

# Ei-A100

## 4K Digital Signage Player with One Intel Movidius VPU for AI Facial Recognition

NEW



### Features

- Intel® Atom™ E3950 and Intel® Movidius Myriad X VPU MA2485 x1 built-in
- Integrated NVIDIA® GeForce® GT 1030 graphics for ultra HD playback
- Intel® OpenVINO™ toolkit supported
- Integrated with Edge AI Suite
- Quad independent HDMI outputs
- Reserve TPM 2.0 for security application
- Signage content management software built-in
- Low power & fanless signage player

WISE-PaaS/SignageCMS WISE-DeviceOn  WISE-Marketplace

### Introduction

Advantech Ei-A100 is an Edge AI Inference Systems of Ultra HD signage player. It is powered by Intel® Atom™ Processor E3950, Movidius Myriad X VPU and NVIDIA® GeForce® GT 1030 graphic engine to help accelerate deep learning inference at the edge. Ei-A100 not only supports four HDMI independent display in 4K@30Hz playback, but also support single video content in 4K@60Hz playback via HDMI 2.0 port. Ei-A100 is the ideal solution for AI-based multi-display applications in stores, stadiums, hotel lobbies, restaurants, and other public spaces.



#### 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

### AI Facial Recognition Feature Highlights



#### High Precision Engine

- 98.5% accuracy rate
- 10E-6 error rate



#### Customer Behavior Analytics

- Dashboard for decision makers



#### Real-time Identification & Notification

- Face identity & labeling
- Performance optimization across CPU/VPU



#### Customer Management

- Easy enrollment
- VIP/Watchlist mgt

### Specifications

		Ei-A100
Processor System	CPU	Intel® Atom™ Processor E3950
	System Chipset	Integrated in CPU
Memory	Technology	2 x DDR3L 204-pin DIMM, Max. 16GB, Pre-installed 4GB
Graphic & Display Tech.	Graphic Engine	HDMI-1 and HDMI-2: NVIDIA® GeForce GT 1030 HDMI-3 and HDMI-4: Intel® HD Graphics 505
	Resolution	HDMI 2.0: up to 3840 x 2160 @ 60Hz 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, 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) 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)
	LAN	1 (RJ-45)
I/O Interface	USB 2.0/USB 3.0	2/2
	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)
Physical Characteristics	Mounting	Wall mount kits for LCD or plasma panels
	Dimensions (W x H x D)	220 x 40 x 150 mm
	Weight	1.7 kg
Environment	Operating Temperature	0 ~ 50 °C with 0.7m/s air flow
Software Development Kit	Operating System	Pre-installed Microsoft Windows 10
	Linux	By project
Certification	EMC	CE, FCC Class B, BSMI
	Safety	UL, CCC, BSMI, CB

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

ADVANTECH

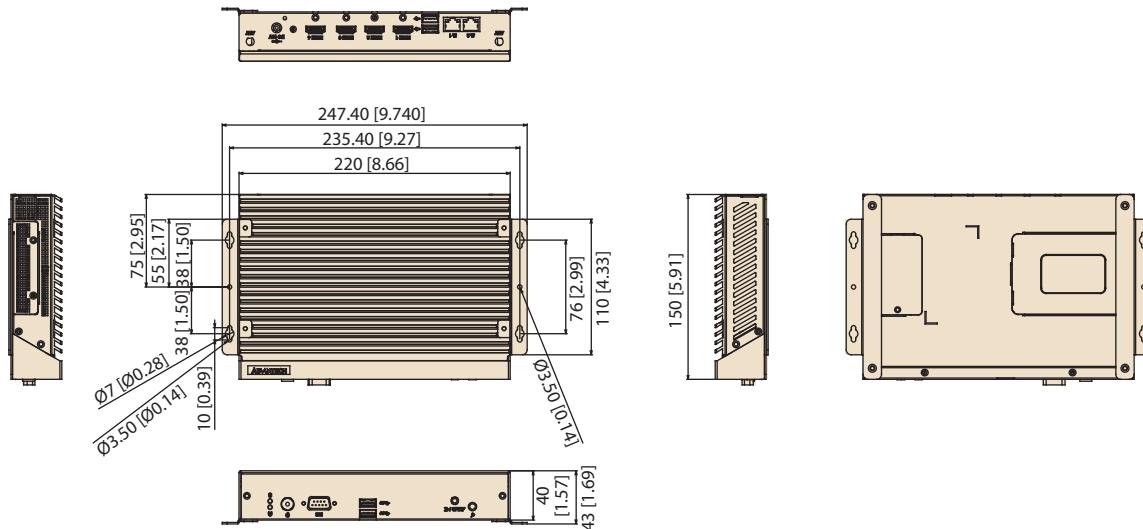
Digital Signage Player

All product specifications are subject to change without notice.

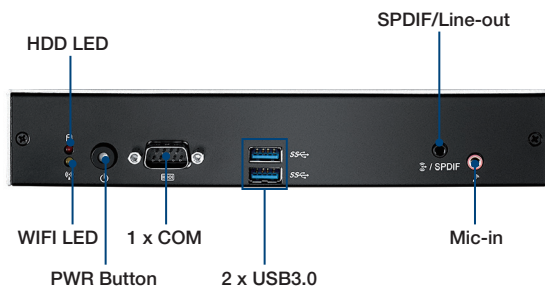
Last updated: 16-Dec-2020

## Dimensions

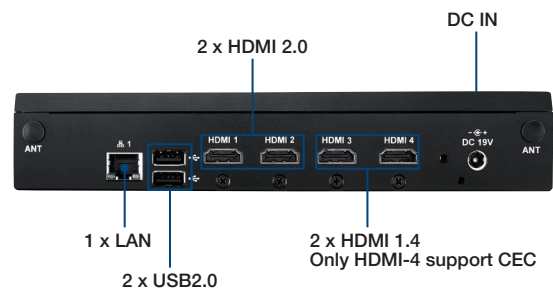
Unit: mm [inch]



## Front View



## Rear View



## Packing List

Part Number	Description
-	1 x Ei-A100 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
Ei-A100-S61A1	Intel E3950 with 1x Movidius VPU and facial recognition

## Mounting Kits

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