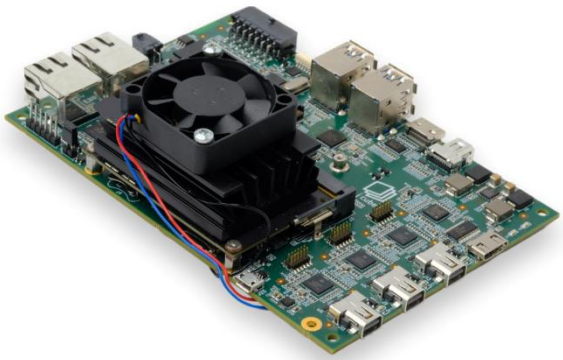
SBC Lightfront AI



MAS Elettronica is proud to announce the Lightfront AI SBC by JCUBE powered by nVidia SOM

Processor Support

NVIDIA® Jetson Nano™ System-on-Module

Software Support

Linux kernel 4.9.x
Ubuntu 18.04 LTE
Jet Pack 4.4.1

RS-485

Application Areas

INDUSTRIAL & AI

MEDICAL

AUTOMOTIVE

The SBC board hosts the nVidia Jetson SOMs which have the performance and capabilities needed to run modern AI workloads, making it possible to add advanced AI to any product. NVIDIA® SOMs brings AI to a world of new embedded and IOT applications, including entry-level network video recorders (NVRs), home robots, and intelligent gateways with full analytics capabilities. Support for both the Jetson Nano and the Jetson Xavier NX SOM, the world's smallest AI supercomputer for embedded and edge systems, is possible.

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MADE in ITALY
Design & Production

SBC Lightfront AI

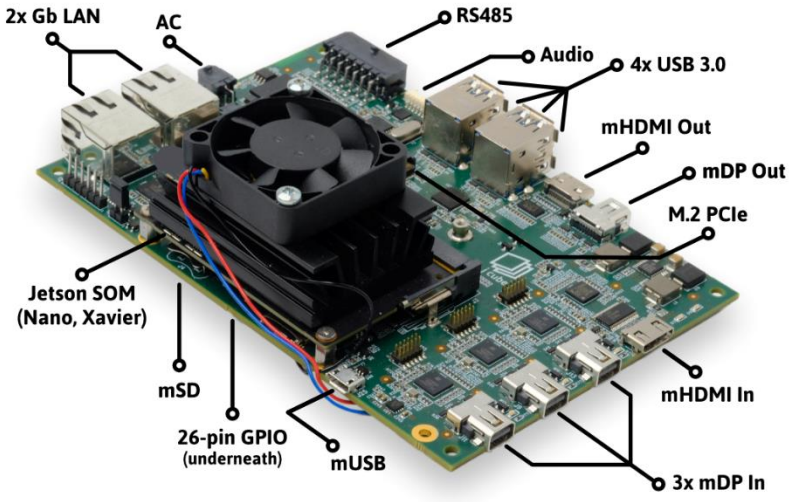
FEATURES OF THE BOARD

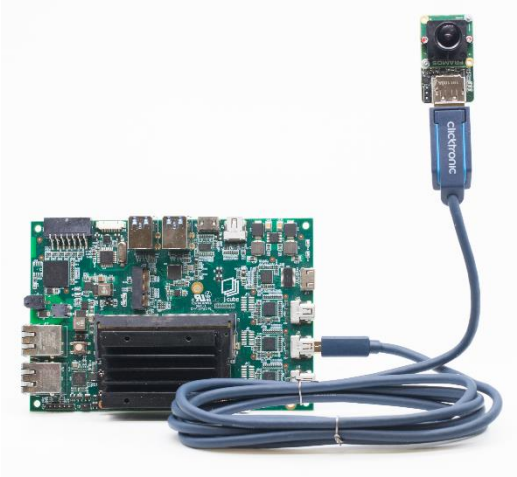
Feature	Description
AI Board	NVidia® Jetson Nano™
	Quad Core ARM® Cortex®-A57 MPCore Processor
System Memory	4GB LPDDR4
Storage Device	16Gbyte eMMC and uSD up to 128Gbyte
Display Interface	HDMI 2.0 x 1, DP 1.4 x1
Ethernet	10/100/1000Base-TX x 2 RJ45
Wireless	M.2. PCIe support WiFi/Bluetooth over PCIe WLAN-AC. Suggested with 8265 INTEL
I/O	USB3.0 x 4 (USB Type A) 26-pin I/O x 1 (GPIO/I2S/I2C/SPI/UART) OS Flash port x 1 (Micro USB) Recovery port x 1
AUDIO	•HDMI audio support. •USB audio Codec. •Analog audio input over analog mic. •Analog output with PA 4W (4/8/16 ohm).
Serial Ports	•2x Medium bandwidth (5Mbps), high-concurrency (low latency), native UART RS485. •4x High bandwidth (20Mbps) UART RS485 serial over PCIe with automatic hardware half-duplex switch. •1x TTL Serial port for console. •1x TTL Serial port for general purpose.
Camera Interface	3 x **CSI** x4 input through Display port connector Up to 4K UHD (3840×2160) @38fps, YUV422. Up to 2K 1080p (1920×1080) @60fps, YUV422. 1 x **mHDMI** input for Profetional camera support Up to 1080p (1920×1080) @60fps, YUV422.

Feature	Description
Software support	Linux kernel 4.9.x , Ubuntu 18.04 LTE Jet Pack 4.4.1
Mechanical Dimentions	147×99×29 mm (without active cooler).
Power Supply	9-36V DC
Power consumption	9-12W
Longevity	Long Term Avaibility

ORDERING

ORDERING CODE	DESCRIPTION
SBC_002_0_0	Full feature board





SENSOR MODULE

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