

CloudDC SuperServer SYS-121C-TN2R



More details here

Key Applications

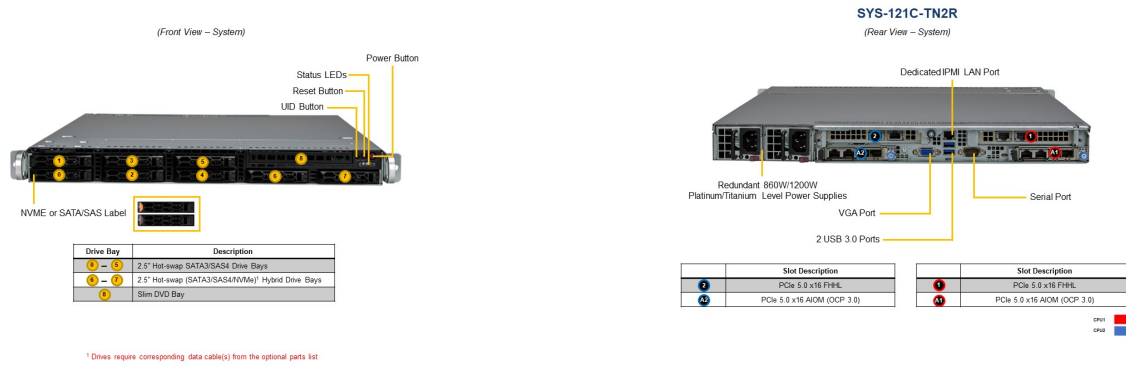
Web Server, Firewall Application, Data Center Optimized, Value IaaS, Cloud Computing, Compact Server, DNS & Gateway Servers, Firewall Application, CDN, Edge Nodes,

Key Features

- Dual sockets E (LGA-4677) 5th and 4th Gen Intel® Xeon® Scalable processors;
- 16 DIMMs up to 4TB 3DS ECC DDR5-5600: RDIMM;
- 2 PCIe 5.0 x16 FHHL; 2 PCIe 5.0 x4 NVMe M.2;
- Dual AIOM (OCP 3.0) slots with NCSI for networking, 1 dedicated IPMI LAN;
- 8x 2.5" hot-swap SATA/SAS4 w/ 2x hybrid NVME drive bays;
- 1 VGA, 1 COM, 2 USB 3.0 (rear);



Form Factor	1U Rackmount Enclosure: 437 x 43 x 597mm (17.2" x 1.7" x 23.5") Package: 605 x 197 x 822mm (23.8" x 7.8" x 32.4")
Processor	Dual Socket E (LGA-4677) 5th Gen Intel® Xeon®/4th Gen Intel® Xeon® Scalable processors Up to 32C/64T; Up to 82.5MB Cache per CPU
GPU	Max GPU Count: Up to 2 single-width GPU(s) Supported GPU: Intel PCIe: Intel Data Center GPU Flex 140 NVIDIA PCIe: A2,L4
System Memory	Slot Count: 16 DIMM slots Max Memory (1DPC): Up to 4TB 5600MT/s ECC DDR5 RDIMM
Drive Bays	8x 2.5" hot-swap NVMe/SATA/SAS drive bays (2x 2.5" NVMe hybrid)(Storage drives require additional cables from the optional parts list.) 2x PCIe 5.0 x4 (*VROC is required) M-Key, 2280
Expansion Slots	2 PCIe 5.0 x16 FHHL slot(s)
On-Board Devices	NVMe: NVMe; RAID 0/1/5/10 support (*VROC is required) SATA: SATA3 (6Gbps) via Intel® C741; RAID 0/1/5/10 support Chipset: Intel® C741 Network Connectivity: with Advanced IO Module, AIOM (OCP 3.0 NIC, refer to AIOM Network Card(s) under Optional Parts List for options) Note: High TDP 200-400G NICs have support conditions due to thermal requirements. IPMI: Support for Intelligent Platform Management Interface v.2.0 IPMI 2.0 with virtual media over LAN and KVM-over-LAN support
Input / Output	LAN: 1 Dedicated IPMI LAN port USB: 2 USB 3.0 port(s) (2 rear) Video: 1 VGA port(s) Serial Port: 1 COM Port(s) (1 rear)



System Cooling	Fans: 6x 4cm heavy duty fans with optimal fan speed control Air Shroud: 2 Air Shroud(s)
Power Supply	2x 860W Redundant Titanium Level power supplies
System BIOS	BIOS Type: AMI 32MB SPI FLASH ROM
Management	Redfish API; SuperCloud Composer; Supermicro Server Manager (SSM); Supermicro Power Manager (SPM); Supermicro Update Manager (SUM); SuperDoctor® 5; Super Diagnostics Offline ; KVM with dedicated LAN ; IPMI 2.0
PC Health Monitoring	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 CPU: Monitors for CPU Cores, Chipset Voltages, Memory. 8 Phase-switching voltage regulator
Dimensions and Weight	Height: 1.7" (43 mm) Width: 17.2" (437 mm) Depth: 23.5" (597 mm) Gross Weight: 40 lbs (18.1 kg) Net Weight: 25 lbs (11.3 kg) Packaging: 7.8" (H) x 23.8" (W) x 32.4" (D) Available Color: Black front & silver body
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 X13DDW-A
Chassis	CSE-LB13TS-R0AWNP2

Parts List

Standard Parts (Parts Included)

Motherboard / Chassis					
Part Number	MBD-X13DDW-A	CSE-LB13TS-ROAWN2			
Qty	1	1			
Description	Super X13DDW-A Motherboard	1U Chassis			
Backplane					
Part Number	BPN-SAS4-LB13A-N2				
Qty	1				
Description	1U 8-Slot 2.5				
Fan					
Part Number	FAN-0163L4				
Qty	6				
Description	40x40x56 mm, 23.3K-20.3K RPM, Counter-rotating Fan				
Parts					
Part Number	MCP-150-00015-0B	MCP-160-00028-0B	MCP-320-00067-0B		
Qty	4	1	1		
Description	Rubber pad, 3.0mm H, 10x10mm	Mylar Cable Channel for Cloud-DC, X12 DDW	Chassis base Air Foam block set (L+R) for Cloud-DC		
Front Panel					
Part Number	MCP-280-00033-0N	FPB-FP112			
Qty	1	1			
Description	Universal Thermal sensor kit with 80cm I2C cable	Front control board for SC113,113M (U/C share)			
Air Shroud					
Part Number	MCP-310-00105-0B				
Qty	2				
Description	Mylar Air Shroud for LA15-AW, LB13-AW, LB16-AW + X12DDW				
Manual					
Part Number	MNL-2523-QRG				
Qty	1				
Description	I21C-TN2R Quick Reference Guide				
Power Supply					
Part Number	PWS-861A-1R	MCP-250-00009-0N			
Qty	2	1			
Description	1U redundant 800/860W Titanium AC power supply 54.5x40x322mm	SC113 Redundant Power Distributor Cover			
Riser Card					
Part Number	RSC-D-6G5	RSC-DR-6G5			
Qty	1	1			
Description	1U LHS DCO Riser card with one PCIe 5.0 X16 slot, HF, RoH	1U RHS DCO Riser card with one PCIe 5.0 X16 slot, HF, Ro			
Software					
Part Number	SFT-OOB-LIC				
Qty	1				
Description	License key for enabling OOB BIOS management				
Heatsink / Retention					
Part Number	SNK-P0087P				
Qty	2				
Description	1U Passive CPU HS for X13 Intel Eagle Stream Platform				
*Power Distributor					
Part Number	PDB-PT116-SL8824				
Qty	1				
Description	Based on PDB-PT116-L8824 to optimize 24Pin etc cable lengths				
*Cable					
Part Number	CBL-CDAT-0680-55	CBL-PWCD-0160-1S			
Qty	1	2			
Description	NCSI, 2x10F to 2x10F, IDC, PH2.54, 55cm, shield, 28AWG, RoHS	PWCD, US, NEMA5-15P to IEC60320 C13, 6FT, 16AWG, RoHS/REACH			
*Drive Tray(s)					
Part Number	MCP-220-00188-0B				
Qty	8				
Description	Black gen-5.5 tool-less cost-effective 2.5				
*Rear Window					
Part Number	MCP-240-00173-0N				
Qty	1				
Description	1U X12 AWIO Rear window for LA15, LB16, LB13 Redundant PWS				
*Rail Set					
Part Number	MCP-290-00016-0N	MCP-290-00063-0N	MCP-290-00102-0N	MCP-290-00108-0N	MCP-290-00112-0N
Qty	1	1set	1 set	1 set	1 set
Description	1U open rack bracket set for CSE-PT51L, MCP-290-00054-0N	Rail set, quick/quick, default for 1U 17.2"W for SC113/SC116, RoHS/REACH	Outer rail, quick-release type, 25.6	Inner rail, front, short, quick-release type	Inner rail, extension, long (quick) for 1U 17.2W chassis
*Fan Holder					
Part Number	MCP-320-00056-0B	MCP-320-00066-0B	MCP-340-00035-0B		
Qty	24	1	2		
Description	40X56 rubber fan pin for SC819U, SC119U, RoHS/REACH	Fan holder with cable channel, 40X56mm fan, for LA15, LB16, LB13	Dummy fan 40x56mm for 40x56 counter-rotating fan (cost-effective)		

- Notes:
- Parts with * are inside the chassis
 - Excessive parts might not be shipped, including but not limited to excessive drive trays, fans, riser brackets, air shrouds, IO shields, cables.....etc.

Optional Parts List

3108/3908/3916 SuperCap Mount					
Part Number	MCP-240-00203-0N	MCP-240-21747-0N	MCP-240-00127-0N		
Qty	1	1	1		
Description	SuperCap mounting bracket for PCIe location	SuperCap mounting card for AIOM location	SuperCap mounting tray for 2.5" drive location		
3808 HBA Card					
Part Number	AOC-S3808L-L8IT (/products/accessories/addon/AOC-S3816-L16IT_S3808L-L8IT.php)	CBL-SAST-1276F-100 ☞Store (/products/accessories/addon/AOC-S3816-L16IT_S3808L-L8IT.php)			
Qty	1	1			
Description	Standard LP, 8 internal ports (12Gb/s) Gen-4, 16HDD; HBA;	Slimline x8 (LE) to 2x Slimline x4 (STR), 76/76CM, Alternative: CBL-SAST-1264F-100 (64 CM)			
3908 RAID Card					
Part Number	CBL-SAST-1276F-100 ☞Store (/products/accessories/addon/AOC-S3908L-H8IR-16DD (/products/accessories/addon/AOC-S3908L-H8IR_S3916L-H16IR.php))	AOC-S3908L-H8IR-16DD (/products/accessories/addon/AOC-S3908L-H8IR_S3916L-H16IR.php)			
Qty	1	1			
Description	Slimline x8 (LE) to 2x Slimline x4 (STR), 76/76CM, Alternative: CBL-SAST-1264F-100 (64 CM)	Standard LP, 8 internal ports (12Gb/s) Gen-4, 122HDD; RAID 0, 1, 5, 6, 10, 50, 60;			
3908/3916 CacheVault					
Part Number	BTR-CVPM05				
Qty	1				
Description	CacheVault for Broadcom 3908/3916 (requires a SuperCap mount)				
Add-on card for additional M.2					
Part Number	AOC-SLG4-2H8M2				
Qty	-				
Description	Low Profile PCIe x8 add-on card supports 2 PCIe 4.0 x4 M-Key M.2 NVMe/SATA Modules; RAID 0,1				
AIOM Network Card(s)					

Part Number	AOC-AG-i4SM (/products/accessories/addon/AOC-AG-i4S.php) AOC-A25G-m2SM	AOC-AG-i4M (/products/accessories/addon/AOC-AG-i4.php) AOC-AH25G-m2S2TM (/products/accessories/addon/AOC-AH25G-m2S2TM.php) AOC-ATG-i2T2SM (/products/accessories/addon/AOC-ATG-i2T2SM.php)	AOC-A25G-i4SM AOC-ATGC-i2TM AOC-A100G-b2CM (/products/accessories/addon/AOC-A100G-b2CM.php)	AOC-AG-i2M (/products/accessories/addon/AOC-AG-i2.php) AOC-ATG-i2TM (/products/accessories/addon/AOC-ATG-i2T.php) AOC-A25G-i2SM	AOC-ATG-i4SM AOC-A25G-b2SM (/products/accessories/addon/AOC-A25G-b2S.php) AOC-ATG-i2SM
Qty	-	-	-	-	-
Description	OCF 3.0 AIOM NIC, 4x 1GbE SFP, PCIe 2.1 x4, Intel® i350-AM4 OCF 3.0 AIOM NIC, 2x 25GbE SFP28, PCIe x8, Mellanox® CX-4 LX OCF 3.0 AIOM NIC, 2x 10GbE RJ45, PCIe 3.0 x4, Broadcom® BCM57416	OCF 3.0 AIOM NIC, 4x 1GbE RJ45, PCIe 2.1 x4, Intel® i350-AM4 OCF 3.0 AIOM NIC, 2x 25GbE SFP28 & 2x 10GbE RJ45, PCIe x8/x4, Mellanox® CX4 LX EN & Intel® X550-AT2, (Add 1x MCP-310-00107-0B per card to support this NIC) OCF 3.0 AIOM NIC, 4x 10GbE RJ45 & SFP+, PCIe x8, Intel® X710-TM4	OCF 3.0 AIOM NIC, 4x 25GbE SFP28, PCIe x8, Intel® E810-CAM1 OCF 3.0 AIOM NIC, 2x 10GbE RJ45, PCIe 3.0 x4, Intel® X710-AT2 OCF 3.0 AIOM NIC, 2x 100GbE QSFP28, PCIe 4.0 x16, Broadcom® BCM57508	OCF 3.0 AIOM NIC, 2x 1GbE RJ45, PCIe 2.1 x4, Intel® i350-AM2 OCF 3.0 AIOM NIC, 2x 10GbE RJ45, PCIe 3.0 x4, Intel® X550-AT2 OCF 3.0 AIOM NIC, 2x 25GbE SFP28, PCIe x8, Intel® E810-XXAM2	OCF 3.0 AIOM NIC, 4x 10GbE SFP+, PCIe 3.0 x8, Intel® XL710-BM1 OCF 3.0 AIOM NIC, 2x 25GbE SFP28, PCIe x8, Broadcom® BCM57414 OCF 3.0 AIOM NIC, 2x 10GbE SFP+, PCIe 3.0 x8, Intel® X710-BM2
Cable Management Arm Part Number	MCP-290-00152-0N «Store (https://store.supermicro.com/1u-cable-management-arm-mcp-290-00152-0n.html)				
Qty	1				
Description	1U Supermicro Cable Management Arm 2nd Gen				
DVD Reader Part Number	CBL-0234L «Store (https://store.supermicro.com/supermicro-15cm-4-pin-peripheral-to-2x-4-pin-peripheral-connector-cable-cbl-0234l.html)	DVM-TEAC-DVDRW-SBT5	CBL-SAST-1295LP-100	CBL-0161L	MCP-220-81502-0N «Store (https://store.supermicro.com/dvd-mounting-kit-mcp-220-81502-0n.html)
Qty	1	1	1	1	1
Description	Big-4-pin M Y-split to two Big-4-pin F	BLACK TEAC SLIM DVD-RW SATA DRIVE	SlimlineLP x4 (STR) to 4x SATA (STR),75/75/90/90/75CM	15 cm power Y-split to 2x small 4-pins	Slim SATA DVD mounting kit. Add 1 per DVD
Front USB Kit Part Number	MCP-220-00087-0B «Store (https://store.supermicro.com/mcp-220-00087-0b.html)				
Qty	1				
Description	Black USB tray for slim DVD bay				
Intel VROC Key Part Number	AOC-VROCSTNMOD (/products/accessories/addon/AOC-VROCCxxMOD.php) «Store (https://store.supermicro.com/supermicro-vroc-standard-module-1.html)	AOC-VROCPREMOD (/products/accessories/addon/AOC-VROCCxxMOD.php) «Store (https://store.supermicro.com/supermicro-vroc-premium-module.html)	AOC-VROCNINTMOD (/products/accessories/addon/AOC-VROCCxxMOD.php)		
Qty	1	1	1		
Description	Intel VROC Standard, RAID 0, 1, 10	Intel VROC Premium, RAID 0, 1, 5, 10	Intel VROC, RAID 0, 1, 5, 10 (Intel SSD Only)		
NC-SI Cable Part Number	CBL-PWEX-1099-34				
Qty	1				
Description	FLAT, IDC 2X11F/P1.27 TO IDC 2X11F/P1.27, NCS1, 0.5A, 35CM				
NVMe Cables Part Number	CBL-MCIO-1235M5Y «Store (https://store.supermicro.com/mcio-x8-to-2-x4-str-35cm-30awg-rohs.html)				
Qty	1				
Description	MCIO x8 STR to MCIO 2 x4 STR, 35CM				
Power Supply Upgrade Part Number	PWS-1K27A-1R «Store (https://store.supermicro.com/1000w-1200w-1u-pws-1k27a-1r.html)				
Qty	2				
Description	1200W Redundant Titanium Power Supply				
SATA Cables Part Number	CBL-SAST-1274LP-100				
Qty	1				
Description	SlimlineLP x8 (LE) to 2x Slimline x4 (STR), 68/76CM				
Software Part Number	SFT-DCMS-Single	SFT-SDDC-SINGLE			
Qty	1	1			
Description	Supermicro System Management Software License	Supermicro Data Center Monitor License			
TPM security module Part Number	AOM-TPM-9672V-FIPS	AOM-TPM-9670V	AOM-TPM-9672V	AOM-TPM-9670V-S-FIPS	
Qty	1	1	1	1	
Description	SPI capable TPM 2.0 with Infineon 9672 controller w/ FIPS; vertical form factor	SPI capable TPM 2.0 with Infineon 9670 controller; vertical form factor	SPI capable TPM 2.0 with Infineon 9672 controller; vertical form factor	SPI capable TPM 2.0 with Infineon 9670 controller w/ FIPS; vertical form factor	

[Global SKU \(/en/products/SMC_global_skus\)](#)