 3.0		ESX Server 3.0.1	
		Driver	Version	Driver	Version
Network	Broadcom	tg3	3.43b	tg3	3.43b
	Broadcom	bnx2	1.3.22	bnx2	1.3.22
	Intel	e100	2.3.40	e100	2.3.40
	Intel	e1000	7.0.33	e1000	7.0.33

Network I/O Device and Model Information

The detailed lists show actual vendor devices that are either physically tested or are similar to the devices tested by VMware or VMware partners. VMware provides support only for the devices listed in this document.

Please contact VMware with any questions about current and planned device support.

Devices from the following vendors are currently supported:

- [“Broadcom Networking Devices”](#) on page 12
- [“Dell Networking Devices \(Intel or Broadcom OEM\)”](#) on page 13
- [“Hewlett Packard Networking Devices \(Intel or Broadcom OEM\)”](#) on page 13
- [“IBM Networking Devices \(Intel OEM\)”](#) on page 14
- [“Intel Networking Devices”](#) on page 16
- [“Sun Networking Devices”](#) on page 17

Table 14. Broadcom Networking Devices

Device model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
BCM 5703C	tg3	3.43b	tg3	3.43b
BCM 5703S	tg3	3.43b	tg3	3.43b
BCM 5704	tg3	3.43b	tg3	3.43b
BCM 5704C	tg3	3.43b	tg3	3.43b
BCM 5704C - Dual port	tg3	3.43b	tg3	3.43b
BCM 5704S	tg3	3.43b	tg3	3.43b
BCM 5706	bnx2	1.3.22	bnx2	1.3.22
BCM 5706 based Server Adapter	bnx2	1.3.22	bnx2	1.3.22
BCM 5708	bnx2	1.3.22	bnx2	1.3.22
BCM 5708S PCI-X to PIB Bridge	bnx2	1.3.22	bnx2	1.3.22
BCM5701	tg3	3.43b	tg3	3.43b
BCM5702	tg3	3.43b	tg3	3.43b

Table 14. Broadcom Networking Devices (Continued)

Device model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
BCM5703	tg3	3.43b	tg3	3.43b
BCM5704	tg3	3.43b	tg3	3.43b
BCM5704S	tg3	3.43b	tg3	3.43b
BCM5705	tg3	3.43b	tg3	3.43b
BCM5705F	tg3	3.43b	tg3	3.43b
BCM5705M	tg3	3.43b	tg3	3.43b
BCM 5721	tg3	3.43b	tg3	3.43b
BCM 5715	tg3	3.43b	tg3	3.43b
BCM5782	tg3	3.43b	tg3	3.43b
BCM5788	tg3	3.43b	tg3	3.43b
BCM5901	tg3	3.43b	tg3	3.43b

Do not use Broadcom 5700 Rev 14 or 5701 Rev 15 for heavy traffic, VMotion, or Service Console on ESX Server 2.x and 3.x.
Update your BCM5700 firmware.

Table 15. Dell Networking Devices (Intel or Broadcom OEM)

Device model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
BCM 5703	tg3	3.43b	tg3	3.43b
BCM 5704	tg3	3.43b	tg3	3.43b
BCM 5708	tg3	3.43b	tg3	3.43b
BCM 5721, PCI-E	tg3	3.43b	tg3	3.43b
Dell PRO/100 server connections	e100	2.3.40	e100	2.3.40
Dell PRO/100 server Adapter	e100	2.3.40	e100	2.3.40
Intel PRO/1000MT Dual Port Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000MT Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 PT Dual Port Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 PT Quad Port Server Adapter			e1000 ¹	ESX-1006511
Intel PRO/1000 PT Server Adapter	e1000	7.0.33	e1000	7.0.33

¹ The Intel Pro/1000 PT Quad Port Adapter is only supported with the e1000 driver update supplied in patch ESX-1006511.
Download the patch from <http://www.vmware.com/download/vi/>

Table 16. Hewlett Packard Networking Devices (Intel or Broadcom OEM)

Device model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
HP PRO/100 Server Adapters	e100	2.3.40	e100	2.3.40
HP Gigabit Ethernet Server Adapter	e1000	7.0.33	e1000	7.0.33
HP Gigabit Ethernet Server Adapter	e1000	7.0.33	e1000	7.0.33
HP Gigabit Ethernet Server Adapter	e1000	7.0.33	e1000	7.0.33
HP NC325m			tg3	3.43b
HP NC326i	tg3	3.43b	tg3	3.43b
HP NC326m	tg3	3.43b	tg3	3.43b
HP NC6134 Gigabit NIC	e1000	7.0.33	e1000	7.0.33
HP NC6136 Gigabit Server Adapter	e1000	7.0.33	e1000	7.0.33

Table 16. Hewlett Packard Networking Devices (Intel or Broadcom OEM) (Continued)

Device model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
HP NC7131 Gigabit Server Adapter	e1000	7.0.33	e1000	7.0.33
HP NC7132 Gigabit Server Adapter	e1000	7.0.33	e1000	7.0.33
HP NC 7170 Dual PCI-X 1000-T Server Adapter	e1000	7.0.33	e1000	7.0.33
HP NC6170 Dual PCI-X 1000-SX Server Adapter	e1000	7.0.33	e1000	7.0.33
HP ProLiant NC310F PCI-X Gigabit Server Adapter	e1000	7.0.33	e1000	7.0.33
HP NC340T PCI-X Quad-port Gigabit Server Adapter	e1000	7.0.33	e1000	7.0.33
HP NC360T PCIe Dual-port Gigabit Server Adapter	e1000	7.0.33	e1000	7.0.33
NC7770	tg3	3.43b	tg3	3.43b
NC7780	tg3	3.43b	tg3	3.43b
NC7771	tg3	3.43b	tg3	3.43b
NC7781 LOM	tg3	3.43b	tg3	3.43b
NC7760 LOM	tg3	3.43b	tg3	3.43b
NC7782 LOM	tg3	3.43b	tg3	3.43b
NC7783 LOM	tg3	3.43b	tg3	3.43b
NC7761 LOM	tg3	3.43b	tg3	3.43b
NC1020	tg3	3.43b	tg3	3.43b
HP NC320m	tg3	3.43b	tg3	3.43b
HP NC272F	bnx2	1.3.22	bnx2	1.3.22
HP NC371i	bnx2	1.3.22	bnx2	1.3.22
HP NC373i	bnx2	1.3.22	bnx2	1.3.22
HP NC373m	bnx2	1.3.22	bnx2	1.3.22
HP NC380T	bnx2	1.3.22	bnx2	1.3.22
NC370i Integrated NIC	bnx2	1.3.22	bnx2	1.3.22
NC370T Dalhart-Lite	bnx2	1.3.22	bnx2	1.3.22

Table 17. IBM Networking Devices (Intel OEM)

Device model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
IBM Netfinity Gigabit Ethernet SX Adapter	e1000	7.0.33	e1000	7.0.33
IBM Gigabit Ethernet SX Server Adapter	e1000	7.0.33	e1000	7.0.33
IBM Total Storage Gigabit Ethernet Copper Adapter	e1000	7.0.33	e1000	7.0.33
IBM PRO/100 server adapters	e100	2.3.40	e100	2.3.40
PRO/1000 GT Dual Port Server Adapter by Intel	e1000	7.0.33	e1000	7.0.33
PRO/1000 GT Quad Port Server Adapter by Intel	e1000	7.0.33	e1000	7.0.33
PRO/1000 GT Server Adapter by Intel	e1000	7.0.33	e1000	7.0.33
PRO/1000 MT Dual Port Server Adapter by Intel	e1000	7.0.33	e1000	7.0.33
PRO/1000 MT Server Ethernet Adapter by Intel	e1000	7.0.33	e1000	7.0.33
PRO/1000 PF Server Adapter by Intel	e1000	7.0.33	e1000	7.0.33
PRO/1000 PT Dual Port Server Adapter by Intel	e1000	7.0.33	e1000	7.0.33
PRO/1000 PT Quad Port Server Adapter by Intel			e1000 ¹	ESX-1006511
PRO/1000 XT Server Adapter by Intel	e1000	7.0.33	e1000	7.0.33
NetXtreme II 1000 Express Ethernet Adapter	bnx2		bnx2	1.3.22
NetXtreme 1000 T Express Ethernet Adapter	tg3		tg3	3.43b
NetXtreme 1000 T + Ethernet Adapter	tg3		tg3	3.43b

Table 17. IBM Networking Devices (Intel OEM) (Continued)

Device model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
NetXtreme 1000 T + Dual Port Ethernet Adapter	tg3		tg3	3.43b
NetXtreme 1000 SX + Fiber Ethernet Adapter	tg3		tg3	3.43b
NetXtreme 1000 Express G Ethernet Adapter	tg3		tg3	3.43b

¹ The Intel Pro/1000 PT Quad Port Adapter is only supported with the e1000 driver update supplied in patch ESX-1006511. Download the patch from <http://www.vmware.com/download/vi/>

Table 18. Intel Networking Devices

Device model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
Intel 82562 based Fast Ethernet Connection	e100	2.3.40	e100	2.3.40
Intel 825xER based Network Connection	e100	2.3.40	e100	2.3.40
Intel PRO/100+ Management Adapter with Alert on LAN G Server	e100	2.3.40	e100	2.3.40
Intel PRO/100 server adapters	e100	2.3.40	e100	2.3.40
Intel Pro/1000 GT Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel Pro/1000 GT Dual Port Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 GT Quad Port Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 MB Dual Port Server Connection	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 MF Server Adapter (LX)	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 MF Dual Port Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 MT Network Connection	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 MT Server Connection	e1000	7.0.33	e1000	7.0.33
Intel Pro/1000 MT Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel Pro/1000 MT Dual Port Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 MT Dual Port Network Connection	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 MT Quad Port Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel Pro/1000 P Dual Port Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 PF Dual Port Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 PF Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 PT Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 PT Dual Port Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 PT Quad Port Server Adapter			e1000 ¹	ESX-1006511
Intel PRO/1000 XF Server Adapter	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 XT Network Connection	e1000	7.0.33	e1000	7.0.33
Intel PRO/1000 XT Server Adapter	e1000	7.0.33	e1000	7.0.33

¹ The Intel Pro/1000 PT Quad Port Adapter is only supported with the e1000 driver update supplied in patch ESX-1006511. Download the patch from <http://www.vmware.com/download/vi/>

Table 19. Sun Networking Devices

Device model	ESX Server 3.0		ESX Server 3.0.1	
	Driver	Version	Driver	Version
X5040A-Z			e1000	7.0.33
X7282A-Z			e1000	7.0.33
X7283A-Z			e1000	7.0.33

