

DATA SHEET Flexible. Affordable. Fast. Exos AP 2U12



Powerful and compact, the Seagate<sup>®</sup> Exos<sup>®</sup> AP 2U12 all-in-one, expandable, low-cost storage solution supports growing businesses with high-capacity and high-availability options.



## Key Advantages

Save space and maximize capacity with up to 12 drives that can hold 192TB per chassis in a 2U rackmount enclosure

Dual ×86 controllers with flexible performance options that fit your software requirements and budget, including high availability

Deliver data fast with 7Gb/s reads and 5.5Gb/s writes

Future-proofed to support network infrastructures with 10GbE, 25GbE, and 100GbE I/O options

Expandable with up to 8 total EBOD chassis to grow with your business

Dual 12Gb/s SAS controllers are compliant with latest architecture standards for maximum data throughput

Ensure data is constantly available with hot-swappable controllers, PSUs, system fan modules, drives, and expander cards

Modular solution is easily serviceable and allows for interchangeability with other Exos products

## **Best-Fit Applications**

- Small to mid-sized businesses
- Scalable capacity
- Immediate data access



| Specifications                       |  |
|--------------------------------------|--|
| Controller Specifications            |  |
| Controller and Quantity              | One or two AP-LS-1 controllers, redundancy optional  |
| CPU Type and Quantity Per Controller | One Intel <sup>®</sup> Xeon <sup>®</sup> E5 processors v4 family up to 85W TDP   |
| Memory Type and Quantity Per         |  |
| Controller                           | up to 4 standard-height DDR4-2400 dimm slots   |
| Internal Boot Drive Per Controller   | Two M.2 SATA devices   |
| Onboard I/O                          | Two 10GbE RJ45 ports (Intel X540); two 1GbE RJ45 ports (Intel i350-AM4); one 1GbE RJ45 port (management from BMC)  |
| PCIe Expansion                       | One low-profile, half-length PCIe gen 3 ×16 slot; one Seagate AP-LS-1 custom form-factor PCIe gen 3 × 16 slot  |
| Storage Infrastructure               | One 12Gb/s SAS controller with optional turbo mode adding second SAS controller  |
| Host/Expansion I/O Ports             | Two ×4 mini-SAS HD 12G expansion I/O connectors  |
| Inter-Controller Link                | ×16 PCIe   |
| Chassis Specifications               |  |
| Redundant Path                       | Yes (SAS only)   |
| Management/Status Reporting          | Out-of-band CLI via management port and in-band SCSI enclosure services  |
| Device Support                       | 12Gb/s SAS drives and 6Gb/s SATA drives  |
| Max Drives Per Enclsoure             | up to 12 × 3.5-in LFF or 2.5-in SFF drives (in 3.5-in conversion carrier) (for a full list of supported drives, please contact your  |
|                                      | account or sales manager)  |
| Hot-Swappable Components             | HDDs and SSDs (in chassis data slots), power supply and cooling modules units (PCU), and controllers   |
| Physical                             | Height: 87.9mm / 3.46 in   Width: 443mm / 17.44 in   Depth: 630mm / 24.8 in   Width (w/ear mounts): 483mm / 19.01 in  <br>Weight: 17kg / 38 lb   Weight (with drives): 32kg / 71 lb  |
| Power Requirements—AC Input          |  |
| Input Power Requirements             | 100V-240V AC 60Hz/50Hz   |
| Max Power Output per PSU             | 764W   |
| Environmental/Temperature Ranges     |  |
| Operating/Nonoperating Temperature   | ASHRAE A2, 5°C to 35°C (41°F to 95°F), derate 1°C/300m above 900m, 20°C/hr max rate of change / -40°C to 70°C (-40°F to 158°F)   |
| Operating/Nonoperating Humidity      | -12°C DP minimum, 8% RH to 85% RH, max DP 21°C / 5% to 100% noncondensing  |
| Operating/Nonoperating Shock         | 5 Gs, 10ms, half sine pulses / 15 Gs, 10ms, half sine pulses   |
| Operating/Nonoperating Vibration     | 0.21 Gs rms, 5Hz to 500Hz random / 1.04 Gs rms, 2Hz to 200Hz random  |
| Standards/Approvals                  |  |
| Safety Certifications                | UL 60950-1/UL62368-1 ED2 (United States)   CAN/CSA-C22.2 No.60950-1-07/No.62368-1-14, 2nd Ed (Canada)   EN 60950-<br>1/EN62368-1 (European Union)   IEC 60950-1/IEC 62368-1 Ed2 (International)   CCC (China PRC – CCC Power Supplies)  <br>BIS (India – BIS Power Supplies) |
| Ecodesign                            | Commission Regulation (EU) 2019/424 (Directive 2009/125/EC)  |
| Emissions (EMC)                      | FCC CFR 47 Part 15 Subpart B Class A (United States)   ICES/NMB-003 Class A (Canada)   EN 55032 Class A   AS/NZS<br>CISPR 32 Class A (Australia/New Zealand)   VCCI Class A (Japan)   KN 32 Class A   CNS 13438 Class A (Taiwan)   |
| Harmonics                            | EN 61000-3-2 (EU)  |
| Flicker                              | EN 61000-3-3 (EU)  |
| Immunity                             | EN 55024 (EU)   KN 24/KN 35 (S. Korea)   CISPR 24/CISPR35  |
| Environmental Standards              | The RoHS Directive (2011/65/EU)   The WEEE Directive (2012/19/EU)   The REACH Directive (EC/1907/2006)   The<br>Batteries Directive (2006/66/EC)   |
| Standard Marks/Approvals             | Australia/New Zealand (RCM), Canada (cUL/ICES/NMB-003 Class A), China (CCC – PSU only), European Union (CE),<br>Japan (VCCI), South Korea (KC), Taiwan (BSMI), United States (FCC/UL), The Eurasian Economic Union (EAC), India<br>(BIS)                                     |

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