



Intel® ATOM C3000 based Ruggedized Fanless system

Intel® ATOM C3000 based Ruggedized Fanless uCPE

Product Description

Silicom's uCPE are based on the Intel® ATOM C3000 Ruggedized fanless product line is a high-performance network edge device that brings the LAN, WAN, management, and compute to cost-sensitive applications in SD-WAN, uCPE, security, 4G/5G Small Cell, and IoT.

Rugged platform offers high MTBF based on extended temp processors and no moving parts solution as well as sealed chassis for humidity and dust. Rugged platform also offers range of Wireless connectivity solutions include WiFi 802.11ax and LTE (5G ready).



Use Cases:

- Fixed Wireless Access (FWA)
- Secure Access Service Edge (SASE)
- WAN Edge gateway

Technical Specifications

General Technical Specifications	
CPU	Intel® ATOM C3000* *SKU are defined in PN ordering information
BIOS	Core boot
BIOS Flash	SPI – Dual redundant
Operating System	Linux
Memory	Two Channels, Memory Down, SODIMM, Up to 32GB, ECC Support, 2133 MTs
Storage	Soldered down eMMC, M.2 M-Key SATA (supports for 2230/42/60/80), J13 M.2 B-Key SATA (HSIO config) / USB2 and USB3 (support for 2230/42/60/80), J22 1xSATA for 2.5" SSD/HDD: J17 (Only in 8C system) 1xSATA DOM (SATA DOM supports +5V): J16 (Only in 8C system)
Ethernet ports	Up to 8 ports: 2 x1GbE RJ45 x via C3000/x553 through Marvell 88E1514P, 4x 1GbE RJ45 via i350AM4 (with optional +2x1GbE (POE+), or 2x 1GbE RJ45 w/ i350AM2 no POE+.

	2x 1GbE Combo (UTP or SFP), 2x via C3000/ x553 through Marvell 88E1543, SFP slots support 3W each. Supports for SR-IOV
Console	RS232 RJ45 (Cisco pinout) on front panel Default, 115200
USB 3.0	1x USB 3.0 on front panel
mPCIe	2x mini PCIe expansion slots
LTE	mini-PCIe Slot. PCIe x1G3 or USB 3.0 and USB 2.0. Externally accessible SIM slot on CS/ PCB. J9 M.2 LTE Slot (B-Key). USB 3.0 USB 2.0 Externally accessible SIM slot on PS/ PCB J30
WiFi	Support for 2x mini-PCIe slots which supports simultaneous dual-band
Buttons	Reset Button (programmable through 8051 MCU) Short tap (<7 seconds) will cause platform reset. Long tap (>7 seconds) will be used for resetting to defaults. Power Button (programmable through 8051 MCU) Very short tap filter (< 2 seconds) – tap shorter than 2 second will be filtered Short tap (>2 seconds) – initiate graceful shutdown to host CPU Long tap (>13 seconds) – hard shutdown for immediate power off
LED's	Tri-color Power LED Tri-color Status LED (programmable) LED's integrated in RJ45's
Other Hardware	Battery for RTC Watchdog
Form Factor	Desktop Form Factor, (WxDxH) = 228x220x44mm Rack Mount option Wall Mount option OEM branding option
Power	12V@90W External Power Adapter with locking connector. Optional: 54V@65W External Power Adapter with locking connector for POE+ ports Optional: Dying Gasp
Sensors/Monitors	Thermal protection Critical Error Detection Voltage monitors Current protection
Operating Temperature	0°C – 50°C
Storage Temperature	-20°C – 70°C
Regulation	CE Class B FCC Class B Compliance with European directives for EMC, Low Voltage, RoHS and WEEE EMC-Compliance and test report for ETSI ES 201 468 Level2, EN55022, EN55024, EN 300 386 Compliance and test report for IUT-K21 enhanced Safety: compliance and test report for EN 62368-1, EN 60950-1, UL 62368-1

Order Information

P/N	Description	RMN:	RTN:	Notes:
90500-0159-G01	uCPE, Desktop/ C3558(4C)/8GB DDR4 w/ECC/ 64GB EMMC/6x1GbE	IA3300	IA3300.00	Ruggedized