

GPU SuperServer SYS-420GP-TNAR

DP Intel System with NVIDIA HGX A100 8-GPU



Key Applications

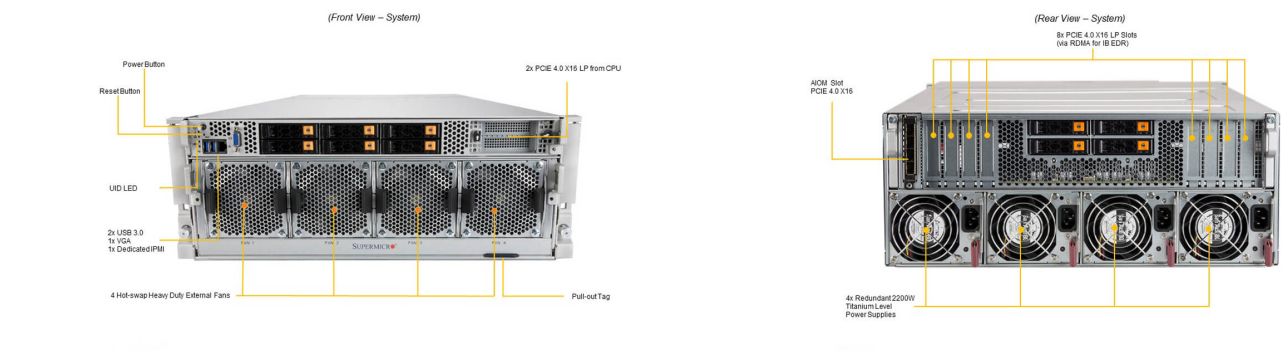
High Performance Computing, AI/Deep Learning Training,

Key Features

- Dual Socket P+ (LGA-4189) 3rd Gen Intel® Xeon® Scalable Processors;
- Intel® C621A Chipset;
- 32 DIMM Slots; Up to 8TB DRAM; Up to 8TB Intel® Optane™ Persistent Memory (up to 12TB with DRAM); 3200/2933/2666 ECC DDR4 LRDIMM; RDIMM; Intel® Optane™ Persistent Memory 200 series;
- AIOM/OCP 3.0 Support
10 PCIe Gen 4.0 X16 LP Slots;
- Flexible networking options;
- 6x 2.5" Hot-swap NVMe/SATA/SAS drive bays
2 M.2 NVMe and SATA for boot drive only;
- 4 heavy duty fans with optimal fan speed control;
- 4x 2200W redundant Titanium level power supplies;



Form Factor	4U Rackmount Enclosure: 446 x 174 x 900mm (17.6" x 6.9" x 35.4") Package: 695 x 750 x 1140mm (27.4" x 29.5" x 44.9")
Processor	Dual Socket P+ (LGA-4189) 3rd Gen Intel® Xeon® Scalable processors Up to 40C/80T; Up to 60MB Cache per CPU
GPU	Max GPU Count: Up to 8 onboard GPUs Supported GPU: NVIDIA SXM: HGX A100 8-GPU (80GB) CPU-GPU Interconnect: PCIe 4.0 x16 CPU-to-GPU Interconnect GPU-GPU Interconnect: NVIDIA® NVLink™ with NVSwitch™
System Memory	Slot Count: 32 DIMM slots Max Memory (2DPC): Up to 8TB 3200MT/s ECC DDR4 RDIMM/LRDIMM Supports Intel® Optane™ persistent memory 200 series
Drive Bays Configuration	Default: Total 6 bays • 6 front hot-swap 2.5" NVMe/SAS/SATA drive bays M.2: 2 M.2 NVMe/SATA slots (M-key)
Expansion Slots	Default • 10 PCIe 3.0 x16 LP slots
On-Board Devices	SATA: SATA (6Gbps) ; RAID 0/1/5/10 support Chipset: Intel® C621A Network Connectivity: 2 RJ45 10GbE with Intel® X550-AT2 (optional)
Input / Output	1 VGA port



System Cooling	Fans: Up to 4 heavy duty fans with optimal fan speed control
Power Supply	1x 2200W Redundant Platinum Level (94%) power supply
System BIOS	BIOS Type: AMI 32MB SPI Flash EEPROM
Management	SuperCloud Composer®; Supermicro Server Manager (SSM); Supermicro Update Manager (SUM); Supermicro SuperDoctor® 5 (SD5); Super Diagnostics Offline (SDO); Supermicro Thin-Agent Service (TAS); SuperServer Automation Assistant (SAA) New!
PC Health Monitoring	CPU: 7 +1 Phase-switching voltage regulator Monitors for CPU Cores, Chipset Voltages, Memory FAN: Fans with tachometer monitoring Pulse Width Modulated (PWM) fan connectors Status monitor for speed control Temperature: Monitoring for CPU and chassis environment Thermal Control for fan connectors
Dimensions and Weight	Weight: Gross Weight: 225 lbs (102.1 kg) Net Weight: 166 lbs (75.3 kg) Available Color: Black Front & Silver Body
Operating Environment	Operating Temperature: 10°C to 35°C (50°F to 95°F) Non-operating Temperature: 40°C to 60°C (40°F to 140°F) Operating Relative Humidity: 8% to 90% (non-condensing) Non-operating Relative Humidity: 5% to 95% (non-condensing)
Motherboard	Super X12DGO-6
Chassis	CSE-438G