

# AIR-100

## Edge AI Inference System with Intel Atom E3950 and One Intel MA2485 VPU

NEW



### Features

- Intel Atom E3950
- Intel Movidius Myriad X MA2485 VPU x1 Built in
- Integrated Nvidia GeForce GT1030 graphics for ultra HD playback
- Intel OpenVINO toolkit supported
- 1 x 204-pin SO-DIMM DDR3L 4GB memory (-20~85°C) built in
- 1 x 64GB SSD built-in
- 4 x independent HDMI outputs
- Reserve TPM 2.0 for security application
- Signage content management software built-in
- Integrated with Edge AI Suite



Acronis WISE-PaaS/SignageCMS WISE-DeviceOn



#### OpenVINO™ Toolkit

- Model optimizer
- Inference engine
- Supports TensorFlow, Caffe, mxnet, ONNX



#### Enhanced Inference Efficiency

Scaling AI inference workloads with modular, plug & play design



#### VEGA-320 built-in

- Single MA2485 VPU
- M.2 2230 (Key A+E)
- PCIe Gen2 x1, USB 2.0

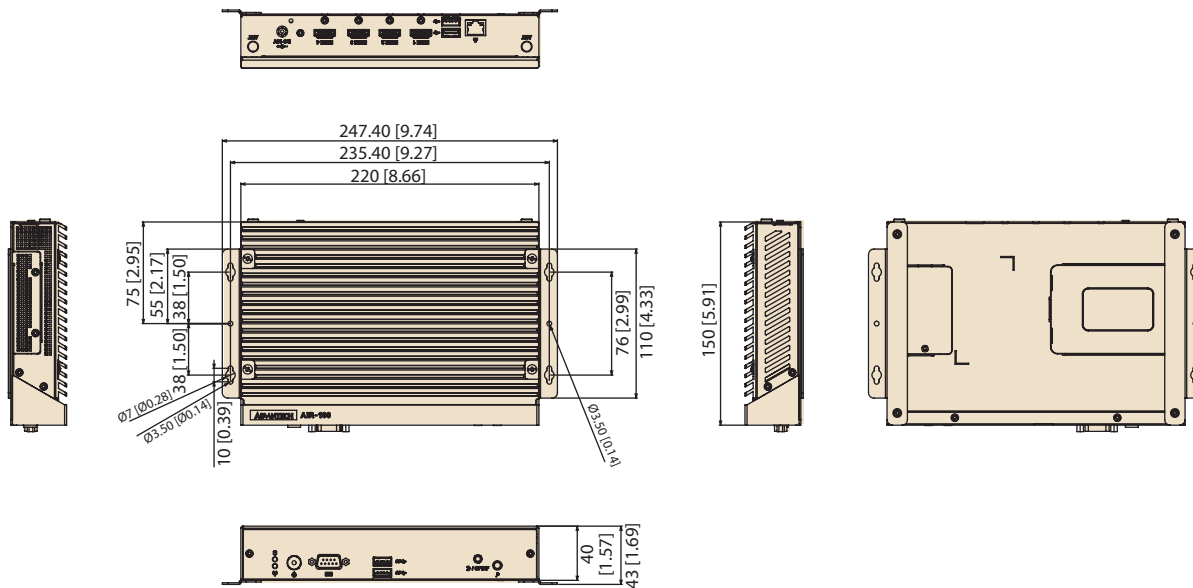
## Specifications

|                          |                        | AIR-100   |
|--------------------------|------------------------|---|
| Processor System         | CPU                    | Intel® Atom™ Processor E3950  |
|                          | System Chipset         | Integrated in CPU   |
|                          | L2 Cache               | 2 MB  |
|                          | BIOS                   | AMI uEFI 64-Mbit  |
| Memory                   | Technology             | 2 x DDR3L 204-pin DIMM  |
|                          | Max. Capacity          | 16 GB (Pre-installed 4GB)   |
| Graphic & Display Tech.  | Graphic Engine         | HDMI-1 and HDMI-2: NVIDIA® GeForce GT 1030<br>HDMI-3 and HDMI-4: Intel® HD Graphics 505   |
|                          | Graphic Memory         | 2GB GDDR5   |
|                          | Resolution             | HDMI 2.0: up to 3840 x 2160 @ 60Hz<br>HDMI 1.4: up to 3840 x 2160 @ 30Hz (HDMI-4 supports CEC function)   |
|                          | Output                 | 2 x HDMI 1.4, 2 x HDMI 2.0  |
|                          | Multi Display          | Up to 4 simultaneous outputs  |
|                          | Video Format           | Decode for H.264, VC-1, WMV9, H.265/HEVC, VP8, VP9, JPEG/MJPEG, MPEG2 (only for Yocto project Linux)<br>Encode for H.264, MVC, WMV9, H.265/HEVC, VP8, VP9, JPEG/MJPEG |
| AI Engine                | VPU                    | One Intel Movidius Myriad X MA2485 (1 x VEGA-320-01A1 Built-in)   |
| Storage                  | SATA                   | 1 x 2.5-inch SATA III HDD/SSD (Pre-installed 64GB SSD)  |
| Ethernet                 | Interface              | Gigabit LAN controller  |
|                          | Controller             | 1 x Intel I211-AT   |
| I/O Interface            | LAN                    | 1 (RJ-45)   |
|                          | USB 2.0                | 2   |
|                          | USB 3.0                | 2   |
|                          | Audio                  | 1 x audio phone jack for Mic In, 1 x SPDIF/Line Out (supports jack sensing via OS settings)   |
|                          | Serial                 | 1 x RS-232  |
| Expansion                | Mini PCIe              | 1 x Full Size MiniPCIe support mSATA; w/SIM holder, support WWAN module (USB interface) #1  |
| Trusted Platform Module  | TPM 2.0                | Option  |
| Power Requirement        | Input Voltage          | 19 V DC in (ATX/AT mode, default ATX)   |
|                          | Output                 | Interrupt, system reset   |
| Watchdog Timer           | Interval               | Programmable using WISE-PaaS/EdgeSense  |
|                          | Mounting               | Wall mount kits for LCD or plasma panels  |
| Physical Characteristics | Dimensions (W x H x D) | 220 x 40 x 150 mm   |
|                          | Weight                 | 1.7 kg  |
|                          | Operating Temperature  | 0 ~ 50 °C with 0.7m/s air flow  |
| Environment              | Relative Humidity      | 95% @ 40° C (non-condensing)  |
|                          | Operating System       | Pre-installed Microsoft Windows 10  |
| Software Development Kit | Linux                  | By project  |
|                          | EMC                    | CE, FCC Class B, BSMI   |
| Certification            | Safety                 | UL, CCC, BSMI, CB   |

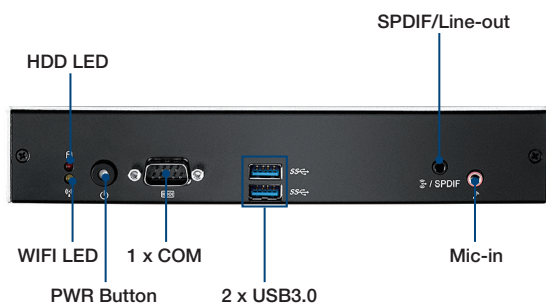
#1 SIM holder is hardware interface for wireless communication integration only. System level RF certification is not available.

## Dimensions

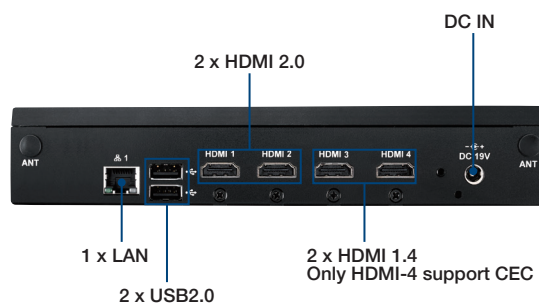
Unit: mm [inch]



## Front View



## Rear View



## Packing List

| Part Number | Description                                   |
|-------------|---|
| -           | 1 x AIR-100 unit                              |
| -           | 1 x Power adapter (DC 19 V/3.42A 65 W)        |
| -           | 1 x Bracket set for fixing power adapter plug |
| -           | 2 x Mounting brackets                         |
| -           | 2 x User manual                               |
| -           | 1 x Content management software               |

## Power Cord

| Part Number | Description              |
|-------------|--------------------------|
| 1700001524  | 3-pin power cord (US)    |
| 170203183C  | 3-pin power cord (EU)    |
| 170203180A  | 3-pin power cord (UK)    |
| 1702031836  | 3-pin power cord (AU)    |
| 1700008921  | 3-pin power cord (Japan) |
| 1700019146  | 3-pin power cord (China) |

## Ordering Information

| Part Number   | Description   |
|---------------|---|
| AIR-100-S61A1 | Intel Atom E3950 with one Movidius Myriad X, 4G memory and 64G SSD built-in and pre-installed win10 |

## Mounting Kits

| Part Number | Description                            |
|-------------|--|
| AMK-V005E   | VESA mount kit (generic for ARK-DS/DS) |