

EdgeAI-ORN

Edge-AI computer with NVIDIA® Jetson Orin™ NX/Nano

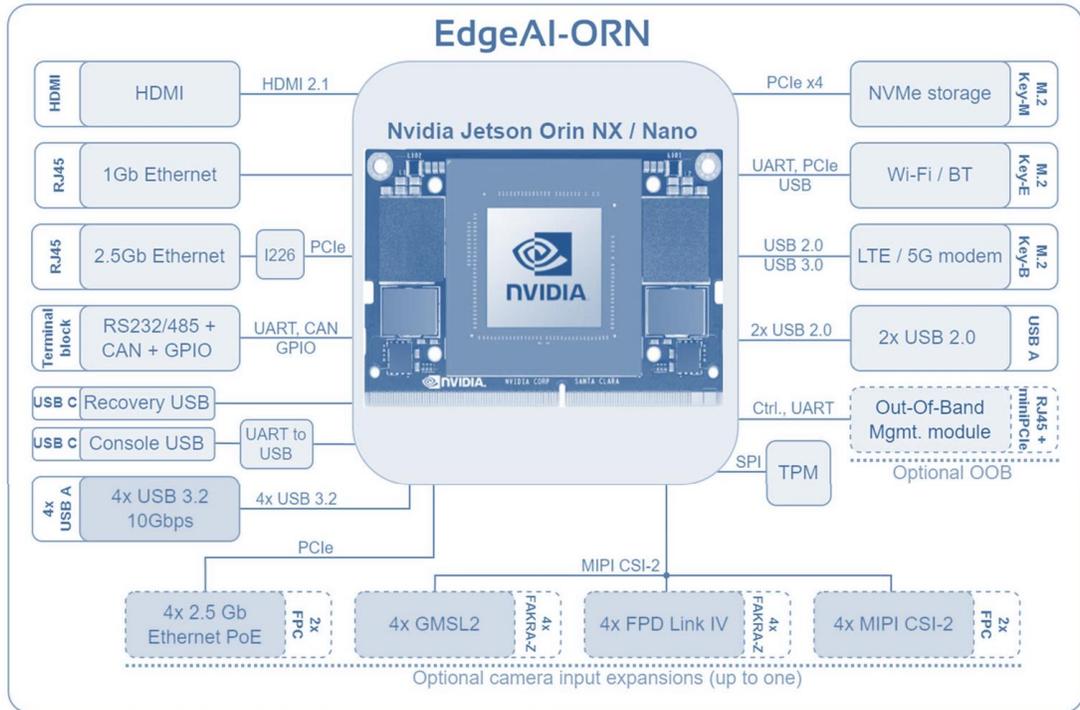


Computation module	16 GB	Up to 157 TOPS 16GB LPDDR5 10W / 15W / 25W / 40W
	8 GB	Up to 117 TOPS 8GB LPDDR5 10W / 15W / 25W / 40W
	8 GB	Up to 67 TOPS 8GB LPDDR5 7W / 15W / 25W
	4 GB	Up to 34 TOPS 4GB LPDDR5 7W / 10W / 25W
Storage	M.2 Key-M	PCIe Gen. 4 ¹ × 4, size up to 2280 for NVMe
Serial/GPIO	Serial port	Isolated RS-232/422/485 on terminal block Isolated CAN bus on terminal block
	GPIO	2 × GPI + 2 × GPO
Display		HDMI 2.1, up to 8K @ 30Hz
Wireless Connectivity	M.2 Key-E	For Wi-Fi/BT M.2 2230 module
	M.2 Key-B	For M.2 LTE/5G modem
Ethernet, standard		1 × 2.5Gbps Ethernet from Intel® i226 on RJ45
		1 × 1Gbps Ethernet from Jetson module on RJ45
USB		2 × USB 2.0 on Type-A 4 × USB 3.2 10 Gbps (20 Gbps in total) – camera input
PoE camera input*	4 × 2.5 GbE	4 × 2.5Gbps PoE Ethernet from Intel® i226 on RJ45 4 × 15.4W PoE power delivery ²
SerDes camera input*		4 × GMSL2 deserializer input on FAKRA Z 4 × Power over Coax, 12V up to 1A
		4 × FPD Link IV deserializer input on FAKRA Z 4 × Power over Coax, 12V up to 1A
MIPI CSI-2 input*		4-lane MIPI CSI-2 v3.0, 2.5Gbps per pair, on 2 FFC connectors 2 × 22-position, Jetson Orin standard pin-out
TPM		TPM 2.0, SLB9670
Out-of-band module*		Allxon Bolt OOB enabler w/ dedicated Ethernet/modem
Debug and recovery ports	Recovery port	USB recovery port on USB Type-C
	Debug console port	Serial debug console w/ UART-to-USB on USB Type-C
OS support	Nvidia Jetpack 6.2	NVIDIA Jetson Linux 36.4.3 (Jetpack 6.2 on Ubuntu 22.04)
Power input	DC input	9–36V DC power input ² on a power jack with twist-locking
Operating Environment	Operation temperature	Commercial: 0–50°C, Industrial: –25–75°C
	Humidity	5–95% non-condensing
Heat dissipation	Cooling	Passive/active cooling
	Optional external fan	External speed-controlled fan for enhanced heat dissipation
Physical Characteristics	Dimensions	157 × 130 × 59 mm (75 mm with fan)
	Weight Mounting	~1.2kg Side/bottom VESA/DIN rail mount

* Optional

1 The NVMe interface of Orin Nano modules is limited to Gen. 3

2 PoE input expansion requires at least 12V DC input



	Interface	Connector
Front Panel	4x USB 3.2 Gen. 2	4x USB Type-A
	HDMI 2.0	HDMI
	Recovery port	USB Type-C
	2x 2.5/1Gb Ethernet ports	2x RJ45
	2x USB 2.0	2x USB Type-A
	9–36V DC power input ²	1x 5.5 mm power jack with twist-locking
	Console port	USB Type-C
	Isolated RS-232/422/485	Terminal block
	Isolated CAN bus	Terminal block
	Isolated 2 x GPI + 2 x GPO	Terminal block
	Power button	On/Off push button with power LED
	2 x antennas for Wi-Fi/BT or modem	2 x SMA
	Optional Camera input expansion 4 x PoE	4 x RJ45
	Optional Camera input expansion 4 x GMSL2	4 x FAKRA Z
Optional Camera input expansion 4 x FPD Link IV	4 x FAKRA Z	
Rear Panel	Micro-SIM Tray for M.2 LTE/5G modem	Micro-SIM Tray
	4 x antennas for Wi-Fi/BT or modem	4 x SMA
	Optional OOB management module	RJ45, Micro-SIM slot, LEDs + buttons

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Need more information? Download at edge.compulab.com