

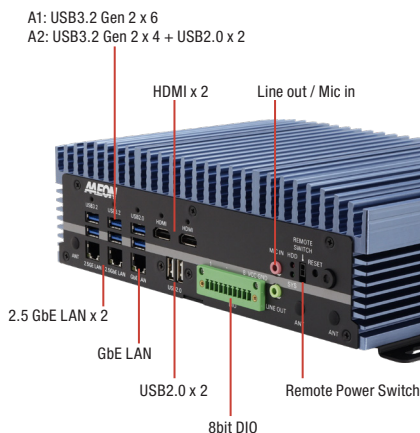
BOXER-6648-ARS

PRELIMINARY



Fanless Compact Embedded Computer with Intel® Core™ Ultra Processors (Series 2)

Front View



Rear View



Features

- Intel® Core™ Ultra Processors (Series 2)
- Intel® Xe LPG Graphic Engine
- Dual-Channel DDR5 SODIMM x 2, up to 96GB
- HDMI 2.0 x 2
- Intel® Ethernet Controller I226-LM, 2.5GbE LAN x 2 / Intel® Ethernet Connection I219-LM, 1GbE LAN x 1
- Wide Range 10V ~ 35V DC input with Circuit Protection
- Wide -25°C ~ 50°C Operating Temperature
- Onboard TPM 2.0
- Supports iAMT (only for A2 SKU)



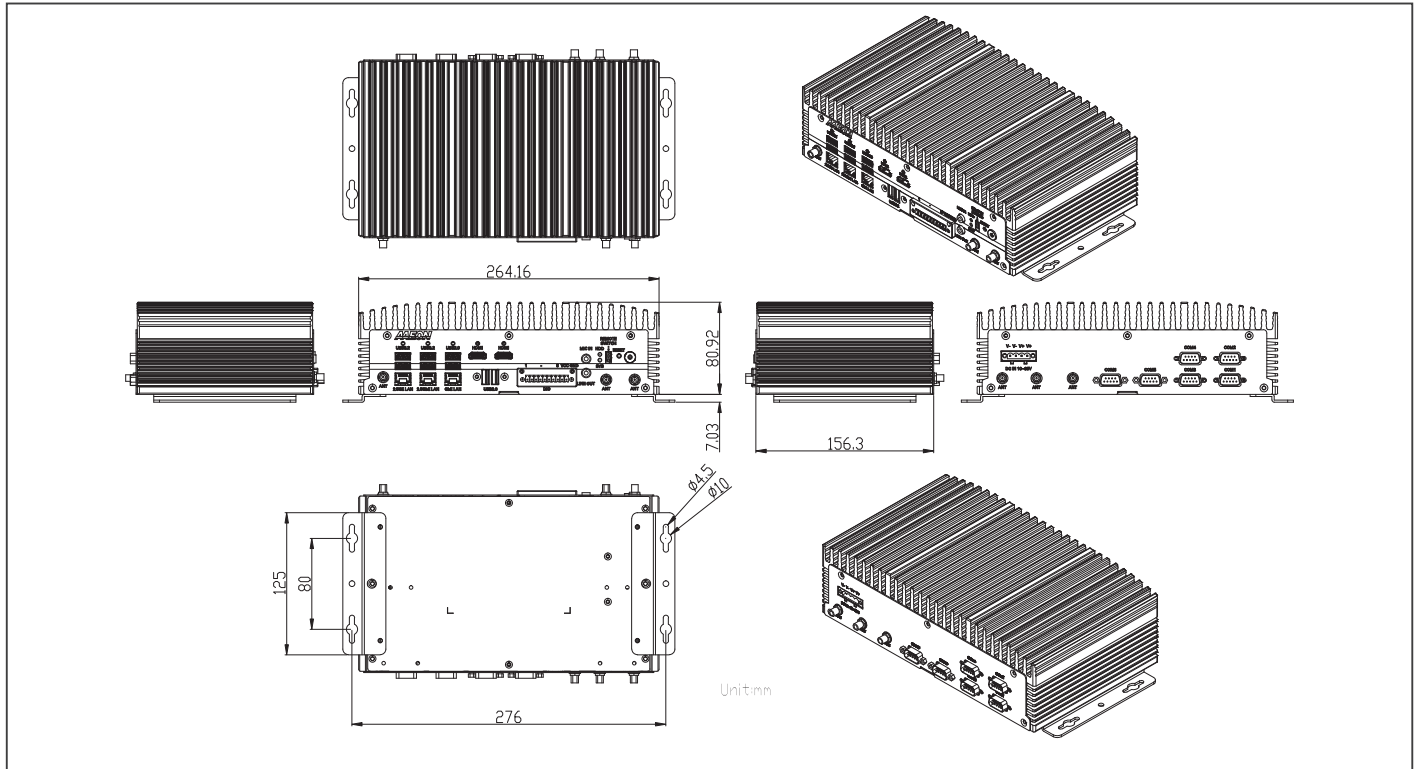
Specifications

System	
CPU	Intel® Core™ Ultra 9 Processor 285/285T Intel® Core™ Ultra 7 Processor 265/265T Intel® Core™ Ultra 5 Processor 225/225T
Chipset	A1 SKU: Intel® H810 Chipset A2 SKU: Intel® Q870 Chipset
System Memory	DDR5 SODIMM Slot x 2, up to 96GB
Display Interface	HDMI 2.0 x 2
Storage Device	Internal 2.5" SATA Drive Bay x 2 (RAID 0/1 for A2 model) M.2 2280 M-Key x 1 (PCIe Gen 4 [x4]) for NVMe
Ethernet	Intel® Ethernet Controller I226-LM, 2.5GbE LAN x 2 / Intel® Ethernet Connection I219-LM, 1GbE LAN x 1 (Intel® Active Management Technology on 2.5GbE LAN on A2 Model SKU only)
I/O	A1 SKU: USB 3.2 Gen 1 (5Gbps) Type-A x 4, USB 2.0 x 4 A2 SKU: USB 3.2 Gen 2 (10Gbps) Type-A x 6, USB 2.0 x 2 DB-9 x 6 for RS-232/422/485 Mic-in / Line-out 10-pin Terminal Block for 8-bit DIO Power Button with LED Indicator x 1 2-pin Remote Power On/Off Connector x 1
Expansion	M.2 2230 E-Key x 1 (PCIe) M.2 2280 M-Key x 1 (PCIe Gen 4 [x4])
Indicator	System Power / Storage LED
OS support	Windows® 11 Pro Windows® 11 IoT Enterprise LTSC 2024 Ubuntu 24.04 or later
Power Supply	
Power Requirement	DC-in 10V ~ 35V via 4-pin Terminal Block Connector
Mechanical	
Mounting	Wallmount, DIN Rail (optional)
Dimensions (W x H x D)	10.39" x 3.2" x 6.1" (264mm x 81mm x 156mm)
Gross Weight	10.8 lb (4.9 Kg)
Net Weight	8.6 lb (3.9 Kg)
Environmental	
Operating Temperature	-13°F ~ 122°F (-25°C ~ 50°C) with 65W TDP CPU, IEC60068-2 with 0.7 m/s AirFlow, with wide temp. memory/storage
Storage Temperature	-40°F ~ 176°F (-40°C ~ 80°C)
Storage Humidity	5 ~ 95% @ 40°C, non-condensing
Anti-Vibration	SSD: Random, 3Grms, 5~500Hz
Anti-Shock	SSD: 50G @ Wallmount, Half-sine, 11ms
Certification	CE/FCC class A



Dimension

Unit: mm



Ordering Information

Part Number	PCH	LAN	USB 3.0	USB 2.0	RS-232/422/485	Digital I/O	Audio	Storage	Display	Expansion	Mounting	Power	Operation Temp.
BOXER-6648-ARS-A1-1010	Intel® H810	GbE LAN x 1 2.5GbE LAN x 2	USB3.2 (5Gbps) x 4	4	6	8	Line Out Mic in	M.2 2280 M Key Slot x 1 (NVMe SSD) 2.5" SATA Drive Bay x 2	HDMI x 2	M.2 E key 2230 x 1 (PCIe) M.2 M key 2280 x 1 (PCIe Gen4 [x4])	Wallmount, DIN Rail (optional)	10~35V DC in	-13°F ~ 122°F (-25°C ~ 50°C) with 65W TDP CPU, IEC60068-2 with 0.7 m/s AirFlow, with wide temp. memory/storage
BOXER-6648-ARS-A2-1010	Intel® H870	GbE LAN x 1 2.5GbE LAN x 2	USB3.2 (10Gbps) x 6	2	6	8	Line Out Mic in	M.2 2280 M Key Slot x 1 (NVMe SSD) 2.5" SATA Drive Bay x 2 (support RAID 0/1)	HDMI x 2	M.2 E key 2230 x 1 (PCIe) M.2 M key 2280 x 1 (PCIe Gen4 [x4])	Wallmount, DIN Rail (optional)	10~35V DC in	-13°F ~ 122°F (-25°C ~ 50°C) with 65W TDP CPU, IEC60068-2 with 0.7 m/s AirFlow, with wide temp. memory/storage

Packing List

- BOXER-6648-ARS x 1
- Wallmount Kit x 1
- Screw Pack x 1
- 4pin Terminal Block Connector x 1 (for DC input)

Optional Accessories

- 1255X00112
180W AC to DC Power Adapter
- 170X000799
Power Cord (US Type)
- 170X000800
Power Cord (Europe)
- 170X000803
Power Cord (Japan)