

Storage / Compute Server: 1U12S16-4189A

1U 12x3.5" SAS/SATA, 16 DIMM 2 SFP28 OCP 3.0, 3 PCIe, Dual Ice Lake Xeon®



Key Features:

- 1U 12 x 3.5" SAS/ SATA Hot Swap Drives
- Dual Socket P+ for 3rd Gen. Intel® Scalable Xeon® Processor
- 16 DDR4 up to 4TB 8-Channel Intel® Optane™ Memory
- 2 PCIe 4.0 x16 Slots, 1 PCIe 4.0 x8 Slot
- 2 25GbE SFP28, OCP 3.0 with IPMI 2.0
- 800W Platinum Redundant Power Supply
- For Virtual Server, Compute Server, Database Server, Cloud, etc.

Specifications:

Processor

- Dual 3rd Generation Intel® Scalable Xeon® (Ice Lake Family)
- Socket P+ (LGA 4189), supports 120-205W, up to 40 Core 80 Threads

Chipset

- Intel® C621A

Memory

- 16 x DDR4 DIMM Sockets
- 8-channel memory bus per processor
- Supports up to 4TB ECC DDR4 3200MHz RDIMM
- Supports up to 4TB Intel® Optane™ Persistent Memory 200 series

Storage

- 12 x 3.5" SATA/ SAS Hot Swap Bays
- 4 x EDSSF Short Hot Swap Bays, 2 x 2.5" 7mm NVMe Hot Swap Bays
- Intel® C621A supports SATA3 (6Gb/s) RAID-0/1/5/10
- Broadcom® 3916 supports SAS3 (12Gb/s) RAID-0/1/5/6/10/50/60
- 2 x M.2-2242/2280 for RAID-0/1

Network

- 2 x 25GbE SFP28 from Mellanox® ConnectX®-4 Lx EN
- 1 x OCP 3.0 (PCIe 4.0 x16 AIOM) for Network Module
- Network Module is available with 2-4 ports of 1G/2.5G/10G/25G/100G RJ45/SFP+/SFP28/QSFP28
- RJ45 Gigabit LAN for IPMI 2.0 by AST2600 BMC
- Additional LAN or InfiniBand by PCIe add-on cards

Expansion Slot

- 2 x PCIe 4.0 x16 (Low Profile)
- 1 x PCIe 4.0 x8 (Low Profile)
- 1 x OCP 3.0 (PCIe 4.0 x16 AIOM) for Network Module

Graphics

- Aspeed AST2600 BMC VGA (DB15)

Back I/O

- 1 x RJ45 IPMI
- 2 x 10GbE SFP28
- 1 x DB15 VGA
- 2 x USB 3.2 Gen 1

Internal I/O

- 2 x USB 3.2 Gen 1 Headers
- 1 x TPM Header

Front I/O

- 2 x USB 2.0

BIOS

- AMI®
- Watchdog Supported

Chassis

- 1U Rackmount with UID Switch, Drive LED, Status LED
- 12 x 3.5" SAS/ SATA Hot Swap Drive Bays
- 4 x E1.5 (EDSSF Short) Hot Swap Bays, 2 x 2.5" 7mm Hot Swap Bays
- 6 x 4cm PWM Cooling Fans
- Dimension: 1.7" (43 mm) H x 17.6" (447 mm) W x 37" (939.8 mm) D
- System Weight: 34 lbs. (15.4 kg) Net, 61 lbs. (27.7kg) Gross

Power Supply

- 800W (1+1) Redundant Platinum Level with PMBus
- 100-127Vac/200-240Vac and 230-240Vdc Input

OS Supported

- Windows Server, Linux, FreeBSD, VMware

Applications

- Virtual Server, Compute Server, Database Server, Cloud Computing

Environments

- Operating Temperature: 10 to +35 C
- Non-operating Temperature: -40 to +60 C
- Vibration - Operating: 9.8 m/s²(1.0G) 5 to 500Hz
- Vibration - Non operating: 49 m/s²(5.0G) 15 to 500Hz
- Shock - Operating: 3,920 m/s² (400G) 2ms
- Shock - Non-Operating: 8,820 m/s² (900G) 1ms
- Operating Relative Humidity: 8% to 90% (non-condensing)
- Non-operating Relative Humidity: 5% to 95% (non-condensing)
- MTBF: 100,000 Hours
- FCC, CE, UL, RoHS Compliance