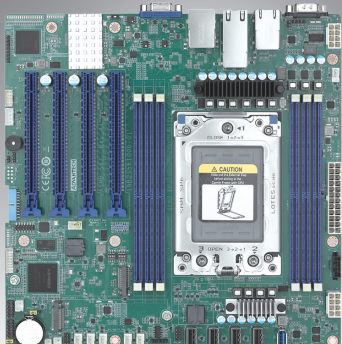


ASMB-561

AMD® EPYC™ Embedded 8004 MicroATX Server Board with 6 x DDR5, 4 x PCIe5.0 x16, up to 4 x MCIO, 5 x USB 3.2 (Gen1), Dual 10GbE, TPM2.0, IPMI



CE FCC

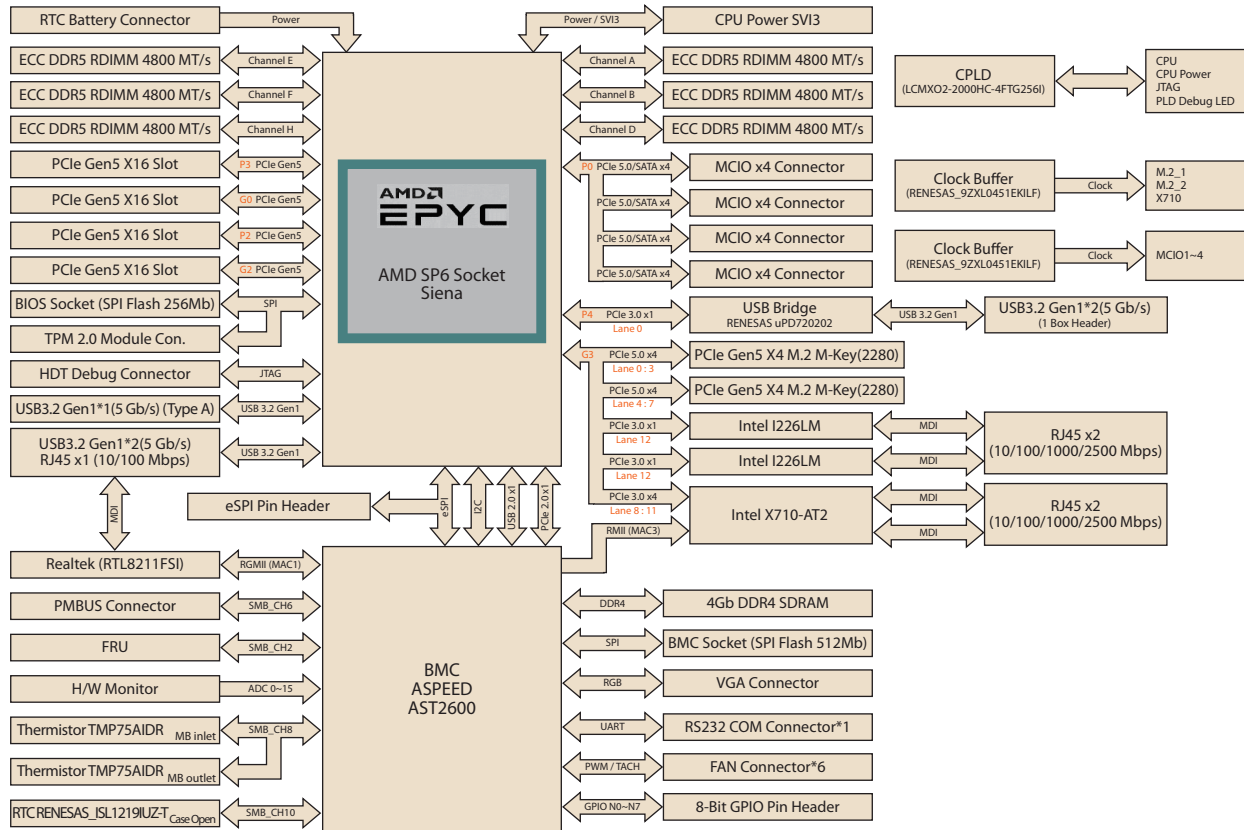
Features

- LGA 4844(Socket SP6) AMD® EPYC™ Embedded 8004 Series Server processors
- Six DDR5 4800 MHz ECC RDIMM, up to 576GB
- Four PCIe Gen5 x16 slots with CXL support on slot 4/6
- Intel® X710-AT2 dual 10GbE ports & I226 dual 2.5GbE ports
- Four MCIO interface for storage device and Five USB 3.2 (Gen1) ports
- Two M.2 2280 PCIe Gen4 x4
- TPM 2.0 on board by eSPI interface
- 0 ~ 60 °C/ 32 ~ 140 °F ambient operating temperature range

Specifications

Form Factor		MicroATX				
Processor System	Socket	AMD LGA 4844 (Socket SP6)				
	CPU type	AMD EPYC™ Embedded 8004 processors (CPU cooler should be purchased separately*)				
Memory	Total slots	6x (one DIMM per channel)				
	Capacity	Maximum 576GB ECC RDIMM				
	Memory type	DDR5 ECC-REG 3600/4000/4400/4800 MHz RDIMM				
	Memory size	16 GB, 32 GB, 64 GB (RDIMM)				
Expansion Slots	Total PCI/PCI-X/PCIe slots	4				
	Slot location 1	-				
	Slot location 2	-				
	Slot location 3	-				
	Slot location 4	PCIe x16 slot (Gen5 x16 link), CXL support				
	Slot location 5	PCIe x16 slot (Gen5 x16 link)				
	Slot location 6	PCIe x16 slot (Gen5 x16 link), CXL support**				
	Slot location 7	PCIe x16 slot (Gen5 x16 link)				
Graphics	VGA	ASPEED AST2600				
Storage	SATA controller	AMD EPYC™ CPU integrated: Eight (via MCIO interface)				
	SAS controller	-				
Networking	GbE/10GbE LAN	Intel® I226LM (2x 2.5GbE ports) /Intel® X710-AT2 (2x 10GbE ports)				
Onboard I/O Connector	PSU connector	24-pin SSI power connector + 2 x 8-pin SSI 12V power connector				
	USB connector	2 x USB 3.2 Gen1 ports (one onboard header) + 1 x Type-A USB 3.2 Gen1 port				
	Fan header	6 x 4-pin (5 for system + 1 for CPU)				
	M.2	2 x M.2 2280 (PCIe Gen4)				
	SMBus	1				
	chassis intrusion	1				
	Front LAN LED	1				
	MCIO connector	4 (2 ports for SATA3, 2 ports for PCIe5.0)				
	PS/2 KB/Mouse header	-				
	Serial port header	-				
Rear I/O Connector	External serial port	1				
	External USB port	2 (USB 3.2 Gen1)				
	VGA port	1				
	RJ-45	5 (1 port dedicated LAN and 1 port shared LAN for IPMI function)				
	PS/2 Keyboard/Mouse	-				
	Infiniband	-				
Management Solution	Software	-				
	Out of band remote management	Yes				
Monitoring	CPU temperature	Yes				
	System Monitoring	Yes				
Watchdog Timer	Output	System reset				
	Interval	Programmable 1 ~ 255 sec/min				
Power Requirement	Power On (200W CPU @2.3GHz DDR5-4800 32G*6)	V3.3	V5	V12	V12_8P	V5_SB
		0.88A	2.97A	0.38A	13.72A	0.04A
Environment	Temperature	Operating			Non-operating	
		0 ~ 60 °C/32 ~ 140 °F (CPU TDP under 200W) Also depends on CPU cooling solution			-40 ~ 85 °C/-40 ~ 185 °F	
		Humidity			10% ~ 95%	
Physical Characteristics	Dimension	244 x 244 mm (9.6 x 9.6 in)				

Block Diagram



Ordering Information

Part Number	Memory	2.5GbE/10GbE LAN	IPMI	Graphics
ASMB-561T2-00A1U	6 x DDR5 ECC-REG DIMM	2/2	Yes	AST2600
ASMB-561T2-00A1	6 x DDR5 ECC-REG DIMM	2/2	Yes	AST2600
ASMB-561I-00A1	6 x DDR5 ECC-REG DIMM	2/0	Yes	AST2600

Packing List

Part Number	Description	Quantity
1930008364	Screw for M.2 device	x2
1960117369N001	STD I/O Shield	x1
1960116618N000	PCIe I/O support	x1

Optional Accessories

Part Number	Description
1970005926N011	2U C.L R4 AMD Siena 200W 118x78x64.5mm
1970005915N001	1U H.S R4 AMD Siena 155W 119.3x78.9x25.5mm
1700035749-01	Cable MCI0 4x 38P(M) / Mini SAS 36P 60cm
1700035750-01	Cable MCI0 4x 74P(M) / MCI0 38P(M)x2 60cm
1700035751-01	Cable MCI0 4x 38P(M) / SATA 7Px4+2x5P-2.54 60cm
1960117370N001	1U IO Shield for ASMB-561

I/O View



ASMB-561T2-00A1



ASMB-561I-00A1