



Main Features

- Onboard Intel® Atom™ processor E3826 dual core, 1.46GHz
- 1 x HDMI Display
- 2 x Intel® I210AT GbE LAN ports; Support WoL, Teaming and PXE
- 4 x USB 2.0
- 3 x Optional Interface for optional WiFi/3.5G/LTE modules
- 1x RS232, 1x RS232 (only Tx/Rx/GND), 1xRS422/485 with auto flow control
- Support -5 ~ 55 degree C extended operating temperature
- Support 24V DC input

Product Overview

Powered by the latest generation of Intel® Atom™ processor E3826 (formerly codenamed "Bay Trail-H"), NISE 50 presents intelligent PC-based controller and IoT gateway for factory automation. Up to 4G on-board DDR3L memory, The NISE 50 support operating temperature from -5 up to 55 degree C with wide range of DC input, 24V +/-20%. The NISE 50 has high integration ability with optional Mini-PCIe module and 3 x COM ports which makes it a reliable connection with devices in factory automation applications, IoT applications (with optional Wi-Fi, 3.5G/4G LTE module) and communication applications (with optional GPIO, RS232). NISE 50 is definitely the top choice for M2M intelligent system as a factory automation controller and gateway.

Specifications

CPU Support

- Default: Onboard Intel® Atom™ processor E3826 Dual Core, 1.46GHz
- Option: Support Intel® Atom™ E3800 processor family (by request)
 - Single Core E3815
 - Dual Core E3825/E3826/E3827
 - Quad Core E3845

Main Memory

- On-board 2GB DDR3L 1066/1333 RAM
 - Un-buffered and non-ECC
 - Max up to 4GB for option

Display Option

- 1 x HDMI display

I/O Interface-Front

- ATX power on/off switch
- 1x Storage/2x GPIO Programming LEDs
- 1 x SIM Card holder
- 2 x Intel® I210AT GbE LAN ports; Support WoL, Teaming and PXE
- 1 x HDMI Display Output
- 4 x USB 2.0 (500mA per each)
- 2 x Antenna Holes for optional WiFi/3.5G antenna

I/O Interface-Rear

- 3x DB9 for COM1 & COM2 & COM3
 - COM1: full RS232 signal
 - COM2: RS232, only support Tx/Rx/GND
 - COM3: RS422/485 auto flow control
- 1 x Line-out
- Support 24V +/-20% DC INPUT

I/O Interface - Internal

- 4 x GPI and 4 x GPO (Programmable to GPI or GPO)
- 1 x DB9, only support RS232, Tx/Rx/GND single

Storage Device

- On-board 16GB EMMC

Expansion Slot

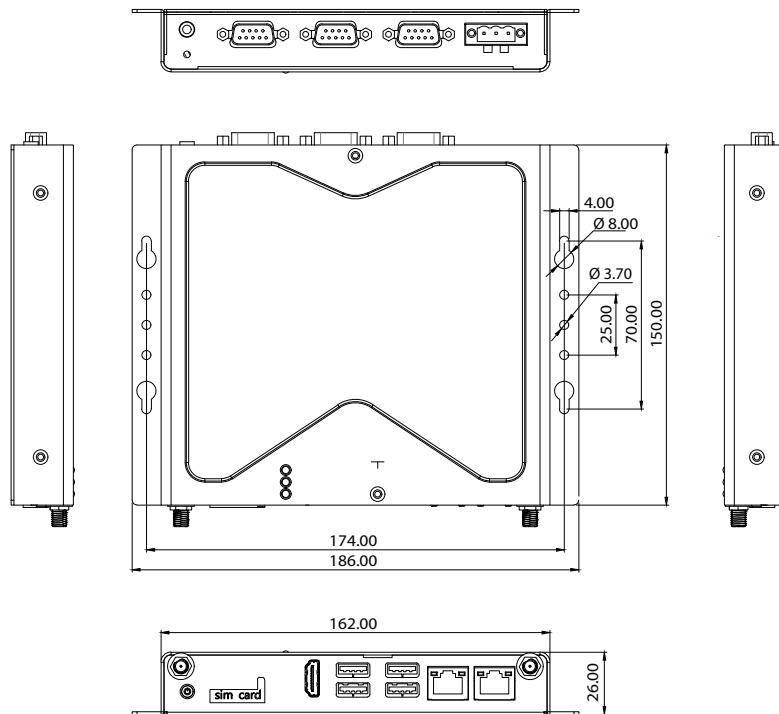
- 3 x Mini-PCIe socket for optional WiFi/3.5G modules

Mini-PCIe	Size	USB	PCIe	mSATA	3.5G/4G
CN5	Full	v	N/A	Support	Support
CN6	Full	v	v	N/A	Support
CN7	Half	v	v	N/A	N/A

Power Requirements

- Power input: 24V +/-20% DC Vdc
- 1 x optional 24V, 60W power adapter

Dimension Drawing



Support OS

- Windows 8.1
- Windows Embedded Standard 8.1
- Windows 10 IoT core
- Android 4.4

Dimensions

- 162mm(W) x 26mm(H) x 150mm(D) without wall-mount bracket

Construction

- Aluminum and Metal Chassis with fanless design

Environment

- Operating Temperature:
Ambient with air flow: -5°C to 55°C
(According to IEC60068-2-1, IEC60068-2-2, IEC60068-2-14)
- Storage Temperature: -20°C to 75°C
- Relative Humidity: 10% to 95% (non-Condensing)
- Shock Protection:
 - EMMC: 50G, half sine, 11ms, IEC60068-27
- Vibration Protection w/ EMMC Condition:
 - Random: 2Grms @ 5~500 Hz, IEC60068-2-64
 - Sinusoidal: 2Grms @ 5~500 Hz, IEC60068-2-6

Certifications

- CE
- FCC Class A

Ordering Information

♦ NISE 50 (P/N: 10J00005000X0)

Intel® Atom™ Processor E3826 Dual Core Fanless System, with on-board 16GB EMMC and 2G DDR3L RAM

♦ 24V, 60W AC/DC power adapter w/o power cord (P/N: 7400060024X00)