HPE Alletra Storage MP B10000

HPE Alletra Storage MP B10130 Controller Node (S0R21A)



What's new

- Simplify management with enhanced and extended AI-driven performance reporting: New cross-stack analytics delivers end to end visibility for VM environments.
- 2X more capacity enables you to start small, scale big—from 15 TB to around 5.6 PB—with support for up to sixteen JBOF expansion shelves.
- Upgrade drives in 2-drive increments and controller nodes in increments of one enabling you to maximize efficiency and cost savings via granular performance and capacity upgrades.
- Remove risk and complexity with quick non-disruptive data migration managed directly from within the HPE GreenLake Platform.
- Monitor, observe, and reduce energy consumption with HPE Sustainability Insight Center support.

Overview

HPE Alletra Storage MP B10000 provides mission-critical storage at midrange economics with the industry's first disaggregated, scale-out block storage with a 100% data availability guarantee. Built on HPE Alletra Storage MP hardware and managed via the HPE GreenLake cloud , this unique block storage offering brings an intuitive cloud experience, efficient scale, and extreme resiliency and performance to mission-critical apps — from large databases to modern cloud native apps to consolidated mixed workloads - at a midrange price point.

Get an intuitive, AI-driven cloud experience on-prem that simplifies management and shifts operations from infrastructure-centric to app-centric. Scale performance and capacity independently — and without disruption — with disaggregated storage. Meet every SLA with mission-critical storage that delivers an unrivalled 100% data availability guarantee.

Features

Simplify Management with an Intuitive Cloud Experience on Prem

Simplify operations and move faster with a cloud operational experience: Reduce on-premises storage complexity across the lifecycle— from install to upgrade — with an AI-driven cloud operational experience powered by the HPE GreenLake cloud.

Simplified deployment: Get started in minutes with streamlined device

- QLC SSD support provides higher density, lower TCO, and optimized price performance for capacity-intensive workloads

deployment. Simply rack the infrastructure, plug in the power cords, and connect the network cables. With a few clicks, the new system is configured and available in your fleet, ready to serve data for application workloads.

Deploy apps faster: Automate app deployment with intent-based provisioning. Select the storage tier, workload type, capacity and protection policy, and let AI-driven intelligence automatically optimize your SLAs by recommending the best-suited system across your fleet for your new workload.

Unified storage management: 100% cloud-managed infrastructure means you can manage, monitor and protect your global storage environment from a single cloud console that's accessible from any location, on any device - so managing hundreds of systems across geographies is as simple as managing one.

Invisible upgrades: Thanks to SaaS-based delivery, new data services instantly become available to you. Data plane software upgrades are non-disruptive and intelligently matched to a given system.

Better Performance, Better Economics with Disaggregated, Scale out Storage

Scale without limitations: Scale capacity and performance independently with disaggregated, scale-out storage – for greater efficiency and lower costs. Fine-tune, adapt and elastically scale your storage environments in line with workload requirements and evolving business needs.

Start small, scale big: Start small with cost-efficient two-node entry level configurations. Scale-up and scale-out to multi-node configurations with granular performance and capacity upgrades.

Non-disruptive upgrades: Maximize ROI with on-line, non-disruptive, data-in-place upgrades without repurchasing existing storage.

Maximize efficiency and cost savings with single controller node performance scaling.

Run any app – Without Compromise with a 100% Data Availability Guarantee

Get peace of mind with 100% data availability guaranteed [1]: Built on an AI-driven, disaggregated, no single point of failure platform to guarantee resilient 100% data availability for your mission-critical apps.

Advanced DR and HA: Meet any recovery-point objective (RPO) and recovery-time objective (RTO) strategy with transparent business continuity and automatic fail-over across multiple sites, as well as getting simple and efficient hybrid cloud data protection for on-prem and cloud native workloads.

Accelerate your most demanding applications: Built on a unique, massively parallel, multi-node, and all-active platform, HPE GreenLake for Block Storage consolidates traditional and next-generation mission-critical applications at scale with predictable performance and ultra-low latency.

Industry's most advanced AI-Ops: Predict and prevent disruptions before they occur across the stack and pinpoint issues between storage and VMs and under-utilized resources. Take the guesswork out of managing storage with AI-driven recommendations that improve performance and availability.

Transformed support experience: Eliminate time-consuming, frustrating escalations via predictive support automation and direct access to the experts and resources you need.

Future proofed-investment that never gets old

No forklift upgrades: With the HPE Timeless Storage program for HPE Alletra Storage MP B10000, you can protect your investment and keep your storage continuously up to date with a non-disruptive controller refresh. This reduces your TCO and saves an average of 30% over traditional forklift upgrades.

Always-improving data services: Unlock the full potential of HPE Alletra Storage MP B10000 with our all-inclusive software subscription. Get access to all our operating system features and enhancements, including AIdriven cloud operations on the HPE GreenLake cloud, at no additional cost.

Rely on 100% data availability—guaranteed: Forget the disruption of unexpected downtime. HPE Alletra Storage MP B10000 is an AIdriven, disaggregated, no-single-point-of-failure platform to guarantee resilient 100% data availability for

every customer and every array

Store more for less with the HPE StoreMore Guarantee: This guarantees total savings of at least 4:1. for your workloads - reducing physical storage costs, saving energy, and decreasing data center footprint.

30-day satisfaction guarantee: Try HPE Alletra Storage MP B10000 for 30 days at no risk. If you are not completely satisfied with the benefits and capabilities of your storage system as described in the product specifications, we will work with you to make things right.

Technical specifications

	HPE Alletra Storage MP B10130 Controller Node
Product Number	S0R21A
Drive description	NVMe SFF encrypted SSD: 1.92 TB, 3.84 TB, 7.68 TB, 15.36 TB QLC SSDs: 15.36 TB, 30.72 TB
Capacity	Up to 368 TB per enclosure switchless, up to 1.1 PB per solution switched, up to 5.8 PB per solution
Host interface	32Gb/s Fibre Channel, 10/25GbE iSCSI
Enclosures	2U form factor of HPE Alletra Storage MP
Storage controller	Redundant HPE Alletra Storage MP 16-core controllers
Maximum drives per enclosure	24 NVMe SSDs per enclosure B10100, up to two (2) expansion shelves per solution B10200, up to sixteen (16) expansion shelves per solution.
Cache	512 GB cache memory per 32-core Controller Node 256 GB cache memory per 16-core Controller Node 256 GB cache memory per 8-core Controller Node
Availability features	Redundant power, cooling modules, and fans; A minimum of dual redundant controller nodes
Compatible operating systems	Microsoft® Windows® Server and Microsoft® Hyper-V™ VMware ESX and ESXi Red Hat® Enterprise Linux® SUSE® Linux Enterprise Server (SLES)
Product dimensions	35.09 x 62.97 x 4.1 cm
Weight	9.5 kg
Warranty	1-year, parts-only warranty for hardware components

[1] 100% Data Availability Guarantee:hpe.com/psnow/doc/a00058506enw

[2] 100% Data Availability Guarantee:
hpe.com/psnow/doc/a00058506enw?from=app&section=search&isFutureVersion=true

For additional technical information, available models and options, please reference the QuickSpecs

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.

Consulting 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.

Operational 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.

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.

The Defective Media Retention (DMR) service feature option applies only to Disk or eligible SSD/Flash Drives replaced by Hewlett Packard Enterprise due to malfunction. Comprehensive Defective Material Retention (CDMR) allows you to keep all data retentive components.

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.

Explore **HPE GreenLake**

Make the right purchase decision. Contact our presales specialists.

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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.

Image may differ from the actual product
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