

GPU SuperServer ARS-111GL-NHR

1U NVIDIA Grace-Hopper Super Chip with On board Hopper GPU and 72 core Grace CPU



[More details here](#)

Key Applications

High Performance Computing, AI/Deep Learning Training and Inference, Large Language Model (LLM) and Generative AI,

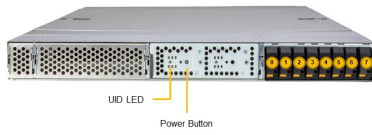
Key Features

- High density 1U GPU system with Integrated NVIDIA® H100 GPU;
- NVIDIA Grace Hopper™ Superchip (Grace CPU and H100 GPU);
- NVLink® Chip-2-Chip (C2C) high-bandwidth, low-latency interconnect between CPU and GPU at 900GB/s;
- Up to 576GB of coherent memory per node including 480GB LPDDR5X and 96GB of HBM3 for LLM applications;
- 3x PCIe 5.0 x16 slots supporting NVIDIA BlueField®-3 or ConnectX®-7;
- 9 Hot-Swap Heavy Duty Fans with Optimal Fan Speed Control;



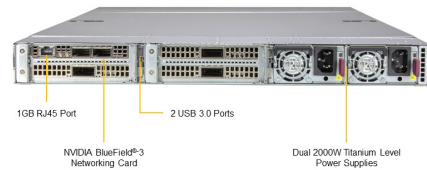
Form Factor	1U Rackmount Enclosure: 440 x 44 x 940mm (17.33" x 1.75" x 37") Package: 1219 x 241 x 711mm (48" x 9.5" x 28")
Processor	Single Socket NVIDIA GH200 Grace Hopper™ Superchip Up to 72C/144T
GPU	Max GPU Count: Up to 1 onboard GPU(s) Supported GPU: NVIDIA: GH200 Grace Hopper™ Superchip (Air-cooled) CPU-GPU Interconnect: NVLink®-C2C
System Memory	Slot Count: Onboard Memory Max Memory: Up to 480GB ECC LPDDR5X Additional GPU Memory: Up to 96GB ECC HBM3
Drive Bays	8x E1.S hot-swap NVMe drive slots (For further information on the maximum number of E1.S drives available and the use of BF3 as a storage controller please contact your Supermicro Sales Representative.) 2 M.2 NVMe
Expansion Slots	2 PCIe 5.0 x16 FHFL slot(s)
On-Board Devices	Chipset: System on Chip Network Connectivity:
Input / Output	LAN: 1 RJ45 1GbE (Dedicated IPMI port) USB: 2 USB 3.0 port(s) (2 rear) Video: 1 Mini DisplayPort(s)

(Front View – System)



Drive Bay	Description
0 - 7	8 Hot-swap EDSFF E1 S Drive Bays

(Rear View – System)



System Cooling Fans: 9 Removable heavy-duty 4CM Fan(s)

Power Supply 2x 2000W Redundant Titanium Level power supplies

System BIOS BIOS Type: AMI 64MB SPI Flash EEPROM

PC Health Monitoring

- CPU: Monitors for CPU Cores, Chipset Voltages, Memory
- FAN: Fans with tachometer monitoring
 - Status monitor for speed control
 - Pulse Width Modulated (PWM) fan connectors
- Temperature: Monitoring for CPU and chassis environment
 - Thermal Control for fan connectors

Dimensions and Weight

- Height: 1.75" (44 mm)
- Width: 17.33" (440 mm)
- Depth: 37" (940 mm)
- Gross Weight: 65.5 lbs (29.7 kg)
- Net Weight: 48.5 lbs (22 kg)
- Packaging: 9.5" (H) x 48" (W) x 28" (D)
- Available Color: Silver

Operating Environment

- Operating Temperature: 10°C ~ 35°C (50°F ~ 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 G1SMH-G](#)

Chassis CSE-MG102TS-R000NDFP