UNO-2271G

Intel® Atom™ Pocket-Size **Smart Factory Edge Gateway with** 2 x GbE, 1 x mPCle, HDMI, eMMC



Features

- Intel® Atom™ E3815 Processor up to 1.46 GHz with 4GB DDR3L onboard
- 2 x GbE, 1 x USB 3.0, 1 x HDMI, Option 2 x RS-232/422/485 or 3 x USB2.0
- Compact Fanless Design
- Rubber Stopper Design with internal reserved screws for 2nd layer assembly
- Diverse system I/O and Isolated Digital I/O by iDoor Technology
- Supports Fieldbus Protocol by iDoor Technology
- 3G/GPS/GPRS/Wi-Fi Communication by iDoor Technology
- Supports 30+ iDOOR combination with four main categories of smart factory application
- Chassis Grounding Protection
- Built-in 32G eMMC storage
- Selectable I/O support for standard models



Introduction

Advantech's new generation UNO-2000 series of Embedded Automation Computers are Fanless with highly ruggedized with embedded operation system. New UNO-2000 series implement Universal, Customized, and Domain idea into modular design concept which provides flexible and time-to-market support in variety of applications. The series also includes iDOOR technology which supports automation feature-extensions such as Multiple I/O Peripheral, Industrial Fieldbus, Smart I/O Communication, and Signal Communication. New UNO-2000 series including pocket, small, and regular-size form-factors with indicated market segments in terms of different kinds of smart factory application categories such as Equipment Connectivity (EC), Process Visualization (PV), Environment Management (EM), and Dispatch Management (DM) solution. New UNO enables smart factory and fulfill all application.

Specifications

General

Certification CE, FCC, UL, CCC, BSMI

Dimensions (W x D x H) 100 x 70 x 30 mm (3.9" x 2.8" x 1.2"),

UNO-2271G-E21AE

100 x 70 x 65 mm (3.9" x 2.8" x 2.6").

UNO-2271G-E22AE and E23AE

Form Factor Pocket Size, same dimension as standard 2.5" SSD/

Enclosure Aluminum Housing

- Mounting Stand, Wall, VESA (Optional), DIN-rail (Optional).

Pole (Optional)

Weight (Net) 0.5 kg (1.1lbs) for UNO-2271G-E21AE

0.6 kg (1.2lbs) for UNO-2271G-E22AE and E23AE

 Power Requirement 10 ~ 30V_{DC}

 Power Consumption 12W (Typical), 20W (Max)

Microsoft® Windows 10, Advantech Win7 64bits, OS Support

Advantech Linux

System Hardware

BIOS AMI EFI64 Mbit

 Watchdog Timer Programmable 256 levels timer interval, from 1 to 255

Intel Atom E3815 1.46GHz (E3825 support by project) Processor

System Chip Intel Atom SoC integrated

Memory Onboard 4GB DDR3L 1066 MHz **Graphics Engine** Intel® HD Graphics

Realtek RTL8111E GbE, 802.10av Ethernet **LED Indicators** LEDs for Power, HDD, LAN (Active, Status)

Onboard 32G eMMC (Option mSATA) Storage

Expansion 1 x Full-size mPCle slot

I/O Interfaces

 Serial Ports 2 x RS 232/422/485 by extension mini card for

UNO-2271G-E23AE

LAN Ports 2 x RJ45, 10/100/1000 Mbps IEEE 802.3u 1000Base-T

Fast Ethernet

USB Ports 1 x USB 3.0 for UNO-2271G-E21AE

3 x USB 2.0 and 1 x USB 3.0 for UNO-2271G-E22AE

1 x USB 3.0 for UNO-2271G-E23AE

Displays 1 x HDMI, supports 1920 x 1080 @ 60Hz

Power Connector 1 x 2 Pins, Terminal Block **Grounding Protection** Chassis Grounding

Environment

• Operating Temperature $0 \sim 50^{\circ}\text{C} (32 \sim 122^{\circ}\text{F}) @ 5 \sim 85\% \text{ RH with } 0.7 \text{ m/s}$

airflow

Storage Temperature - 20 ~ 70°C (-4 ~ 158°F)

10 ~ 95% RH @ 40°C, non-condensing **Relative Humidity Shock Protection** Operating, IEC 60068-2-27, 50G, half sine, 11 ms

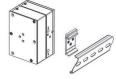
Vibration Protection Operating, IEC 60068-2-64, 2 Grms, random,

5 ~ 500 Hz, 1hr/axis (mSATA)

Ingress Protection

Installation Scenario

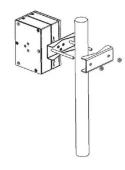
DIN-rail Mount Illustration

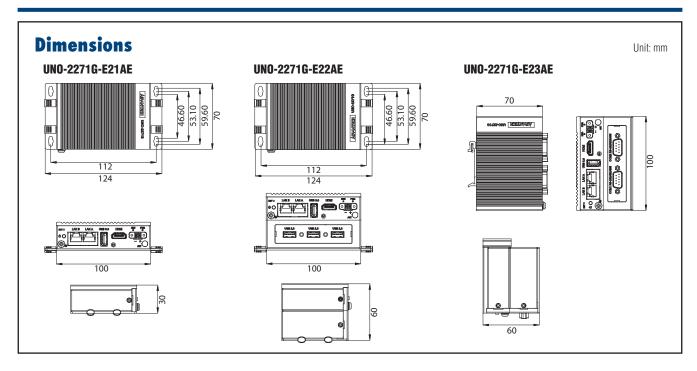


VESA Mount Illustration



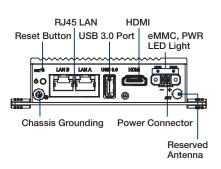
Pole Mount Illustration



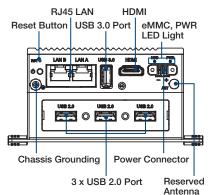


Front I/O View

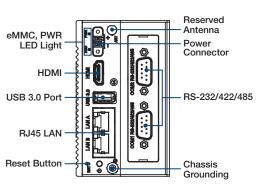
UNO-2271G-E21AE



UNO-2271G-E22AE



UNO-2271G-E23AE



Ordering Information

UNO-2271G-E21AE
 2271G-Standard, Intel Atom E3815 1.46 GHz, 4GB, 2 x LAN,

1 x mPCle, 1 x USB3.0

 UNO-2271G-E22AE 2271G-Universal, Intel Atom E3815 1.46 GHz, 4GB, 2 x LAN, 1 x mPCle, 1 x USB3.0, 3 x USB2.0

 UNO-2271G-E23AE
 2271G-DIN RAIL, Intel Atom E3815 1.46GHz, 4GB, 2 x LAN, 1 x mPCle, 1 x USB3.0, 2 x RS-232/422/485

 UNO-2271G-W1032GE
 2271G-Ready-to-Go, UNO-2271G-E21AE with Windows 10 LTSB, WISE-PaaS/RMM, and PWR-247-CE 60W Adapter

Optional Accessories

PWR-247-CE

1702002600

1702002605

1702031801

= 1700000596

■ UNO-2271G-EKAE

UNO-2271G-DMKAE

UNO-2000G-VMKAE

UNO-2000G-PMKAE
UNO-2271G-LKAE

= 2070014803

2070014725

60W AC to DC UNO series power adapter (Industrial Grade)

Power Cable US Plug 1.8 M (Industrial Grade)

Power Cable EU Plug 1.8 M (Industrial Grade)

Power Cable UK Plug 1.8 M (Industrial Grade)
Power Cable China/Australia Plug 1.8 M (Industrial Grade)

UNO-2271G Expansion ME Kit UNO-2271G DIN RAIL Kit UNO-2000 VESA Mount Kit

UNO-2000 Pole Mount Kit UNO-2271G lockable kit 10 units/per pack

Windows 10 LTSB Enterprise image for UNO-2271G

WES7P image for UNO-2271G X64 MUI

iDoor Modules

■ PCM-24S2WF-AE 802.11 a/b/g/n 2T2R w/ Bluetooth4.0, Half-size mPCle, 2-port

PCM-24S23G-AE
 6-band HSPA Cellular Module, GPS, SIM holder, SMAx2

PCM-24R2GL-AE 2-Port Gigabit Ethernet, mPCle, RJ45

PCM-24D2R2-AE 2-Port Isolated RS-232 mPCle, DB9

PCM-24D4R4-AE 4-Port Non-Isolated RS-422/485 mPCle, DB37
PCM-24R1TP-AE 1-Port Gigabit Ethernet, Intel® 82574L, mPCle, RJ45

PCM-27D24DI-AE 24-Channel Isolated Digital I/O w/ counter mPCle, DB37