



Your Partner in Innovation
Embedded Solutions

VEST PICO-ITX 2.5" Single Board Computer (SBC)

The compact VEST PICO-ITX SBC family provides scalable performance, spanning the i.MX8M Plus to the i.MX93 processors. It offers comprehensive multimedia (MIPI, HDMI, audio) and industrial communication support. Critical for AI/ML, the M.2 Key E interface accelerates operations using the Hailo-8 module or the NXP Kinara ARA-2 for generative AI use cases.



Applications

- HMI (Commercial, Industrial)
- Vision Systems (Smart Cameras)
- Industrial Automation, Robotics & Edge Gateways (Industry 4.0)
- Voice Recognition, Audio Intercom, Audio & Video Communication
- Smart POS, Smart Retail & Digital Signage
- Energy Management (EV Charging, Metering, Smart Grid)
- Test & Measurement, Healthcare & Medical Devices



100mm x 72mm (Carrier Board)
30mm x 30mm (OSM Size-S)

Specifications

- **VEST PICO ITX i.MX8M Plus:**
Up to Quad-Core Cortex®-A53, Cortex®-M7, 2D/3D graphics, NPU (2.3 TOPS), 4GB RAM, 32GB eMMC, Micro SD slot, Hailo-8/8L AI module (Optional)
- **VEST PICO ITX i.MX93:**
Up to Dual-Core Cortex®-A55, Cortex®-M33, PXP, NPU (Arm Ethos™-U65 0.5 TOPS), 2GB RAM, 16GB eMMC, Micro SD slot
- **VEST PICO ITX i.MX 8ULP:**
Dual-Core Cortex®-A35, Cortex®-M33, 2D/3D graphics & PXP, 2GB RAM, 16GB eMMC, Micro SD slot
- **Operating System**





VEST PICO ITX i.MX8M Plus

VE8MPN4PX530C/VE8MPN4PX530I/
VE8MPN4PX53H8C/VE8MPN4PX53H8I/
VE8MPN4PX53H9I

Arm® Cortex®-A53 (Quad-core),
EdgeLock® Secure Enclave
1x HDMI 2.0 Type A, 1x HDMI 1.4 Type A
1x with I2C Touch & Backlight
1x MIPI CSI-2 (4-Lane)
2x Gigabit Ethernet (1x TSN)
USB: 1x Type-C (3.0), 2x Type-A (3.0),
1x Header (2.0)
M.2 Key E 2230 slot: 1x PCIe (1-Lane),
1x SDIO, 1x UART, 1x SAI, 1x I2C,
AI modules (Hailo-8/8L)
1x RTC & Coin Battery
USB Type-C with PD (up to 20V, 3A)
NXP Real-Time Edge Software,
Matter, NXP eIQ®



VEST PICO ITX i.MX93

VE9352PTX420C/VE9352PTX420I

Arm® Cortex®-A55 (Dual-core),
EdgeLock® Secure Enclave
1x HDMI 1.4 Type A
1x with I2C Touch & Backlight
1x MIPI CSI-2 (2-Lane)
2x Gigabit Ethernet (1x TSN)
USB: 1x Type-C (3.0), 2x Type-A (3.0),
1x Header (2.0)
M.2 Key E 2230 slot: 1x SDIO, 1x UART,
1x SAI, 1x I2C
1x RTC & Coin Battery
USB Type-C with PD (up to 20V, 3A)
NXP Real-Time Edge Software,
NXP eIQ®, HailoRT



Picture does not represent the actual product

VEST PICO ITX i.MX 8ULP

VE8ULP2PTX420C

Arm® Cortex®-A35 (Dual-core),
EdgeLock® Secure Enclave
1x HDMI 1.4 Type A (via MIPI DSI, No Audio)
1x MIPI CSI (2-lane)
1x Camera LED FFC (SPI, I2C)
1x 10/100 Mbps RMII for Ethernet
USB: 1x Type-C DRP (2.0), 2x Type-A (2.0),
1x Header (2.0)
M.2 Key E 2230 slot: 1x SDIO, 1x UART,
1x SAI, 1x I2C
1x RTC & Coin Battery
USB Type-C with PD (up to 20V, 3A)
NXP Real-Time Edge Software, NXP eIQ®



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SCANDIT



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