

VT-MITX-APL Single Board Computer

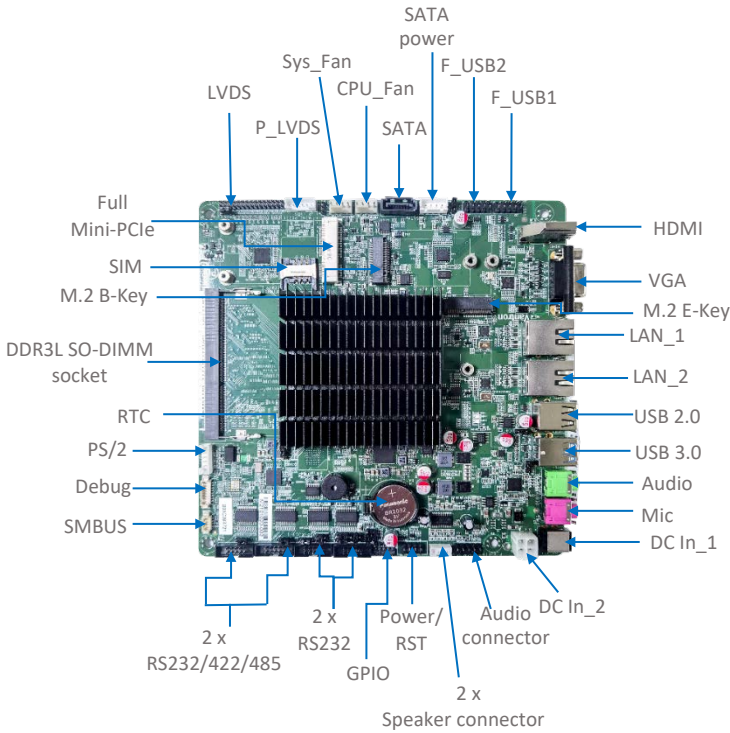


Product Brief Introduction









VT-MITX-APL Single Board Computer is in line with international industry size standards. It is powered by Intel® Celeron® APL-N3350 quad core processor, and customers have the choice between Windows 10 and Linux operating systems. The board supports multi-channel display outputs and high-definition video encoding and decoding technology to provide outstanding visual experience. Better yet, it provides rich on-board interfaces and customer expansion options to meet different application scenarios including smart retail, self-service terminals, industrial automation, intelligent medical health, and digital media.

Featuring high flexibility and high performance, the board could work under extreme environments with extended temperatures ranging from -20°C to +60°C, making it a reliable industrial IoT solution.

Exterior and Features



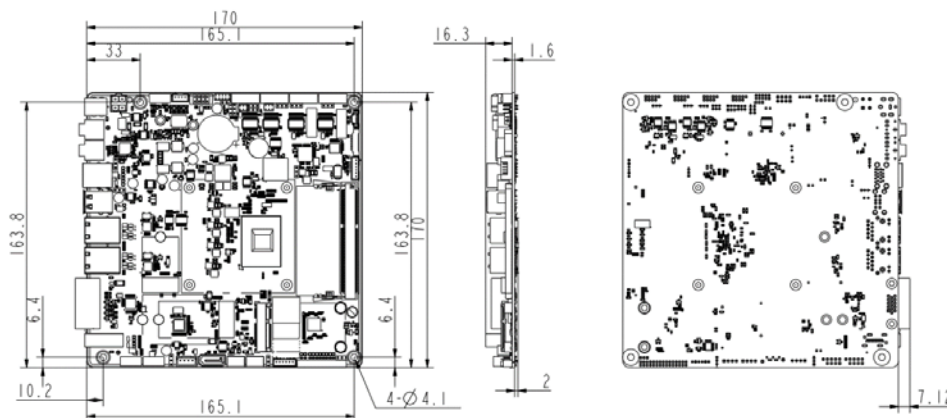
VT-MITX-APL

-  Windows 10 operating system
-  Supporting up to 8GB DDR3L, 1866 MHz
-  Rich interfaces, flexible expansion
-  High-definition video encoding and decoding
-  TPM module
-  RTC supported
-  USB 2.0 & USB 3.0
-  Wide temperature range supported

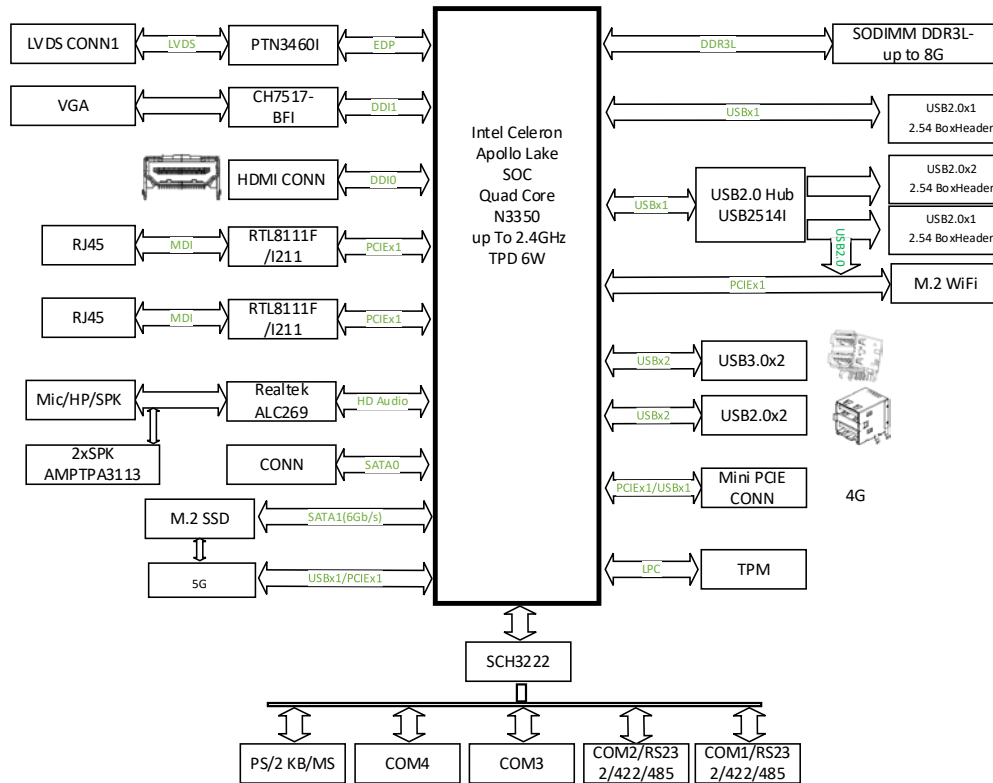
VT-MITX-APL Single Board Computer Datasheet

VT-MITX-APL		
System	CPU	Intel® Celeron®, APL-N3350, Quad-core processor, 2.4GHz (Max.) (Optional: N4200)
	Memory	DDR3L SO-DIMM socket, 1866 MHz, up to 8GB
	Storage	1 x SATA 3.0
Communication	Ethernet	2 x RJ45, 10/100/1000Mbps
Media	Display	1 x HDMI 1.4b, 3840 x 2160 @30Hz 1 x Dual-channel LVDS, 1920 x 1200 @30Hz 1 x VGA, 1920 x 1200 @60Hz
	Audio	1 x 3.5mm Audio jack 1 x 3.5mm Mic jack
I/Os	Serial	2 x RS232 2 x RS232/RS422/RS485
	USB	2 x USB 2.0 Type-A 2 x USB 3.0 Type-A 4 x Built-in USB 2.0
	GPIO	8 x GPIO
	SMBus	1 x SMBus
	RTC	Supported
	Others	1 x PS/2 connector 2 x Standard fan connector
Expansion	Slot	1 x Full Mini-PCIe for 4G with SIM slot 1 x M.2 B-key, 2242 for SATA SSD or 3052 for 5G 1 x M.2 E-key 2230, for Wi-Fi & BT
Security	TPM	1 x TPM
System Control	Button	1 x Standard power/reset button
	Indicator	1 x Status LED
Power	Input	12V DC
	Consumption	10W+
Software	Operating system	Windows 10, Linux
	OTA tool	BlueSphere OTA
Mechanical	Dimensions	MITX standard board, 170mm x 170mm
	Cooling mode	Fan, heat sink
Environment Condition	Temperature	Operating: -20°C~+60°C
	Humidity	RH 10%-85% (Non-condensing)
	Certification	RoHS

Product Outlines



Block Diagram



Company Profile

Since 2002 established by two Silicon Valley entrepreneurs, Vantron Technology has been a pioneer in connected IoT devices and IoT platform solutions. Today, Vantron serves countless customers all over the world, some of them are Fortune 500 companies. Products lines cover edge intelligent hardware, IoT communication devices, industrial displays and BlueSphere cloud device management platform.

Vantron has 20 years of experience in R&D of embedded edge intelligent hardware like SOM board and motherboard, and provided users with various embedded solutions with ARM and X86 architecture. From Linux to Windows, from embedded to desktop level, from gateway to server. At the same time, we provide our users with system clipping, driver transplation and other services.

Vantron IoT communication devices support multi-protocol connection of industrial equipment, edge computing of local data. Abundant wired and wireless connectivity make remote operations and maintenance possible. From electricity and transportation to smart retail, medical and warehousing, Vantron IoT communication device can be deployed anywhere in any business section. Vantron believes its IoT solution to help many companies finish their digital transformation, efficiency of manufacturing and productivities have been improved significantly.

Vantron industrial display systems, ARM and X86 series, are equipped with Rockchip, NXP, MediaTek, Intel and other high-performance processors. It supports various operating systems such as Windows, Linux, and Android. Diverse wireless communications keep your device online all the time. Multiple installation methods make it suitable for a variety of application scenarios. Features like waterproof, dustproof, shatter resistant guarantee the best performance in any environment.

Vantron BlueSphere device management platform, a software product, is playing a big role in Vantron overall IoT solution. Today, Vantron puts more focus on offering complete cost effective, leading-edge yet reliable solutions to help customers carry out their visions.