

## NIFE 200

Intel® Celeron® J1900 Quad Core 2.0GHz Factory Automation Fanless System  
with Fieldbus Expansion Ability



### Main Features

- Onboard Intel® Celeron® processor J1900 Quad Core 2.0GHz
- Dual independent display from DP and DVI-I
- 2 x Intel® I210AT GbE LAN ports support WoL, Teaming and PXE
- 3 x USB 2.0 & 1 x USB 3.0
- 2 x RS232/422/485
- 2 x Mini-PCIe socket for optional Wi-Fi/3.5G/4G LTE/Fieldbus modules
- TOP access SD card socket
- Support -5 ~ 55 degree C operating temperature
- Typical 24V DC input with +/-20% range

### Product Overview

Powered by the latest generation of Intel® Celeron® processor J1900 (formerly codenamed "Bay Trail-D"), NIFE200 presents intelligent PC-based controller and IOT gateway for factory automation. NIFE 200 supports up to 8G DDR3L memory and have several options on storage devices like SD, mSATA, HDD and SSD. The NIFE 200 support operating temperature from -5 up to 55 degree C with typical DC input 24V +/-20% range. The NIFE 200 has high integration ability with optional Mini-PCIe module and 2 x COM ports, which makes it a reliable connection with devices in factory automation applications (with optional PROFIBUS, ProfiNET, DeviceNET, EtherCAT, EtherNet/IP, CANopen, SERCOSIII master module), IOT applications (with optional GbE LAN, Wi-Fi, 3.5G/4G LTE module) and communication applications (with optional GPIO, RS232/422/485). NIFE200 is definitely the top choice for M2M intelligent system as a factory automation controller and gateway.

### Specifications

#### CPU Support

- Onboard Intel® Celeron® processor J1900 Quad Core 2.0GHz
- Support Intel® Atom™ E3800 processor family from single core E3815, Dual Core E3825/E3826/E3827 and Quad Core E3845 with difference SKUs

#### Main Memory

- 2 x DDR3L SO-DIMM socket, support DDR3L 1066/1333 8GB RAM max., un-buffered and non-ECC

#### Display Option

- Dual independent display
  - DVI-I and DP

#### I/O Interface-Front

- ATX power on/off switch
- LEDs for HDD LED, Batty LEDs, Power LED, COM port TX/RX, 5x programmable GPO LEDs
- 1 x External SD Card
- 1 x SIM card holder
- 2 x Intel® I210AT GbE LAN ports, support WoL, Teaming and PXE
- 1 x DP display output
- 1 x DVI-I display output
- 1 x USB 3.0 (900mA per each)
- 3 x USB 2.0 (500mA per each)

- 2 x RS232/422/485 support auto flow control
  - Jumper-free setting on RS232/422/485
  - Support 2.5KV isolation protection on COM1
- 1 x 3-pic DC input, Typical 24V DC input with +/-20% range

#### Storage Device

- 1 x 2.5" SSD/HDD(SATA 2.0) -front accessible
- 1 x SD card (Data storage only)
- 1 x mSATA

#### Expansion Slot

- 2 x Mini-PCIe socket for optional Wi-Fi/3.5G/4G LTE/Fieldbus modules

#### Power Requirement

- Typical 24V DC input with +/-20% range
- 1 x optional 24V, 60W power adapter

#### Dimensions

- 85mm (W) x 157mm (D) x 214mm (H)

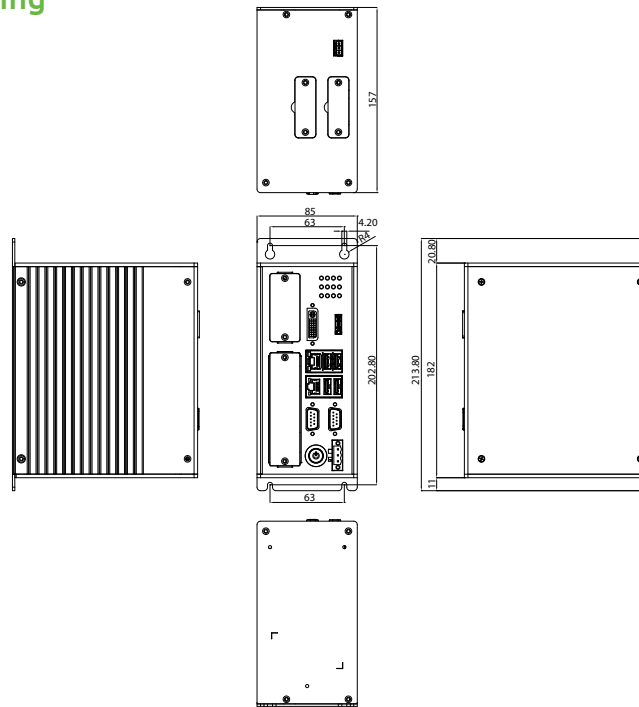
#### Construction

- Aluminum and metal chassis with fanless design

#### Environment

- Operating temperature:  
Ambient with air flow: -5°C to 55°C

## Dimension Drawing



(According to IEC60068-2-1, IEC60068-2-2, IEC60068-2-14)

- Storage temperature: -20°C to 80°C
- Relative humidity: 10% to 95% (non-condensing)
- Shock protection:
  - SSD: 20G, half sine, 11ms, IEC60068-2-27
  - CFast: 50G, half sine, 11ms, IEC60068-2-27
- Vibration protection w/ CFast & SSD condition:
  - Random: 2Grms @ 5 ~ 500Hz, IEC60068-2-64
  - Sinusoidal: 2Grms @ 5 ~ 500Hz, IEC60068-2-6

### Certifications

- CE Approval
  - EN61000-4-2
  - EN61000-4-4
- FCC Class A
- LVD

### Support OS

- Windows 8, 32bit/64bit
- Windows Embedded Standard 8, 32bit/64bit
- Windows 7, 32bit/64bit
- Windows Embedded Standard 7, 32bit/64bit
- Linux Kernel version 3.8.0

## Ordering Information

- **NIFE 200 (P/N: 10J70020000X0)**  
Intel® Atom™ processor J1900 Quad Core 2.0GHz fanless system
- **24V, 60W AC/DC power adapter w/ o power cord**  
**(P/N: 7400060024X00)**