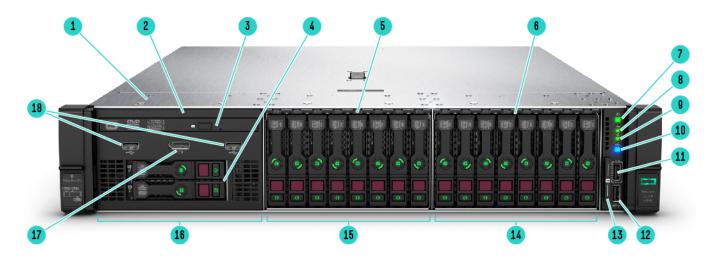
QuickSpecs

Overview

HPE ProLiant DL385 Gen10 Server

The HPE ProLiant DL385 Gen10 Server is redefining price/performance with the new math for virtualized compute. This 2P, 2U server has been designed with flexibility while delivering a high maximum core count and large memory footprint. Choose this purpose-built platform for virtualization.



Front View - SFF chassis with optional Universal Media bay with optical and 2 NVME plus 16 NVMe shown

- 1. Quick removal access panel
- 3. Optional Optical drive. Requires Universal Media bay
- 5. Drive Bay 2. NVMe shown (8 SFF, 6SFF+2NVMe or 8 NVMe PCle SSD optional)
- 7. Power On/Standby button and system power LED button
- 9. NIC status
- 11. iLO Front Service Port
- 13. Serial label pull tag
- 15. Box 2
- 17. Optional front display port (Via Universal Media Bay)

- 2. Drive Bay 1. Optional Universal Media bay. 2 USB 2.0 and Display port standard shown (8 SFF bay or 6 SFF+2NVMe or 8NVMe optional)
- 4. Optional 2 SFF HDD, requires optional Universal Media bay
- 6. Drive Bay 3. NVMe shown (8 SFF, 6SFF+2NVMe or 8 NVMe PCle SSD optional)
- 8. Health LED
- 10. UID button
- 12. USB 3.0
- 14. Box 3
- 16. Box 1
- 18. Optional USB 2.0 (via Universal Media Bay)

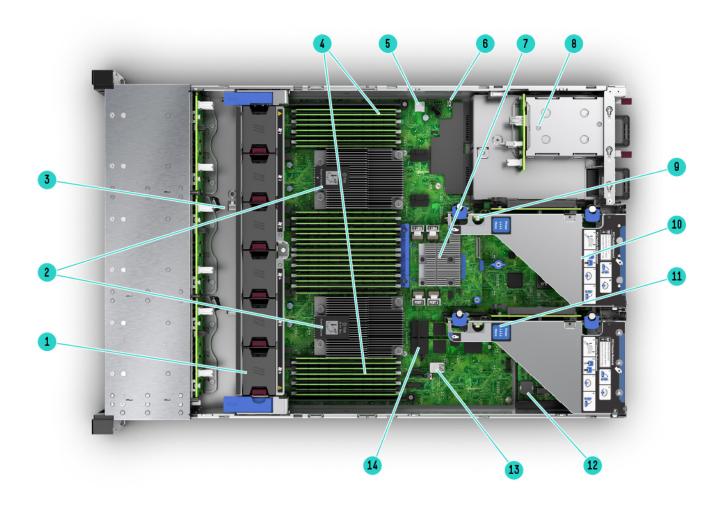




Front View - 8LFF chassis with Universal media bay and optional 2SFF and optical drive shown

- 1. Unit ID button
- 3. NIC status
- 5. Front display port
- 7. Serial label pull tag
- 9. Optional 2 SFF Drive bay, 2 NVMe shown

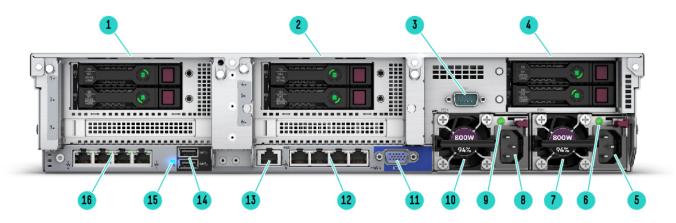
- 2. Health LED
- 4. Power On/Standby button and system power LED button
- 6. iLO Front Service Port
- 8. Optional optical drive shown (blank as standard)



Internal View 8SFF chassis – with optional 2nd CPU, FlexLOM, Smart array shown

- 1. Fan cage shown with 6 standard Hot-plug fans (High Performance fans optional)
- 3. Optional HPE Smart Storage Battery (not shown)
- 5. MicroSD card slot (Optional Dual Micro-SD option)
- 7. Optional HPE Flexible Smart Array Controller (P408i-a shown)
- 9. Connection for second (optional) riser (Requires second CPU)
- 11. Primary PCIe riser, standard (Optional double wide GPU riser)
- 13. Internal USB 3.0 connector

- 2. 2 Processors (heatsinks shown)
- 4. DDR4 DIMM slots. Shown fully populated in 32 slots (16 per processor)
- 6. Chassis intrusion detection connector
- 8. (Under) Hot Plug redundant HPE Flexible Slot Power supplies
- 10. Embedded 4x1Gbe NIC
- 12. Optional Flexible LOM slot
- 14. Embedded M.2 connectors



Rear View - With optional FlexLOM, Rear drives and Serial port shown.

- 1. Primary Riser. PCI Slots (Slots 1-3 top to bottom, riser shipped standard, not shown) Optional 2SFF rear drives
- 3. Optional serial port
- 5. Power supply power connection. Bay 1
- 7. HPE Flexible Slot Power Supply. Bay 1
- 9. Power supply Power LED Bay 2
- 11. VGA connector
- 13. Dedicated iLO management port
- 15. Unit ID LED

- 2. Secondary Riser. PCI Slots (Slots 4-6top to bottom, not shown, requires second riser card, and second processor). Optional 2 SFF rear drives
- 4. Tertiary Riser (Slots 7-8 top to bottom, not shown). Optional rear 2 SFF HDD
- 6. Power supply Power LED. Bay1
- 8. Power supply Power connection Bay 2
- 10. HPE Flexible Slot Power Supply Bay 2
- 12. Embedded 4 x 1GbE Network Adapter
- 14. USB connectors 3.0 (2)
- 16. Optional FlexibleLOM ports (Shown: 4 x 1GbE)

What's New:

- 32 DIMM slots
- AMD® EPYC® 7000 Processor Family
- Two embedded M.2 connectors on the system board
- Highly flexible drive options (SSD, M.2, NVMe)

Platform Information

Form Factor

2U rack

Chassis Types

8 SFF with optional Universal Media Bay, and optional SFF or NVMe drive bay options

24 SFF bay with additional 6SFF rear drive bay option to total 30 SFF drives

8 LFF with Universal Media Bay

12 LFF with optional 4 LFF mid-plane and optional 3LFF + 2 SFF rear drive bay to total 19 LFF drives + 2 SFF drives

NOTE: The 3 LFF rear drive box will consume space for the secondary and tertiary riser.

NOTE: The 8 and 12 LFF chassis also supports the 2 SFF rear drive box which allows for the user to attach a secondary or tertiary riser.

NOTE: The 8 NVMe drive option (826689-B21) can only be leveraged in the SFF chassis and replaces Box 1, 2 or 3.

NOTE: The Premium cage (826690-B21, 6 SAS/SATA+2 NVMe) can only be leveraged in the SFF chassis and replaces Box 1, 2 or 3.

NOTE: The Universal Media Bay (882097-B21) not available with the LFF chassis or the 24 SFF front end, and can only be populated in Box 1.

NOTE: The 8 SFF can be upgraded with additional 8SFF drive box to total 16 or 24 SFF drives. For optimal upgrade Box 2 should be populated second, with Box 1 the last to be populated for a field upgrade to 24 SFF. For CTO builds requiring 24 SFF please use the 24 SFF chassis (878613-B21). Note a field upgrade to 24 SFF will require a High Performance fan kit (867810-B21).

NOTE: The 8 LFF chassis cannot be upgraded to 12 LFF front in the field; however the 4-LFF Mid plane (882096-B21) is supported, but will also require a performance fan kit (867810-B21).

NOTE: CPU selection is limited 125W or lower with 4LFF midtray selected.

NOTE: The 8LFF chassis ships with 6-standard fans.

NOTE: All models come with the S100i Smart Array Controller (Available 2H2018) with embedded software RAID support for the 2 embedded M.2 drive connectors on the system board.

System Fans

Standard – fan types included

NOTE: 1P models ship with 4 standard fans. The second processor option kit contains 2 additional fans.

NOTE: The 12 LFF and 24 SFF chassis ship with 6 High performance fans as standard.

NOTE: The 8LFF chassis ships with 6 standard fans as standard.

NOTE: High performance fan kit is available to meet ambient temperature environments.

NOTE: High performance fan kits are required for rear drives, Graphics (GPU) card, 180w Processors SKUs, or NVMe configurations.

Standard Features

Processors – Up to 2 of the following depending on model.

NOTE: For more information regarding AMD EPYC processors, please see the

following: https://www.amd.com/en/products/epyc.

AMD EPYC Processor	Cores	Base Frequency	Max Frequency	Max Memory	Wattage	Cache	Memory
EPYC 7601	32	2.2Ghz	3.2Ghz	2TB	180	64MB	2666MT/S
EPYC 7551	32	2.0Ghz	3.0Ghz	2TB	180	64MB	2666MT/S
EPYC 7501	32	2.0Ghz	3.0Ghz	2TB	155/170	64MB	2666MT/S
EPYC 7451	24	2.3Ghz	3.2Ghz	2TB	180	64MB	2400/2666MT/S
EPYC 7401	24	2.0Ghz	3.0Ghz	2TB	155/170	64MB	2400/2666MT/S
EPYC 7351	16	2.4Ghz	2.9Ghz	2TB	155/170	64MB	2400/2666MT/S
EPYC 7301	16	2.2Ghz	2.7Ghz	2TB	155/170	64MB	2400/2666MT/S
EPYC 7281	16	2.1Ghz	2.7Ghz	2TB	155/170	32MB	2400/2666MT/S
EPYC 7251	8	2.1Ghz	2.9Ghz	2TB	120	32MB	2400MT/S

NOTE: All AMD EPYC processors can support up to 2TB of memory each.

Chipset

No chipset – System on Chip (SoC) design.

On System Management Chipset

HPE iLO 5 ASIC

NOTE: Read and learn more in the iLO QuickSpecs.

Memory

One of the following depending on model

Type: HPE DDR4 SmartMemory,

Registered (RDIMM), Load Reduced (LRDIMM)

DIMM Slots Available 32 16 DIMM slots per processor, 8 channels per processor, 2 DIMMs

per channel

Maximum capacity (LRDIMM) 4.0 TB 32 x 128 GB LRDIMM @ 2666 MHz
Maximum capacity (RDIMM) 1.0 TB 32 x 32 GB RDIMM @ 2666 MHz

NOTE: The maximum memory speed is limited by the processor selection.

NOTE: Mixing of RDIMM and LRDIMM memory is not supported.

Expansion Slots

Slots#	Technology	Bus Width	Connector Width	Slot Form Factor	Notes
1	PCIe 3.0	X8	X8	Full-height, full-length slot	Proc 1
2	PCle 3.0	X16	X16	Full-height, full-length slot	Proc 1
3	PCIe 3.0	X8	X8	Full-height, half-length slot	Proc 1

NOTE: Bus Width Indicates the number of physical electrical lanes running to the connector.

Slots #	Technology	Bus Width	Connector Width	Slot Form Factor	Notes
1	PCle 3.0	X8	X8	Full-height, full-length slot	Proc 2
2	PCle 3.0	X16	X16	Full-height, full-length slot	Proc 2
3	PCle 3.0	X8	X8	Full-height, half-length slot	Proc 2
Slots #	Technology	Bus Width	Connector Width	Slot Form Factor	Notes
1	PCle 3.0	X8	X8	Full-height, full-length slot	Proc 2
2	PCle 3.0	X8	X8	Full-height, full-length slot	Proc 2

NOTE: Tertiary riser (other options available) can be leveraged without secondary riser. **NOTE:** Bus width indicated the number of physical electrical lanes running to the connector.

Storage Controllers

The Gen10 controller naming framework has been updated to simplify identification as depicted below. For a more detailed breakout of the available Gen10 Smart Array controllers visit the **HPE Smart Array Gen10 Controllers Data Sheet**.

One of the following depending on model

Software RAID HPE Smart Array S100i SR Gen10 SW RAID

NOTE: HPE Smart Array S100i SR Gen10 SW RAID will operate in UEFI mode only. For legacy support an additional controller will be needed, and for CTO orders please also select the Legacy mode settings part, 758959-B22.

NOTE: HPE Smart Array S100i SR Gen10 SW RAID is off by default and must be enabled.

NOTE: The S100i supports the 2 M.2 system board connectors.

NOTE: S100i is available 2H2018.

HPE Smart Array E208i-a SR Gen10 Controller
HPE Smart Array E208i-p SR Gen10 Controller
HPE Smart Array E208e-p SR Gen10 Controller
HPE Smart Array E208e-p SR Gen10 Controller
HPE Smart Array P408i-a SR Gen10 Controller
HPE Smart Array P408i-p SR Gen10 Controller

HPE Smart Array P408e-p SR Gen10 Controller HPE Smart Array P816i-a SR Gen10 Controller

NOTE: Performance RAID Controllers require the HPE Smart Storage Battery (P01366-B21) which is sold separately.

Internal Storage Devices

One of the following depending on model

Optical Drive Ships standard in Performance Models

Optional: DVD-ROM, DVD-RW

Hard Drives None ship standard

Maximum Internal Storage

	CAPACITY	CONFIGURATION
Hot Plug SFF SAS	72.0 TB	$24+6 \times 2.4 \text{ TB}^*$ (with optional rear SFF drive cage)
Hot Plug SFF SATA	60.0 TB	24+6 x 2 TB (with optional SFF drive cage)
Hot Plug LFF SAS	235.68 TB	$12+4+3 \times 12$ TB + 2×3.84 TB (with optional mid –tray and rear LFF drive cage, plus 2 SFF SSD rear)
Hot Plug LFF SATA	235.68 TB	$12+4+3 \times 12$ TB + 2×3.84 TB (with optional mid –tray and rear LFF drive cage, plus 2 SFF SSD rear)
Hot Plug SFF SAS SSD	230.4 TB	24+6 x 7.68 TB (with optional rear SFF drive cage)
Hot Plug LFF SATA SSD	44.16 TB	$12+4+3 \times 1.92 \text{ TB} + 2 \times 3.84 \text{ TB}$ (with optional mid –tray and rear LFF drive cage, plus 2 SFF SSD rear)
Hot Plug SFF NVMe PCle SSD	38.4 TB NVMe	24 x 1.6 TB NVMe
NOTE: 2x m.2 drives are supporte	d on the system board.	

NOTE: uFF drives are also supported.

Power Supply

HPE 500W Flex Slot Platinum Hot Plug Low Halogen Power Supply Kit

NOTE: Available in 94% efficiency.

HPE 800W Flex Slot Platinum Hot Plug Low Halogen Power Supply Kit

NOTE: Available in 94% and 96% efficiency.

NOTE: Also available in -48VDC and 227VAC/380VDC power inputs.

HPE 1600W Flex Slot Platinum Hot Plug Low Halogen Power Supply Kit

NOTE: Available in 94% efficiency. **NOTE:** 240v power input only.

HPE Flexible Slot (Flex Slot) Power Supplies share a common electrical and physical design that allows for hot plug, tool-less installation into HPE ProLiant Gen10 Performance Servers. Flex Slot power supplies are certified for high-efficiency operation and offer multiple power output options, allowing users to "right-size" a power supply for specific server configurations. This flexibility helps to reduce power waste, lower overall energy costs, and avoid "trapped" power capacity in the data center.

All pre-configured servers ship with a standard 6-foot IEC C-13/C-14 jumper cord (A0K02A). This jumper cord is also included with each standard AC power supply option kit. If a different power cord is required, please check the **ProLiant Power Cables** web page.

To review the power requirements for your selected system, please use the HPE Power Advisor Tool.

For information on power specifications and technical content visit **HPE Server power supplies**.

Interfaces

Serial Optional, rear

Display Port 1 (SFF 1 front, optional via Universal Media Bay, 882097-B21), 8 LFF chassis standard

FlexibleLOM Network Ports 4 x 1 Gb ports shipping standard with optional FlexibleLOM or stand up card

HPE iLO Remote 1 Gb Dedicated

Management Network Port

Front iLO Service Port 1 standard (Not available on 12 LFF chassis or when SID is ordered, note iLO dongle

required, 880123-B21)

Micro SD Slot 1 Micro SD

NOTE: The Micro SD slot is not a hot-pluggable device. Customers should not attempt to plug an SD card into the SD slot

while the server is powered.

USB 3.0 Up to 5 total: 1 front, 2 rear, 2 internal (secure), 2 optional USB 2.0 front via Universal Media

Bay, or standard on 8LFF chassis

SID (Systems Insight Display) Optional

NOTE: Not shipping as standard. Available as a CTO option or as a field upgrade (882099-B21).

Operating Systems and Virtualization Software Support for ProLiant Servers

Windows Server 2012 R2 (Most Recent Version)

Windows Server 2016 (Most Recent Version)

VMware ESXi 6.5 and U1 upon release

Red Hat Enterprise Linux (RHEL) 7.4

SUSE Linux Enterprise Server (SLES) 12 SP3

NOTE: For more information on Hewlett Packard Enterprise Certified and Supported ProLiant Servers for OS and Virtualization Software and latest listing of software drivers available for your server.

https://www.hpe.com/us/en/servers/server-operating-systems.html

Industry Standard Compliance

ACPI 6.1 Compliant

PCle 3.0 Compliant

WOL Support

Microsoft® Logo certifications

PXE Support

VGA/Display Port

NOTE: This support is on the optional Universal Media Bay.

USB 3.0 Compliant (internal)

USB 2.0 Compliant (external ports via SUV)

NOTE: This support is on the optional Universal Media Bay.

Energy Star

SMBIOS 3.1

UEFI 2.6

Redfish API

IPMI 2.0

Secure Digital 2.0

Advanced Encryption Standard (AES)

Triple Data Encrytion Standard (3DES)

SNMP v3

TLS 1.2

DMTF Systems Management Architecture for Server Hardware Command Line Protocol (SMASH CLP)

Active Directory v1.0

ASHRAE A3/A4

NOTE: For additional technical thermal details regarding ambient temperatures, humidity and features support please

visit: http://www.hpe.com/servers/ashrae.

UEFI (Unified Extensible Firmware Interface Forum)

NOTE: UEFI is the default for the DL385 Gen10. Legacy mode can be selected in the field or as a CTO option (758959-B22).

Graphics

Integrated Video Standard

- Video modes up to 1920 x 1200@60Hz (32 bpp)
- 16MB Video Memory

HPE iLO 5 on system management memory

- 32 MB Flash
- 4 Gbit DDR 3 with ECC protection

HPE Server UEFI/Legacy ROM

Unified Extensible Firmware Interface (UEFI) is an industry standard that provides better manageability and more secured configuration than the legacy ROM while interacting with your server at boot time. HPE ProLiant Gen10 servers have a UEFI Class 2 implementation and support both UEFI Mode (default) and Legacy BIOS Mode.

NOTE: The UEFI System Utilities tool is analogous to the HPE ROM-Based Setup Utility (RBSU) of legacy BIOS. For more information, please visit http://www.hpe.com/servers/uefi.

UEFI enables numerous new capabilities specific to HPE ProLiant servers such as:

- Secure Boot and Secure Start enable for enhanced security
- Operating system specific functionality
- Support for > 2.2 TB (using GPT) boot drives
- USB 3.0 Stack
- Embedded UEFI Shell
- Mass Configuration Deployment Tool using iLO RESTful API that is Redfish API Conformant
- PXE boot support for IPv6 networks
- Workload Profiles for simple performance optimization

UEFI Boot Mode only:

- TPM 2.0 Support
- NVMe Boot Support
- Platform Trust Technology (PTT) can be enabled.
- iSCSI Software Initiator Support.
- HTTP/HTTPs Boot support as a PXE alternative.
- Boot support for option cards that only support a UEFI option ROM

NOTE: For UEFI Boot Mode, boot environment and OS image installations should be configured properly to support UEFI. **NOTE:** UEFI FIO Setting (758959-B22) can be selected to configure the system in Legacy mode in the factory for your HPE ProLiant Gen10 Server.

Embedded Management

HPE Integrated Lights-Out (HPE iLO) Monitor your servers for ongoing management, service alerting, reporting and remote

management with HPE iLO. Learn more at http://www.hpe.com/info/ilo.

UEFIConfigure and boot your servers securely with industry standard Unified Extensible Firmware

Interface (UEFI). Learn more at http://www.hpe.com/servers/uefi.

Intelligent Provisioning Hassle free server and OS provisioning for 1 or more servers with Intelligent Provisioning.

Learn more at http://www.hpe.com/servers/intelligentprovisioning.

iLO RESTful API

iLO RESTful API is Redfish API conformance and offers simplified server management automation such as configuration and maintenance tasks based on modern industry standards. Learn more at http://www.hpe.com/info/restfulapi.

Server Utilities

Active Health System

The HPE Active Health System (AHS) is an essential component of the iLO management portfolio that provides continuous, proactive health monitoring of HPE servers. Learn more at http://www.hpe.com/servers/ahs.

Active Health System

Viewer

Use the Active Health System Viewer, a web-based portal, to easily read AHS logs and speed problem resolution with HPE self-repair recommendations, to learn more

visit: http://www.hpe.com/servers/ahsv.

Smart Update

Keep your servers up to date with the HPE Smart Update solution by using Smart Update Manager (SUM) to optimize the firmware and driver updates of the Service Pack for ProLiant (SPP). Learn more at http://www.hpe.com/info/smartupdate.

iLO Amplifier Pack

Designed for large enterprise and service provider environments with hundreds of HPE servers, the iLO Amplifier Pack is a free, downloadable open virtual application (OVA) that delivers the power to discover, inventory and update Gen8, Gen9 and Gen10 HPE servers at unmatched speed and scale. Use with an iLO Advanced License to unlock full capabilities. Learn more at http://www.hpe.com/servers/iLOamplifierpack.

HPE iLO Mobile Application

Enables the ability to access, deploy, and manage your server anytime from anywhere from select smartphones and mobile devices. For additional information please

visit: http://www.hpe.com/info/ilo/mobileapp.

RESTful Interface Tool

RESTful Interface tool (iLOREST) is a single scripting tool to provision using iLO RESTful API to discover and deploy servers at scale. Learn more at http://www.hpe.com/info/resttool.

Scripting Tools

Provision one to many servers using your own scripts to discover and deploy with Scripting Tool (STK) for Windows and Linux or Scripting Tools for Windows PowerShell. Learn more at http://www.hpe.com/servers/stk or http://www.hpe.com/servers/powershell.

HPE OneView Standard

HPE OneView Standard can be used for inventory, health monitoring, alerting, and reporting without additional fees. It can monitor multiple HPE server generations. The user interface is similar to the HPE OneView Advanced version, but the software-defined functionality is not available. Learn more at http://www.hpe.com/info/oneview.

HPE Systems Insight Manager (HPE SIM)

Ideal for environments already using HPE SIM, it allows you to monitor the health of your HPE ProLiant Servers and HPE Integrity Servers. Also provides you with basic support for non-HPE servers. HPE SIM also integrates with Smart Update Manager to provide quick and seamless firmware updates. Learn more at http://www.hpe.com/info/hpesim.

Security

UEFI Secure Boot and Secure Start support

Immutable Silicon Root of Trust

FIPS 140-2 validation (iLO 5 certification in progress)

Common Criteria certification (iLO 5 certification in progress)

Configurable for PCI DSS compliance

Advanced Encryption Standard (AES) and Triple Data Encryption Standard (3DES) on browser

Support for Commercial National Security Algorithms (CNSA)

Tamper-free updates – components digitally signed and verified

Secure Recovery – recover critical firmware to known good state on detection of compromised firmware

Ability to rollback firmware

Secure erase of NAND/User data

TPM (Trusted Platform Module) 1.2 option

TPM (Trusted Platform Module) 2.0 option

Bezel Locking Kit option

Chassis Intrusion detection option

Warranty

This product is covered by a global limited warranty and supported by HPE Services and a worldwide network of HPE Authorized Channel Partners resellers. Hardware diagnostic support and repair is available for three years from date of purchase. Support for software and initial setup is available for 90 days from date of purchase. Enhancements to warranty services are available through HPE Pointnext operational services or customized service agreements. Hard drives have either a one year or three year warranty; refer to the specific hard drive QuickSpecs for details.

NOTE: Server Warranty includes 3-Year Parts, 3-Year Labor, 3-Year Onsite support with next business day response. Warranty repairs may be accomplished through the use of Customer Self Repair (CSR) parts. These parts fall into two categories: 1) Mandatory CSR parts are designed for easy replacement. A travel and labor charge will result when customers decline to replace a Mandatory CSR part; 2) Optional CSR parts are also designed for easy replacement but may involve added complexity. Customers may choose to have Hewlett Packard Enterprise replace Optional CSR parts at no charge. Additional information regarding worldwide limited warranty and technical support is available

at: http://h17007.www1.hpe.com/us/en/enterprise/servers/warranty/.

Optional Features

Server Management

HPE iLO Advanced

HPE iLO Advanced licenses offer smart remote functionality without compromise, for all HPE ProLiant servers. The license includes the full integrated remote console, virtual keyboard, video, and mouse (KVM), multi-user collaboration, console record and replay, and GUI-based and scripted virtual media and virtual folders. You can also activate the enhanced security and power management functionality. Learn more about HPE iLO Advanced

at http://www.hpe.com/servers/iloadvanced.

HPE iLO Advanced
Premium Security Edition

HPE iLO Advanced Premium Security Edition for iLO 5 includes iLO Advanced License plus high-end security modes, unique security capabilities, like Automatic FW recovery; Runtime FW verification, and Secure erase. Learn more about HPE iLO Advanced Premium Security Edition at: http://www.hpe.com/servers/ilopremium.

HPE OneView Advanced

HPE OneView brings a new level of automation to infrastructure management by taking a template driven approach to provisioning, updating, and integrating compute, storage, and networking infrastructure. It provides full-featured licenses which can be purchased for managing Gen8, Gen9 and Gen10 servers. To learn more

visit http://www.hpe.com/info/oneview.

HPE Insight Cluster
Management Utility (CMU)

HPE Insight Cluster Management Utility is a HyperScale management framework that includes software for the centralized provisioning, management and monitoring of nodes and infrastructure. Learn more at http://www.hpe.com/info/cmu.

Accelerator and GPGPU Information

Hewlett Packard Enterprise supports various accelerators on select HPE Proliant servers to support different workloads. The accelerators enable seamless integration of GPU computing with HPE ProLiant servers for high-performance computing, large data center graphics, deep learning and virtual desktop deployments. These accelerators deliver all of the standard benefits of GPU computing while enabling maximum reliability and tight integration with system monitoring and management tools such as HPE Insight Cluster Management Utility.

Rack and Power Infrastructure

The story may end with servers, but it starts with the foundation that makes compute go – and business grow. We've reinvented our entire portfolio of rack and power products to make IT infrastructure more secure, more practical, and more efficient. In other words, we've created a stronger, smarter, and simpler infrastructure to help you get the most out of your IT equipment. As an industry leader, Hewlett Packard Enterprise is uniquely positioned to address the key concerns of power, cooling, cable management and system access.

HPE G2 Advanced and Enterprise Racks are perfect for the server room or today's modern data center with enhanced airflow and thermal management, flexible cable management, and a 10 year Warranty to support higher density computing.

HPE G2 PDUs offer reliable power in flexible form factors that operate at temperatures up to 60°C, include color-coded outlets and load segments and a low-profile design for optimal access to the rack and support for dense rack environments.

HPE Uninterruptible Power Systems are cost-effective power protection for any type workload. Some UPSs include options for remote management and extended runtime modules so you're critical dense data center is covered in power outages.

HPE KVM Solutions include a console and switches designed to work with your server and IT equipment reliably. We've got a cost-effective KVM switch for your first rack and multiple connection IP switches with remote management and security capabilities to keep your data center rack up and running.

Learn more about HPE Racks, KVM, PDUs and UPSs at HPE Rack and Power Infrastructure.

Optional Features

One Config Simple (SCE)

SCE is a guided self-service tool to help sales and non-technical people provide customers with initial configurations in 3 to 5 minutes. You may then send the configuration on for configuration help, or use in your existing ordering processes. If you require "custom" rack configuration or configuration for products not available in SCE, please contact Hewlett Packard Enterprise Customer Business Center or an Authorized Partner for

assistance. https://h22174.www2.hpe.com/SimplifiedConfig/Welcome#

Service and Support

HPE Pointnext - Service and Support

Protect your business beyond warranty with HPE Pointnext Operational Service

HPE Pointnext provides a comprehensive portfolio including Advisory and Transformational, Professional, and Operational Services to help accelerate your digital transformation. From the onset of your transformation journey, Advisory and Transformational Services focus on designing the transformation and creating a solution roadmap. Professional Services specializes in creative configurations with flawless and on-time implementation, and on-budget execution. Finally, operational services provides innovative new approaches like Flexible Capacity and Datacenter Care, to keep your business at peak performance. HPE is ready to bring together all the pieces of the puzzle for you, with an eye on the future, and make the complex simple.

Connect your devices:

Unlock all of the benefits of your technology investment by connecting your products to Hewlett Packard Enterprise. Achieve up to 77%1 reduction in down time, near 100%2 diagnostic accuracy and a single consolidated view of your environment. By connecting, you will receive 24x7monitoring, pre-failure alerts, automatic call logging, and automatic parts dispatch. HPE Proactive Care Service and HPE Datacenter Care Service customers will also benefit from proactive activities to help prevent issues and increase optimization. All of these benefits are already available to you with your server storage and networking products, securely connected to HPE support.

1- IDC 2 - HP CSC reports 2014 - 2015

Learn more about getting connected at http://www.hpe.com/services/getconnected.

Recommended Services

HPE Proactive Care* with 6 hour call-to-repair commitment, three year Support Service

HPE Proactive Care gives customers an enhanced call experience. When your products are connected to HPE, Proactive Care helps prevent problems and maintains IT stability by utilizing personalized proactive reports with recommendations and advice. This Service combines three years' proactive reporting and advice with our highest level of hardware support - HPE's 24x7, six hour hardware call-to-repair. HPE is the only leading manufacturer who makes this level of coverage available as a standard service offering for your most valuable servers. This service also includes collaborative software support for Independent Software Vendors (ISVs), (Red Hat, VMWare, Microsoft, etc.) running on your HPE servers.

https://www.hpe.com/h20195/v2/GetPDF.aspx/4AA3-8855ENW.pdf

HPE Proactive Care* with 24x7 coverage, three year Support Service

HPE Proactive Care gives customers an enhanced call experience. When your products are connected to HPE, Proactive Care helps prevent problems and maintains IT stability by utilizing personalized proactive reports with recommendations and advice This Service combines three years proactive reporting and advice with our 24x7 coverage, four hour hardware response time when there is a problem. This service also includes collaborative software support for Independent Software Vendors (ISVs), (Red Hat, VMWare, Microsoft, etc.) running on your HPE servers.

https://www.hpe.com/h20195/v2/GetPDF.aspx/4AA3-8855ENW.pdf

HPE Proactive Care* - Next Business Day service, three year Support Service

HPE Proactive Care gives customers an enhanced call experience. When your products are connected to HPE, Proactive Care helps prevent problems and maintains IT stability by utilizing personalized proactive reports with recommendations and advice. This service combines three years of Hardware Support where an HPE authorized representative will arrive at the Customer's site during the onsite coverage window to begin hardware maintenance service the next coverage day after the service request has been logged. This service also includes collaborative software support for Independent Software Vendors (ISVs), (Red Hat, VMWare, Microsoft, etc.) running on your HPE servers.

Service and Support

https://www.hpe.com/h20195/v2/GetPDF.aspx/4AA3-8855ENW.pdf

*HPE Proactive Care and HPE Proactive Care Advanced require that the customer connect their devices to make the most of these services and receive all the deliverables.

Parts and Materials

HPE will provide HPE-supported replacement parts and materials necessary to maintain the covered hardware product in operating condition, including parts and materials for available and recommended engineering improvements.

Parts and components that have reached their maximum supported lifetime and/or the maximum usage limitations as set forth in the manufacturer's operating manual, product QuickSpecs, or the technical product data sheet will not be provided, repaired, or replaced as part of these services.

The defective media retention service feature option applies only to Disk or eligible SSD/Flash Drives replaced by HPE due to malfunction.

Other related Services

HPE Server Hardware Installation

Provides for the basic hardware installation of HPE branded servers, storage devices and networking options to assist you in bringing your new hardware into operation in a timely and professional manner.

https://www.hpe.com/h20195/V2/GetPDF.aspx/5981-9356EN.pdf

HPE Installation and Startup Service

Provides for the installation of your HPE hardware according to product specifications including options. The HPE service delivery technician will connect the product to a LAN as appropriate and enable remote support to allow for automatic case creation for hardware failures. Installation and start up services also includes the installation of one supported operating system type (Windows® or Linux).

HPE Datacenter Care service

HPE Datacenter Care helps improve IT stability and security, increase the value of IT, and enable agility and innovation. It is a structured framework of repeatable, tested, and globally available services "building blocks." You can deploy, operate, and evolve your datacenter wherever you are on your IT journey. With HPE Datacenter Care, you benefit from a personalized relationship with HPE via a single point of accountability for HPE and others' products. For more information,

visit http://www.hpe.com/services/datacentercare

HPE GreenLake Flex Capacity

With HPE GreenLake Flex Capacity, you get the speed, scalability, and economics of the public cloud in the privacy of your data center. Gain the advantages of the public cloud—consumption-based payment, rapid scalability without worrying about capacity constraints. Reduce the "heavy lifting" needed to operate a data center. And retain the advantages that IT provides the business (i.e., control, security). Deliver the right user experience, choose the right technology for the business, manage privacy and compliance, and manage the cost of IT. And, you have the option to use the public cloud when needed.

DC for Hyperscale

Datacenter Care for Hyperscale is available for Service Providers and HPC customers who use a scale out approach to computing with a high volume homogenous infrastructure and resilient architecture can take advantage of this environment support tailored to their operating model.

HPE Factory Express for Servers and storage

HPE Factory Express offers configuration, customization, integration and deployment services for HPE servers and storage products. Customers can choose how their factory solutions are built, tested, integrated, shipped and deployed.

Service and Support

Factory Express offers service packages for simple configuration, racking, installation, complex configuration and design services as well as individual factory services, such as image loading, asset tagging, and custom packaging. HPE products supported through Factory Express include a wide array of servers and storage: HPE Integrity, HPE ProLiant, HPE Apollo, HPE ProLiant Server Blades, HPE BladeSystem, HPE 9000 servers as well as the MSAxxxx3PAR suite, XP, rackable tape libraries and configurable network switches.

HPE Service Credits

HPE Service Credits offers flexible services and technical skills to meet your changing IT demands. With a menu of service that is tailored to suit your needs, you get additional resources and specialist skills to help you maintain peak performance of your IT. Offered as annual credits, you can plan your budgets while proactively responding to your dynamic business.

HPE Education Services

Keep your IT staff trained making sure they have the right skills to deliver on your business outcomes. Book on a class today and learn how to get the most from your technology investment.

http://www.hpe.com/ww/learn

HPE Support Center

The HPE Support Center is a personalized online support portal with access to information, tools and experts to support HPE business products. Submit support cases online, chat with HPE experts, access support resources or collaborate with peers.

Learn more http://www.hpe.com/support/hpesc.

HPE's Support Center Mobile App* allows you to resolve issues yourself or quickly connect to an agent for live support. Now, you can get access to personalized IT support anywhere, anytime.

HPE Insight Remote Support and HPE Support Center are available at no additional cost with a HPE warranty, HPE Support Service or HPE contractual support agreement.

*HPE Support Center Mobile App is subject to local availability.

For more information: http://www.hpe.com/services.

NOTE: HPE ProLiant DL385 Gen10 Server is covered under the HPE Service Contract applied to the HPE ProLiant Server. No separate HPE support services need to be purchased.

Warranty and Support Services will extend to include HPE options configured with your server or storage device. The price of support service is not impacted by configuration details. HPE sourced options that are compatible with your product will be covered under your server support at the same level of coverage allowing you to upgrade freely. Installation for HPE options is available as needed. To keep support costs low for everyone, some high value options will require additional support. Additional support is only required on select high value workload accelerators, fibre switches, InfiniBand and UPS batteries over 12KVA. See the specific high value options that require additional support **HERE**.

	Entry Models				
[SKU Number]	878712-xx1	878714-xx1			
Model Name	Entry LFF	Entry SFF			
Processor	7251 (8-Core, 2.1 GHz, 120W)	7251 (8-Core, 2.1 GHz, 120W)			
Number of Processors	One processor	One processor			
Memory	16 GB RDIMM DR 2600 MT/s (1x 16 GB)	16 GB RDIMM DR 2600 MT/s (1x 16 GB)			
Network Controller	HPE 1Gb Ethernet 4-Port 331i Adapter plus optional HPE FlexibleLOM or stand up card	HPE 1Gb Ethernet 4-Port 331i Adapter plus optional HPE FlexibleLOM or stand up card			
Storage Controller	Embedded S100i for 2 x M.2 Connectors E208i-a NOTE: 8-Port modular Smart Array.	Embedded S100i for 2 x M.2 Connectors E208i-a NOTE: 8-Port modular Smart Array.			
Hard Drive	None ship as standard	None ship as standard			
Internal Storage	8 LFF chassis, with 2 SFF bays optional (upgradeable to 15LFF with 4LFF mid and 3LFF rear + 2SFF rear)	8 SFF Chassis (upgradeable to 24 SFF front + 6SFF rear)			
Optical Drive Bay	Optional via Universal Media Bay (included)	Optional Universal Media Bay (882097-B21)			
Optical Drive	None ship as standard	None ship as standard			
PCI-Express Slots	3-slots (x8, x16, x8) as standard	3-slots (x8, x16, x8) as standard			
Power Supply	1x 500W HPE FlexSlot Power Supply	1x 500W HPE FlexSlot Power Supply			
Fans	4-standard fans	4-standard fans			
Management	HPE iLO Standard with Intelligent Provisioning (embedded), HPE OneView Standard (requires download); HPE iLO Advanced, HPE iLO Advanced Premium Security Edition and HPE OneView Advanced (require licenses)				
Energy Star	2.1 ce	ertified			
Form Factor	2U Rack, Easy Install rails without CMA				
Warranty	3-year parts, 3-year labor, 3-year onsite	support with next business day response.			

	Entry Models				
[SKU Number]	878714-AA1	P05887-xx1			
Model Name	Entry SFF	Entry LFF			
Processor	7251 (8-Core, 2.1 GHz, 120W)	7251 (8-Core, 2.1 GHz, 120W)			
Number of Processors	One processor	One processor			
Memory	8 GB RDIMM DR 2600 MT/s (1x 16 GB)	16 GB RDIMM DR 2600 MT/s (1x 16 GB)			
Network Controller	HPE 1Gb Ethernet 4-Port 331i Adapter plus optional HPE FlexibleLOM or stand up card	HPE 1Gb Ethernet 4-Port 331i Adapter plus optional HPE FlexibleLOM or stand up card			
Storage Controller	Embedded S100i for 2 x M.2 Connectors E208i-a NOTE: 8-Port modular Smart Array.	P408i-a NOTE: 8-Port modular Smart Array. NOTE: Smart Storage battery included.			
Hard Drive	None ship as standard None ship as standard				
Internal Storage	8 SFF Chassis (upgradeable to 24 SFF front + 6SFF rear)	8 LFF chassis, with 2 SFF bays optional (upgradeable to 15LFF with 4LFF mid and 3LFF rear + 2SFF rear)			
Optical Drive Bay	Optional Universal Media Bay (882097-B21)	Optional via Universal Media Bay (included)			
Optical Drive	None ship as standard	None ship as standard			
PCI-Express Slots	3-slots (x8, x16, x8) as standard	3-slots (x8, x16, x8) as standard			
Power Supply	1x 500W HPE FlexSlot Power Supply	2x 500W HPE FlexSlot Power Supply			
Fans	4-standard fans	4-standard fans			
Management	HPE iLO Standard with Intelligent Provisioning (embedded), HPE OneView Standard (requires download); HPE iLO Advanced, HPE iLO Advanced Premium Security Edition and HPE OneView Advanced (require licenses)				
Energy Star	2.1 certified				
Form Factor	2U Rack, Easy Install rails without CMA				
Warranty	3-year parts, 3-year labor, 3-year onsite support with next business day response.				

	Base Model				
[SKU Number]	878716-xx1	878718-xx1			
Model Name	Base LFF	Base SFF			
Processor	7251 (8-Core, 2.1 GHz, 85W)	7301 (16-Core, 2.2 GHz, 170W)			
Number of Processors	One processor	One processor			
Memory	32 GB RDIMM DR 2666 MT/s (2x 16 GB)	32 GB RDIMM DR 2600 MT/s (2x 16 GB)			
Network Controller	HPE 1Gb Ethernet 4-Port 331i Adapter plus optional HPE FlexibleLOM or stand up card	HPE 1Gb Ethernet 4-Port 331i Adapter plus optional HPE FlexibleLOM or stand up card			
Storage Controller	P816i-a NOTE: 16-Port modular Smart Array. NOTE: Smart Storage battery included.	P408i-a NOTE: 8-Port modular Smart Array. NOTE: Smart Storage battery included.			
Hard Drive	None ship as standard None ship as standard				
Internal Storage	12 LFF chassis (upgradeable to 19LFF with 4LFF mid and 3LFF rear + 2SFF)	8 SFF Chassis (upgradeable to 24 SFF front + 6SFF rear)			
Optical Drive Bay	Optional via Universal Media Bay (included) Optional Universal Media Bay (882097-				
Optical Drive	None ship as standard	None ship as standard			
PCI-Express Slots	3-slots (x8, x16, x8) as standard	3-slots (x8, x16, x8) as standard			
Power Supply	1x 800W HPE FlexSlot power supply	1x 500W HPE FlexSlot power supply			
Fans	6-High Performance fans	4-standard fans			
Management	HPE iLO Standard with Intelligent Provisioning (embedded), HPE OneView Standard (requires download); HPE iLO Advanced, HPE iLO Advanced Premium Security Edition and HPE OneView Advanced (require licenses)				
Energy Star	2.1 ce	rtified			
Form Factor	2U Rack, Easy ins	tall rails with CMA			
Warranty	3-year parts, 3-year labor, 3-year onsite support with next business day response				

	Base Model	Performance Model	High Performance Model		
[SKU Number]	878720-xx1	878722-xx1	878724-xx1		
Model Name	Base 24 SFF	Performance	High-Performance 24 SFF		
Processor	7401 (24-Core, 2.0GHz, 170W)	7451 (24-Core, 2.3 GHz, 180W)	7451 (24-Core, 2.0 GHz, 180W)		
Number of Processors	One Processor	Two processors	Two processors		
Memory	32 GB RDIMM DR 2600 MT/s (2x 16 GB)	64 GB RDIMM DR 2666 MT/s (2x 32 GB)	64 GB RDIMM DR 2666 MT/s (2x 32 GB)		
Network Controller	HPE 1Gb Ethernet 4-Port 331i Adapter plus optional HPE FlexibleLOM or stand up card	HPE 1Gb Ethernet 4-Port 331i Adapter plus HPE Ethernet 10/25 Gb 2-port 640FLR-SFP28 Adapter (817749-B21)	HPE 1Gb Ethernet 4-Port 331i Adapter plus HPE Ethernet 25 Gb 2-port 631FLR Adapter (817709-B21)		
Storage Controller	P408i-a w/Expander NOTE: 8-Port modular Smart Array. NOTE: Smart Storage battery included.	P408i-a NOTE: 8-Port modular Smart Array. NOTE: Smart Storage battery included.	P408i-a w/Expander NOTE: 8-Port modular Smart Array. NOTE: Smart Storage battery included.		
Hard Drive	None ship as standard	None ship as standard	None ship as standard		
Internal Storage	24 SFF Chassis	8 SFF Chassis (upgradeable to 24 SFF front + 6SFF rear)	24 SFF Chassis		
Optical Drive Bay	Optional Universal Media Bay (882097-B21)	Universal Media Bay (882097- B21)	Universal Media Bay (882097-B21)		
Optical Drive	None ship as standard	DVD-RW	DVD-RW		
PCI-Express Slots	3-slots (x8, x16, x8) as standard	8 total: 3-slots (x8, x16, x8) as standard, plus 3 PCIe (x8, x16, x8), 2 PCIe (x8) Tertiary Riser Kit	8 total: 3-slots (x8, x16, x8) as standard, plus 3 PCle (x8, x16, x8), 2 PCle (x8) Tertiary Riser Kit		
Power Supply	1x 800W HPE FlexSlot power supply	2x 800W HPE FlexSlot power supply	2x 800W HPE FlexSlot power supply		
Fans		6-High Performance fans			
Management	HPE iLO Standard with Intelligent Provisioning (embedded), HPE OneView Standard (requires download); HPE iLO Advanced, HPE iLO Advanced Premium Security Edition and HPE OneView Advanced (require licenses)				
Energy Star		2.1 certified			
Form Factor	2U Rack, Easy Install rails with CMA				
Warranty		3-3-3			

Country Code Key xx1 = B21 Worldwide

NOTE: The -B21 WW SKU is to be ordered in all countries other than Japan.

xx1 = 291 Japan

This section lists some of the steps required to configure a Factory Integrated Model. To ensure only valid configurations are ordered, Hewlett Packard Enterprise recommends the use of an HPE approved configurator. Contact your local sales representative for information on configurable product offerings and requirements.

- 1. Factory Integrated Models must start with a CTO Server.
- 2. FIO indicates that this option is only available as a factory installable option.
- 3. All Factory Integrated Models will be populated with sufficient hard drive blanks based on the number of initial hard drives ordered with the server.
- 4. Some options may not be integrated at the factory. Contact your local sales representative for additional information.

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

CTO Server	HPE ProLiant DL385	HPE ProLiant DL385	HPE ProLiant DL385	HPE ProLiant DL385		
CTO Server	Gen10 8 LFF CTO Server	Gen10 12 LFF CTO	Gen10 8 SFF CTO Server	Gen10 24 SFF CTO		
	Genie o En en o server	Server	CCNEO O SIT CTO SCIVE	Server		
SKU Number	878615-B21	878614-B21	878612-B21	878613-B21		
TAA SKU	878619-B21	878618-B21	878616-B21	878617-B21		
Processor	Not included as standard	Not included as standard	Not included as standard	Not included as standard		
DIMM Slots	32-DIMM slots	32-DIMM slots	32-DIMM slots	32-DIMM slots		
Storage Controller	Embedded s100i SW RAID for 2 x M.2 SATA support, choice of HPE modular Smart Array and PCIe plug-in controller					
PCle		Three stan	dard in primary riser			
Drive Cage - included	8 LFF	12 LFF	8 SFF	24 SFF		
Network Controller	HPE 1Gb Ethernet 4-Port 331i Adapter plus optional HPE FlexibleLOM or stand up card					
Fans	6-Standard	6-High Performance	4-Standard	6-Performance		
Management	HPE iLO with Intelligent Provisioning (standard), iLO Advances and OneView (optional)					
USB	1x 3.0 standard plus iLo front service port	None as standard	1x 3.0 standard plus iLo front service port	1x 3.0 standard plus iLo front service port		

NOTE: HPE offers multiple Trade Agreement Act (TAA) compliant configurations to meet the needs of US Federal Government customers. These products are either manufactured or substantially transformed in a designated country. TAA compliance is only provided when HPE options are included as part of factory integrated orders (CTO).

NOTE: TAA chassis are only orderable in North America and Canada.

NOTE: The HPE ProLiant DL385 Gen10 12 LFF CTO Server ships with the cable required for the P816i-a installation. **NOTE:** The cables that come standard with the 8SFF chassis for BOX3 work for the first 8 drives, and are connected to the E208 or the P408. When the 8SFF drive cage for BOX2 or BOX1 is ordered, the cables come with the drive cage kits. **NOTE:** All CTO servers are Energy Star 2.1 compliant.

CTO Server	8 SFF CTO Chassis	24 SFF CTO Chassis	8 LFF CTO Chassis	12 LFF CTO Chassis
Included Drive Cage	8 SFF SAS/SATA	3x 8 SFF SAS/SATA	8 LFF + UMB	12 LFF Chassis
Additional drive cages	-	-	-	-
Universal Media Bay	1 Optional	Not available	1 Included	Not available
ODD	1 Optional with UMB	Not available	1 Optional	Not available
8 SFF Drive Cage	Up to 2 Optional	Not available	Not available	Not available
8 NVME/SAS Bay	Up to 3 Optional	Not available	Not available	Not available
8 NVME Cage	Up to 3 Optional	Not available	Not available	Not available
2 SFF SAS/SATA (Front)	1 Optional with UMB	Not available	1 Optional	Not available
2 SFF SAS/SATA (Rear)	1 Optional	1 Optional	1 Optional	1 Optional
2 NVMe (Front)	1 Optional with UMB	Not available	1 Optional	Not available
4 LFF Mid-plane	Not available	Not available	1 Optional	1 Optional
3 LFF Rear	Not available	Not available	1 Optional	1 Optional

NOTE: This aplies to CTO configurations, field upgrades may differ depending field configuration.

NOTE: 3x 8 NVMe option on SFF requires the second processor be installed and I/O cards are limited to ALOM options.

Step 2a: Choose Required Options – Processors (only one of the following unless otherwise noted)

Please select one -L21 processor required below.

For second processor, please select the same processor model with –B21 from Core Options – HPE Processors section. For example: first processor, select 874752-L21 then for second processor, select 874752-B21.

NOTE: 8SFF CTO 1P models ship with 4 standard fans. The second processor option kit contains 2 additional fans. 12 LFF and 24 SFF CTO Servers ship with 6 High performance fans included; 8LFF CTO Servers ship with 6 Standard fans included. High performance fan kit is available to meet ambient temperature environments are are required for rear drives or NVMe configurations. NVMe is limited to front install only.

NOTE: Mixing of 2 different processor models are NOT allowed.

NOTE: DDR4 memory speed will depend on the quantity and type of DIMMs installed.

NOTE: Processors with greater than 170W will ship with the High Performance heatsink.

NOTE: Processors with greater than 170W will require the High Performance fan kit.

Processor Option Kits	Required Processor
HPE DL385 Gen10 AMD EPYC 7601 (2.2GHz/32-core/180W) FIO Processor Kit	881162-L21
NOTE: Ships with Performance Heatsink.	
HPE DL385 Gen10 AMD EPYC 7551 (2.0GHz/32-core/180W) FIO Processor Kit	881163-L21
NOTE: Ships with Performance Heatsink.	
HPE DL385 Gen10 AMD EPYC 7501 (2.0GHz/32-core/155-170W) FIO Processor Kit	881164-L21
NOTE: Ships with Standard Heatsink.	
HPE DL385 Gen10 AMD EPYC 7451 (2.3GHz/24-core/180W) FIO Processor Kit	881165-L21
NOTE: Ships with Performance Heatsink.	
HPE DL385 Gen10 AMD EPYC 7401 (2.0GHz/24-core/155-170W) FIO Processor Kit	881166-L21
NOTE: Ships with Standard Heatsink.	
HPE DL385 Gen10 AMD EPYC 7351 (2.4GHz/16-core/155-170W) FIO Processor Kit	881169-L21
NOTE: Ships with Standard Heatsink.	
HPE DL385 Gen10 AMD EPYC 7301 (2.2GHz/16-core/155-170W) FIO Processor Kit	881170-L21
NOTE: Ships with Standard Heatsink.	
HPE DL385 Gen10 AMD EPYC 7251 (2.1GHz/8-core/120W) FIO Processor Kit	881171-L21
NOTE: Ships with Standard Heatsink.	
HPE DL385 Gen10 AMD EPYC 7281 (2.1GHz/16-core/155-170W) FIO Processor Kit	P00645-L21

NOTE: Ships with Standard Heatsink.

Step 2b: Choose Memory Options

Please select one or more memory from below.

For new Gen10 memory population rule whitepaper and optimal memory performance guidelines, please go

to: http://www.hpe.com/docs/amd-population-rules

For Gen10 memory speed table, please go to: http://www.hpe.com/docs/amd-speed-tables

NOTE: Memory DIMM availability with a server platform is dependent upon completion of certification testing.

NOTE: The maximum memory speed is a function of the memory type, memory configuration, and processor model.

HPE 8GB (1x8GB) Single Rank x8 DDR4-2666 CAS-19-19-19 Registered Smart Memory Kit	838079-B21
HPE 16GB (1x16GB) Single Rank x4 DDR4-2666 CAS-19-19 Registered Smart Memory Kit	838081-B21
HPE 16GB (1x16GB) Dual Rank x8 DDR4-2666 CAS-19-19-19 Registered Smart Memory Kit	838089-B21
HPE 32GB (1x32GB) Dual Rank x4 DDR4-2666 CAS-19-19-19 Registered Smart Memory Kit	838083-B21
HPE 64GB (1x64GB) Quad Rank x4 DDR4-2666 CAS-19-19-19 Load Reduced Smart Memory Kit	838085-B21
HPE 128GB (1x128GB) Octal Rank x4 DDR4-2666 CAS-22-19-19 3DS Load Reduced Smart	838087-B21
Memory Kit	

Step 2c: Choose Power Supplies

Select one or two power supplies from below.

NOTE: Mixing of 2 different power supplies is NOT allowed.

HPE 500W Flex Slot Platinum Hot Plug Low Halogen Power Supply Kit	865408-B21
HPE 800W Flex Slot Titanium Hot Plug Low Halogen Power Supply Kit	865438-B21
HPE 800W Flex Slot Universal Hot Plug Low Halogen Power Supply Kit	865428-B21
HPE 800W Flex Slot Platinum Hot Plug Low Halogen Power Supply Kit	865414-B21
HPE 800W Flex Slot -48VDC Hot Plug Low Halogen Power Supply Kit	865434-B21
HPE 1600W Flex Slot Platinum Hot Plug Low Halogen Power Supply Kit	830272-B21

NOTE: Select one or more power supplies. For 800W, 4 power supplies need to be selected.

NOTE: 1600W Power supplies only support high line voltage (200VAC to 240VAC).

NOTE: Prior to making a power supply selection it is highly recommended that the HPE Power

Advisor is run to determine the right size power supply for your server configuration. The HPE

Power Advisor is located at: http://www.hpe.com/info/hppoweradvisor.

NOTE: All power supplies in a server should match. Mixing Power Supplies is not supported.

NOTE: HPE ProLiant servers ship with an IEC-IEC power cord used for rack mounting with Power

Distribution Units (PDUs). Visit **HPE power cords** for a full list of optional power cords.

Step 3: Choose Additional Factory Integratable Options

One of the following from each list may be selected if desired at time of factory integration

HPE Unique Options

NOTE: DL385 has support for 4x NMVE drives when the second CPU is selected. NVME cable 871827-B21 is required and supports 2 drives each.

HPE DL38X Gen10 Slot 1/2 x16/x16 FIO Riser Kit	871674-B21
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NOTE: Slot 1 or 2 in Primary location.

NOTE: Supports Full Height and Full length cards.

NOTE: Bus width x16, x16, Connector Width x16, x16.

HPE DL38X Gen10 x16/x16 GPU Slot2/3 FIO Riser Kit 871676-B21

NOTE: Primary Riser, Connector in slot 2 & 3 for GPU support.

NOTE: Supports Full Height and Full length cards.

NOTE: Bus width x16, x16, Connector Width x16, x16.

HPE 4 NVMe Box 1 Instr Spec FIO	878186-B21
HPE DL38X Gen10 x8/x8/x8 1-port 2 NVMe Slim SAS FIO Riser Kit	871673-B21

NOTE: Supports 3x 8 and 1-port for NVMe.

NOTE: Supports Full Height and halt-length cards.	
NOTE: Bus width x8, x8, x8 Connector Width x8, x8, x8.	
HPE 2 NVMe Instr Spec FIO	878189-B21
NOTE: This is a factory integrated only option.	
NOTE: This will connect 2 SFF cage installed in the front of the chassis to NVMe.	
NOTE: This supports NMVe only, if desired, to maintain SATA drive compatibility the 3 POS cable	
kit must also be selected (882100-B21).	
HPE 6+2 NVMe Instr Spec FIO	878192-B21
NOTE: This is a factory integrated only option.	
NOTE: Indicates the cage will also have an NVMe connection.	
NOTE: When NVME is selected, the SAS/SATA will no longer function unless the controller	
selection supports it, or the 3POS cable is selected for S100i connection.	
HPE 8SFF Front Remove SPEC Perf FIO	873763-B21
NOTE: This is a factory integrated only option.	
NOTE: Will remove the Primary 8SFF cage in Box 3 of the 8SFF and replace with a Box blank.	
HPE Riser Remove SPEC FIO	873766-B21
NOTE: This is a factory integrated only option.	
NOTE: Will remove the Primary shipping PCIe riser.	
HPE Legacy FIO Mode Setting	758959-B22
NOTE: UEFI is the default, this FIO part can be used for CTO to enable Legacy mode.	
HPE Memory Fast Fault Tolerance FIO Kit	875293-B21
NOTE: East Equit Tolerance is a new feature in Gen10 server memory that enables the system to	

Step 4: Choose additional options for Factory Integration from Core and Additional Options sections below

boot with full memory performance while monitoring for DRAM device failures.

NOTE: Some options may not be integrated at the factory. To ensure only valid configurations are ordered, Hewlett Packard Enterprise recommends the use of an HPE approved configurator. Contact your local sales representative for additional information.

HPE Unique Options

HPE DL38X NVMe 8 Solid State Drive Express Bay Enablement Kit

826689-B21

NOTE: This option provides support for up to 8 NVMe drives, and can only be populated in Box 1, Box 2 and Box 3 of the SFF chassis.

NOTE: The HPE DL385 Gen10 High Performance fan kit is required for NVMe support (867810-B21).

NOTE: The HPE DL38X Gen10 4-port 8 NVMe SlimSAS Riser (867807-B21) is required to support this.

NOTE: If BOX 1, 2 and 3 are populated for full 24 drive NVMe support this requires 3 risers (1st 867807-B21, 2nd 873732-B21, & 3rd 867808-B21) and the on board NVMe connections with 2x NVMe cable

(871827-B21).

NOTE: There are limitations on GPU support with the NVMe bay installed.

HPE DL385 Gen10 Universal Media Bay Kit

882097-B21

NOTE: The HPE DL385 Gen10 Universal Media bay provides front Display Port and 2xUSB 2.0; plus support for 2x SFF front drives or 2 NVMe front drives (826687-B21 and NVMe riser required see note below) and ODD support (Not included); and can only be located in Box1 in either an 8 SFF or 8+8 SFF model.

NOTE: This is a SFF model option only.

NOTE: For support of the 2 NVMe drives this will require the addition of the HPE DL38X Gen10 x8/x8/x8 1-port 2 NVMe SlimSAS Riser (867806-B21) for 1P configurations.

NOTE: For 2P configurations the HPE DL38X Gen10 2-port 4 NVMe SlimSAS Riser (867808-B21) is needed or the NVMe cable (871827-B21) with the on board NVMe connections may be used.

HPE DL38X Gen10 Premium 6 SFF SAS/SATA + 2 NVMe or 8 SFF SAS/SATA Bay Kit

826690-B21

NOTE: This kit can be supported in Box 1, 2 or 3 and provides support for up to 8 SFF SAS/SATA or 6 SAS/SATA + 2 NVMe drives per Box.

NOTE: With NVMe drives a specific riser is required for 1P. 2P enables the on board NVMe connection with the NVMe cable 871827-B21 or this can be enabled with NMVe risers.

NOTE: When adding to Box 1 the addition of the High Performance Fan kit (867810-B21) is required.

NOTE: This kit can be supported in Box 1, 2 or 3 and provides support for up to 8 SFF SAS/SATA or 6 SAS/SATA + 2 NVMe drives per Box.

NOTE: With NVMe drives a specific riser is required for 1P only. 2P enables on board NVME connections.

NOTE: When adding to Box 1 the addition of the High Performance Fan kit (867810-B21) is required.

HPE DL385 Gen10 High Performance Heatsink Kit

882098-B21

NOTE: Required for GPU installations.

NOTE: Processor kits above 170W include a High Performance Heatsink.

HPE DL38X Gen10 High Performance Temperature Fan Kit

867810-B21

NOTE: This kit is also required to support GPUs configurations.

NOTE: This is required for NVMe configurations.

NOTE: This kit provides maximum cooling for your Server.

NOTE: This kit is required when Box 1, 2 and 3 are populated.

HPE DL38X Gen10 2SFF HDD SAS/SATA Riser Kit

826688-B21

NOTE: 2 SFF in the rear is only supported with a 24 SFF model or 12 LFF model.

NOTE: In the rear this leaves 1x16 slot accessible.

NOTE: Rear drives require the addition of the High Performance Fan kit (867810-B21).

HPE DL38X Gen10 2SFF Premium HDD Front NVMe or Front/Rear SAS/SATA Kit

826687-B21

NOTE: Supports 2SFF SAS/SATA/NVMe in Universal Media bay (882097-B21).

NOTE: NVMe drives require the addition of the High Performance Fan kit (867810-B21).

NOTE: NVMe drives require the addition of an NVMe capable riser or a 2P configuration and the NVMe cable 871827-B21 for the on board NVMe connections.

NOTE: To maintain SATA compatibility with NVMe connections, the 3 POS cable (882100-B21) must also **NOTE:** Drive cage can be used in the rear of the chassis, but will not support NVMe drives rear. **NOTE:** Supports uFF drives. HPE DL38X Gen10 8LFF Front 2SFF SAS/SATA HDD Kit 867805-B21 NOTE: Adds support for 2 SFF in front of 8 LFF chassis (878615-B21). HPE DL38X Gen10 8LFF Front 2NVMe HDD Bay Kit 873781-B21 NOTE: Supports 2 NVMe in the Universal Media bay (included) on the 8 LFF model. NOTE: For support of the 2 NVMe drives this will require the addition of the HPE DL38X Gen10 x8/x8/x8 1-port 2 NVMe SlimSAS Riser (867806-B21) for 1P configurations. NOTE; For 2P configurations the HPE DL38X Gen10 2-port 4 NVMe SlimSAS Riser (867808-B21) is needed or the NVME cable 871827-B21 with the on board NVMe connections may be used. NOTE: NVMe drives require the addition of the High Performance Fan kit (867810-B21). HPE DL38X Gen10 12Gb SAS Expander Card Kit with Cables 870549-B21 NOTE: SAS expander to enable 24 SFF field upgrade. **NOTE:** Primary population in slot 3 of the primary riser. HPE DL385 Gen10 System Insight Display Kit 882099-B21 NOTE: Systems Insight Display no longer ships as standard but is available as a Factory Integrated or field upgrade option. HPE DL3XX Gen10 Rear Serial Cable and Enablement Kit 873770-B21 **HPE Processors Processor Option Kits** HPE DL385 Gen10 AMD EPYC - 7601 (2.2GHz/32-core/180W) Processor Kit 881162-B21 **NOTE:** Ships with Performance Heatsink. HPE DL385 Gen10 AMD EPYC - 7551 (2.0GHz/32-core/180W) Processor Kit 881163-B21 **NOTE:** Ships with Performance Heatsink. HPE DL385 Gen10 AMD EPYC - 7501 (2GHz/32-core/155-170W) Processor Kit 881164-B21 NOTE: Ships with Standard Heatsink. HPE DL385 Gen10 AMD EPYC - 7451 (2.3GHz/24-core/180W) Processor Kit 881165-B21 **NOTE:** Ships with Performance Heatsink. HPE DL385 Gen10 AMD EPYC - 7401 (2GHz/24-core/155-170W) Processor Kit 881166-B21 **NOTE:** Ships with Standard Heatsink. HPE DL385 Gen10 AMD EPYC - 7351 (2.4GHz/16-core/155-170W) Processor Kit 881169-B21 NOTE: Ships with Standard Heatsink. HPE DL385 Gen10 AMD EPYC - 7301 (2.2GHz/16-core/155-170W) Processor Kit 881170-B21 **NOTE:** Ships with Standard Heatsink. HPE DL385 Gen10 AMD EPYC - 7281 (2.1GHz/16-core/155-170W) Processor Kit P00645-B21 NOTE: Ships with Standard Heatsink. HPE DL385 Gen10 AMD EPYC - 7251 (2.1GHz/8-core/120W) Processor Kit 881171-B21 **NOTE:** Ships with Standard Heatsink. NOTE: DDR4 memory speed will depend on the quantity and type of DIMMs installed. NOTE: The xxxxxx-L21 is the first processor shipped, the xxxxxx-B21 is the 2nd processor and ships with 2 additional fans for factory or field installation. NOTE: Processors above 170W use a High Performance Heatsink and the high performance fan kit (867810-B21). NOTE: Processors with greater than 170W do not include the fans as the selection of processors above 170W requires the High Performance fan kit that comes with 6 fans.

Memory Selection

To streamline the configuration process for HPE ProLiant Gen10 servers and to provide the best product availability, HPE recommends memory from the list located here: http://www.hpe.com/products/recommend. Best product availability is limited to US, Canada, and Latin America at this time.

HPE Memory

HPE 8GB (1x8GB) Single Rank x8 DDR4-2666 CAS-19-19-19 Registered Smart Memory Kit	838079-B21
HPE 16GB (1x16GB) Single Rank x4 DDR4-2666 CAS-19-19-19 Registered Smart Memory Kit	838081-B21
HPE 16GB (1x16GB) Dual Rank x8 DDR4-2666 CAS-19-19 Registered Smart Memory Kit	838089-B21
HPE 32GB (1x32GB) Dual Rank x4 DDR4-2666 CAS-19-19 Registered Smart Memory Kit	838083-B21
HPE 64GB (1x64GB) Quad Rank x4 DDR4-2666 CAS-19-19-19 Load Reduced Smart Memory Kit	838085-B21
HPE 128GB (1x128GB) Octal Rank x4 DDR4-2666 CAS-22-19-19 3DS Load Reduced Smart Memory Kit	838087-B21

NOTE: Memory DIMM availability with a server platform is dependent upon completion of certification

NOTE: The maximum memory speed is a function of the memory type, memory configuration, and processor model.

HPE Optical Drives

HPE 9.5mm SATA DVD-ROM Optical Drive 726536-B21

NOTE: The Universal Media Bay (882097-B21) is required for this option on a SFF model. No support in 12 LFF or 24 SFF models.

NOTE: Not supported anytime the 3 POS cable (882100-B21) is selected.

HPE 9.5mm SATA DVD-RW Optical Drive

NOTE: The Universal Media Bay (882097-B21) is required for this option on a SFF model. No support in 12 LFF or 24 SFF models.

NOTE: Not supported anytime the 3 POS cable (882100-B21) is selected.

HPE Mobile USB DVD-RW Optical Drive 701498-B21

NOTE: This is only supported on USB 3.0 ports.

HPE Drives

Enterprise - 12G SAS - SFF Drives

HP	E 300GB SAS 12G Enterprise 15K SFF (2.5in) SC 3yr Wty Digitally Signed Firmware HDD	870753-B21
HP	300GB SAS 12G Enterprise 10K SFF (2.5in) SC 3yr Wty Digitally Signed Firmware HDD	872475-B21
HP	E 600GB SAS 12G Enterprise 15K SFF (2.5in) SC 3yr Wty Digitally Signed Firmware HDD	870757-B21
HP	E 600GB SAS 12G Enterprise 10K SFF (2.5in) SC 3yr Wty Digitally Signed Firmware HDD	872477-B21
HP	900GB SAS 12G Enterprise 15K SFF (2.5in) SC 3yr Wty Digitally Signed Firmware HDD	870759-B21
HP	E 900GB SAS 12G Enterprise 15K SFF (2.5in) SC 3yr Wty 512e Digitally Signed Firmware HDD	870765-B21
HP	E 1.2TB SAS 12G Enterprise 10K SFF (2.5in) SC 3yr Wty Digitally Signed Firmware HDD	872479-B21
HP	E 1.8TB SAS 12G Enterprise 10K SFF (2.5in) SC 3yr Wty 512e Digitally Signed Firmware HDD	872481-B21
HP	E 2.4TB SAS 12G Enterprise 10K SFF (2.5in) SC 3yr Wty 512e Digitally Signed Firmware HDD	881457-B21
	400040 0000	

Midline - 12G SAS - SFF Drives

HPE 1TB SAS 12G Midline 7.2K SFF (2.5in) SC 1yr Wty Digitally Signed Firmware HDD	832514-B21
HPE 1TB SAS 12G Midline 7.2K SFF (2.5in) SC 1yr Wty 512e Digitally Signed Firmware HDD	765464-B21
HPE 2TB SAS 12G Midline 7.2K SFF (2.5in) SC 1yr Wty 512e HDD	765466-B21

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idline - 12G SAS - LFF Drives			
HPE 1TB SAS 12G Midline 7.2K LFF (3.5in) SC 1yr Wty Digitally Signed Firmware HDD	846524-B21		
HPE 2TB SAS 12G Midline 7.2K LFF (3.5in) SC 1yr Wty Digitally Signed Firmware HDD	872485-B21		
HPE 4TB SAS 12G Midline 7.2K LFF (3.5in) SC 1yr Wty Digitally Signed Firmware HDD	872487-B21		
HPE 6TB SAS 12G Midline 7.2K LFF (3.5in) SC 1yr Wty Digitally Signed Firmware HDD	846514-B21		
HPE 6TB SAS 12G Midline 7.2K LFF (3.5in) SC 1yr Wty 512e HDD	861754-B21		
HPE 8TB SAS 12G Midline 7.2K LFF (3.5in) SC 1yr Wty Helium 512e Digitally Signed Firmware HDD	861590-B21		
HPE 8TB SAS 12G Midline 7.2K LFF (3.5in) SC 1yr Wty 512e Digitally Signed Firmware HDD	819201-B21		

726537-B21

Mixed Use - 6G SATA - SFF - Solid State Drives

HPE 240GB SATA 6G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD

HPE 480GB SATA 6G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD

HPE 960GB SATA 6G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD

HPE 1.92TB SATA 6G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD

Core Options	
HPE 10TB SAS 12G Midline 7.2K LFF (3.5in) SC 1yr Wty Helium 512e Digitally Signed Firmware HDD	857644-B21
HPE 12TB SAS 12G Midline 7.2K LFF (3.5in) SC 1yr Wty Helium 512e Digitally Signed Firmware HDD	881779-B21
Midline - 6G SATA - SFF Drives	
HPE 1TB SATA 6G Midline 7.2K SFF (2.5in) SC 1yr Wty Digitally Signed Firmware HDD	655710-B21
HPE 2TB SATA 6G Midline 7.2K SFF (2.5in) SC 1yr Wty 512e Digitally Signed Firmware HDD	765455-B21
Midline - 6G SATA - LFF Drives	
HPE 1TB SATA 6G Midline 7.2K LFF (3.5in) SC 1yr Wty HDD	861691-B21
HPE 2TB SATA 6G Midline 7.2K LFF (3.5in) SC 1yr Wty Digitally Signed Firmware HDD	872489-B21
HPE 4TB SATA 6G Midline 7.2K LFF (3.5in) SC 1yr Wty Digitally Signed Firmware HDD	872491-B21
HPE 6TB SATA 6G Midline 7.2K LFF (3.5in) SC 1yr Wty 512e HDD	861750-B21
HPE 8TB SATA 6G Midline 7.2K LFF (3.5in) SC 1yr Wty 512e Digitally Signed Firmware HDD	819203-B21
HPE 8TB SATA 6G Midline 7.2K LFF (3.5in) SC 1yr Wty Helium 512e Digitally Signed Firmware HDD	861594-B21
HPE 10TB SATA 6G Midline 7.2K LFF (3.5in) SC 1yr Wty Helium 512e Digitally Signed Firmware HDD	857648-B21
HPE 12TB SATA 6G Midline 7.2K LFF (3.5in) SC 1yr Wty Helium 512e Digitally Signed Firmware HDD	881785-B21
SSD Selection	
To streamline the configuration process for HPE ProLiant Gen10 servers and to provide the best product av	ailability,
HPE recommends SSDs from the list located here: http://www.hpe.com/products/recommend .	
Read Intensive - 12G SAS - SFF - Solid State Drives	
HPE 480GB SAS 12G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	875311-B21
HPE 960GB SAS 12G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	872390-B21
HPE 960GB SAS 12G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	875313-B21
HPE 1.92TB SAS 12G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	872392-B21
HPE 1.92TB SAS 12G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	875326-B21
HPE 3.84TB SAS 12G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	872394-B21
HPE 3.84TB SAS 12G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	875330-B21
HPE 7.68TB SAS 12G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	870144-B21
HPE 15.3TB SAS 12G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	870148-B21
Mixed Use - 12G SAS - SFF - Solid State Drives	
HPE 400GB SAS 12G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	872374-B21
HPE 400GB SAS 12G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	873359-B21
HPE 800GB SAS 12G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	872376-B21
HPE 800GB SAS 12G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	873363-B21
HPE 1.6TB SAS 12G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	872382-B21
HPE 1.6TB SAS 12G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	873365-B21
HPE 3.2TB SAS 12G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	872386-B21
HPE 3.2TB SAS 12G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	873367-B21
HPE 3.84TB SATA 6G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	P00896-B21
Write Intensive - 12G SAS - SFF - Solid State Drives	
HPE 400GB SAS 12G Write Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	873351-B21
HPE 800GB SAS 12G Write Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	873355-B21
HPE 1.6TB SAS 12G Write Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	873357-B21
Mixed Use - 12G SAS - LFF - Solid State Drives	0
HPE 800GB SAS 12G Mixed Use LFF (3.5in) SCC 3yr Wty Digitally Signed Firmware SSD	872378-B21
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875483-B21

875470-B21

875474-B21

875478-B21

Mixed Use - 6G SATA - LFF - Solid State Drives	
HPE 480GB SATA 6G Mixed Use LFF (3.5in) SCC 3yr Wty Digitally Signed Firmware SSD	875472-B21
HPE 960GB SATA 6G Mixed Use LFF (3.5in) SCC 3yr Wty Digitally Signed Firmware SSD	P03691-B21
HPE 960GB SATA 6G Mixed Use LFF (3.5in) SCC 3yr Wty Digitally Signed Firmware SSD	875476-B21
HPE 1.92TB SATA 6G Mixed Use LFF (3.5in) SCC 3yr Wty Digitally Signed Firmware SSD	875480-B21
Read Intensive - 6G SATA - SFF - Solid State Drives	073400 BZI
HPE 240GB SATA 6G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	877740-B21
HPE 480GB SATA 6G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	875509-B21
HPE 480GB SATA 6G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	877746-B21
HPE 960GB SATA 6G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	875511-B21
HPE 960GB SATA 6G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	877752-B21
HPE 1.92TB SATA 6G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	875513-B21
HPE 1.92TB SATA 6G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	877758-B21
HPE 3.84TB SATA 6G Read Intensive SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	877764-B21
Mixed Use - 6G SATA - SFF - Solid State Drives	077701 BZI
HPE 240GB SATA 6G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	880295-B21
HPE 480GB SATA 6G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	877776-B21
HPE 960GB SATA 6G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	877782-B21
HPE 1.92TB SATA 6G Mixed Use SFF (2.5in) SC 3yr Wty Digitally Signed Firmware SSD	877788-B21
Mixed Use - 6G SATA - LFF - Solid State Drives	077700 BZ1
HPE 960GB SATA 6G Mixed Use LFF (3.5in) SCC 3yr Wty Digitally Signed Firmware SSD	877784-B21
HPE 1.92TB SATA 6G Mixed Use LFF (3.5in) SCC 3yr Wty Digitally Signed Firmware SSD	877790-B21
Read Intensive – 6G SATA uFF - Solid State Drives	077770 BZ1
HPE Dual 150GB SATA Read Intensive M.2 - UFF to SFF SCM 3yr Wty Digitally Signed Firmware SSD	880875-B21
HPE Dual 480GB SATA Read Intensive M.2 - UFF to SFF SCM 3yr Wty Digitally Signed Firmware SSD	880877-B21
Read Intensive - NVMe - SFF - Solid State Drives	000077 521
HPE 480GB NVMe x4 Lanes Read Intensive SFF (2.5in) SCN 3yr Wty Digitally Signed Firmware SSD	875587-B21
HPE 960GB NVMe x4 Lanes Read Intensive SFF (2.5in) SCN 3yr Wty Digitally Signed Firmware SSD	875589-B21
HPE 1.92TB NVMe x4 Lanes Read Intensive SFF (2.5in) SCN 3yr Wty Digitally Signed Firmware SSD	875591-B21
Mixed Use - NVMe - SFF - Solid State Drives	0,00,1222
HPE 400GB NVMe x4 Lanes Mixed Use SFF (2.5in) SCN 3yr Wty Digitally Signed Firmware SSD	875593-B21
HPE 800GB NVMe x4 Lanes Mixed Use SFF (2.5in) SCN 3yr Wty Digitally Signed Firmware SSD	875595-B21
HPE 1.6TB NVMe x4 Lanes Mixed Use SFF (2.5in) SCN 3yr Wty Digitally Signed Firmware SSD	875597-B21
HPE 3.2TB NVMe x4 Lanes Mixed Use SFF (2.5in) SCN 3yr Wty Digitally Signed Firmware SSD	877998-B21
Hard Drive Blank Kits	
HPE Universal SATA HHHL 3yr Wty M.2 Kit	878783-B21
NOTE: This is a M.2 enablement standup card.	
HPE Large Form Factor Hard Drive Blank Kit	666986-B21
HPE Small Form Factor Hard Drive Blank Kit	666987-B21
Hard Drive Kits	
HPE DL38X Gen10 3LFF Rear SAS/SATA Drive Kit	826685-B21
NOTE: This is supported in the LFF model only.	
NOTE: 3 LFF rear drives will consume the 2nd riser expansion slot.	
HPE DL385 Gen10 4 Large Form Factor Mid-Plane Hard Drive Carrier	882096-B21
NOTE: Supported with both the 8 and 12 LFF model.	
NOTE: With this mid-tray only single-wide (8.5-inch cards with connections or less) cards are supported.	
NOTE: This drive does support hot-swap drives.	
NOTE: This requires High Performance Fans (867810-B21).	
HPE DL38X Gen10 2SFF Premium HDD Front NVMe or Front/Rear SAS/SATA Kit	826687-B21
NOTE: Supports 2SFF SAS/SATA/NVMe in Universal Media bay (882097-B21).	
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NOTE: NVMe drives require the addition of the High Performance Fan kit (867810-B21).

NOTE: NVMe drives require the addition of an NVMe capable riser, or a 2P configuration and the NVMe cable 871827-B21 for the on boards NVMe connection.

NOTE: To maintain SATA compatibility with NVMe connections, the 3 POS cable (882100-B21) must be used as well.

HPE DL38X Gen10 2SFF HDD SAS/SATA Riser Kit

826688-B21

NOTE: Supports 2 SFF rear in Riser1 or 2 location – max 2 supported SFF model.

NOTE: Supports 2 SFF rear in Riser1 or 2 location in LFF model. Note is 3 LFF rear option is selected maximum of one in riser 1 location.

NOTE: Supports uFF drives.

HPE DL38X NVMe 8 Solid State Drive Express Bay Enablement Kit

826689-B21

NOTE: This option provides support for up to 8NVMe drives, and can be populated in all Boxes in the 8 SFF model

NOTE: A maximum of 24 NVMe drives only are supported.

NOTE: This will require the HPE DL38X Gen10 4-port 8 NVMe SlimSAS Riser (867807-B21).

NOTE: A maximum of 24 NVMe drives are supported.

NOTE: For full 24 drive NVMe support this requires 3 risers; 1st (867807-B21), 2nd (873732-B21) & 3rd (867808-B21) and the on board NVMe connections with 2x NVMe cable (871827-B21).

NOTE: Supporting 24 NMVe limits I/O support to the ALOM slot.

HPE DL38X Gen10 Premium 6 SFF SAS/SATA + 2 NVMe or 8 SFF SAS/SATA Bay Kit

826690-B21

NOTE: This option provides supports for up to 8 SAS/SATA SFF drives or a combination of 6 SATA/SATA and 2 NVMe drives in the same cage, and can be populated in all Boxes in the SFF model.

NOTE: For support of the 2 NVMe drives this will require the addition of the HPE DL38X Gen10 x8/x8/x8 1-port 2 NVMe SlimSAS Riser (867806-B21) for 1P configurations.

NOTE; For 2P configurations the HPE DL38X Gen10 2-port 4 NVMe SlimSAS Riser (867808-B21) or the NVME cable (871827-B21) with the on board NVMe connections me be used. **NOTE**: NVMe drives require the addition of the High Performance Fan kit (867810-B21).

HPE DL38X Gen10 SFF Box1/2 Cage/Backplane Kit

826691-B21

NOTE: Supports 8 SAS/SAFA SFF drives in Box 1 or 2 to a max of 24 SFF SAS/SATA front.

HPE DL38X Gen10 8LFF Front 2SFF SAS/SATA HDD Kit

867805-B21

NOTE: For 2 SFF SAS/SATA in UMB on 8 LFF model only.

HPE DL38X Gen10 8LFF Front 2NVMe HDD Bay Kit

873781-B21

NOTE: Supports 2 NVMe in the Universal Media bay (included) on the 8 LFF model.

NOTE: For support of the 2 NVMe drives this will require the addition of the HPE DL38X Gen10 x8/x8/x8 1-port 2 NVMe SlimSAS Riser (867806-B21) for 1P configurations.

NOTE: For 2P configurations the HPE DL38X Gen10 2-port 4 NVMe SlimSAS Riser (867808-B21) is needed or the NVMe cable (871827-B21) with the on board NVMe connections may be used. **NOTE:** NVMe drives require the addition of the High Performance Fan kit (867810-B21).

Media Bay Kits

HPE DL385 Gen10 Universal Media Bay Kit

882097-B21

NOTE: The HPE DL385 Gen10 Universal Media bay provides front Display Port and 2xUSB 2.0; plus support for 2x SFF front drives or 2 NVME front drives (826687-B21 and NVMe riser required see notes below) and ODD support (Not included); and can only be located in Box1 in either an 8 SFF or 8+8 SFF model.

NOTE: This is a SFF model option only.

NOTE: For support of the 2 NVMe drives this will require the addition of the HPE DL38X Gen10 x8/x8/x8 1-port 2 NVMe SlimSAS Riser (867806-B21) for 1P configurations.

NOTE: For 2P configurations the HPE DL38X Gen10 2-port 4 NVMe SlimSAS Riser (867808-B21) is needed or the NVMe cable (871827-B21) with the on board NVMe connections may be used.

HPE DL Gen10 x8/x16/x8 Riser Kit

NOTE: No M.2 support on this riser.

Core Options	
HPE Networking	
1 Gigabit Ethernet adapters	
HPE Ethernet 1Gb 4-port 331T Adapter	647594-B21
HPE Ethernet 1Gb 2-port 332T Adapter	615732-B21
HPE Ethernet 1Gb 2-port 361T Adapter	652497-B21
HPE Ethernet 1Gb 4-port 366T Adapter	811546-B21
10 Gigabit Ethernet adapters	
HPE Ethernet 10Gb 2-port 521T Adapter	867707-B21
HPE Ethernet 10Gb 2-port 535T Adapter	813661-B21
HPE Ethernet 10Gb 2-port 562SFP+ Adapter	727055-B21
25 Gigabit Ethernet adapters	
HPE Ethernet 10/25Gb 2-port 631SFP28 Adapter	817718-B21
HPE Ethernet 10/25Gb 2-port 640SFP28 Adapter	817753-B21
HPE Ethernet 10/25Gb 2-port 621SFP28 Adapter	867328-B21
NOTE: The DL385 Gen10 ships with 4x 1 Gb Embedded.	
NOTE: A minimum of two Gigabytes (2 GB) of server memory is required per each adapter.	
NOTE: Direct Attach Cable (DAC) for copper environments or fiber transceivers and cables for fiber-optic	
environments must be purchased separately. Please see the related NIC QuickSpecs for Technical	
Specifications and additional information:	
http://www.hpe.com/us/en/product-catalog/servers/server-adapters.hits-12.html	
FlexibleLOM adapters	
HPE Ethernet 1Gb 4-port 331FLR Adapter	629135-B22
HPE Ethernet 1Gb 4-port 366FLR Adapter	665240-B21
HPE Ethernet 10Gb 2-port 535FLR-T Adapter	817721-B21
HPE FlexFabric 10Gb 4-port 536FLR-T Adapter	764302-B21
HPE Ethernet 10Gb 2-port 562FLR-SFP+ Adapter	727054-B21
HPE Ethernet 10/25Gb 2-port 631FLR-SFP28 Adapter	817709-B21
HPE Ethernet 10/25Gb 2-port 640FLR-SFP28 Adapter	817749-B21
HPE Ethernet 10/25Gb 2-port 622FLR-SFP28 Converged Network Adapter	867334-B21
NOTE: The DL385 Gen10 chassis ships with 4x 1 Gb embedded.	
NOTE: Only one FlexibleLOM can be added to the server. These options are upgradeable and can be	
changed from the original configuration after the server is shipped. NOTE: Direct Attach Cable (DAC) for copper environments or fiber transceivers and cables for fiber-optic	
environments must be purchased separately. Please see the related NIC QuickSpecs for Technical	
Specifications and additional information:	
http://www.hpe.com/us/en/product-catalog/servers/server-adapters.hits-12.html	
HPE InfiniBand	
HPE InfiniBand EDR/Ethernet 100Gb 1-port 840QSFP28 Adapter	825110-B21
HPE InfiniBand EDR/Ethernet 100Gb 2-port 840QSFP28 Adapter	825111-B21
HPE InfiniBand EDR 100Gb 1-port 841QSFP28 Adapter	872725-B21
HPE 100Gb 1-port OP101 QSFP28 x16 PCle Gen3 with Intel® Omni-Path Architecture Adapter	829335-B21
HPE I/O Expansion Options	
NOTE: The Primary Riser shipping default in the chassis is a x8 FH, FL, x16 FH, FL and x8 FH, HL.	
NOTE: For a Secondary/Tertiary riser the second processor is required.	
HPE DL38X Gen10 x16/x16 Riser Kit	826694-B21
NOTE: Slot 1 or 2 in Primary or Secondary location.	
NOTE: Supports Full Height and Full length cards.	
NOTE: Bus width x16, x16, Connector Width x16, x16.	

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870548-B21

	NOTE: Supports Full Height, Half- length cards; Full Height, Full-length cards and Full Height, Half- length	
	cards.	
	NOTE: Bus width x8, x16, x8, Connector Width x8, x16, x8.	
	HPE ProLiant Special Riser Cards	867807-B21
	NOTE: Riser supporting up to 8 NVMe drives in Primary location.	
	NOTE: This can be connected to an 8SFF NVMe drive cage in box 3.	
	NOTE: To achieve max 24 NVMe support, connect 8 NVMe drives to both the primary and secondary risers,	
	4 NVMe drives to the tertiary riser, and 4 NVMe drives the the on board connectors.	
	HPE DL Gen10 x16/x16 GPU Riser Kit	826704-B21
	NOTE: Primary or Secondary Riser, Connector in slot 2 & 3 for GPU support.	
	NOTE: Supports Full Height and Full length cards.	
	NOTE: Bus width x16, x16, Connector Width x16, x16.	
	HPE DL38X Gen10 2SFF HDD SAS/SATA Riser Kit	826688-B21
	NOTE: Premium bay supporting SFF SAS/SATA .	
	NOTE: Available in Primary or Secondary Riser location.	
	NOTE: Will leave 1 x16 Connector available in bottom slot.	0/700/ D04
	HPE DL38X Gen10 x8/x8/x8 1-port 2 NVMe SlimSAS Riser	867806-B21
	NOTE: Supports NVMe drives in Primary or Secondary location.	
	NOTE: Supports Full Height and half-length cards. NOTE: Bus width x8, x8, x8 Connector Width x8, x8, x8.	
	HPE DL38X Gen10 2-port 4 NVMe SlimSAS Riser	867808-B21
	NOTE: Supports up to 4 NVMe drives in Tertiary location.	007000-BZI
		873732-B21
	HPE DL38X Gen10 4-port 8 NVMe Secondary Slim SAS Riser	0/3/3Z-DZI
	NOTE: Riser supporting up to 8 NVMe drives in Secondary location.	075700 021
	HPE DL38X Gen10 2 x8 PCle Tertiary Riser Kit	875780-B21
	NOTE: Supports 2x 8 slots in the Tertiary location.	826700-B21
	HPE DL38X Gen10 x16 Tertiary Riser Kit	820700-821
	NOTE: Supports 1x 16 slot in the Tertiary location. NOTE: Supports Full Height and full-length card.	
	NOTE: Bus width x16 Connector Width x16.	
_	PE Power Supplies	
Г		865408-B21
	HPE 500W Flex Slot Platinum Hot Plug Low Halogen Power Supply Kit NOTE: Flex Slot Platinum power supplies support power efficiency of up to 94% and include a standard	0034U0-DZI
	C-14 power inlet connector.	
	HPE 800W Flex Slot Titanium Hot Plug Low Halogen Power Supply Kit	865438-B21
	NOTE: Flex Slot Titanium power supplies support power efficiency of up to 96% and include a standard	003430 BZI
	C-14 power inlet connector.	
	HPE 800W Flex Slot Universal Hot Plug Low Halogen Power Supply Kit	865428-B21
	NOTE: Flex Slot universal power supplies support power efficiency of up to 94% and support both	003 120 021
	277VAC/380VDC power inputs.	
	HPE 800W Flex Slot Platinum Hot Plug Low Halogen Power Supply Kit	865414-B21
	NOTE: Flex Slot Platinum power supplies support power efficiency of up to 94% and include a standard	000 11 1 021
	C-14 power inlet connector.	
	HPE 800W Flex Slot -48VDC Hot Plug Low Halogen Power Supply Kit	865434-B21
	NOTE: Flex Slot -48VDC power supplies support power efficiency of up to 94%.	
	HPE 1600W Flex Slot Platinum Hot Plug Low Halogen Power Supply Kit	830272-B21
	NOTE: Flex Slot Platinum Plus power supplies support power efficiency of up to 94% and include a C-14	0002,2021
	power inlet connector that can support HPE Power Discovery Services (blue connector).	
	NOTE: Prior to making a power supply selection it is highly recommended that the HPE Power Advisor is	
	run to determine the right size power supply for your server configuration. The HPE Power Advisor is	
	located at: http://www.hpe.com/info/hppoweradvisor.	
		Dana 33

NOTE: All power supplies in a server should match. Mixing Power Supplies is not supported.

NOTE: Option kits contain the specified power supply and a PDU IEC cable.

NOTE: 1600W power supplies only support high line voltage.

NOTE: HPE ProLiant servers ship with an IEC-IEC power cord used for rack mounting with Power

Distribution Units (PDUs). Visit **HPE power cords** for a full list of optional HPE power cords.

HPE Cooling Options

HPE DL38X Gen10 High Performance Temperature Fan Kit

867810-B21

NOTE: This kit is required for specific **Ambient temperature environments**, coming in 2H2017.

NOTE: High Performance fan kit consists of 6 fans, these will need to replace all the standard fans in the unit, and fill all 6 fan cages.

NOTE: The 12 LFF and 24 SFF models (including field upgrades to 24 SFF) will already include 6 High Performance fan kits.

NOTE: The High Performance fan kit is needed to support certain Passive GPGPU (Graphics cards) configurations; or ASHRAE operating environments.

NOTE: For elevated ambient temperature support please see: http://www.hpe.com/servers/ashrae

NOTE: Some options may not be integrated at the factory. To ensure only valid configurations are ordered, Hewlett Packard Enterprise recommends the use of an HPE approved configurator. Contact your local sales representative for additional information.

HPE iLO Advanced

HPE iLO Advanced Electronic License with 1yr Support on iLO Licensed Features	E6U59ABE
HPE iLO Advanced 1-server License with 1yr Support on iLO Licensed Features	512485-B21
HPE iLO Advanced Flexible Quantity License with 1yr Support on iLO Licensed Features	512486-B21
HPE iLO Advanced AKA Tracking License with 1yr Support on iLO Licensed Features	512487-B21
HPE iLO Advanced Electronic License with 3yr Support on iLO Licensed Features	E6U64ABE
HPE iLO Advanced 1-server License with 3yr Support on iLO Licensed Features	BD505A
HPE iLO Advanced Flexible Quantity License with 3yr Support on iLO Licensed Features	BD506A
HPE iLO Advanced AKA Tracking License with 3yr Support on iLO Licensed Features	BD507A

HPE iLO Advanced Security

PE ILO Advanced Security	
HPE iLO Advanced Premium Security Upgrade Electronic License with 3yr Support on Licensed Features	Q7E12AAE
HPE iLO Advanced Premium Security Edition License with 1yr Support on Licensed Features	Q7E31A
HPE iLO Advanced Premium Security Flex Qty License with 1yr Support on Licensed Features	Q7E32A
HPE iLO Advanced Premium Security Edition Electronic License with 1yr Support on Licensed Features	Q7E32AAE
HPE iLO Advanced Premium Security AKA Tracking License with 1yr Support on Licensed Features	Q7E35A
HPE iLO Advanced Premium Security Upgrade Electronic License with 3yr Support on Licensed Features	Q7E12AAE
HPE iLO Advanced Premium Security Edition License with 3yr Support on Licensed Features	Q7E33A
HPE iLO Advanced Premium Security Flex Qty License with 3yr Support on Licensed Features	Q7E34A
HPE iLO Advanced Premium Security Edition Electronic License with 3yr Support on Licensed Features	Q7E34AAE
HPE iLO Advanced Premium Security AKA Tracking License with 3yr Support on Licensed Features	Q7E36A

HPE Converged Infrastructure Management Software

HPE OneView Physical Media Kit LTU	E5Y37A
HPE OneView Standard 1yr 9x5 Support Flexible Quantity E-RTU	K6F98AAE
HPE OneView including 3yr 24x7 Support Physical 1-server LTU	E5Y34A
HPE OneView including 3yr 24x7 Support Track 1-server LTU	E5Y36A
HPE OneView including 3yr 24x7 Support Flexible Quantity E-LTU	E5Y35AAE
HPE OneView Upgrade from Insight Management 3yr 24x7 Support 1-server LTU	F6Q91A
HPE OneView w/o iLO including 3yr 24x7 Support 1-server LTU	P8B24A
HPE OneView w/o iLO including 3yr 24x7 Support Track 1-server LTU	P8B25A
HPE OneView w/o iLO Advance including 3yr 24x7 Support Track 1-server LTU	E5Y40A
HPE OneView for ProLiant DL Server including 3yr 24x7 Support Bundle Track 1-server LTU	E5Y44A
HPE OneView Upgrade from Insight Management including 3yr 24x7 Support Flexible Quantity E-LTU	E5Y45AAE
HPE OneView w/o iLO including 3yr 24x7 Support Flexible Quantity E-LTU	P8B26AAE

NOTE: Licenses ship without media. The HPE OneView Media Kit can be ordered separately, or can be downloaded.

HPE PCIe Workload Accelerator Options

HPE 4TB PCIe x4 Lanes Read Intensive HHHL 3yr Wty I	Digitally Signed Firmware Card	877831-B21
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HPE SMB Solution Software USB Media Kit

HPE SMB Software Installer Gen1 USB Media Kit

Q9W01A

HPE Security

HPE Gen10 2U Bezel Kit 867809-B21 HPE Bezel Lock Kit 875519-B21

HPE Gen10 Chassis Intrusion Detection Kit

867824-B21

NOTE: This provides a physical connection from the chassis board and hood and detects any physical intrusion into the chassis, providing security during the entire supply chain process of shipping, receiving, distribution, and operation.

HPE Trusted Platform Module 2.0 Gen10 Option

864279-B21

NOTE: HPE Trusted Platform Module 2.0 option works with Gen10 servers with UEFI Mode not Legacy

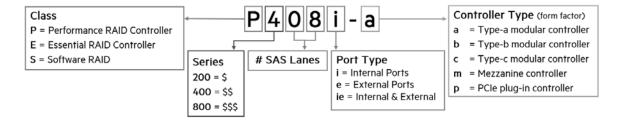
Mode. It is not compatible with HPE ProLiant Gen8 servers or earlier generation variants.

NOTE: HPE server systems can have a TPM module (of any type) installed only once. It cannot be replaced with any other TPM module.

NOTE: There is a FIO setting to allow this TPM module to operate in a TPM 1.2 mode (872108-B21).

HPE Smart Array Controllers

The Gen10 controller naming framework has been updated to simplify identification as depicted below. For a more detailed breakout of the available Gen10 Smart Array controllers visit the HPE Smart Array Gen10 Controllers Data Sheet.



Performance RAID Controllers

NOTE: All performance RAID controllers are supported by the HPE Smart Storage Battery (P01366-B21), which supports multiple devices and is sold separately.

HPE Smart Array P816i-a SR Gen10 (16 Internal Lanes/4GB Cache/SmartCache) 12G SAS Modular Controller

804338-B21

NOTE: Does not occupy a PCIe expansion slot and includes SmartCache license.

NOTE: The P816i-a cable ships in the 12LFF chassis only.

HPE Smart Array P408i-a SR Gen10 (8 Internal Lanes/2GB Cache) 12G SAS Modular Controller

804331-B21

NOTE: Does not occupy a PCIe expansion slot.

HPE Smart Array P408i-p SR Gen10 (8 Internal Lanes/2GB Cache) 12G SAS PCIe Plug-in Controller 830824-B21 HPE Smart Array P408e-p SR Gen10 (8 External Lanes/4GB Cache) 12G SAS PCIe Plug-in Controller

804405-B21

Essential RAID Controllers

HPE Smart Array E208i-a SR Gen10 (8 Internal Lanes/No Cache) 12G SAS Modular Controller

804326-B21

NOTE: Does not occupy a PCle expansion slot.

HPE Smart Array E208i-p SR Gen10 (8 Internal Lanes/No Cache) 12G SAS PCIe Plug-in Controller 804394-B21 HPE Smart Array E208e-p SR Gen10 (8 External Lanes/No Cache) 12G SAS PCIe Plug-in Controller 804398-B21

HPE Cable Options

HPE DL380 Gen9 12LFF Smart HBA H240 SAS Cable Kit 786215-B21 HPE DL385 Gen10 Mini SAS 3POS Cable Kit 882100-B21

Optional Software

HPE Smart Array SR Secure Encryption (Data at Rest Encryption/per Server Entitlement) E-LTU	Q2F26AAE
HPE Smart Array SR SmartCache (Single Key/Single Server) LTU	D7S26A
HPE Smart Array SR SmartCache (Single Key/Multiple Servers) LTU	D7S27A
HPE Smart Array SR SmartCache (Single Key/Multiple Servers) E-LTU	D7S27AAE
NOTE: SmartCache is offered on HPE Smart Array performance RAID controllers and comes standard (no	
licensing is required) if the HPE Smart Array P816i-a SR Gen10 Controller is installed in the server.	

Optional Upgrades

HPE 96W Smart Storage Battery (up to 20 Devices) with 145mm Cable Kit

P01366-B21

NOTE: Provides backup power for multiple HPE Smart Array controllers or other devices. Is required with performance RAID controllers.

HPE Tape Backup

NOTE: For the complete range of tape drives, autoloaders, libraries and media

see: https://www.hpe.com/us/en/storage/storeever-tape-storage.html.

For hardware and software compatibility of Hewlett Packard Enterprise tape backup

products http://www.hpe.com/storage/BURAcompatibility.

HPF	Disk	-Based	Backup
	PISK	Dascu	Dackup

HPE RDX+ 1TB External Backup System	B7B69B
HPE RDX+ External Docking System	C8S07B
HPE RDX 2TB USB3.0 External Disk Backup System	E7X53B

HPE Storage Options

Emulex Fibre Channel HBAs

HPE StoreFabric SN1200E 16Gb Single Port Fibre Channel Host Bus Adapter	Q0L13A
HPE StoreFabric SN1200E 16Gb Dual Port Fibre Channel Host Bus Adapter	Q0L14A
HPE StoreFabric SN1600E 32Gb Single Port Fibre Channel Host Bus Adapter	Q0L11A
HPE StoreFabric SN1600E 32Gb Dual Port Fibre Channel Host Bus Adapter	Q0L12A

QLogic Fibre Channel HBAs

HPE StoreFabric SN1100Q 16Gb Single Port Fibre Channel Host Bus Adapter	P9D93A
HPE StoreFabric SN1100Q 16Gb Dual Port Fibre Channel Host Bus Adapter	P9D94A
HPE StoreFabric SN1600Q 32Gb Single Port Fibre Channel Host Bus Adapter	P9M75A
HPE StoreFabric SN1600Q 32Gb Dual Port Fibre Channel Host Bus Adapter	P9M76A

Converged Network Adapters

HPE StoreFabric CN1100R Dual Port Converged Network Adapter	QW990A
HPE StoreFabric CN1100R 10GBASE-T Dual Port Converged Network Adapter	N3U52A
HPE StoreFabric CN1200E 10Gb Converged Network Adapter	E7Y06A
HPE StoreFabric CN1200E 10GBASE-T Dual Port Converged Network Adapter	N3U51A

NOTE: For the complete listing of Fibre Channel Host Bus Adapters for Windows 2000, Windows Server 2003 and Linux,

please see: https://www.hpe.com/us/en/product-catalog/storage/storage-adapters.hits-12.html

HPE Racks

NOTE: Please see the **HPE Advanced Series Racks QuickSpecs** for information on additional racks options and rack specifications.

NOTE: Please see the <u>HPE Enterprise Series Racks QuickSpecs</u> for information on additional racks options and rack specifications.

NOTE: Please see the <u>HPE Standard Series Racks QuickSpecs</u> for information on additional racks options and rack specifications.

HPE Power Distribution Units (PDUs)

NOTE: Please see the <u>HPE Basic Power Distribution Units (PDU) QuickSpecs</u> for information on these products and their specifications.

NOTE: Please see the **HPE Metered Power Distribution Units (PDU) QuickSpecs** for information on these products and their specifications.

NOTE: Please see the <u>HPE Intelligent Power Distribution Unit (PDU) QuickSpecs</u> for information on these products and their specifications.

NOTE: Please see the <u>HPE Metered and Switched Power Distribution Units (PDU) QuickSpecs</u> for information on these products and their specifications.

HPE Uninterruptible Power Systems (UPS)

NOTE: To learn more, please visit the HPE Uninterruptible Power Systems (UPS) web page.

NOTE: Please see the <u>HPE DirectFlow Three Phase Uninterruptible Power System QuickSpecs</u> for information on these products and their specifications.

NOTE: Please see the <u>HPE Line Interactive Single Phase UPS QuickSpecs</u> for information on these products and their specifications.

HPE Rack Options

NOTE: Please see the **HPE KVM Switches web page** for information on these products and their specifications.

Rail Kits

NOTE: Ball bearing and Easy Install rail kits contain telescoping rails which allow for in-rack serviceability. **NOTE:** To assist in the installation of the server into the rack an optional installation tool is available by contacting your local services representative (695539-001).

CAUTION: Hewlett Packard Enterprise recommends that a minimum of two people are required for all Rack Server installations. Please refer to your installation instructions for proper tools and number of people to use for any installation.

HPE 2U Small Form Factor Easy Install Rail Kit	733660-B21
NOTE: Does not include CMA (733664-B21).	
HPE 2U Large Form Factor Easy Install Rail Kit	733662-B21
NOTE: Does not include CMA (733664-B21).	
HPE 2U Cable Management Arm for Easy Install Rail Kit	733664-B21
HPE 2U Small Form Factor Ball Bearing Rail Kit	720863-B21
NOTE: Does not include CMA (720865-B21).	
HPE 2U Large Form Factor Ball Bearing Rail Kit	720864-B21
NOTE: Does not include CMA (720865-B21).	
HPE 2U Cable Management Arm for Ball Bearing Rail Kit	720865-B21

HPE Other Options

l	HPE Rack LED Light Kit	BW939A
-	HPE Kit LCD 1.83m Latch Display Port Cable	G7T29A

HPE USB and SD Options

HPE Enterprise Mainstream Flash Media Kits for Memory Cards

HPE 32GB microSD Flash Memory Card	700139-B21
HPE 8GB microSD Flash Memory Card	726116-B21
HPE 8GB microSD Flash USB Drive	737953-B21

HPE Support Services

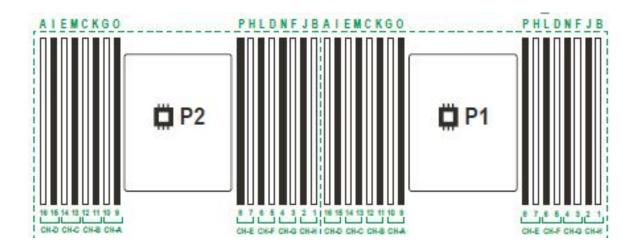
Installation & Startup Services

HPE Install ProLiant DL38x(p) Service	U4554E
HPE Installation and Startup DL38x(p) Service	U4555E

Proactive Care

HPE 3 Year Proactive Care 24x7 DL38x Gen10 Service	H8QQ0E
HPE 3 Year Proactive Care 24x7 with DMR DL38x Gen10 Service	H8QQ1E
HPE 3 Year Proactive Care 24x7 with CDMR DL38x Gen10 Service	H8QQ2E
HPE 3 Year Proactive Care Call-To-Repair DL38x Gen10 Service	H8QQ9E
HPE 3 Year Proactive Care Call-To-Repair 24x7 with DMR DL38x Gen10 Service	H8QR0E
HPE 3 Year Proactive Care Call-To-Repair with CDMR DL38x Gen10 Service	H8QR1E

Memory



DIMM Type		Register DIMI	M (RDIMM)	
HPE SKU P/N	838079-B21	838081-B21	838089-B21	838083-B21
SKU Description	HPE 8GB (1x8GB) Single Rank x8 DDR4- 2666 CAS-19-19-19 Registered Smart Memory Kit	HPE 16GB (1x16GB) Single Rank x4 DDR4- 2666 CAS-19-19-19 Registered Smart Memory Kit	HPE 16GB (1x16GB) Dual Rank x8 DDR4- 2666 CAS-19-19-19 Registered Smart Memory Kit	HPE 32GB (1x32GB) Dual Rank x4 DDR4- 2666 CAS-19-19- 19 Registered Smart Memory Kit
DIMM Rank ->	Single Rank (1R)	Single Rank (1R)	Dual Rank (2R)	Dual Rank (2R)
DIMM Capacity ->	8GB	16GB	16GB	32GB
Voltage	1.2V	1.2V	1.2V	1.2V
DRAM depth [bit]	1G	2G	1G	2G
DRAM Width [bit]	x8	x4	x8	x4
DRAM Density	8Gb	8Gb	8Gb	8Gb
CAS Latency	19-19-19	19-19-19	19-19-19	19-19-19
DIMM Native Speed (MT/s)	2666 MT/s	2666 MT/s	2666 MT/s	2666 MT/s
AMD EPYC® 7000 Processors Officially Supported Memory Speed (MT/s)				
1 DIMM Per Channel	2666 MT/s	2666 MT/s	2400 MT/s	2400 MT/s
2 DIMM Per Channel	2133 MT/s	2133 MT/s	2133 MT/s	2133 MT/s

NOTE: The maximum memory speed is a function of the memory type, memory configuration, and processor model. **NOTE:** Model 7251 1 DIMM per channel is 2400 MT/s.

For details on the HPE Server Memory speed, visit: http://www.hpe.com/docs/amd-speed-tables

Memory

DIMM Type	Load Reduce	Load Reduced (LRDIMM)		
HPE SKU P/N	838085-B21	838087-B21		
	HPE 64GB (1x64GB) Quad Rank x4 DDR4-2666 CAS-19-19-19 Load Reduced Smart Memory Kit	HPE 128GB (1x128GB) Octal Rank x4 DDR4-2666 CAS-22-19-19 3DS Load Reduced Smart Memory Kit		
SKU Description		2000 (1000000 0.11011 1.01101)		
DIMM Rank ->	Quad Rank (4R)	Octal Rank (8R)		
DIMM Capacity ->	64GB	128GB		
Voltage	1.2V	1.2V		
DRAM depth [bit]	2G	2G		
DRAM Width [bit]	x4	×4		
DRAM Density	8Gb	8Gb		
CAS Latency	19-19-19	22-19-19		
DIMM Native Speed (MT/s)	2666	2666		
AMD EPYC® 7000 Processors Officia	ally Supported Memory Speed (MT/s)			
1 DIMM Per Channel	2666 MT/s	2666 MT/s		
2 DIMM Per Channel	2133 MT/s	2133 MT/s		

NOTE: The maximum memory speed is a function of the memory type, memory configuration, and processor model. **NOTE:** Model 7251 1 DIMM per channel is 2400 MT/s.

For details on the HPE Server Memory speed, visit: http://www.hpe.com/docs/amd-speed-tables

DDR4 memory options part number decoder

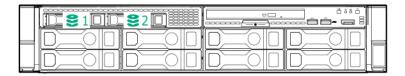
NOTE: Capacity references are rounded to the common gigabyte (GB) values.

- 8GB = 8,192 MB
- 16GB = 16,384 MB
- 32GB = 32,768 MB
- 64GB = 65,536 MB

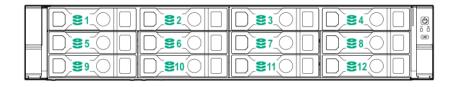
For more information on memory, please see the Memory Quickspecs: **HPE DDR4 SmartMemory**

Storage

8LFF chassis with Universal media bay and optional 2SFF and optical drive shown

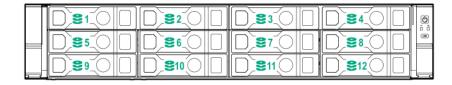


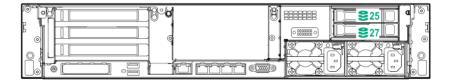
12 LFF + 3 rear LFF drives



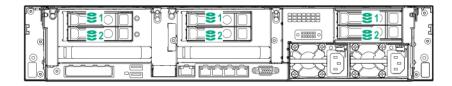


12 LFF + 2 rear SFF drives





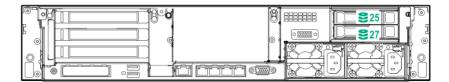
6 rear SFF drives



Storage

24 SFF + rear 2 SFF drives





Technical Specifications

System Unit

Dimensions 8.73 x 44.55 x 67.94 cm SFF Drives:

 $3.44 \times 17.54 \times 26.75$ in

8.73 x 44.55 x 73.02 cm LFF Drives:

3.44 x 17.54 x 28.75 in

Weight (approximate) 14.9 kg Minimum: 8 SFF chassis with 1x SFF HDD and 7 HDD blanks, 2x Drive

32.75 lb Bay blanks, 1x processor including standard heatsink, 1x power supply (plus blank), 1x Smart Array, 1x Riser installed, cables for the above)

23.6 kg Maximum: 12 LFF hard drives (no rear drives), 2x processors, 2x power

51.5 lb supplies, 1x Smart Array, 2x Risers installed)

Input Requirements Rated Line Voltage 100 to 120 VAC

(per power supply) 200 to 240 VAC

Temperature

BTU Rating Maximum For 800W Power Supply: 3207 BTU/hr (at 100 VAC), 3071 BTU/hr (at

200 VAC), 3112 BTU/hr (at 240 VAC) for China Only

For 500W Power Supply: 1979 BTU/hr (at 100 VAC), 1911 BTU/hr (at

200 VAC), 1965 BTU/hr (at 240 VAC) for China Only

Power Supply Output Rated Steady-State Power For 1400W Power Supply: 1400W (at 240 VAC), 1400W (at 240 VAC)

(per power supply) For 800W Power Supply: 800W (at 100 VAC), 800W (at 240 VAC),

800W (at 240 VAC) input for China only

For 500W Power Supply: 500W (at 100 VAC), 500W (at 240 VAC),

500W (at 240 VAC) input for China only

Maximum Peak Power For 1400W Power Supply: 1400W (at 200 to 240 1VAC), 1400W (at

240 VAC) input for China only

For 800W Power Supply: 800W (at 100 to 127 VAC), 800W (at 200 to

240 1VAC), 800W (at 240 VAC) input for China only

For 500W Power Supply: 500W (at 100 to 127 VAC), 500W (at 200 to

240 VAC), 500W (at 240 VAC) input for China only

System Inlet Temperature Standard Operating 10° to 35°C (50° to 95°F) at sea level with an altitude derating of 1.0°C

per every 305 m (1.8°F per every 1000 ft) above sea level to a maximum of 3050 m (10,000 ft), no direct sustained sunlight.

Maximum rate of change is 20°C/hr (36°F/hr). The upper limit and rate

of change may be limited by the type and number of options installed.

System performance during standard operating support may be

reduced if operating with a fan fault or above 30°C (86°F).

Extended Ambient For appro Operating Temperature range is ex

For approved hardware configurations, the supported system inlet range is extended to be: 5° to 10° C (41° to 50° F) and 35° to 40° C (95° to 104° F) at sea level with an altitude derating of 1.0° C per every 175 m (1.8° F per every 574 ft) above 900 m (2953 ft) to a maximum of 3050 m (10,000 ft). The approved hardware configurations for this

system are listed at the URL:

http://www.hpe.com/servers/ashrae

For approved hardware configurations, the supported system inlet range is extended to be: 40° to 45°C (104° to 113°F) at sea level with an altitude derating of 1.0°C per every 125 m (1.8°F per every 410 ft) above 900 m (2953 ft) to a maximum of 3050 m (10,000 ft). The approved hardware configurations for this system are listed at the URL:

http://www.hpe.com/servers/ashrae

Technical Specifications

System performance may be reduced if operating in the extended

ambient operating range or with a fan fault.

Non-operating -30° to 60°C (-22° to 140°F). Maximum rate of change is 20°C/hr

(36°F/hr).

Relative Humidity Operating 8% to 90% - Relative humidity (Rh), 28°C maximum wet bulb

temperature, non-condensing.

(non-condensing) Non-operating 5 to 95% relative humidity (Rh), 38.7°C (101.7°F) maximum wet bulb

temperature, non-condensing..

Altitude Operating 3050 m (10,000 ft). This value may be limited by the type and number

of options installed. Maximum allowable altitude change rate is 457

m/min (1500 ft/min).

Non-operating 9144 m (30,000 ft). Maximum allowable altitude change rate is 457

m/min (1500 ft/min).

Acoustic Noise

Listed are the declared A-Weighted sound power levels (L_{WAd}) and declared average bystander position A-Weighted sound pressure levels (L_{PAm}) when the product is operating in a 23°C ambient environment. Noise emissions were measured in accordance with ISO 7779 (ECMA 74) and declared in accordance with ISO 9296 (ECMA 109). The listed sound levels apply to standard shipping configurations. Additional options may result in increased sound levels. Please have your HPE representative provide information from the HPE EMESC website for further technical details regarding the configurations listed below.

Idle

LWAd 4.8 B Entry

4.4 B Base

4.6 B Perf

LpAm 37 dBA Entry

31 dBA Base

31 dBA Perf

Operating

LWAd 4.8 B Entry

4.4 B Base

4.6 B Perf

LpAm 37 dBA Entry

31 dBA Base

31 dBA Perf

NOTE: Acoustics levels presented here are generated by the test configuration only. Acoustics levels will vary depending on system configuration. Values are subject to change without notification and are for reference only.

NOTE: Product conformance to cited product specifications is based on sample (type) testing, evaluation, or assessment. This product or family of products is eligible to bear the appropriate compliance logos and statements.

NOTE: The Listed sound levels apply to standard shipping configurations. Additional options may result in increased sound levels.

Emissions Classification (EMC) – Regulatory Information To view the regulatory information for your product, view the Safety and Compliance Information for Server, Storage, Power, Networking, and Rack Products, available at the Hewlett Packard Enterprise Support Center:

http://www.hpe.com/support/Safety-Compliance-EnterpriseProducts

Technical Specifications

For information on the HPE Smart Array E208i-a SR Gen10 Controller please refer to their QuickSpecs.

For information on the HPE Smart Array E208i-p SR Gen10 Controller please refer to their **QuickSpecs**.

For information on the HPE Smart Array E208e-p SR Gen10 Controller please refer to their QuickSpecs.

For information on the HPE Smart Array P408i-a SR Gen10 Controller please refer to their **QuickSpecs**.

For information on the HPE Smart Array P408i-p SR Gen10 Controller please refer to their QuickSpecs.

For information on the HPE Smart Array P408e-p SR Gen10 Controller please refer to their QuickSpecs.

For information on the HPE Smart Array P816i-a SR Gen10 Controller please refer to their QuickSpecs.

Environment-friendly Products and Approach -End-of-life Management and Recycling Hewlett Packard Enterprise offers <u>end-of-life product return, trade-in, and recycling programs</u>, in many geographic areas, for our products. Products returned to Hewlett Packard Enterprise will be recycled, recovered or disposed of in a responsible manner.

The EU WEEE directive (2002/95/EC) requires manufacturers to provide treatment information for each product type for use by treatment facilities. This information (product disassembly instructions) is posted on the Hewlett Packard Enterprise web site. These instructions may be used by recyclers and other WEEE treatment facilities as well as Hewlett Packard Enterprise OEM customers who integrate and re-sell Hewlett Packard Enterprise equipment.

Summary of Changes

Date	Version History	Action	Description of Change
07-May-2018	Version 4	Added	Added new Entry model to the Pre-Configured models section.
		Changed	Service and Support section was updated. Pre-Configured models, Configuration Information – Factory Integrated Models, Core Options, and Additional Options were revised.
02-Apr-2018	Version 3	Changed	SKU descripton were updated.
12-Feb-2018	2-Feb-2018 Version 2 Added New model was added to		New model was added to the Pre-configured Models section.
		Changed	Overview, Expansion Slots, Maximum Internal Storage, Pre-configured Models, Configuration Information - Factory Integrated Models, Core Options, Additional Options, and Memory were revised.
		Removed	Obsolete SKUs were removed from the QuickSpecs.
04-Dec-2017	Version 1	New	New QuickSpecs.



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For hard drives, 1GB = 1 billion bytes. Actual formatted capacity is less

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