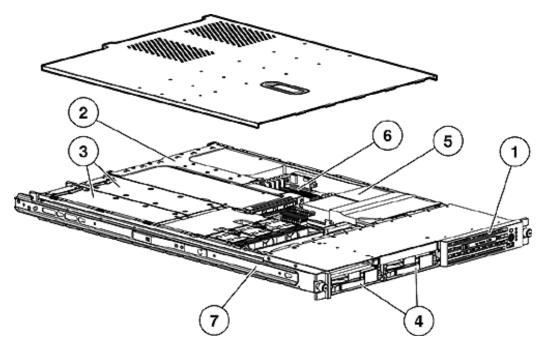
Overview



- 1. Redundant fans standard
- 2. 1 full length and 1 half length PCI-X slots (optional PCI Express)
- 3. Optional redundant power supplies
- 4. Two 1" U320 hot plug drive bays (SATA models also available)
- 5. Up to two Xeon processors with $800 MHz\ FSB$
- 6. Up to 8GB PC2700 SDRAM
- 7. Sliding rails standard for in rack servicing

What's New

• Intel® Xeon 3.6 GHz/800 SCSI & SATA Models

Overview

At A Glance

- Intel® Xeon 3.0 GHz/800 Processor (dual capability) with 1-MB L2 cache
- Intel® Xeon 3.4 GHz/800 Processor (dual capability) with 1-MB L2 cache
- Intel® Xeon 3.6 GHz/800 Processor (dual capability) with 1-MB L2 cache
- Combining concentrated 1U compute power, integrated Lights-Out management, and essential fault tolerance, the DL360 is optimized for space constrained data center installations.
- Up to 2 Intel Xeon 3.0 GHz/1MB, 3.4 GHz/1MB and 3.6 GHz/1MB Processors with 800MHz front side bus and EM64T Technology
- Up to 8GB of PC2700 DDR 333 SDRAM; system can be configured for 2:1 interleaving
- Advanced ECC memory standard; optional Online Spare Memory
- Two 64 bit/133 MHz PCI-X slots (one full length slot and one half length); optional PCI-Express NOTE: For information about PCI Express visit: http://www.hp.com/servers/pci-express
- Fan redundancy, standard
- 460-Watt hot plug power supply with optional 1+1 redundancy
- Integrated Lights-Out (iLO) remote management embedded on every DL360
- Support for new iLO Shared Network Port enables access to the iLO management processor through one of the embedded system NICs
- Embedded Smart Array 6i RAID Controller with optional 128MB transportable BBWC
- Embedded NC7782 Dual Port NIC
- Supports up to two 1" Ultra320 hot plug hard drives; Serial ATA models also available
- Three USB ports available: rear, front, internal.
- 1U Rack form factor (1.75")
- Intel E7520 chipset
- New spring-loaded Universal sliding rails for in rack servicing ship standard; optional ambidextrous cable management arm
- ProLiant Essential Foundation Pack standard, including HP Systems Insight Manager, SmartStart, SmartStart Scripting Toolkit, Subscriber's Choice and ROM Based Setup Utility (RBSU).
- Protected by HP Services, including a three-year, next business day on-site limited global warranty and extended Pre-Failure Warranty which covers
 processors, memory, and U320 SCSI hard drives SATA hard drives have a one-year warranty. Certain restrictions and exclusions apply. Consult the
 HP Customer Support Center at 1-800-345-1518 for details.



Standard Features

NOTE: For the Standard Features shipped in the "Factory Integrated Models", please see the "Configuration Information - Factory Integrated Models"

section.

Processor
One of the following depending on Model

Intel Xeon Processor 3.0 GHz/800MHz -1MB L2
Intel Xeon Processor 3.4 GHz/800MHz -1MB L2
Intel Xeon Processor 3.6 GHz/800MHz -1MB L2

Cache Memory

1-MB Level 2 cache

Upgradability

Upgradeable to dual processing

Chipset

Intel chipset is E7520

Memory

Type PC2700 DDR 333 SDRAM

Standard

1 GB (1 x 1 GB)

Maximum

8 GB

Memory Protection

Online spare Advanced ECC

Network Controller

Embedded NC7782 Dual Port NIC

Expansion Slots	Slot Number	Bus Speed	Bus Number*	Device Number**	Hot Plug	PCI Voltage Notes
	1	64-bit/133MHz PCI-X	7	0	no	3.3 Volt
	1	PCI Express x8(optional)	3	0	no	Х8
	2	64-bit/133MHz PCI-X	10	0	no	3.3 Volt
	2	PCI Express x8(optional)	13	0	no	Х8

^{*}NOTE: Default bus assignment. Inserting cards with PCI bridges may alter the actual bus assignment number.

NOTE: For information about PCI Express visit: http://www.hp.com/servers/pci-express

NOTE: For more information regarding PCI-X, please see the following URL: http://www.HP.com/pci-x.

NOTE: All slots can accept universal keyed PCI cards.

Manageability

Integrated Lights-Out (iLO) Management (integrated on motherboard)

Storage Controllers

Smart Array 6i Controller (integrated on system board of SCSI models) or non-RAID SATA on SATA models (SATA RAID

functionality is available via OS software RAID)

NOTE: The ProLiant DL360 G4 does not offer an external SCSI port.



^{**}NOTE: Slots are enumerated differently based on OS. MS OS's enumerate from lowest to highest Device ID by bus (starting with the lowest bus).

Standard Features

Storage	Diskette Drive Optical Drive	1.44 MB Diskette Drive; optional in some models24x IDE CD-ROM Drive (Low-Profile) (ejectable); optional in some models				
Maximum Internal Storage	Hot Plug SCSI	600 GB	2 x 300 GB Ultra320			
Type	SATA	500 GB	2 x 250 GB Serial ATA			
Interfaces	Serial	1				
	Pointing Device (Mouse)	1				
	Graphics	1				
	Hot Plug Keyboard	1				
	USB	3 (rear, front, intern	nal)			
			the following URL for additional information regarding USB support: v1.hp.com/products/servers/platforms/usb-support.html.			
	Network RJ-45	2				
	iLO remote management port	1				
Graphics	Integrated ATI RAGE XL Video (Controller with 8-MB	SDRAM Video Memory			
Form Factor	Rack (1U), (1.75 in/4.45 cm)					



Standard Features

ProLiant Essentials Foundation Pack Software

HP Systems Insight Manager

HP's new HP Systems Insight Manager (HP SIM) helps maximize system uptime and performance and reduce system maintenance costs by providing proactive notification of problems before those problems result in unplanned downtime or reduced productivity. HP SIM are both easy to set up work with the Insight Management Agents, integrated Light-Out and Remote Insight Light-Outs Edition, and Version Control Agents to deliver robust fault, configuration, and asset management as well as remote administration. With HP SIM customers will also be able to take advantage of role-based security; the ability to manage ProLiant, Integrity, and HP 9000 systems; and plug-ins for storage, client, printer, and power management as well as server rapid deployment, performance management, and workload management. For more details on HP SIM visit

http://www.hp.com/go/hpsim.

SmartStart SmartStart is a tool that simplifies server setup, providing a rapid way to deploy reliable

and consistent server configurations. For more information, please visit the SmartStart Web site at http://www.hp.com/servers/smartstart.

SmartStart version supported (minimum): SmartStart 7.10.

Management Agents The Management Agents form the foundation for HP's Intelligent Manageability strategy.

They provide direct, browser-based access to in-depth instrumentation built into HP servers, workstations, desktops, and portables, and send alerts to HP System Insight Manager and other enterprise management applications in case of subsystem or environmental failures. For additional information about the Management Agents and other management

products from HP, please visit the management Web site at

http://www.hp.com/servers/manage.

Subscriber's Choice Subscriber's Choice Driver and Support Alerts/Notifications is a web-based email

subscription service that provides automatic delivery of software and driver change notifications for ProLiant products. Sign up at http://www.hp.com/go/subscriberschoice and customize your profile to receive various new alerts as they become available, on a

weekly or monthly basis.

ROMPaq, support software,

ana configuration utilities

Insight Diagnostics Online

Edition

Optional ProLiant Essentials Value Packs The latest software, drivers, and firmware fully optimized and tested for your ProLiant server and options available in SmartStart or downloadable from Software and Drivers download pages: http://www.hp.com/go/support

The most advanced configuration analysis, reporting and troubleshooting utilities used by HP and at your fingertips, available in SmartStart.

Optional software offerings that selectively extend the functionality of an Adaptive

Infrastructure to address specific business problems and needs:

• Rapid Deployment Pack - an automated solution for multi-server deployment and

provisioning, enabling companies to quickly and easily adapt to changing

- business demands.
 Workload Management Pack provides easier management of complex environments, improving overall server utilization and enabling Windows® 2000 customers for the first time to confidently deploy multiple applications on a single
- Integrated Lights-Out Advanced Pack upgrades the Integrated Lights-Out processor to full virtual presence and control with graphical console and virtual media.
- Recovery Server Option Pack entry-level high availability software that will
 provide reliable protection and increased uptime against server hardware and
 operating system failures.
- Performance Management Pack a performance management solution that identifies and explains hardware performance bottlenecks on ProLiant servers and attached options enabling users to better utilize their valuable resources.

NOTE: Flexible and volume quantity license kits are available for ProLiant Essentials Value Packs. Refer to http://www.hp.com/servers/proliantessentials or the various ProLiant Essentials Value Pack product QuickSpecs for more information.

multiprocessor ProLiant Server.

NOTE: For more information regarding ProLiant Essentials Software, please see the following URL: http://www.hp.com/servers/proliantessential.



Standard Features

Industry Standard Compliance

ACPI 1.0b Compliant PCI 2.2 Compliant

Microsoft® Logo certifications USB 1.1 and 2.0 Compliant

Remote Manageability

Integrated Lights-Out (iLO) Standard Management:

- Virtual Text Remote Console
- Virtual Power Button Control
- Dedicated & shared LAN Connectivity
- Browser and command line access
- Automatic IP Configuration via DHCP/DNS/WINS
- Industry Standard 128-bit Secure Sockets Layer (SSL) and Secure Shell Security
- IML and iLO Event Logging
- Support for 12 user accounts with customizable access privilege

Integrated Lights Out Advanced Pack (optional)

Remote Lights out Edition II (optional)

Intelligent Manageability HP Systems Insight Manager

SmartStart

Remote Insight Lights-Out Edition II (optional)

ROM-Based Setup Utility (RBSU) Remote-Flash Redundant ROM Integrated Management Log (IML)

Server Health logging

Automatic Server Recovery-2 (ASR-2) System Interconnect Status Indicators

Dynamic sector repairing and drive parameter tracking (with Smart Array controllers)

Hot Spare Boot

(NOTE: Upon the event of a failed processor or VRM in a multi-processing environment, the system will automatically reboot and use the remaining good processor(s).)

Power Down Utility

Pre-Failure Warranty (covers processors, as well as hard drives and memory)

Security

Power-on password Keyboard password Diskette drive control Diskette boot control

QuickLock, Network Server Mode

Removable CD and Floppy Drive Assembly

Serial interface control Administrator's password Disk configuration lock

Integrated Lights-Out has 12 customizable user accounts and SSL encryption

Integrated Lights-Out can be disabled via a Global Setting

Server Power Cords

High line cord ships standard with all skus, an additional low line cord for US and Japan

Power Supply

460W Optional (1+1 redundant) power supply

NOTE: PN 354587-B21 contains the optional power supply and an IEC power cable only; purchase if connecting to PDU/UPS that supports IEC cables. PN 354587-001 contains a country-specific low line (NEMA) power cord only.



Standard Features

System Fans 7 fans ship standard; Fan redundancy standard

Required Cabling

For required cabling information, refer to the Web site at http://h18000.www1.hp.com/products/servers/proliantdl360/.

OS Support

Microsoft Windows 2000 Windows Server 2003 Novell NetWare Linux (Red Hat, SuSE, UnitedLinux)

Solaris

NOTE: SCSI and SATA models have different OS support. Please see OS Support Matrix.

NOTE: For a more complete and up-to-date listing of supported OSs and versions, please visit our OS Support Matrix

page at: http://www.hp.com/go/supportos.

NOTE: For more complete and up-to-date information on how to buy server operating systems from HP please visit the OS product site at: http://h18004.www1.hp.com/products/servers/software/OEM.html

NOTE: For a listing of the latest drivers available for the ProLiant DL360, please see:

http://h18023.www1.hp.com/support/files/server/us/index.html.

NOTE: For a more complete and up-to-date information on Linux support, please visit HP Linux Web site at

http://h18000.www1.hp.com/products/servers/linux/hpLinuxcert.html.

Rack Airflow Requirements Rack 10000 series Cabinets

The increasing power of new high-performance processor technology requires increased cooling efficiency for rack-mounted servers. The 10000 Series Racks provide enhanced airflow for maximum cooling, allowing these racks to be fully loaded with servers using the latest processors.

CAUTION: If a third-party rack is used, observe the following additional requirements to ensure adequate airflow and to prevent damage to the equipment:

- Front and rear doors: If your 42U server rack includes closing front and rear doors, you must allow 830 square inches (5,350 sq cm) of hole evenly distributed from top to bottom to permit adequate airflow (equivalent to the required 64 percent open area for ventilation).
- Side: The clearance between the installed rack component and the side panels of the rack must be a minimum of 2.75 inches (7 cm).

CAUTION: Always use blanking panels to fill all remaining empty front panel U-spaces in the rack. This arrangement ensures proper airflow. Using a rack without blanking panels results in improper cooling that can lead to thermal damage.

NOTE: For additional information, refer to the Setup and Installation Guide or the Documentation CD provided with the server, or to the server documentation located in the Support section at the following URL: http://h18000.www1.hp.com/products/servers/proliantdl360/index.html.

HP Factory Express Capabilities

HP Factory Express gives you the flexibility to choose from a full menu of factory capabilities all in one manufacturing facility, in one process, with one touch giving you full control and access to HP's World class manufacturing facility anytime. This approach provides you the speed to deploy your IT needs, with total quality assurance, reliability, and predictability to lower your total cost of ownership by letting HP install, rack, and customize your software and hardware options for you.



Standard Features

Service and Support

Three-year limited warranty, including hardware diagnostic support, pre-failure warranty (coverage of hard drives, memory and processors). The warranty is fully supported by HP Services and a worldwide network of resellers and service providers. In addition 90-day's getting started software telephone support may be covered under the warranty or available for an additional fee. Enhancements to warranty services are available through HP Care Pack services.

NOTE: Limited warranty includes 3 year parts, 3 year labor, 3-year on-site support **NOTE:** SATA drives have a 1 year warranty.

Care Pack services provide a range of life cycle support options that let you choose the service levels that meet your business requirements, from basic to mission-critical.

A full range of HP Care Pack hardware and software services are available including:

- Installation and start up
- Education courses
- Extended onsite hardware coverage hours from same business day 13 hours, 5 day to 24 hours, 7 days call window with options including 4-hour response or 6-hour Call To Repair
- Comprehensive range of software technical support for Microsoft, Linux, ProLiant Essentials and VMWare-based IT solutions helping to deliver high level of application availability. Response times range from 30 mins for critical problems to 2 hours.
- System Management, Performance Services and Mission Critical Support Solution

HP Care Pack Services include HP branded hardware options qualified for the server, purchased at the same time or afterwards, internal to the enclosure, as well as 22" and smaller external monitors and tower UPS options up to 3KVA. 22" and smaller external monitors will be covered at the same service level and coverage period as the server. For servers or storage systems installed within a rack, service also covers all HP qualified rack options installed within the same rack.

NOTE: For more information on HP Care Pack services, contact any of our worldwide sales offices or resellers or visit our worldwide Web site on the internet at: http://www.hp.com/hps/carepack

NOTE: For more complete information on HP Services offerings, customers and resellers, please visit us at: http://www.hp.com/hps

NOTE: Additional information regarding worldwide limited warranty and technical support is available at: http://h18004.www1.hp.com/products/servers/platforms/warranty/index.html



Models

DL360R04 X3.6-1MB/800, Processor (1) Intel Xeon Processor 3.6-GHz/800MHz standard (up to 2 supported)

1GB SCSI 360528-xx1

Cache Memory 1-MB level 2 cache

1 x 1-GB (Standard) to 8-GB (Maximum) of PC2700 DDR 333 SDRAM Memory

Embedded NC7782 Dual Port NIC Network Controller

Storage Controller U320 Smart Array 6i Controller (embedded on system board)

NOTE: The ProLiant DL360 Generation 4 (G4) does not offer an external SCSI port.

Hard Drives None ship standard; system supports up to two 1" hot plug U320 drives

NOTE: The DL360 G4 SCSI models only support U320 Universal Hot Plug drives.

Integrated Lights-Out (iLO) Standard Management (embedded) Remote Management **Power Supply** One 460W power supply (redundant power supply optional)

Optical Drive 24x IDE CD-ROM Drive (Low-profile)

Diskette Drive 1.44 MB Diskette Drive

PCI-X Slots 1 full length and 1 half length 64bit/133MHz PCI-X slot

Form Factor Rack (1U), (1.75 in/4.45 cm)

DL360R04 X3.6-1MB/800, Processor 2GB SCSI, RPS

377376-xx1

(1) Intel Xeon Processor 3.6-GHz/800MHz standard (up to 2 supported)

Cache Memory 1-MB level 2 cache

Memory 2 x 1-GB (Standard) to 8-GB (Maximum) of PC2700 DDR 333 SDRAM

Network Controller Embedded NC7782 Dual Port NIC

Storage Controller U320 Smart Array 6i Controller (embedded on system board)

NOTE: The ProLiant DL360 Generation 4 (G4) does not offer an external SCSI port.

Hard Drives None ship standard; system supports up to two 1" hot plug U320 drives

NOTE: The DL360 G4 SCSI models only support U320 Universal Hot Plug drives.

Remote Management Integrated Lights-Out (iLO) Standard Management (embedded)

Power Supply Two 460W power supply (1 + 1 redundant)Optical Drive 24x IDE CD-ROM Drive (Low-profile)

Diskette Drive 1.44 MB Diskette Drive

PCI-X Slots 1 full length and 1 half length 64bit/133MHz PCI-X slot

Form Factor Rack (1U), (1.75 in/4.45 cm)

DL360R04 X3.6-1MB/800, Processor

1GB SATA 377375-xx1

Cache Memory

1-MB level 2 cache

1 x 1-GB (Standard) to 8-GB (Maximum) of PC2700 DDR 333 SDRAM Memory

Network Controller Embedded NC7782 Dual Port NIC

Storage Controller Non-RAID SATA (SATA RAID functionality is available via OS software RAID)

Hard Drives None ship standard; system supports up to two Serial ATA drives

NOTE: When SATA drives are installed, hot-plug capability and LEDs are currently not

(1) Intel Xeon Processor 3.6-GHz/800MHz standard (up to 2 supported)

Remote Management Integrated Lights-Out (iLO) Standard Management (embedded) **Power Supply** One 460W power supply (redundant power supply optional)

Optical Drive Optional on SATA Models Diskette Drive Optional on SATA Models

PCI-X Slots 1 full length and 1 half length 64bit/133MHz PCI-X slot

Form Factor Rack (1U), (1.75 in/4.45 cm)



Models

DL360R04 X3.4-1MB/800, Processor (1) Intel Xeon Processor 3.4-GHz/800MHz standard (up to 2 supported)

Cache Memory

2GB SCSI, RPS 354572-xx1

Memory 2 x 1-GB (Standard) to 8-GB (Maximum) of PC2700 DDR 333 SDRAM

Network Controller Embedded NC7782 Dual Port NIC

Storage Controller U320 Smart Array 6i Controller (embedded on system board)

1-MB level 2 cache

NOTE: The ProLiant DL360 Generation 4 (G4) does not offer an external SCSI port.

Hard Drives None ship standard; system supports up to two 1" hot plug U320 drives

NOTE: The DL360 G4 SCSI models only support U320 Universal Hot Plug drives.

Remote Management Integrated Lights-Out (iLO) Standard Management (embedded)

Power Supply Two 460W power supply (1+ 1 redundant)

Optical Drive 24x IDE CD-ROM Drive (Low-profile)

Diskette Drive 1.44 MB Diskette Drive

PCI-X Slots 1 full length and 1 half length 64bit/133MHz PCI-X slot

Form Factor Rack (1U), (1.75 in/4.45 cm)

DL360R04 X3.4-1MB/800, Processor (1) Intel Xeon Processor 3.4-GHz/800MHz standard (up to 2 supported)

1GB SCSI Cache Memory1-MB level 2 cache
354571-xx1

Memory 1 x 1-GB (Standard) to 8-GB (Maximum) of PC2700 DDR 333 SDRAM

Network Controller Embedded NC7782 Dual Port NIC

Storage Controller U320 Smart Array 6i Controller (embedded on system board)

NOTE: The ProLiant DL360 Generation 4 (G4) does not offer an external SCSI port.

Hard Drives None ship standard; system supports up to two 1" hot plug U320 drives

NOTE: The DL360 G4 SCSI models only support U320 Universal Hot Plug drives.

Remote Management Integrated Lights-Out (iLO) Standard Management (embedded)

Power Supply One 460W power supply (redundant power supply optional)

Optical Drive 24x IDE CD-ROM Drive (Low-profile)

Diskette Drive 1.44 MB Diskette Drive

PCI-X Slots 1 full length and 1 half length 64bit/133MHz PCI-X slot

Form Factor Rack (1U), (1.75 in/4.45 cm)

DL360R04 X3.4-1MB/800, Processor (2) Intel Xeon Processor 3.4-GHz/800MHz standard

1GB 2P SATA 354570-xx1

Cache Memory 1-MB level 2 cache

Memory 1 x 1-GB (Standard) to 8-GB (Maximum) of PC2700 333 DDR SDRAM

Network Controller Embedded NC7782 Dual Port NIC

Storage Controller Non-RAID SATA (SATA RAID functionality is available via OS software RAID)

Hard Drives None ship standard; system supports up to two Serial ATA drives

NOTE: When SATA drives are installed, hot-plug capability and LEDs are not currently

supported

Remote Management Integrated Lights-Out (iLO) Standard Management (embedded)

Power Supply One 460W power supply (redundant power supply optional)

Optical Drive Optional on SATA Models

Diskette Drive Optional on SATA Models

PCI-X Slots 1 full length and 1 half length 64bit/133 MHz PCI-X slot

Form Factor Rack (1U), (1.75 in/4.45 cm)



Cache Memory

Models

DL360R04 X3.0-1MB/800, Processor (1) Intel Xeon Processor 3.0-GHz/800MHz standard (up to 2 supported)

1GB SCSI 368134-xx1

Memory 1 x 1-GB (Standard) to 8-GB (Maximum) of PC2700 DDR 333 SDRAM

Network Controller Embedded NC7782 Dual Port NIC

Storage Controller U320 Smart Array 6i Controller (embedded on system board)

1-MB level 2 cache

NOTE: The ProLiant DL360 Generation 4 (G4) does not offer an external SCSI port.

Hard Drives None ship standard; system supports up to two 1" hot plug U320 drives

NOTE: The DL360 G4 SCSI models only support U320 Universal Hot Plug drives.

 Remote Management
 Integrated Lights-Out (iLO) Standard Management (embedded)

 Power Supply
 One 460W power supply (redundant power supply optional)

Optical Drive 24x IDE CD-ROM Drive (Low-profile)

Diskette Drive 1.44 MB Diskette Drive

PCI-X Slots 1 full length and 1 half length 64bit/133MHz PCI-X slot

Form Factor Rack (1U), (1.75 in/4.45 cm)

DL360R04 X3.0-1MB/800, Processor

1GB SATA 368150-xx1 ssor (1) Intel Xeon Processor 3.0-GHz/800MHz standard (up to 2 supported)

Cache Memory 1-MB level 2 cache

Memory 1 x 1-GB (Standard) to 8-GB (Maximum) of PC2700 333 DDR SDRAM

Network Controller Embedded NC7782 Dual Port NIC

Storage Controller Non-RAID SATA (SATA RAID functionality is available via OS software RAID)

Hard Drives None ship standard; system supports up to two Serial ATA drives

NOTE: When SATA drives are installed, hot-plug capability and LEDs are currently not

supported.

Remote Management Integrated Lights-Out (iLO) Standard Management (embedded)

Power Supply One 460W power supply (redundant power supply optional)

Optical Drive Optional on SATA Models
Diskette Drive Optional on SATA Models

PCI-X Slots 1 full length and 1 half length 64bit/133 MHz PCI-X slot

Form Factor Rack (1U), (1.75 in/4.45 cm)

Country Code Key Rack Code Key

XX=00
 XX=20
 Brazil
 XX=29
 Japan
 XX=37
 APD
 XX=42
 EURO
 XX=AA
 PRC





Configuration Information - Factory Integrated Models (North America only)

NOTE: HP does not allow factory integration of options into standard models listed above.

Configure-to-order servers must start with a CTO Chassis.

NOTE: This product offering does not support HP Factory Express Server Configuration Level 1.

Step 1: Base Configuration (choose one of the following configurable models)

Models HP ProLiant DL360G4 SATA Rack CTO Chassis (North America) 367006-405

Factory Integrated Model ships with:

NC7782 Dual Port PCI-X Gigabit Server Adapter (embedded)

Non-RAID SATA (SATA RAID functionality is available via OS software RAID)

1 full length and 1 half length 64bit/133 MHz PCI-X slot

Integrated Lights-Out (iLO) embedded

7 fans; Fan redundancy Rack (1U), (1.75 in/4.45 cm)

HP ProLiant DL360G4 SCSI Rack CTO Chassis (North America) 367007-405

Factory Integrated Model ships with:

NC7782 Dual Port PCI-X Gigabit Server Adapter (embedded) U320 Smart Array 6i Controller (embedded on system board) 1 full length and 1 half length 64bit/133 MHz PCI-X slot

Integrated Lights-Out (iLO) embedded

1.44MB Diskette Drive 7 fans; Fan redundancy Rack (1U), (1.75 in/4.45 cm)

Step 2: Choose Required Options (only one of the following from each list unless otherwise noted)

Processors	Intel X3.0GHz/800-1MB DL360G4 FIO BASE	368152-L21

 Intel X3.4GHz/800-1MB DL360G4 FIO BASE
 354582-L21

 Intel X3.6GHz/800-1MB DL360G4 FIO BASE
 354583-L21

Base Memory 512MB of Advanced ECC PC2700 DDR SDRAM DIMM Memory Kit (1 x 512 MB) 358347-B21

 HP ProLiant 1GB PC2700 SGLDIMM FIO BASE
 358348-L21

 2048-MB of Advanced ECC PC2700 DDR SDRAM DIMM Memory Kit (1 x 2 GB)
 358349-B21

Optical Drive NOTE: An Optical Drive is REQUIRED if choosing the 367007-405 SCSI Rack CTO Chassis Model

in Step 1.

NOTE: Optical Drives are OPTIONAL if choosing the 367006-405 SATA Rack CTO Chassis Model

in Step 1.

Slimline CD-ROM Drive 24X 356963-B21

NOTE: This CD/ROM Drive (PN 356963-B21) is for SATA models.

Slimline CD-RW/DVD-ROM Combo Option Kit

331903-B21
Slimline DVD-ROM Drive (8X/24X) Option Kit

264007-B21

Step 3: Choose Additional Factory Integratable Options

Diskette Drive 1.44 MB Diskette drive 354588-B21

NOTE: This Diskette Drive is for SATA (367006-405) models

Optical Drive NOTE: The Optical Drive is OPTIONAL for the SATA Rack CTO Chassis Model (367006-405) but

REQUIRED if choosing the SCSI Rack CTO Chassis Model (367007-405) in Step 1.

Slimline CD-ROM Drive 24X 356963-B21

NOTE: This CD/ROM Drive (PN 356963-B21) is for SATA models.

Slimline DVD-ROM Drive (8X/24X) Option Kit 264007-B21





Configuration Information - Factory Integrated Models (North America only)

Step 4: Choose Additional Options for Factory Integration

NOTE: For additional options, please refer to the "Options" section below.



Options

NOTE: Some options may not be factory integratable. Please contact your local sales representative for additional information.

ProLiant DL360 G4 Unique Options	Intel Xeon 3.0GHz/800MHz-1MB Processor Option Kit NOTE: This processor option kit (PN 368152-B21) supports the ProLiant DL360 G4 only.	368152-B21
	Intel Xeon 3.4GHz/800MHz-1MB Processor Option Kit NOTE: This processor option kit (PN 354582-B21) supports the ProLiant DL360 G4 only.	354582-B21
	Intel Xeon 3.6GHz/800MHz-1MB Processor Option Kit NOTE: This processor option kit (PN 354583-B21) supports the ProLiant DL360 G4 only.	354583-B21
	1.44 MB Diskette Drive NOTE: This Diskette drive is for SATA models only.	354588-B21
	PCI-e Riser option (to convert one or both PCI-X to PCI-e slots)	354589-B21
	Ambidextrous cable management arm NOTE: Package contains two cable management arms	365403-B21
	Fixed Cord Extension Bars for 1U servers (2 PDU sticks per kit)	351655-B21
	460W HP redundant power supply with IEC cord only	354587-B21
	460W HP redundant power supply with US or Japanese NEMA cord only NOTE: The HP ProLiant DL360 G4 ships with an IEC-IEC power cord used for rack mounting with Power Distribution Units (PDUs). For stand-alone deployments or installation without a rack, country- specific power cord options are available. U.S., Japan, & APD models ship with two power cords: IEC-IEC and country-specific NEMA cords.	354587-001



ProLiant Essentials	Rapid Deployment Pack, 1 User, V1.x	267196-B21
Value Pack Software	NOTE: This license allows 1 server to be managed and deployed via the Deployment Server.	207170-021
	Rapid Deployment Pack, 1 User, V1.x (Japan) NOTE: This license allows 1 server to be managed and deployed via the Deployment Server.	267196-291
	Rapid Deployment Pack, 10 Users, V1.x NOTE: This license allows 10 servers to be managed and deployed via the Deployment Server.	269817-B21
	Rapid Deployment Pack, 10 Users, V1.x (Japan) NOTE: This license allows 10 servers to be managed and deployed via the Deployment Server.	269817-291
	Rapid Deployment Pack, Flexible-Quantity License Kit NOTE: A single pack is shipped with a single license key for the total number of licenses ordered.	302127-B21
	Rapid Deployment Pack, Tracking License Kit NOTE: For use with a Master License Agreement.	302128-B21
	ProLiant Essentials Workload Management Pack (Featuring Resource Partitioning Manager version 2.0)	303284-B21
	Flexible Quantity License Kit	302127-B21
	License-Only - for use with a Master License Agreement	302128-B21
	ProLiant Essentials Integrated Lights-Out Advanced Pack (Featuring: sophisticated virtual administration features for ultimate control of servers in the data centers and remote sites)	263825-B21
	ProLiant Essentials Recovery Server Option Pack	280189-B21
	ProLiant Essentials Intelligent Networking Pack (1 License)	372906-B21
	ProLiant Essentials Intelligent Networking Pack Flex License	372950-B21
	ProLiant Essentials Intelligent Networking Pack Track License	
	Performance Management Pack, single server NOTE: This license allows 1 server to be managed by Performance Management Pack.	306696-B21
	Performance Management Pack, flexible license kit NOTE: A single pack is shipped with a single license key for the total number of licenses ordered NOTE: Flexible and volume quantity license kits are available for ProLiant Essentials Value Packs.	306697-B21
	Refer to http://www.hp.com/servers/proliantessentials or the various ProLiant Essentials Value Pack product QuickSpecs for more information.	
	NOTE: For more information regarding ProLiant Essentials Software, please see the following URL: http://www.hp.com/servers/proliantessentials .	
ProLiant Software	ProLiant Software Maintenance Subscription	355060-B21
Maintenance Subscription	ProLiant Software Maintenance Single Release	356573-B21
	ProLiant Foundation Pack Single Release	356604-B21
	NOTE: Please see the SmartStart QuickSpecs for additional information regarding the subscription	
	purchase: http://h18000.www1.hp.com/products/quickspecs/12007_div/12007_div.HTML (Worldwide) http://h18000.www1.hp.com/products/quickspecs/12007_na/12007_na.HTML (North America)	
Software	HP digital asset protection	302316-001
Processor	Intel Xeon 3.0GHz/800MHz-1MB Processor Option Kit	368152-B21
	NOTE: This processor option kit (PN 368152-B21) supports the ProLiant DL360 G4 only.	054500 05-
	Intel Xeon 3.4GHz/800MHz-1MB Processor Option Kit NOTE: This processor option kit (PN 354582-B21) supports the ProLiant DL360 G4 only.	354582-B21
	Intel Xeon 3.6GHz/800MHz-1MB Processor Option Kit NOTE: This processor option kit (PN 354583-B21) supports the ProLiant DL360 G4 only.	354583-B21



Memory (DIMMs)	512MB of Advanced ECC PC2700 DDR SDRAM DIMM Memory Kit (1 x 512 MB) 1024MB of Advanced ECC PC2700 DDR SDRAM DIMM Memory Kit (1 x 1 GB) 2048-MB of Advanced ECC PC2700 DDR SDRAM DIMM Memory Kit (1 x 2 GB)	358347-B21 358348-B21 358349-B21
Optical Drives	Slimline CD-RW/DVD-ROM Combo Option Kit Slimline DVD-ROM Drive (8X/24X) Option Kit (Servers) Slimline CD-ROM Drive 24X NOTE: This CD/ROM Drive (PN 356963-B21) is for SATA models Slimline CD-ROM Drive 24X (Carbon)	331903-B21 264007-B21 356963-B21 366788-B21
Diskette Drive	1.44 MB Diskette Drive NOTE: This 1.44MB Diskette Drive (PN 354588-B21) is for SATA models	354588-B21
Hard Drives	Ultra320 – Universal Hot Plug NOTE: The DL360 G4 only supports U320 Universal Hot Plug drives. 300-GB 10,000 rpm U320 Universal Hard Drive (1") 146.8-GB 10,000 rpm U320 Universal Hard Drive (1") 72.8-GB 10,000 rpm U320 Universal Hard Drive (1") 72.8-GB 15,000 rpm U320 Universal Hard Drive (1") 36.4-GB 15,000 rpm U320 Universal Hard Drive (1") NOTE: Please see the Hard Drive QuickSpecs for Technical Specifications such as capacity, height, width, interface, transfer rate, seek time, physical configuration, and operating temperature: U320 Hard Drive QS: http://h18000.www1.hp.com/products/quickspecs/11531_div/11531_div.HTML (Worldwide) http://h18000.www1.hp.com/products/quickspecs/11531_na/11531_na.HTML (North America) Serial-ATA (SATA) Hard Drive (SATA Models only)	350964-B22 286716-B22 286714-B22 286778-B22 286776-B22
	NOTE: When SATA drives are installed, hot-plug capability and LEDs are currently not supported. NOTE: SATA drives have a 1 year warranty. 80-GB SATA 1.5Gb 7,200 RPM Hard Drive (1") 160-GB SATA 1.5Gb 7,200 RPM Hard Drive (1") 250-GB SATA 1.5Gb 7,200 RPM Hard Drive (1") NOTE: Please see the SATA Hard Drive QuickSpecs for Technical Specifications such as capacity, height, width, interface, transfer rate, seek time, physical configuration, and operating temperature: Serial ATA Hard Drive QS: http://h18000.www1.hp.com/products/quickspecs/11940_div/11940_div.HTML (Worldwide) http://h18000.www1.hp.com/products/quickspecs/11940_na/11940_na.HTML (North America)	349237-B21 349238-B21 349239-B21



Options

Storage Controllers	128MB Battery Backed Write Cache Enabler Option Kit NOTE: Upgrade for Smart Array 6i Controller.	346914-B21	
	Smart Array 6402/128 Controller NOTE: For support of external drives only.	273915-B21	
	Smart Array 6404/256 Controller NOTE: For support of external drives only.	273914-B21	
	Smart Array 642 Controller NOTE: For support of external drives only.	291967-B21	
	128MB Battery-Backed Cache Enabler NOTE: This 128MB BBWC supports the Smart Array 641 Controller and Smart Array 642 Controller.	351580-B21	
	256MB DDR, Battery-Backed Cache Upgrade Kit for SA-6400 NOTE: This 256-MB Battery-Backed Cache Module upgrade kit supports the Smart Array 6400 series controller only.	273913-B21	
	64 MB Battery Backed Write Cache Enabler NOTE: This 64MB BBWC supports the Smart Array 642 Controller.	291969-B21	
	64-Bit/66-MHz Dual Channel Wide Ultra3 SCSI Adapter, Alternate OS	284688-B21	
	64-Bit/133-MHz Dual Channel Ultra320 SCSI Adapter NOTE: For support of external drives only.	268351-B21	
	Ultra320 Expansion Module for SA-6402 NOTE: For support of external drives only.	273911-B21	
	64-Bit/133-MHz Single Channel Ultra320 SCSI HBA G2		
	NOTE: Please see the following Controller or SCSI Adapter QuickSpecs for Technical Specifications such as PCI Bus, PCI Peak Data Transfer Rate, SCSI Protocols supported, SCSI Peak Data Transfer Rate, Channels, SCSI Ports, Drives supported, Cache, RAID support, and additional information:: http://h18000.www.1.hp.com/products/quickspecs/12030_div/12030_div.HTML (Smart Array 6400 Series) http://h18000.www1.hp.com/products/quickspecs/11563 div/11563 div.HTML (Smart Array 642)		
	http://h18000.www1.hp.com/products/quickspecs/10429_div/10429_div.HTML		
	(SCSI Adapter) http://h18000.www1.hp.com/products/quickspecs/11555_div/11555_div.HTML (U320 Adapter) http://h18000.www.1.hp.com/products/quickspecs/11943_div/11943_div.HTML (U320 SCSI HBA)		
Communications	HP NC150T PCI 4-port Gigabit Combo Switch Adapter	367132-B21	
	HP NC310F PCI-X Gigabit Server Adapter	368169-B21	
	HP NC320T PCI Express Gigabit Server Adapter	367047-B21	
	NC1020 Cu Gigabit Server Adapter 32 PCI Single Port	353377-B21	
	NC6170 Dual Port PCI-X 1000SX Gigabit Server Adapter	313879-B21	
	NC7170 Dual Port PCI-X 1000T Gigabit Server Adapter	313881-B21	
	NC7771 PCI-X 10/100/1000-T Server Adapter	290563-B21	
	NOTE: Any NIC (except the NC1020) on the option list can be used for redundancy with the embedded NC7782 Dual Port Network Controller. When teaming with other NICs or with the embedded NIC, the lack of Jumbo Frames and LSO features on the NC1020 will cause high end		



platform).

NICs to have those features disabled. (e.g. incompatibility issues with the other option NICs for that

Management Options	ProLiant Essentials Integrated Lights-Out Advanced Pack FEATURING: Sophisticated virtual administration features for ultimate control of servers in the data	263825-B21
	centers and remote sites	007051 001
	Remote Insight Lights-Out Edition II (NA, LA)	227251-001
	Remote Insight Lights-Out Edition II (EMEA)	227251-021
	Remote Insight Lights-Out Edition II (ROW)	227251-371
Security	HP/Atalla AXL600L SSL Accelerator Card for ProLiant Servers	524545-B21
	AXL300 Accelerator PCI Card (HW SSL Encryption) for ProLiant Servers	227933-B21
High Performance Solutions	HPCC Myrinet Fiber NIC	257894-006
Tape Drives	NOTE: For complete listing of tape drive offerings see http://www.hp.com/products1/storage/compatibility/tapebackup/ISS/index.html For recommended tape drive offerings for this ProLiant server see the following:	
	External and Rack-Mount Ultrium Tape Drives	
	HP StorageWorks Ultrium 215 Tape Drive, Internal (Carbon) NOTE: No internal tape drives fit inside the DL360. The internal drive shown here is for the 3U Rackmount Kit	Q1543A
	HP StorageWorks Ultrium 215 Tape Drive, External (Carbon)	Q1545A
	HP StorageWorks Ultrium 215 rack-mount (Carbon) - Single drive installed in a 3U rack-mount kit	350544-B21
	HP StorageWorks Ultrium 215 Array Module (Carbon) - Offline hot-swap drive for Tape Array 5300	C7492B
	HP StorageWorks Ultrium 230 Tape Drive, Internal (Carbon) NOTE: No internal tape drives fit inside the DL360. The internal drive shown here is for the 3U or 5U Rack-mount Kit	Q1515A
	HP StorageWorks Ultrium 230 Tape Drive, External (Carbon)	Q1517A
	HP StorageWorks Ultrium 230, Rack-mount (Carbon) - Single drive installed in a 3U rack-mount kit	350545-B21
	HP StorageWorks Ultrium 230 Array Module (Carbon) - Offline hot-swap drive for Tape Array 5300	C7470B
	NOTE: Please see the HP StorageWorks Ultrium 215 and 230 Tape Drive QuickSpecs for additional options such as controllers, media, and other related items: http://h18006.www1.hp.com/products/quickspecs/11739_div/11739_div.html (Worldwide)	
	http://h18006.www1.hp.com/products/quickspecs/11739_na/11739_na.html	
	(North America)	
	For an up-to-date listing of the latest O/S and software support details for HP Ultrium tape drives, please visit: http://www.hp.com/go/connect	
	External and Array Module DAT Drives	
	HP StorageWorks DAT 72 Tape Drive, Internal (Carbon) NOTE: No internal tape drives fit inside the DL360. The internal drive shown here is for the 3U or 5U Rack-mount Kit	Q1522A
	HP StorageWorks DAT 72 Tape Drive, External (Carbon)	Q1523A
	HP StorageWorks DAT 72 Array Module (Carbon) - Offline hot-swap drive for Tape Array 5300	Q1524B
	NOTE: Please see the DAT Tape Drive QuickSpecs for controllers, media, and other options: http://h18000.www1.hp.com/products/quickspecs/11883_div/11883_div.HTML (Worldwide) http://h18000.www1.hp.com/products/quickspecs/11883_na/11883_na.HTML (North America)	
	For an up-to-date listing of the latest O/S and software support details for HP DAT drives, please visit: http://www.hp.com/go/connect	
	Rack-Mount Tape Drive Enclosures	
	HP StorageWorks 3U Rack-Mount Kit NOTE: The 3U Rack-Mount Kit can support up to 2 full-height or 4 half-height tape drives and	274338-B21



Options

compatible with multiple Single-Ended and LVD SCSI tape drives including DAT, DLT VS80, SDLT 320, Ultrium 215, Ultrium 230, and Ultrium 460 Tape Drives.

HP StorageWorks 5U Rack-Mount Kit

NOTE: The 5U Rack-Mount Kit can support up to 4 full-height tape drives and is compatible with SDLT 320, Ultrium 230, and Ultrium 460 tape drives.

NOTE: Please see the Rack-Mount Tape Drive Kits QuickSpecs for additional information regarding these kits:

http://h18000.www1.hp.com/products/quickspecs/10854_div/10854_div.HTML (Worldwide) http://h18000.www1.hp.com/products/quickspecs/10854_na/10854_na.HTML

(North America)

HP StorageWorks Tape Array 5300

C7508A

274339-B21

NOTE: The Tape Array 5300 is a 3U enclosure that supports up to 2 full-height or 4 half-height hot-swap array modules, including DAT and Ultrium tape drives. Cables and terminators are not included and must be ordered separately.

NOTE: Please see the Tape Array 5300 QuickSpecs for additional information regarding this product.

http://h18000.www1.hp.com/products/quickspecs/11878_div/11878_div.HTML (Worldwide)

http://h18000.www1.hp.com/products/quickspecs/11878_na/11878_na.HTML

(North America)

Accessories for 3U & 5U Rack-mount Tape Drive Kits

LVD Cable Kit, VHDCI/HD68 168048-B21

NOTE: For use with the 3U Rack-mount Kit and 5U Rack-mount Kit only.

LVD Cable Kit, HD68/HD68 242381-B21

NOTE: For use with the 3U Rack-mount Kit and 5U Rack-mount Kit only.



Options		
Tape Autoloaders	DAT Autoloader	
	HP StorageWorks DAT 72x6 Tape Autoloader, External (Flint)	Q1567A
	NOTE: Please see the DAT 72x6 Tape Autoloader QuickSpecs for additional options such as host bus adapters, controllers and media: http://h18006.www1.hp.com/products/quickspecs/11905_div/11905_div.html	
	(Worldwide) http://h18006.www1.hp.com/products/quickspecs/11905_na/11905_na.html (North America)	
	HP StorageWorks DAT 40x6 Tape Autoloader, External (Flint)	C5717C
	NOTE: Please see the DAT 40x6 Tape Autoloader QuickSpecs for additional options such as host bus adapters, controllers and media: http://h18000.www1.hp.com/products/quickspecs/11882_div/11882_div.HTML (Worldwide) http://h18000.www1.hp.com/products/quickspecs/11882_na/11882_na.HTML	
	(North America)	
	HP StorageWorks 1/8 Tape Autoloader 1/8 Ultrium 460 Tape Autoloader, Tabletop	AA927A
	1/8 SDLT 320 Tape Autoloader, Tabletop	AA926A
	1/8 Ultrium 230 Tape Autoloader, Tabletop	C9572CB
	1/8 DLT VS80 Tape Autoloader, Tabletop	C9264CB
	1/8 Tape Autoloader Rackmount Kit NOTE: Required to install the 1/8 tape autoloader in a standard 19-inch rack.	C9268R
	NOTE: Please reference the 1/8 Tape Autoloader QuickSpecs at http://www.hp.com/go/automation for additional information needed to create a complete solution; reference current compatibility information at http://www.hp.com/go/ebs .	
	HP StorageWorks SSL1016 Tape Autoloader	
	SSL1016 Ultrium 460 Tape Autoloader	330821-B21
	SSL1016 SDLT 320 Tape Autoloader	330816-B21
	NOTE: Please reference the SSL1016 Tape Autoloader QuickSpecs at http://www.hp.com/go/automation for additional information needed to create a complete solution; reference current compatibility information at http://www.hp.com/go/ebs .	
Tape Libraries	HP StorageWorks MSL6000 Tape Library	
	MSL6030, 1 drive, 30 slots, Ultrium 460, RM	330731-B22
	MSL6030, 2 drive, 30 slots, Ultrium 460, RM	330731-B23
	MSL6030, 1 drive, 30 slots, Ultrium 460, RM with embedded FC router	330731-B24
	MSL6030, 2 drive, 30 slots, Ultrium 460, RM with embedded FC router	330731-B25
	MSL6030, 1 drive, 30 slots, Ultrium 460, TT	330788-B21
	MSL6030, 2 drive, 30 slots, Ultrium 460, TT	330788-B22
	MSL6060, 2 drive, 60 slot, Ultrium 460, RM	331196-B21
	MSL6060, 2 drive, 60 slot, Ultrium 460, RM with embedded FC router	331196-B22
	MSL6060, 2 drive, 60 slot, Ultrium 460, TT	331195-B21
	NOTE: Please reference the MSL6000 Tape Library QuickSpecs at http://www.hp.com/go/automation for additional information needed to create a complete solution; reference current compatibility information at http://www.hp.com/go/ebs.	3311,73 321
	HP StorageWorks MSL5026S2 Tape Library	
	MSL5026S2, 1 drive, 26 slots, SDLT 320, RM	293472-B22
	MSL5026S2, 2 drive, 26 slots, SDLT 320, RM	293472-B23



MSL5026S2, 1 drive, 26 slots, SDLT 320, RM with embedded FC router

293472-B24

MSL5026S2, 2 drive, 26 slots, SDLT 320, RM with embedded FC router	293472-B25
MSL5026S2, 1 drive, 26 slots, SDLT 320, TT	293473-B21
MSL5026S2, 2 drive, 26 slots, SDLT 320, TT	293473-B22
NOTE: Please reference the MSL5026S2 Tape Library QuickSpecs at http://www.hp.com/go/automation for additional information needed to create a complete solution; reference current compatibility information at http://www.hp.com/go/ebs . HP StorageWorks MSL5052S2 Tape Library	
MSL5052S2, 2 drive, 52 slots, SDLT 320, RM	293474-B21
MSL5052S2, 2 drive, 52 slots, SDLT 320, RM with embedded FC router	293474-B24
MSL5052S2, 2 drive, 52 slots, SDLT 320, TT	293476-B21
NOTE: Please reference the MSL5052S2 Tape Library QuickSpecs at http://www.hp.com/go/automation for additional information needed to create a complete solution; reference current compatibility information at http://www.hp.com/go/ebs . HP StorageWorks MSL5030 Tape Library	
MSL5030, 1 drive, 30 slots, Ultrium 230, RM	301897-B22
MSL5030, 2 drive, 30 slots, Ultrium 230, RM	301897-B23
MSL5030, 2 drive, 30 slots, Ultrium 230, RM with embedded FC router	301897-B24
MSL5030, 2 drive, 30 slots, Ultrium 230, RM with embedded FC router	301897-B25
MSL5030, 1 drive, 30 slots, Ultrium 230, TT	301898-B21
MSL5030, 2 drive, 30 slots, Ultrium 230, TT	301898-B22
NOTE: Please reference the MSL5030 Tape Library QuickSpecs at http://www.hp.com/go/automation for additional information needed to create a complete solution; reference current compatibility information at http://www.hp.com/go/ebs . HP StorageWorks MSL5060 Tape Library	
MSL5060, 2 drive, 60 slots, Ultrium 230, RM	301899-B22
MSL5060, 2 drive, 60 slots, Ultrium 230, RM with embedded FC router	301899-B23
MSL5060, 2 drive, 60 slots, Ultrium 230, TT	301900-B21
NOTE: Please reference the MSL5060 Tape Library QuickSpecs at http://www.hp.com/go/automation for additional information needed to create a complete solution; reference current compatibility information at http://www.hp.com/go/ebs .	
HP StorageWorks ESL E-Series Tape Libraries	
ESL Extended 712e Tape Library, 0 drive, 712 LTO slots	AA934A
ESL Extended 630e Tape Library, 0 drive, 630 SDLT slots	AA935A
ESL Extended 322e Tape Library, 0 drive, 322 LTO slots	AA939A
ESL Extended 286e Tape Library, 0 drive, 286 SDLT slots	AA940A
ESL E Ultrium 460 drive kit	AA937A
ESL E SDLT 320 drive kit	AA936A
NOTE: Please reference the ESL E-Series Tape Libraries QuickSpecs at http://www.hp.com/go/automation for additional information needed to create a complete solution; reference current compatibility information at http://www.hp.com/go/ebs . HP StorageWorks ESL9000 Series Tape Libraries	
ESL9595 Extended Tape Library, 0 drive, 400 slots (card cage, Interface Mgr card, Command View license)	343378-B21
ESL9322 Extended Tape Library, 0 drive, 222 slots (card cage, Interface Mgr card, Command View	343377-B21
license) ESL9000 Ultrium 460 drive kit	330834-B21



	ESL9000 Ultrium 230 drive kit	301930-B21
	ESL9000 SDLT 320 drive kit	293414-B21
	NOTE: Please reference the ESL9000 Series Tape Libraries QuickSpecs at http://www.hp.com/go/automation for additional information needed to create a complete solution; reference current compatibility information at http://www.hp.com/go/ebs .	
Magneto-Optical	HP StorageWorks 9.1 GB Mid-range Optical Jukeboxes	
Jukeboxes	300mx, 2 drive, 32 slot jukebox 600mx, 4 drive, 64 slot jukebox	C1150M C1160M
	700mx, 2 drive, 76 slot jukebox	C1170M
	NOTE: Please reference the Magneto-Optical Jukebox data sheets at http://www.hp.com/go/optical for additional information needed to create a complete solution. HP StorageWorks 9.1 GB High-end Optical Jukeboxes	
	1200mx, 4 drive, up to 128 slots	C1104M
	2200mx, 4 drive, up to 238 slots	C1105M
	2200mx, 4 drive, up to 238 slots	C1111M
		C1107M
	2200mx, 6 drive, up to 238 slots	
	2200mx, 10 drive, up to 238 slots	C1110M
	NOTE: Please reference the Magneto-Optical Jukebox data sheets at http://www.hp.com/go/optical for additional information needed to create a complete solution.	
Ultra Density Optical	1000ux, 2 drive, 32 slot jukebox	AA965A
Jukeboxes	1900ux, 4 drive, 64 slot jukebox	AA966A
	1900ux, 4 mixed drive, 64 slot jukebox	AA968A
	2300ux, 2 drive, 76 slot jukebox	AA967A
	3800ux, 4 drive, 128 slot jukebox	AA969A
	3800ux, 6 drive, 128 slot jukebox	AA970A
	7100ux, 4 drive, 238 slot jukebox	AA973A
	7100ux, 6 drive, 238 slot jukebox	AA971A
	7100ux, 10 drive, 238 slot jukebox	AA972A
	7100ux, 6 mixed drive, 238 slot jukebox	AA974A
	NOTE: Please reference the Ultra Density Optical Jukebox QuickSpecs at http://www.hp.com/go/optical for additional information needed to create a complete solution	
Power Cords	NOTE: The ProLiant DL360 G4 ships with an IEC-IEC power cord used for rack mounting with Power Distribution Units (PDUs). For stand-alone deployments or installation without a rack, country-specific power cord options are available. U.S. & Japan models will ship with two power cords: IEC-IEC (142257-002) and North American C13-Nema 5-15P (103541-001) cords.	
	Power Cord, Euro, 10A 250 V Straight (12 ft/3.7 m)	157215-021
	Power Cord, UK, 10A 250 V Straight (12 ft/3.7 m)	157216-031
	Power Cord, Danish, 10A 250 V Straight (12 ft/3.7 m)	157218-081
	Power Cord, Swiss, 10A 250 V Straight (12 ft/3.7 m)	157219-111
	Power Cord, Italian, 10A 250 V Straight (12 ft/3.7 m)	157217-061
	Power Cord, South Africa, 10A 250 V Straight (12 ft/3.7 m)	157220-AR1



External Storage - Rack	HP StorageWorks Modular Smart Array 20 NOTE: Rack-mountable 12 (SATA) drive enclosure with U320 Host connectivity, redundant power	335921-B21
	supplies. HP StorageWorks Modular Smart Array 20 Starter Kit NOTE: Rack-mountable 12 (SATA) drive enclosure with U320 Host connectivity, redundant power supplies. Includes Smart Array 6402/128 Controller.	366172-B21
	NOTE: The Modular Smart Array Enclosure 20 Family supports the SATA 1.5Gb/s 1" Hot Plug Hard Drives.	
	HP StorageWorks Modular Smart Array 30 SB NOTE: Rack-mountable 14 drive enclosure with single bus, redundant power supplies.	302969-B21
	HP StorageWorks Modular Smart Array 30 DB NOTE: Rack-mountable 14 drive enclosure with dual bus, redundant power supplies.	302970-B21
	NOTE: The Modular Smart Array Enclosure 30 Family supports the Wide Ultra3, Ultra320 1" Hot Plug Hard Drives.	
	StorageWorks Modular Smart Array 30 OpenView Storage Mirroring HA Kit - WW	359079-B21
	StorageWorks Modular Smart Array 30 OpenView Storage Mirroring HA Kit - Japan	359079-291
	Redundant Power Supply 499 W	338296-B21
	Ultra320 Single Bus I/O Module for MSA30	287484-B21
	Ultra320 Dual Bus I/O Module for MSA30	287483-B21
HP StorageWorks Modular	· HP StorageWorks Modular Smart Array 1000	201723-B22
Smart Array 1000	NOTE: Please see the Modular Smart Array 1000 QuickSpecs for additional options and configuration information at	
	http://h18000.www1.hp.com/products/quickspecs/11033_na/11033_na.HTML	
	(North America) http://h18000.www1.hp.com/products/quickspecs/11033_div/11033_div.HTML (Worldwide)	
HP StorageWorks Modular	Modular Smart Array 1500 Controller Shelf	AA986A
Smart Array 1500 cs	NOTE: Please see the StorageWorks Modular SAN Array 1500 cs QuickSpecs for additional options and configuration information at: http://www.hp.com/go/MSA1500cs	
StorageWorks Modular	StorageWorks SAN Director 64	254512-B21
Array 8000/Enterprise Modular Array 12000	NOTE: Please see the StorageWorks SAN Director 64 QuickSpecs for additional information: http://h18000.www1.hp.com/products/quickspecs/11003_na/11003_na.HTML (North America)	
	http://h18000.www1.hp.com/products/quickspecs/11003_div/11003_div.HTML (Worldwide)	



StorageWorks Options	StorageWorks 2 Gb, 64-bit/133 MHz PCI-X-to-Fibre Channel Host Bus Adapter for Windows 2000, Windows Server 2003 and Linux NOTE: FCA2214 2 Gb Fibre Channel Host Bus Adapter is a single channel, 64-bit/133 MHz PCI-X-to Fibre Channel Host Bus Adapter (HBA) with an embedded multi-mode optical interface	281541-B21
	StorageWorks 2 Gb, 64-bit/133 MHz PCI-X to-Fibre Channel Host Bus Adapter for NetWare NOTE: FCA2210 2 Gb, Fibre Channel Host Bus Adapter is a single channel, 64-bit/133 MHz PCI-X-to-Fibre Channel Host Bus Adapter (HBA) with an embedded multi-mode optical interface.	281540-B21
	FCA2408 - HP StorageWorks 2 Gb, 64-Bit/133 MHz Single Channel , PCI- X-to-Fibre Channel Host Bus Adapter for Windows® 2000 and Windows Server® 2003 NOTE: FCA2408 HP StorageWorks 2 Gb, 133 MHz PCI-X-to-Fibre Channel Host Bus Adapter (HBA) with optical small-form-factor (SFF) (LC) interface.	343073-B21
	FCA2404DC - HP StorageWorks 2 Gb, Dual Channel, 133 MHz PCI-X-to-Fibre Channel Host Bus Adapter for Windows® 2000, and Windows Server 2003 NOTE: FCA2404DC HP StorageWorks 2 Gb Fibre Channel Host Bus Adapter is a dual channel, 133 MHz, PCI-X to Fibre Channel Host Bus Adapter (HBA) with an embedded multi-mode optical interface.	323264-B21
	FCA2404 - StorageWorks 2 Gb, single channel, 133 MHz PCI-X-to-Fibre Channel Host Bus Adapter for Windows 2000, Windows NT and Windows Server 2003 NOTE: FCA2404 StorageWorks 2 Gb, Fibre Channel Host Bus Adapter is a single channel, multipath failover, 133 MHz, PCI-X to Fibre Channel Host Bus Adapter (HBA) with an embedded multimode optical interface for Proliant Server connects	305573-B21
	StorageWorks 2 Gb, Dual Port, 64-Bit/133 MHz PCI-X-to-Fibre Channel Host Bus Adapter for W2K, Windows Server 2003 and Linux NOTE: FCA2214DC StorageWorks 2 Gb Dual Port, Fibre Channel Host Bus Adapter is a 64-bit/133 MHz, PCI-X-to Fibre Channel Host Bus Adapter (HBA) with an embedded multi-mode optical interface.	321835-B21
	StorageWorks SAN Switch 2/8-EL	322120-B21
	StorageWorks SAN Switch 2/8-EL Upgrade	325888-B21
	StorageWorks SAN Switch 2/16	322118-B21
	StorageWorks SAN Switch 2/16-EL Upgrade	325889-B21
-	- HP StorageWorks Modular Smart Array 500 Generation 2	335880-B21
Smart Array 500	NOTE: Please see the Modular Smart Array 500 Generation 2 QuickSpecs for additional information including configuration steps and additional options needed for a complete solution at: http://h18000.www1.hp.com/products/quickspecs/11956_na/11956_na.HTML (North America) http://h18000.www1.hp.com/products/quickspecs/11956_div/11956_div.HTML (Worldwide)	
	HP StorageWorks Modular Smart Array 500	201724-B21
	NOTE: Please see the Modular Smart Array 500 Generation 2 QuickSpecs for additional information including configuration steps and additional options needed for a complete solution at: http://h18000.www1.hp.com/products/quickspecs/11050_na/11050_na.HTML (North America) http://h18000.www1.hp.com/products/quickspecs/11050_div/11050_div.HTML (Worldwide)	



Options

Cluster Options	ProLiant Cluster Starter Kit	364023-B21
	NOTE: For additional information regarding the ProLiant Cluster Starter Kit please see the following	
	QuickSpecs at: http://h18000.www1.hp.com/products/quickspecs/11935_na/11935_na.html	
	(North America)	
	http://h18000.www1.hp.com/products/quickspecs/11935_div/11935_div.html (Worldwide)	
	ProLiant Cluster Kit with OpenView Storage Mirroring	364025-B21
	NOTE: For additional information regarding the ProLiant Cluster Kit with OpenView Storage Mirroring please see the following QuickSpecs at:	
	http://h18000.www1.hp.com/products/quickspecs /11934_na/11934_na.html	
	(North America) http://h18000.www1.hp.com/products/quickspecs /11934 div/11934 div.html (Worldwide)	
	ProLiant Cluster HA/F200 for the Entry Level SAN	364026-B21
	ProLiant Cluster HA/F200 for the Entry Level SAN (Japan)	364026-291
	NOTE: For additional information regarding the ProLiant Cluster for Entry Level SAN please see the	
	following QuickSpecs at:	
	http://h18000.www1.hp.com/products/quickspecs/11932_na/11932_na.html	
	(North America) http://h18000.www1.hp.com/products/quickspecs/11932 div/11932 div.html (Worldwide)	
	ProLiant Cluster HA/F500 for the Enterprise SAN	364024-B21
	NOTE: For additional information regarding the ProLiant Cluster HA/F500 for Enterprise SAN	004024-021
	please see the following QuickSpecs at:	
	http://h18000.www1.hp.com/products/quickspecs/11933_na/11933_na.html	
	(North America)	
	http://h18000.www1.hp.com/products/quickspecs/11933_div/11933_div.html (Worldwide)	
UPS Power Cord Matrix	Please see the UPS Power Cord Matrix for cable descriptions, requirements, and specific	ications for UPS
	units:	
	ftp://ftp.compaq.com/pub/products/servers/proliantstorage/power-protection/powercordmatrix.pdf.	
	MB MBC 23 500 VB (2 440 V4 30 40 V4 3) 1	004404.003
Uninterruptible Power Systems – Rack Mountable	HP UPS R1500 XR (1440VA, 1340 Watt), Low Voltage (NA)	204404-001
Systems Ruck Mooningble	The Grant (1999), 1919 Hally, Finger Ferrage (in ly	204404-B31
	HP UPS R1500 XR (1500VA, 1340 Watt), Low Voltage (Japan)	204404-291
	HP UPS R3000 XR (2880VA, 2700 Watt), Low Voltage (NA)	192186-001
	HP UPS R3000 XR (3000VA, 2700 Watt), High Voltage (NA)	192186-002
	HP UPS R3000 XR (2400VA, 2250 Watt), Low Voltage (Japan)	192186-291
	HP UPS R3000 XR (3000VA, 2700 Watt), High Voltage (Japan)	192186-292
	HP UPS R3000 XR (3000VA, 2700 Watt), High Voltage (Int'l - detachable cord)	192186-B31
	HP UPS R3000 XR (3000VA, 2700 Watt), High Voltage (16A IEC309 Plug)	192186-B32
	HP UPS R3000 XR (3000VA, 2700 Watt), High Voltage (16A CEE 7/7 SCHUKO Plug)	192186-B33
	HP UPS R3000 XR (3000VA, 2700 Watt), High Voltage (16A BS-546 Plug)	192186-AR1
	HP UPS R5500 XR, (5000VA, 4500 Watt), High Voltage (NA/Jpn)	326529-D71
	HP UPS R5500 XR, (6000VA, 5400 Watt), High Voltage (Int'l)	326529-B31



HP UPS R12000 XR, N+ \times (12KVA, 12KW) High Voltage (WW)

NOTE: UPS R12000 has a hardwired input and output connection.

207552-B22

Modular PDUs 1U/0U	Fixed Cord Extension Bars	351655-B21
(Up to 32 outlets)	NOTE: Two extension bar sticks; each with (7) C13 plugs. Fixed Cord PDU (NA/JPN)	351655-D72
NOTE: 1U/0U mounting brackets shipped with	NOTE: Four Fixed Cord Extension Bars, and one 24A, HV mPDU L6-30P core.	
the unit (optimized for 10000 and 9000 series racks).	Fixed Cord PDU (INTL) NOTE: Four Fixed Cord Extension Bars, and one 32A, HV mPDU IEC-309 core.	351655-B31
,	HP Modular Power Distribution Units (mPDU), Low Volt Model, 24A (100-127 VAC) (NA, Japan) NOTE: This mPDU (252663-D71) may also be used to connect the low volt model of the UPS R3000 XR.	252663-D71
	HP Modular Power Distribution Units (mPDU), High Volt Model, 24A (200-240 VAC) (NA, Japan)	252663-D72
	HP Modular Power Distribution Units (mPDU), High Volt Model, 32A (200-240 VAC) (Int'l)	252663-B31
	HP Modular Power Distribution Units (mPDU), High Volt Model, 40A (200-240 VAC) (WW) NOTE: This mPDU (252663-B21), 40A model has a hardwired input.	252663-B21
	HP Modular Power Distribution Unit(mPDU), High Volt Model, 16A (200-240 VAC) (WW)	252663-B24
	HP Modular Power Distribution Unit (mPDU), High Volt Model, 40A, Attached Cord, (NA/JPN)	252663-D73
	HP Modular Power Distribution Unit (mPDU), High Volt Model, 40A, Attached Cord, (Int'l)	252663-B32
	NOTE: This PDU has a detachable input power cord and allows for adaptability to country specific power requirements. This model may also be used with the high volt UPSs R3000 XR and R6000 For North America, need to order cable PN 340653-001.	
	NOTE: Please see the following Modular Power Distribution Unit (Zero-U/1U Modular PDUs) QuickSpecs for additional options including shorter jumper cables and country specific power cords: http://h18000.www1.hp.com/products/quickspecs/11041_na/11041_na.HTML (North America) http://h18000.www1.hp.com/products/quickspecs/11041_div/11041_div.HTML (Worldwide)	
USB Options	HP USB 2-Button Optical Scroll Mouse (Carbonite/Silver)	DC172B
·	USB 1.44-MB External Diskette Drive (Carbonite)	DC141B
	256MB HP Drive Key	DL973B
	Multibay USB cradle	DC373A#ABA
	Multibay USB cradle	DC373A#B13
Customer Builder	Please see the Enterprise Configurator for configuration assistance at: http://www.hp.com/products/conf	igurator.
ProLiant DL360 G4	460W HP redundant power supply with IEC cord only	354587-B21
Deployment Options	460W HP redundant power supply with US or Japanese NEMA cord only NOTE: The HP ProLiant DL360 G4 ships with a single IEC-IEC power cord used for rack mounting with Power Distribution Units (PDUs). For stand-alone deployments or installation without a rack, country-specific power cord options are available. U.S., Japan, & APD models ship with two power cords: IEC-IEC and country-specific NEMA cords.	354587-001
Third Party Rack Kit	Rack Adapter Kit NOTE: This kit allows HP rack servers to fit in racks that are 24" wide.	332815-B21
HP Rack 5000 Series (Graphite Metallic)	HP 5642 RACK-UNASSEMBLED	358254-B21
Rack Options for Rack	Stabilizer Kit for 5642 rack (Graphite Carbon)	374493-B21
5000 Series	NOTE: The stabilizing kit is used to prevent rack from tipping over. Baying Kit for 5642 rack (Graphite Carbon) NOTE: The baying kit is used to join two or more HP 5642 racks.	374499-B21
-		



Options

ΗP	Rack	10000	Series
(Gr	anhite	Metallic)	

HP Rack S10614 (14U) Rack Cabinet - Shock Pallet	292302-B22
HP Rack 10842 (42U, 800mm wide) – Pallet	257415-B21
HP Rack 10842 (42U, 800mm wide) – Shock Pallet	257415-B22
HP Rack 10647 (47U) – Pallet	245160-B21
HP Rack 10647 (47U) – Crated	245160-B23
HP Rack 10642 (42U) – Pallet	245161-B21
HP Rack 10642 (42U) – Shock Pallet	245161-B22
HP Rack 10642 (42U) – Crated	245161-B23
HP Rack 10636 (36U) – Pallet	245162-B21
HP Rack 10636 (36U) – Shock Pallet	245162-B22
HP Rack 10636 (36U) – Crated	245162-B23
HP Rack 10622 (22U) – Pallet	245163-B21
HP Rack 10622 (22U) – Shock Pallet	245163-B22
HP Rack 10622 (22U) – Crated	245163-B23

NOTE: -B21 (pallet) used to ship empty racks shipped on a truck

-B22 (shock pallet) used to ship racks with equipment installed (by custom systems, VARs and Channels)

-B23 (crated) used for air shipments of empty racks

NOTE: It is mandatory to use a shock pallet in order to ship racks with equipment installed. Not all HP equipment is qualified to be shipped in the Rack 10000 series

NOTE: Please see the Rack 10000 QuickSpecs for Technical Specifications such as height, width, depth, weight, and color:

http://h18000.www1.hp.com/products/quickspecs/10995_div/10995_div.HTML (Worldwide) http://h18000.www1.hp.com/products/quickspecs/10995_na/10995_na.HTML (North America)

NOTE: For additional information regarding Rack Cabinets, please see the following URL: http://h18000.www1.hp.com/products/servers/proliantstorage/rack-ptions/index.html.

Rack Options for Rack 10000 Series

HP Light kit for 10000 series rack	361589-B21
HP Plinth kit for 10000 series rack	251960-B21
Switch Box Connector Kit (high voltage) (Int'l)	144007-B33
TFT7210R Rack Mounted 17" Monitor	348373-B21
TFT5600 RKM Rack Keyboard Monitor	221546-xx1

Country Code Key (for TFT5600 RKM Rack Keyboard Monitor (PN 221546-xx1))

XX = 00	US	XX = 09	Norway
XX = 03	UK	XX = 10	Sweden/Finland
XX = 04	Germany	XX = 11	Switzerland
XX = 05	France	XX = 13	Portugal
XX = 06	Italy	XX = 18	Belgium
XX = 07	Spain	XX = 29	Japan
XX = 08	Denmark	XX = B3	International

NOTE: For additional information regarding Rack Cabinets, please see the following URL: http://h18000.www1.hp.com/products/servers/proliantstorage/rack-ptions/index.html.

NOTE: For a complete list of Monitors please view the following URL:

http://h18004.www1.hp.com/products/monitors/



HP KVM Switch Options	Server Console Switch (KVM), 0 x 1 x 8 port	336044-B21
	Server Console Switch (KVM), 0 x 2 x 16 port	336045-B21
	IP Console Switch Box (KVM/IP), 1 x 1 x 16	262585-B21
	IP Console Switch Box (KVM/IP), 3 x 1 x 16	262586-B21
	HP 1x4 USB/PS2 KVM Switch, RM (ALL)	371302-B21
	HP 1x4 USB/PS2 KVM Switch, TT, (EURO)	371301-A21
	HP 1x4 USB/PS2 KVM Switch, TT (UK)	371301-031
	HP 1x4 USB/PS2 KVM Switch, TT, (AUST/NZ)	371301-011
	HP 1x4 USB/PS2 KVM Switch, TT, (NA/JPN)	371301-D71
	PS/2 Interface Adapter, 8 pack	262587-B21
	PS/2 Interface Adapter, 1 pack	262588-B21
	CAT5 KVM Expansion Module	262589-B21
	CAT5e Cable 3', 4 pack	263474-B21
	CAT5e Cable 6', 8 pack	263474-B22
	CAT5e Cable 12', 8 pack	263474-B23
	CAT5e Cable 20', 4 pack	263474-B24
	CAT5e Cable 40', 1 pack	263474-B25
	NOTE: For additional information regarding HP KVM Switches and options, please see the following URL: http://h18004.www1.hp.com/products/servers/proliantstorage/rack-options/list.html#console	



HP Factory Express	Factory Installation, Racking, and Customization Services	
	Factory Express Server Configuration Level 1	293355-888
	NOTE: Free Installation of HP Options - Installation of HP Options memory, NICs, hard drives, controllers, processors, I/O cards, pre-install standard OEM OS image, and tape drives. Installation fees will apply to all non-HP certified hardware and asset tags.	
	Factory Express Server Configuration Level 2	266326-888
	NOTE: Includes Level 1 Customer Intent of a ProLiant server and options configuration, OS installation, custom image download, IP addressing, network setting, and custom packaging. Customer unique requirements (quick restore creation, cd duplication, test reports, real-time reporting of server MAC address, password, and RILOE). Customer access, validation and control through VPN (price/server).	
	Factory Express Rack Integration Level 3 with $1-3$ servers or storage enclosures	325736-888
	Factory Express Rack Integration Level 3 with 4 – 9 servers or storage enclosures	232539-888
	Factory Express Rack Integration Level 3 with 10 or more servers or storage enclosures	325735-888
	NOTE: Includes Level 1 Customer Intent for standard mounted servers and storage units plus standard cable mgmt, RAID configuration, servers & storage, power distribution, networking gear and accessories (price/rack).	
	Factory Express Rack Integration Level 4 with 1 – 3 servers or storage enclosures	325734-888
	Factory Express Rack Integration Level 4 with 4 – 9 servers or storage enclosures	232540-888
	Factory Express Rack Integration Level 4 with 10 or more servers or storage enclosures	325733-888
	NOTE: Includes Level 2 Customer Intent plus customer defined cable management and naming convention, customer furnished image download, IP addressing, cluster configurations (SQL, External storage RAID). Quick restore creation, cd duplication, test reports, real-time reporting of server MAC address, password, RILOE). Customer access and validation through VPN (price/rack).	
	Factory Express Rack Integration Level 5 with 1 – 3 servers or storage enclosures	325732-888
	Factory Express Rack Integration Level 5 with 4 – 9 servers or storage enclosures	232541-888
	Factory Express Rack Integration Level 5 with 10 or more servers or storage enclosures	325731-888
	NOTE: Includes Level 4 Customer Intent plus Custom SW layering and extended test, Customer access, validation and control through VPN, Clustered racks with networking gear and / or external storage array, Start-up installation services custom quote. (price/rack). NOTE: Factory Express Engineered Solution Level 6 is a custom solutions available through Factory Express. Please contact your local reseller or Account Manager.	



Options

Service and Support Offerings (HP Care Pack Services)

Hardware Services 4-Hour On-site Service	
4-Hour On-site Service, 5-Day x 13-Hour Coverage, 3 Years	U4496A
4-Hour On-site Service, 5-Day x 13-Hour Coverage, 3 Years, Electronic	U4496E
4-Hour On-site Service, 7-Day x 24-Hour Coverage, 3 Years	U4497A
4-Hour On-site Service, 7-Day x 24-Hour Coverage, 3 Years, Electronic	U4497E
Hardware Services 6-Hour Call to Repair On-site Service	
6-Hour Call to Repair, On-site Service, 7-Day x 24-Hour Coverage, 3 Years	U4498A
6-Hour Call to Repair, On-site Service, 7-Day x 24-Hour Coverage, 3 Years, Electronic	U4498E
Hardware Services Next Business Day On-Site Service	
Hardware Installation	U4506A
Hardware Installation, Electronic	U4506E
Installation & Start-Up of a ProLiant server and Microsoft or Linux O/S per the Customer Description and/or Data Sheet. To be delivered on a scheduled basis 8am-5pm, M-F, excl. HP holidays.	U4507A
Installation & Start-Up of a ProLiant server and Microsoft or Linux O/S per the Customer Description and/or Data Sheet. To be delivered on a scheduled basis 8am-5pm, M-F, excl. HP holidays, Electronic	U4507E
Support Plus	
Onsite HW support, 8am-9pm, M-F, 4hr response and Microsoft O/S SW Tech support offsite, onsite at HP's discretion, 8am-9pm, M-F 2hr response time excl. HP holidays.	U4508A
Onsite HW support, 8am-9pm, M-F, 4hr response and Microsoft O/S SW Tech support offsite, onsite at HP's discretion, 8am-9pm, M-F 2hr response time excl. HP holidays, Electronic	U4508E
Support Plus 24	
Onsite HW support 24x7, 4hr response and Microsoft O/S SW Tech support offsite, onsite at HP's discretion, 24x7 2hr response time incl. HP holidays.	U4509A
Onsite HW support 24x7, 4hr response and Microsoft O/S SW Tech support offsite, onsite at HP's discretion, 24x7 2hr response time incl. HP holidays, Electronic	U4509E
Onsite HW support 24x7, 4hr response and SuSE Linux SW Tech support offsite, onsite at HP's discretion, 24x7 2hr response time incl. HP holidays.	U6310
Onsite HW support 24x7, 4hr response and SuSE Linux SW Tech support offsite, onsite at HP's discretion, 24x7 2hr response time incl. HP holidays, Electronic	U6310E
Onsite HW support 24x7, 4hr response and Red Hat ES2.1 Linux SW Tech support offsite, onsite at HP's discretion, 24x7 2hr response time incl. HP holidays.	U8332A
Onsite HW support 24x7, 4hr response and Red Hat ES2.1 Linux SW Tech support offsite, onsite at HP's discretion, 24x7 2hr response time incl. HP holidays, Electronic	U8332E
NOTE: For more information, customer/resellers can contact http://www.hp.com/services/carepack .	





Memory

NOTE: Memory configurations listed do not apply to "Factory Integrated Models".

HP ProLiant DL360 G4 3.06 GHz and 3.4GHz-1MB Models

Standard Memory

1-GB PC2700 DDR 333 Registered SDRAM DIMM installed (1 x 1-GB SDRAM DIMM)

Upgrading Memory and Memory Interleaving

When upgrading memory, DIMMs 1A and 2A must match. DIMMs 3B and 4B must match and must be installed as a pair. When DIMMs 1A and 2A are populated the system is automatically configured for 2:1 interleaving. When all four DIMMs are populated with identical DIMMs the system is automatically configured for bank interleaving. Bank B can be configured for Online Spare Memory.

Standard Memory Plus Optional Memory

Up to 6-GB memory is available with the standard memory of 1-GB and the optional installation of PC2700 DDR 333 Registered SDRAM DIMM memory kits.

Standard Memory Replaced with Optional Memory

Up to 8-GB of memory is available with the removal of the standard 1-GB of memory and the optional installation of PC2700 DDR 333 Registered SDRAM DIMM memory kits.

NOTE: Chart does not represent all possible configurations.

Memory		Slot			
		1	2	3	4
Standard	1 GB	1 GB	Empty	Empty	Empty
Optional	6 GB	1 GB	1 GB	2 GB	2 GB
Maximum	8 GB	2 GB	2 GB	2 GB	2 GB

Following are memory options available from HP:

 512MB of Advanced ECC PC2700 DDR 333 SDRAM DIMM Memo 	ory Kit (1 x 512 MB)	358347-B21
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• 1 GB of Advanced ECC PC2700 DDR 333 SDRAM DIMM Memory Kit (1 x 1 GB)

358348-B21

2 GB of Advanced ECC PC2700 DDR 333 SDRAM DIMM Memory Kit (1 x 2 GB)

358349-B21

HP ProLiant DL360 G4 3.4GHz-1MB RPS Models

Standard Memory

2-GB PC2700 DDR 333 Registered SDRAM DIMM installed (2 x 1-GB SDRAM DIMM)

Upgrading Memory and Memory Interleaving

When upgrading memory, DIMMs 1A and 2A must match. DIMMs 3B and 4B must match and must be installed as a pair. When DIMMs 1A and 2A are populated the system is automatically configured for 2:1 interleaving. When all four DIMMs are populated with identical DIMMs the system is automatically configured for bank interleaving. Bank B can be configured for Online Spare Memory.

Standard Memory Plus Optional Memory

Up to 6-GB memory is available with the standard memory of 1-GB and the optional installation of PC2700 DDR 333 Registered SDRAM DIMM memory kits.

Standard Memory Replaced with Optional Memory

Up to 8-GB of memory is available with the removal of the standard 1-GB of memory and the optional installation of PC2700 DDR 333 Registered SDRAM DIMM memory kits.

NOTE: Chart does not represent all possible configurations.

Memory		Slot				
		1	2	3	4	
Standard	2 GB	1 GB	1 GB	Empty	Empty	
Optional	6 GB	1 GB	1 GB	2 GB	2 GB	
Maximum	8 GB	2 GB	2 GB	2 GB	2 GB	



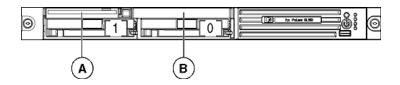


Memory

Following are memory options available from HP:

•	512MB of Advanced ECC PC2700 DDR 333 SDRAM DIMM Memory Kit (1 x 512 MB)	358347-B21
•	1 GB of Advanced ECC PC2700 DDR 333 SDRAM DIMM Memory Kit (1 x 1 GB)	358348-B21
•	2 GB of Advanced ECC PC2700 DDR 333 SDRAM DIMM Memory Kit (1 x 2 GB)	358349-B21

Storage



- 1,0 2 x 1 inch Wide Ultra320 Hot Pluggable Hard Drive Bays; SATA model also available
- A 1.44-MB Diskette Drive (removeable)
- B Low-Profile 24x IDE CD-ROM (ejectable)

Drive Support

	Quantity Supported	Position Supported	Controller
Removable Media	• •		
1.44-MB Diskette Drive	Up to 1	Α	Integrated
Low-profile 24x IDE CD Drive	P-ROM Up to 1	В	Integrated IDE
Slim Line DVD-Rom Dri (8x/24x) Option Kit (Sen		В	Integrated IDE

Hard Drives

Ultra320 Hot Pluggable Drives

NOTE: The DL360 G4 only supports U320 Universal drives.

	Quantity Supported	Position Supported	Controller
1-inch 300-GB 10,000 rpm 146.8-GB 10,000 rpm 72.8-GB 10,000 rpm 36.4-GB 15,000 rpm 72.8-GB 15,000 rpm	Up to 2	0-1	Smart Array 6i Controller (integrated on system board) NOTE: The ProLiant DL360 Generation 4 (G4) does not offer an external SCSI port. Smart Array 6402/128 Controller Smart Array 6404/256 Controller Smart Array 642 Controller 64-Bit/133-MHz Dual Channel Ultra320 SCSI Adapter

Serial-ATA (SATA) Hard Drive

NOTE: When SATA drives are installed, Hot-plug capability and LEDs are only supported when a Serial ATA Smart Array option card has been installed.

	Quantity	Position	
	Supported	Supported	Controller
1-inch 80GB 7.2k SATA 160GB 7.2k SATA 250GB 7.2k SATA	Up to 2	0-1	



Storage

External Storage

	Quantity Supported	Position Supported	Host Controller or Adapter	
Modular Smart Array20 Family	Please see the Modular Smart Array 20 QuickSpecs to determine configuration requirements	External	Smart Array 6402/128 Controller Smart Array 6404/256 Controller Smart Array 642 Controller 64-Bit/133-MHz Dual Channel Ultra320 SCSI Adapter 64-Bit/66-MHz Dual Channel Wide Ultra3 SCSI Adapter, Alternate OS	
Modular Smart Array 30 Fami	y Please see the Modular Smart Array 30 QuickSpecs to determine configuration requirements.	External	Smart Array 6402/128 Controller Smart Array 6404/256 Controller Smart Array 642 Controller 64-Bit/133-MHz Dual Channel Ultra320 SCSI Adapter 64-Bit/66-MHz Dual Channel Wide Ultra3 SCSI Adapter, Alternate OS	
Modular Smart Array 500 G2 System	1	External	Smart Array 642 Controller (used as Host Bus Adapter) Please see the Modular Smart Array 500 G2 QuickSpecs for the latest list of supported HBAs: http://www.hp.com/go/msa500	
Modular Smart Array 500 System	1	External	Please see the Modular Smart Array 500 QuickSpecs for the latest list of supported HBAs: http://www.hp.com/go/msa500	
Modular Smart Array 1500 cs	Please see the Modular Smart Array 1500 cs QuickSpecs below to determine configuration requirements	External	Please see the Modular Smart Array 1500 cs QuickSpecs (URL below) for the latest list of supported HBAs	
Modular Smart Array 1000	Please see the Modular Smart Array 1000 QuickSpecs below to determine configuration requirements	External	Please see the Modular Smart Array 1000 QuickSpecs (URL below) for the latest list of supported HBAs	
Modular Smart Array 1000: http://h18000.www1.hp.com/products/quickspecs/11033_div/11033_div.HTML (Worldwide)				

http://h18000.www1.hp.com/products/quickspecs/11033_na/11033_na.HTML (North America)

Modular Smart Array 1500: http://www.hp.com/go/MSA1500cs



Storage

Tape Drives, Tape Autoloaders, & Tape Libraries

NOTE: For an up-to-date listing of the latest O/S Support details for each of the Tape Drives listed below, please see the following:

http://www5.compaq.com/products/quickspecs/North_America/10233.html (North America)

http://www5.compaq.com/products/quickspecs/Division/10233.html (Worldwide)

NOTE: For an up-to-date listing of the latest O/S Support details for each of the Tape Autoloaders & Tape Libraries listed below, please see the following:

http://www5.compaq.com/products/quickspecs/North America/10809.html (North America)

http://www5.compaq.com/products/quickspecs/Division/10809.html (Worldwide)

http://www5.compaq.com/proc	Quantity Supported	Position Supported	Controller
Ultrium 215, External Ultrium 230, External	Up to 2	External	64-Bit/133Mhz Dual Channel Ultra320 SCSI Adapter 64-Bit/66-MHz Dual Channel Wide Ultra3 SCSI Adapter, Alternate OS
HP StorageWorks DAT 72 Tape Drive, External	Up to 2	External	64-Bit/133Mhz Dual Channel Ultra320 SCSI Adapter 64-Bit/66-MHz Dual Channel Wide Ultra3 SCSI Adapter, Alternate OS
HP StorageWorks DAT 40x6 Tape Autoloader DAT 72x6 Tape Autoloader, External 1/8 Ultrium 460 Tape Autoloader 1/8 SDLT 320 Tape Autoloader 1/8 Ultrium 230 Tape Autoloader 1/8 DLT VS80 Tape Autoloader SSL1016 Ultrium 460 Tape Autoloader SSL1016 SDLT 320 Tape Autoloader	1 autoloader per SCSI channel	External	64-Bit/133Mhz Dual Channel Ultra320 SCSI Adapter 64-Bit/66-MHz Dual Channel Wide Ultra3 SCSI Adapter, Alternate OS
HP StorageWorks Tape Libraries MSL6000 MSL5026S2 MSL5052S2 MSL5030 MSL5060	Please reference the MSL Tape Library QuickSpecs to determine configuration requirements	External	64-Bit/133Mhz Dual Channel Ultra320 SCSI Adapter 64-Bit/66-MHz Dual Channel Wide Ultra3 SCSI Adapter, Alternate OS
ESL 712e ESL 630e ESL 322e ESL 286e ESL9322 ETLA ESL9595 ETLA	Please reference the relevant MSL or ESL Tape Library QuickSpecs to determine configuration requirements	External	64-Bit/133Mhz Dual Channel Ultra320 SCSI Adapter 64-Bit/66-MHz Dual Channel Wide Ultra3 SCSI Adapter, Alternate OS



Power Specifications

To review typical system power ratings use the Active Answers Power Calculator which is available via the online tool located at URL: http://h30099.www3.hp.com/configurator/calc/Power%20Calculator%20Catalog.xls

To drill down to calculators:

- Click on: "ProLiant Servers"
- Click on the Server of interest. Example: DL360 G4
- Click on: "Power Calculator" link. (You may need to scroll down to see it)



Technical Specifications

System Unit Dimensions $(H \times W \times D)$ 1.70 x 16.78 x 27.75 in (4.32 x 42.62 x 70.49 cm)

Weight Maximum (two hard drives 37 lb (16.78 kg)

installed, two power supply, two

processor)

No hard drives installed, one 27.5 lb (12.47 kg)

power supply, one processor

Input Requirements Rated Input Voltage 100 to 240 VAC

> Rated Input Current 5.85 Amps (100 V) to 2.85 Amps (200 V)

50 to 60 Hz Rated Input Frequency

Rated Input Power 585 W (100VAC) to 565 W (200VAC)

NOTE: 585 W of Rated Input Power is for the Maximum

Peak Output Power of 460 W.

BTU Rating 2000 BTU/HR

NOTE: The BTU rating listed is for the Rated Input Power of

585 W.

Power Specifications To review typical system power ratings use the Power Calculator which is available via the

online tool located at URL: http://h30099.www3.hp.com/configurator/calc

/Power%20Calculator%20Catalog.xls

To drill down to calculators: - Click on: "ProLiant Servers"

Rated Steady-State Power

- Click on the Server of interest. Example: DL360 G4

- Click on: "Power Calculator" link. (You may need to scroll down to see it) 460 W

Power Supply Output

Power

(per power supply)

Temperature Range Operating 10° to 35°C at sea level with an altitude derating of

> 1.0°C per every 300m (1000ft) above sea level to a maximum of 3000m (10,000ft), no direct sustained sunlight. Maximum rate of change is 10°C/Hr.

Storage -30° to 60°C - Maximum rate of change is 20°C/Hr.

Relative Humidity (non-condensing)

Operating

10 to 90% relative humidity (Rh), 28°C maximum wet

bulb temperature

Storage 5 to 95% relative humidity (Rh), 38.7°C maximum wet

bulb temperature

Maximum Wet Bulb

Temperature

38.7° C

SCSI Connectors

Acoustic Noise

No external VHDCI connector

Idle

(Fixed Disk Drives Spinning)

 L_{WAd} (BELS) 6.6

L pAm (dBA) 50

Operating

(Random Seeks to Fixed Disks)

L WAd (BELS) 6.9 BELS

L pAm (dBA) 53 dBA

Technical Specifications

Smart Array 6i Controller (integrated on system board)

Data Compatible with all Yes

Smart Array Controllers

Instant Upgrades to other Yes

Smart Array Controllers

Consistent Software

Manageability Tools

64-bit up to 133 (integrated on system board)

PCI-X Peak Data Transfer

Rate

PCI-X Bus

800 MB/s

SCSI Protocols Supported Ultra320, Ultra3, Ultra2 SCSI Peak Data Transfer 320 MB/s per channel

Yes

Rate NOTE: For ProLiant servers having TWO internal drive bays on separate SCSI ports: SCSI

Peak Data Transfer Rate is 320 MB/s; 160 MB/s per channel and Channels is 2

Channels

NOTE: For ProLiant servers having two internal drive bays on separate SCSI ports: SCSI

Peak Data Transfer Rate is 320 MB/s; 160 MB/s per channel and Channels is 2.

SCSI Ports 0/2

NOTE: For ProLiant servers having two internal drive bays on separate SCSI ports: SCSI (external/internal)

Peak Data Transfer Rate is 320 MB/s; 160 MB/s per channel and Channels is 2.

Drives Supported Maximum = total number of drives

(maximum) NOTE: True Maximum is 14HDs per channel with up to 2TB per logical volume.

Cache 64 MB Read Cache

Battery-Backed Write

Cache

Yes, with installation of Battery-Backed Write Cache Enabler, up to 128MB

RAID Support 0, 1, 1+0, 5

Logical Drives Maximum = total number of drives

(maximum)

Online Configuration Online Capacity

Expansion

Yes Yes

Yes

Logical Drive Capacity

Extension

Online Stripe Size

Yes

Migration

Online RAID Level

Migration

Yes

Yes

Yes

Online Spare Support **Automatic Data Recovery**

Drive Roaming Yes Redundant Controllers No



Technical Specifications

Embedded NC7782 Dual Network Interface Port NIC

Compatibility

10/100/1000-T

EEE 802.3 10Base-T

IEEE 802.3ab 1000Base-T IEEE 80.3u 100Base-TX

Data Transfer Method

64-bit/66MHz PCI-X

Network Transfer Rate

10 Mb/s

Duplex)

10Base-T (Full-

10Base-T (Half-

20 Mb/s

Duplex)

100Base-TX (Half-

100 Mb/s

Duplex)

100Base-TX (Full-

200 Mb/s

Duplex)

100Base-TX (Half-

1000 Mb/s

Duplex)

1000Base-TX (Full-

2000 Mb/s

Duplex)

10Base-T

RJ-45 Connector

Cable Support

Categories 3, 4 or 5 UTP up to 328 ft (100 m)

10/100/1000 Base- Category 5 UTP up to 328 ft (100 m)

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