IEIT SYSTEMS Server
NF5170G7

High-density computing rack server with a streamlined design

Built on a streamlined design philosophy, the NF5170G7 series server is a cost-effective 1U 2-socket rack server that features the 4th Gen Intel® Xeon® Scalable processors. With efficient computing power and ultimate scalability, the server achieves an optimal balance between overall performance and power consumption, and meets the requirements of light-weight workloads, making it an ideal choice for high-density data centers and such mainstream computing scenarios as cloud computing and virtualization.

Applicable Model

Model	Maintenance Method	Cooling Mode
NF5170-M7-A0-R0-00	Rear I/O	Air cooling

Product Features

High computing scalability and balance between performance and power consumption

- Equipped with the 4th Gen Intel® Xeon® Scalable processors, the server supports up to 32 cores per CPU, a TDP of up to 225W, a max base frequency of 3.7GHz, and 3 UPI links per CPU at 16GT/s per link, delivering improved processing performance.
- The server supports up to 4 PCIe 4.0 expansion slots (including 1 RAID mezz slot), meeting the expansion requirements of light-weight workloads.

Streamlined design and flexible configuration

- With a streamlined design and flexible configurations, the server supports 4 front 3.5-inch drives, 2 front M.2 SSDs and 2 front E1.S SSDs or 10 front 2.5-inch SAS/SATA/NVMe drives, providing an elastic storage space so that users can expand the capacity to the required value.

Security, reliability, low carbon, and energy conservation

- The intrusion alert feature improves the physical security. The optional security bezel with a latch prevents unauthorized users from installing or removing drives, thus protecting local data.
- The server adopts the chip-level redundancy design of core components such as the BIOS and BMC, ensuring that the system can start by switching to the standby chip. It also supports the online upgrade of the BMC without suspending services, thus guaranteeing service continuity.
- The fully-optimized cooling design, energy-efficient cooling fans, and power capping and staggered spin-up technologies help minimize the power consumption of the system.
- With the focus on environmental protection, key components of the server meet the lead-free requirements (RoHS), and all packaging materials are recyclable.

Product Specifications

Item	Description
Form Factor	1U rack server
Processor	One or two 4th Gen Intel® Xeon® Scalable processors Up to 32 cores, with a max Turbo frequency of 4.1GHz 3 UPI links per CPU at up to 16GT/s per link Up to 225 W TDP
Chipset	Intel Emmitsburg
Memory	Up to 16 DDR5 DIMMs (4,800MT/s) 8 DIMMs per CPU and 16 DIMMs for 2 CPUs RDIMMs supported
Storage	**Front:** 10 × 2.5-inch SAS/SATA/NVMe drive 4 × 3.5-inch SAS/SATA/NVMe drive + 2 × M.2 SSD + 2 × E1.S SSD **Internal:** Up to 2 TF cards, 1 for BMC and 1 for PCH Up to 2 PCIe x4 M.2 SSDs
Storage Controller	RAID/SAS controller Onboard PCH that supports 14 SATA connectors Intel onboard NVMe controller and optional Intel NVMe RAID key
Network	1/10/25/40/100/200Gb PCIe NICs
I/O Expansion Slot	Up to 4 PCIe 4.0 expansion slots, including 1 RAID mezz slot
Port	Front: 1 × USB 2.0 port/LCD port, 1 × USB 3.0 port, and 1 × DB15 VGA port Rear: 2 × USB 3.0 port, 1 × DB15 VGA port, 1 × COM port (Micro USB), and 1 × RJ45 management network port
Fan	6 hot-swap dual-rotor fans with N+1 redundancy
Power Supply	1+1 redundant CRPS PSUs with the output power of 550/800/1,300W
System Management	Integrated with 1 independent 1,000Mbps network port, dedicated to IPMI remote management
Security Feature	Two-factor authentication, TPM 2.0, security bezel, intrusion alert, BMC/BIOS chip-level redundancy, power capping, etc.
Operating System	Microsoft Windows Server, Red Hat Enterprise Linux, SUSE Linux Enterprise Server, CentOS, etc.
Dimensions (W × H × D)	10 × 2.5-inch drive configuration: With mounting ears: 43mm × 482mm × 830 mm Without mounting ears: 43mm × 438mm × 800 mm 4 × 3.5-inch drive configuration: With mounting ears: 43mm × 482mm × 880 mm Without mounting ears: 43mm × 438mm × 850 mm
Weight	Weight (with all drives installed): <18kg (For more information, see the corresponding white paper.)
Operating Temperature	5°C to 45°C (For more information, see the corresponding white paper.)