

# IES-2031

Fanless Embedded Edge System with Intel® processor N series and X series



## Features

- Intel® processor N series and X series
- Onboard LPDDR5/eMMC
- 12 VDC
- TPM 2.0
- Support LAN, COM, USB, Display
- Optional 4G LTE, 5G, Wi-Fi
- Fanless design

## Specifications

System	
CPU	Intel® Processor N97 Intel Atom® Processor x7433RE
Memory	Onboard LPDDR5 8 GB (N97) Onboard LPDDR5 8 GB (x7433RE)
Storage	Onboard eMMC 32 GB (N97) Onboard eMMC 64 GB (x7433RE)
Real time clock	Yes
Security	TPM 2.0
Thermal Design	Fanless design
Operating System	Ubuntu 22.04 LTS, Yocto 4.0 Windows 10 IoT Enterprise
Support Protocol	--
Power Requirement	
Input Voltage	12 VDC
Power Consumption	35 W (typical)
Power Connector	1 x 5.5 mm x 2.5 mm DC input
Environmental and Mechanical	
Dimension	134 x 126 x 58 mm (5.28" x 4.92" x 2.28")
Weight	1 kg
Mouting/Installation	--
Operating Temperature	-20 ~ 50 °C (-4 ~ 122 °F)
Storage Temperature	-40 ~ 80 °C (-40 ~ 176 °F)
Operating Humidity	5% ~ 95% relative humidity (RH), non-condensing
Certification	
Regulations	CE, FCC, RoHs

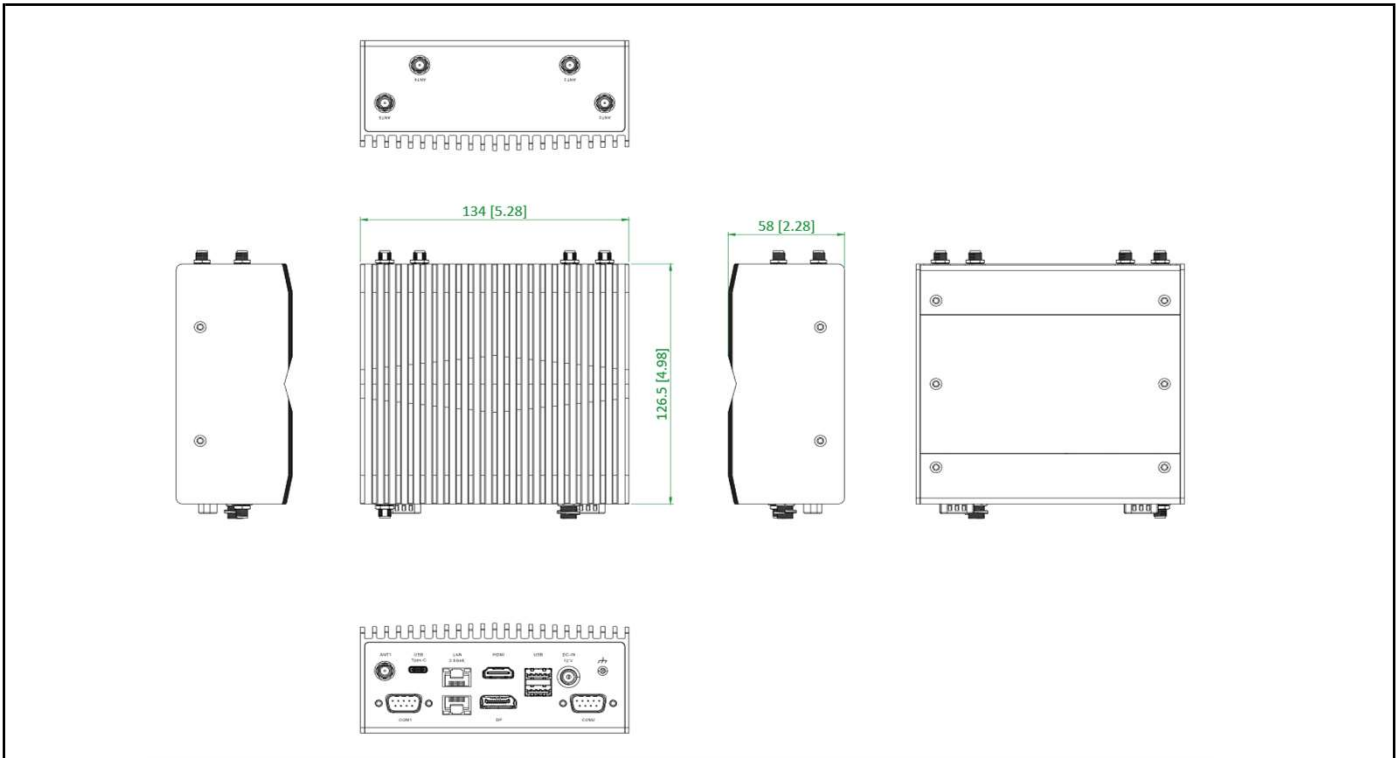
Interface	
Serial Port	2 x RS232/422/485 DB9
CAN Bus	--
Ethernet	2 x RJ45 Intel® I226IT 2.5GbE LAN
USB	2 x USB 3.2 Gen2 (Type A) 1 x USB 3.2 Gen2 (Type C)
DI/DO	--
AI/AO	--
Audio	--
Display	1 x HDMI 1 x DP
PoE	--
Expansion Slot	1 x M.2 M-Key 2280, PCIe Gen3 x2 for NVMe SSD 1 x M.2 B-Key 3042/3052, USB 3.2 Gen2 1 x M.2 E-Key 2230, PCIe x1 + USB 2.0
SIM Slot	1 x Nano SIM Card Socket
Antenna	5 x External Antenna holes
Console port	--
Indicator	--
Other Interface	--

Note:

Onboard M-Key and E-Key; installation/configuration required prior to shipment.

## Dimension

Unit: mm / inch



## Ordering Information

### Packing List

- 1 x System
- 1 x Power Adapter

### Part Number

- |                 |   |
|-----------------|---|
| 2IES-2031-00-01 | IES-2031.Intel N97.Fanless.DC-In 12V.8GB RAM.32GB Emmc          |
| 2IES-2031-10-01 | IES-2031.Intel Atom x7433RE.Fanless.DC-In 12V.8GB RAM.64GB eMMC |

## Optional Accessories

### Part Number / Item

- |               |                                     |
|---------------|-------------------------------------|
| Wi-Fi Module  | Wi-Fi Module M.2 2230 with Antenna  |
| 4G LTE Module | 4G LTE Module M.2 3042 with Antenna |
| 5G Module     | 5G Module M.2 3052 with Antenna     |
| Power cord    | US/EU Power cord                    |