



Highlights

- 12 x 2.5" drive bays in 1U, the highest capacity storage on the market
- High expandability for storage and communication
- Flexible storage with dual M.2 - Dual M.2 slots supports either SATA 6Gb/s or PCIe 3.0 x4 with 32Gb/s bandwidth to enable fast data transfers.
- Release the power of AMD EPYC™ processor
- Best-in-class memory bandwidth and capacity
- Comprehensive IT infrastructure management software — [ASUS Control Center \(ACC\)](#) IT management software and ASMB9-iKVM module support
- Smart thermal design for energy efficiency
- Server Fan Control

RS700A-E9-RS12

AMD EPYC™ platform 1U server with 12 2.5" storage bays



High expandability for storage and communication

RS700A-E9-RS12 provides numerous expansion slots to support additional storage and networking configurations, including a PCIe 3.0 x16 slot for a 4-NVMe adapter card, two PCIe 3.0 x8 slots for ASUS PIKE II HBA/RAID and 2-NVMe adapter cards, and an OCP Mezzanine x16 slot for a high-speed networking card.

Release the power of brand new AMD EPYC™ processor

RS700A-E9-RS12 is built on the brand-new AMD EPYC™ platform to deliver incredible server performance. With up to 32 cores per CPU and up to 128 threads in a single 1U server, RS700A-E9-RS12 packs incredible power in minimal space. 32 DIMM slots provide best-in-class memory capacity and bandwidth, and an integrated I/O controller on the processor eliminates the data transfer bottlenecks caused by discrete I/O chipsets for reduced latency and dramatically faster system performance.

Best-in-class memory bandwidth and capacity

RS700A-E9-RS12 supports up to 32 DDR4-2666 DIMMs for up to 4TB of RAM. An integrated I/O controller on the processor eliminates the data transfer bottlenecks caused by discrete I/O chipsets for reduced latency and dramatically faster system performance.

Smart thermal design for energy efficiency

RS700A-E9-RS12 features ASUS-exclusive thermal radar technology with temperature sensors on front panel and key components such as CPU, NVMe SSD, and OCP cards. This design provides internal and external temperature monitoring and enables dynamic fan curve adjustment, bringing fan power consumption drop by up to 20% and reducing TCO for non-stop operation such as data center.

Server Fan Control

- Adjust fan curve via BMC (rather than BIOS compared to last generation)
- Graphic user interface - more user friendly
- Flexible fan policy



Specification

Processor Support		2 x Socket SP3 (LGA 4094) AMD EPYC™ 7000 Series, xGMI (External Global Memory Interface Link)
Core Logic		System on Chip (SoC)
Memory	Total Slots	32 (8-channel per CPU, 16 DIMM per CPU)
	Capacity	Maximum up to 4096GB
	Memory Type	DDR4 2666/2400/2133 RDIMM/ LRDIMM *Please refer to www.asus.com for latest memory AVL update
	Memory Size	-
Expansion Slots	Total PCI/PCI-X/PCI-E/PIKE Slots	3+1
	Slot Type	1 x PCI-E x16 (Gen3 x16 link), FH, HL (Optional for NVME4-OCuLink Card) 1 x PCI-E x16 (Gen3 x8 link), LP 1 x PCI-E x8 (Gen3 x8 link), LP (Default for NVME2-OCuLink Card) 1 x OCP Mezzanine 2.0 (Gen3 x16 link)
	Proprietary Slot 1	-
Disk Controller	SATA Controller	8 x SATA 6Gb/s ports 2 x M.2 connectors (SATA 6Gb/s & PCI-E Gen3 x4 link)
	SAS Controller	Optional kits: ASUS PIKE II 3008 8-port SAS HBA card(Optional) ASUS PIKE II 3108 8-port SAS HW RAID card(Optional) 12G SAS Support
Storage Bays	I = internal A or S will be hot-swappable	12 x 2.5" hot-swap drive bays - (4 x NVMe+ 4 x SATA/SAS/NVMe + 4 x SATA/SAS) 2 x M.2 (22110, 2280, 2260, 2242) *SAS support via PIKE
Networking	LAN	1 x Dual Port Intel I350-AM2 Gigabit LAN Controller 1 x Management Port
Graphic	VGA	Aspeed AST2500 64MB
Auxiliary Storage Device Bay (Floppy / Optical Drive)		-
Front I/O Ports		2 x USB 3.0 ports, 1 x VGA port
Rear I/O Ports		2 x USB 3.0 ports, 1 x VGA port, 2 x RJ-45 GbE LAN ports, 1 x RJ-45 Mgmt LAN port
Switch/LED		Rear Switch/LED: 1 x Q-Code/Port 80 LED, 1 x Power switch
		Front Switch/LED: 1 x Power switch/LED, 1 x Location LED, 1 x Message LED, 1 x Storage device LED, LAN 1-2 LED
OS Support		Windows® Server 2016, Windows® Server 2012 R2 RedHat® Enterprise Linux SuSE® Linux Enterprise Server CentOS Ubuntu VMware Citrix XenServer
		Please find the latest OS support from http://www.asus.com/
Management Solution	Software	ASUS Control Center
	Out of Band Remote Management	On-Board ASMB9-iKVM for KVM-over-IP
Regulatory Compliance		BSMI, CE, FCC (Class A)
Dimension		686mm x 444mm x 44mm(1U) 27" x 17.48" x 1.73"
Net Weight Kg (CPU, DRAM & HDD not included)		12.15KG
Gross Weight Kg (CPU, DRAM & HDD not included, Packing include)		15.75KG
Power Supply (following different configuration by region)		1+1 Redundant 800W 80 PLUS Platinum Power Supply Rating: 100-127/200-240Vac, 9.4A/4.72A ,47-63Hz Class I (240Vdc, 4.6A Only for China)
Environment		Operation temperature: 10°C ~ 35°C Non operation temperature: -40°C ~ 70°C Non operation humidity: 20% ~ 90% (Non condensing)

