

HPE Compute MR Controllers

HPE MR416i-p Gen11 x16 Lanes 8GB Cache PCI SPDM Plug-in Storage Controller (P47777-B21)



What's new

- Standard PCI HH/HL and OCP NIC 3.0 form factors.
- DMTF Security Protection Data Model (SPDM) supports certificate-based authentication with HPE iLO 6.
- Hardware Root of Trust (HWRoT) protects against malicious firmware.
- MegaRAID Storage Administrator (MRSAs), Storage Command Line Interface (StorCLI), Unified Extensible Firmware Interface (UEFI), and Redfish management.

Overview

Do you need a versatile, simplified, and flexible choice for your data centers? HPE Compute MR Controllers are expansive and agile PCIe Gen4.0 storage controllers based on Broadcom MegaRAID® technology that deliver quality, performance, and security for mission-critical applications. The HPE MR416i-o / HPE MR416i-p Gen11 controllers are ideal for most data center environments where RAID is applicable offering reduced rebuild times, high bandwidth, and 240K RAID5 Random Write IOPS. The HPE MR416i-o / HPE MR416i-p Gen11 controllers are ideal for many virtualized environments where HBA / pass-through mode is applicable offering high bandwidth and three million random write IOPS. HPE Compute MR Controllers offer solutions for multiple workflows across multiple applications to deliver customer satisfaction.

Features

Powerful Performance

HPE Compute MR Gen11 Controllers offer up to 13.7 GBs of bandwidth, and eight PCIe Gen4.0 host lanes.

HPE Compute MR Controllers offer 3M Random Read IOPS and 240K RAID5 Random Write IOPS.

Enhanced Security

HPE Compute MR Controllers are built with the silicon root of trust from HPE for firmware authentication and support for self-encrypting drives to help protect data at rest and prevent malware.

HPE Compute MR Controllers now offer DMTF SPDM that supports certificate-based authentication with HPE iLO 6.

Software Supported

HPE Compute MR Controllers support full tool suite including command line interface, web-based management, and out-of-band management support.

Supported operating systems include, but are not limited to Windows, Linux®, and VMware®.

Technical specifications		HPE MR416i-p Gen11 x16 Lanes 8GB Cache PCI SPDM Plug-in Storage Controller
Product Number	P47777-B21	
Form factor	(MR216i-p / MR416i-p) Standard PCI HH/HL (MR216i-o / MR416i-o / MR408i-o / MR408i-p) OCP NIC 3.0 form-factor	
Ports	MR216i-o = 2x8 LP SlimSAS MR216i-p = 2x8 SlimSAS MR408i-o = 1x8 LP SlimSAS MR408i-p = 1x8 SlimSAS MR416i-o = 2x8 LP SlimSAS MR416i-p = 2x8 SlimSAS	
Cache	MR216i-o = None MR216i-p = None MR408i-o = 4GB MR408i-p = 4GB MR416i-o = 8GB MR416i-p = 8GB	
RAID levels	(MR416i-o / MR416i-p / MR408i-o / MR408i-p) – 0, 1, 5, 6, 10, 50, 60 (MR216i-o / MR216i-p) – 0, 1, 10	
Servers supported	Refer to platform QuickSpecs to see controller support.	
Certifications	Refer to HPE Compute MR Controllers QuickSpecs	
Secure encrypted drives	Supported	
Storage protocol	6G SATA, 12G SAS, 16G NVMe	
Storage management	MRSA, StorCLI, UEFI, and Redfish management	
Warranty	The warranty for this device is 3-years parts only.	

HPE Services

No matter where you are in your transformation journey, you can count on HPE Services to deliver the expertise you need when, where and how you need it. From strategy and planning to deployment, ongoing operations and beyond, our experts can help you realize your digital ambitions.

Advisory & Professional services

Experts can help you map out your path to hybrid cloud and optimize your operations.

Managed services

HPE runs your IT operations, giving you unified control, so can focus on innovation.

Support services

Optimize your entire IT environment and drive innovation. Manage day-to-day IT operational tasks while freeing up valuable time and resources.

- **HPE Complete Care Service:** a modular service designed to help optimize your entire IT environment and achieve agreed upon IT outcomes and business goals. All delivered by an assigned team of HPE experts.
- **HPE Tech Care Service:** the operational service experience for HPE products. The service provides access to product specific experts, an AI driven digital experience, and general technical guidance to help reduce risk and search for ways to do things better.
- **HPE Multivendor Services:** Single point of accountability for managing on-site hardware and software support for multivendor products. HPE experts help manage your IT across technologies and platforms for HPE and non-HPE technologies, acting as the single point of contact for your IT operational needs.

Lifecycle Services

Address your specific IT deployment project needs with tailored project management and deployment services.

HPE Education Services

Training and certification designed for IT and business professionals across all industries. Create learning paths to expand proficiency in a specific subject. Schedule training in a way that works best for your business with flexible continuous learning options

Defective Media Retention is optional and allows you to retain Disk or eligible SSD/Flash Drives replaced by HPE due to malfunction.

HPE GreenLake

[HPE GreenLake edge-to-cloud platform](#) is HPE's market-leading as-a-Service offering that brings the cloud experience to apps and data everywhere – data centers, multi-clouds, and edges – with one unified operating model, on premises, fully managed in a pay per use model.

If you are looking for more services, like **IT financing solutions**, please [explore them here](#).

[For additional technical information,
available models and options, please
reference the QuickSpecs](#)

Visit [HPE.com](https://www.hpe.com)

[Chat now](#)

© Copyright 2025 Hewlett Packard Enterprise Development LP. The information contained herein is subject to change without notice. The only warranties for Hewlett Packard Enterprise products and services are set forth in the express warranty statements accompanying such products and services. Nothing herein should be construed as constituting an additional warranty. Hewlett Packard Enterprise shall not be liable for technical or editorial errors or omissions contained herein.

Parts and Materials: HPE will provide HPE-supported replacement parts and materials required to maintain the covered hardware.

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 quick-specs, or the technical product data sheet will not be provided, repaired, or replaced as part of these services.

Linux is the registered trademark of Linus Torvalds in the U.S. and other countries. Windows is either registered trademark or trademark of Microsoft Corporation in the United States and/or other countries. VMware is a registered trademark or trademark of VMware, Inc. and its subsidiaries in the United States and other jurisdictions. All third-party marks are property of their respective owners.

Image may differ from the actual product.

[PSN1014690941FIEN](#), October, 2025.

HEWLETT PACKARD ENTERPRISE

[hpe.com](https://www.hpe.com)

