

## 2U Ion Accelerator Flash Storage Array

With game-changing performance, density and fault tolerance, this 2U NVMe storage array offers flexible capacity while maintaining the high-bandwidth and low-latency pedigree of Ion Accelerator™ arrays deployed in hundreds of global installations. This OSS Shared Flash Storage Array boasts the latest Ion Accelerator 5.1.0 software, NVMe drives, networking options and dual Intel® Xeon® Scalable Processors needed to support the most demanding applications. Multiple high-speed networking options allow this array to fit seamlessly into Fibre Channel (up to 32 Gbps), iSCSI (up to 100 Gbps) or InfiniBand (up to 100 Gbps) deployments. Twenty-four 2.5" NVMe drives expand the capacity of the Ion Accelerator up to 367TB. High Availability (HA) is achieved using two arrays in a mirrored setup. The low overhead of the Ion software allows the system to deliver near bare-metal performance from the latest NVMe technology flash drives along with the reliability and data integrity required in mission-critical enterprise applications. Existing Ion Appliance customers can also upgrade from legacy drives to modern NVMe with zero down time and no migration costs using our Easy Migrate upgrade program.

### Features

- Ultra-low latency with Ion Accelerator 5.1.0 software
- 2U rackmount design
- 24 2.5" hot-swap NVMe drive bays
- System health monitoring
- HA option with mirrored array
- 1600W redundant power supplies
- Zero downtime, zero migration cost option



### Ion Accelerator Architecture

Developed over the last 8 years for pure performance, OSS Ion Accelerator 5.1.0 design incorporates a streamlined, innovative software stack that eliminates bottlenecks, taking advantage of near-native NVMe flash performance.

- Enables NVMe flash to be shared storage for database acceleration
- Delivers sub 100 microseconds latency for random workload acceleration
- Efficient density with incremental scalable storage of up to 367TB of front removable NVMe capacity in 2U space
- Balanced PCIe internal switched fabric architecture scales performance with capacity by directing data from network interface slots to flash without protocol translation used by other systems
- Deployment in standalone or HA mode. With HA, OSS Ion Accelerator simultaneously accelerates performance for volumes distributed across two mirrored arrays

### High-Availability Solved

Ion Accelerator with HA provides total redundancy of data without sacrificing performance. With two HA arrays, there is no single point of failure like in other shared HA solutions.

- Three-way balanced PCIe architecture provides the maximum bandwidth between networking; NVMe drives and HA interconnect functions to maximize array performance.
- Ion Accelerator HA increases performance through an Active-Active HA architecture with synchronous replication providing more performance in HA configurations than standalone arrays, maximizing your return on investment.
- Existing Ion Accelerator customers get the added benefit of zero-downtime and zero-migration cost from legacy flash technology to modern NVMe flash using Easy Migration Ion upgrade program.

### Accelerated Support

The Ion Accelerator 5.0 FSA comes with full systems support from a single point of contact under a single contract.

- 24/7 support for the server, drives, NICs and Ion Accelerator software with 1 hour response times for Severity 1 issues.
- One to 5 year support and warranty contracts with advanced replacement available.
- Inquire about custom support services and OEM server Ion Accelerator options from the world's most popular server OEMs. To learn which servers are compatible, please contact your OSS sales representative.

# Specifications

<b>System</b>	2U rackmount (17.2" x 3.5" x 27.76") Net weight 36 lbs. Supports up to 24 total 2.5" NVMe hot-swap main-storage drives
<b>Networking options</b>	iSCSI via 4x 100Gbps Ethernet ports SRP via 4 x 100Gbps Infiniband ports FC via 8 x 32Gbps Fibre Channel ports HA interconnects via <ul style="list-style-type: none"> <li>• 2x100Gbps Ethernet ports</li> <li>• 4x 10Gbps Ethernet ports</li> </ul> IPMI via 1x 1Gbps Ethernet port
<b>CPU</b>	Dual socket P (LGA 3647) Intel® Xeon® Scalable Processors Supports Embedded CPUs
<b>Software</b>	Ion 5.1.0 Storage Accelerator Software Sub 100 <b>µs latency</b> Over 5M IOPS (4KB) High Availability option with synchronous replication RAID 0, 5, 10 IPMI 2.0 with virtual media over LAN, KVM over LAN
<b>Power / Cooling</b>	1600W 1+1 redundant power supplies with PMBus 4 heavy duty 8cm PWM fans with tachometer, status monitoring
<b>Ordering options</b>	OSS-FSAn-2D-Ion-012TB-xx    12.8TB Ion Accelerator FSA OSS-FSAn-2D-Ion-051TB-xx    51.2TB Ion Accelerator FSA OSS-FSAn-2D-Ion-153TB-xx    153.6TB Ion Accelerator FSA OSS-FSAn-2D-Ion-367TB-xx    367TB Ion Accelerator FSA xx = Networking option FC, IB or EN