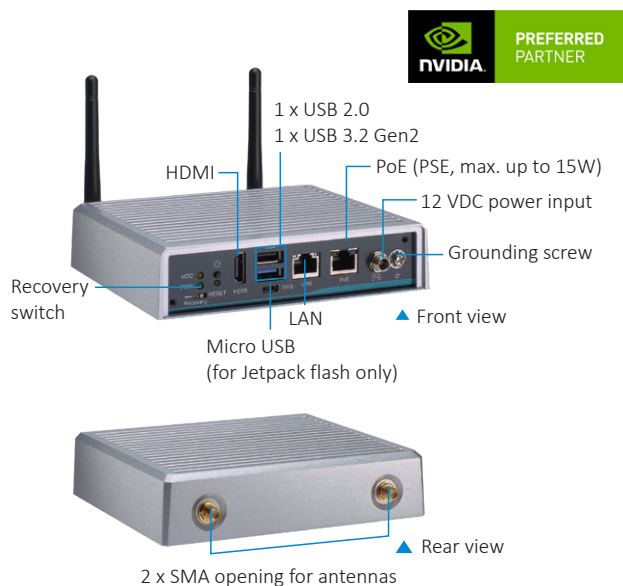# AIE100-ONA NEW

Fanless Edge AI System with NVIDIA® Jetson Orin™ Nano SoM, 1 HDMI, 1 GbE LAN, 1 GbE PoE, and 2 USB, Remote Management Service Empowered by Allxon

NVIDIA. PREFERRED PARTNER

1 x USB 2.0
1 x USB 3.2 Gen2
HDMI
PoE (PSE, max. up to 15W)
12 VDC power input
Grounding screw
Recovery switch
LAN
▲ Front view

Micro USB
(for Jetpack flash only)

▲ Rear view
2 x SMA opening for antennas

Features

- NVIDIA® Jetson Orin™ Nano, up to 1024-core NVIDIA Ampere GPU
- High AI computing performance for GPU-accelerated processing
- Ideal for edge AI smart city applications
- Supports one 15W GbE PoE for camera
- Wide operating temperature from -20°C to +50°C
- JetPack supported
- Supports 24/7 secure remote monitoring, control, and OTA deployment empowered by Allxon

NVIDIA® Jetson Orin™ Nano available through to 2028*
The official end of life notice will be sent for at least 8 months before the last shipment.

IP42 | Fanless | Low Power | LPDDR5 | 4K Ultra HD | 12VDC | NVIDIA Jetson Orin Nano

Specifications

Standard Color	Silver
Construction	Aluminum extrusion and heavy-duty steel, IP40 (IP42 by optional cover kit)
AI Accelerator	NVIDIA® Jetson Orin™ Nano
CPU	6-core Arm® Cortex®-A78AE v8.2 64-bit CPU 1.5MB L2 + 4MB L3
GPU	4GB: 512-core NVIDIA Ampere architecture GPU with 16 Tensor Cores 8GB: 1024-core NVIDIA Ampere architecture GPU with 32 Tensor Cores
System Memory	4GB: 4GB 64-bit LPDDR5 onboard 8GB: 8GB 128-bit LPDDR5 onboard
Carrier Board	SBC87903
System I/O Outlet	1 x HDMI 1.4 with 4K2K supported 1 x 10/100/1000 Mbps Ethernet (via Jetson Orin™ Nano) 1 x 10/100/1000 Mbps PoE (Intel® i210-IT; max. up to 15W) 1 x USB 3.2 Gen2, 1 x USB 2.0 1 x Micro USB for image flash 1 x Recovery switch 1 x Reset button 1 x Power button 1 x 12 VDC power input connector 2 x SMA-type antenna connector
Watchdog Timer	Built-in Orin Nano
Storage	1 x M.2 Key M 2280 with PCIe x4 NVMe SSD slot *The bootable device supported by NVMe only
Expansion Interface	1 x Full-size PCI Express Mini Card slot (USB + PCI Express signal) 1 x SIM slot
System Indicator	1 x Green LED for system power-on 1 x Yellow LED for M.2 storage
Power Supply	12 VDC screw type

AXIOMTEK

Specifications

Operating Temperature	-20°C to +50°C (-4°F to +122°F)
Humidity	10% - 95%, non-condensing
Vibration Endurance	3 Grms with M.2 (5 to 500Hz, X, Y, Z directions)
Dimensions	148.6 mm (5.85") (W) x 129.8 mm (5.11") (D) x 34.6 mm (1.36") (H)
Weight (net/gross)	1 kg (2.20 lb)/1.6 kg (3.52 lb)
Certifications	CE, FCC Class A
OS Support	Linux Ubuntu 20.04 or later

Remote Management Enrollment

Allxon Portal – Enroll in 24/7 secure service to get the full feature of remote device management on one centralized cloud portal
*Enrollment Page: https://allxon.com/jetson/device_enroll/

Packing List

1 x Screw pack
4 x Foot pad

Power Protection

DC Adapter
OVP (over voltage protection)
OCP (over current protection)
UVP (under voltage protection)
SCP (short circuit protection)

Ordering Information

Standard

AIE100-ONA-4GB	Fanless edge AI system with NVIDIA® Jetson Orin™ Nano 4GB SoM, 1 HDMI, 1 GbE LAN, 1 GbE PoE and 2 USB
AIE100-ONA-8GB	Fanless edge AI system with NVIDIA® Jetson Orin™ Nano 8GB SoM, 1 HDMI, 1 GbE LAN, 1 GbE PoE and 2 USB

Optional

8817H1003A0E	Wall mount kit
8817H1001A0E	DIN-rail kit
8817H1006A0E	VESA mount kit
8817H1002A0E	IP42 cover kit
M.2 NVMe SSD 128GB or above	
LTE module	
Wi-Fi module	
Power cord	
50966124050E	12V/60W adapter

* Specifications and certifications may vary based on different requirements.

Dimensions