

ARK-3532C

Intel® 10th Gen Xeon® W / Core™ i LGA1200 Expansion Fanless Box PC

NEW



Features

- Support Intel® 10th Gen. Xeon® W and Core™ i3/i5/i7/i9 processor
- Triple independent display: VGA + HDMI + Optional Display
- DDR4 SO-DIMM ECC/non-ECC memory support up to 64 GB
- 12-36V_{DC} wide range power input
- Up to 4sets 2.5" hard drive bays, support Intel® SW RAID
- Support 4GbE, 8USB, 6COM, 16bit DIO, TPM2.0
- SUSI API, WISE-DeviceOn, McAfee and Acronis bundled
- 2 x Independent USB 3.0 with lockable design
- Support Windows 11 IoT Enterprise LTSC



WISE-DeviceOn SUSI API



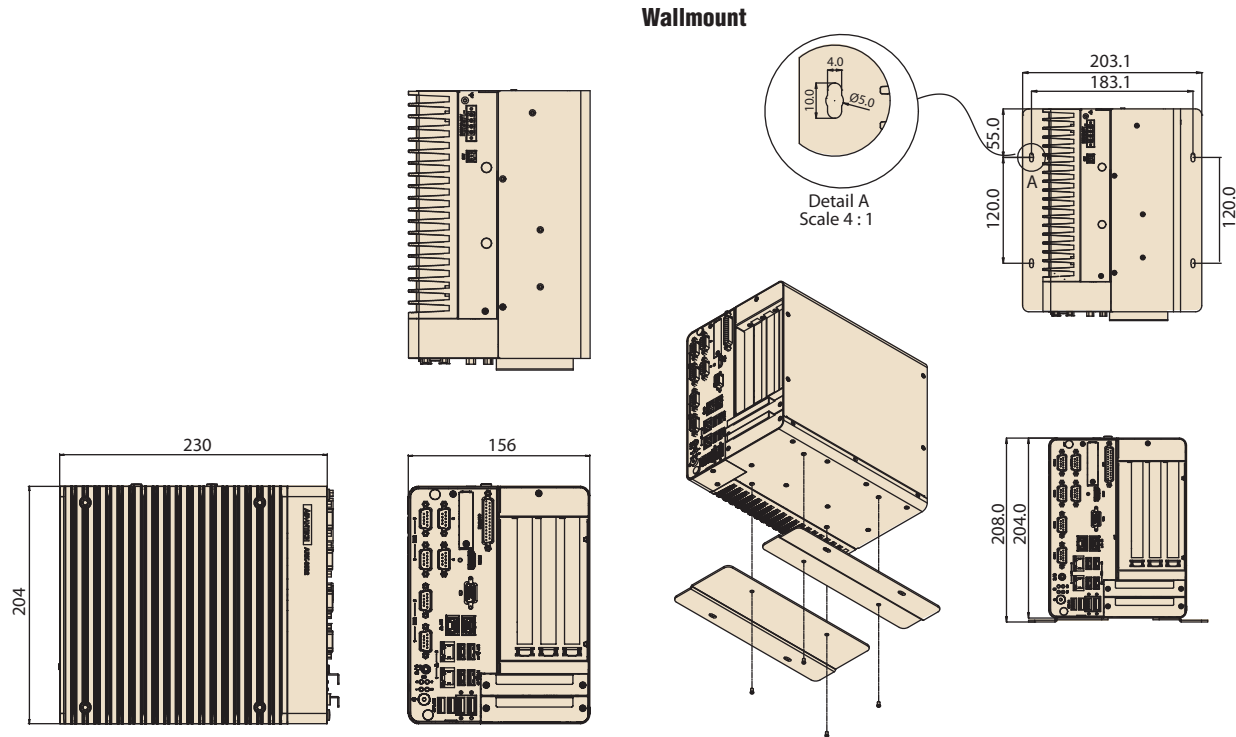
Specifications

| | CPU | W-1290TE | i9-10900E | i7-10700E | i5-10500E | i3-10100E | G5900E |
|-------------------------------------|-------------------------------------|---|------------|------------|------------|------------|--------|
| Processor System | Frequency | 1.8-4.5GHz | 2.8-4.7GHz | 2.9-4.5GHz | 3.1-4.2GHz | 3.2-3.8GHz | 3.2GHz |
| | L3 Cache | 20MB | 20MB | 16MB | 12MB | 6MB | 2MB |
| | Cores | 10 | 10 | 8 | 6 | 4 | 2 |
| | TDP | 35W | 65W | 65W | 65W | 65W | 65W |
| | ECC memory support (support by CPU) | YES | NO | NO | NO | YES | NO |
| | Chipset | W480E | | | | | |
| | BIOS | AMI EFI 256Mbit | | | | | |
| Memory | Technology | DDR4 2933 MHz | | | | | |
| | Max. Capacity | 64 GB | | | | | |
| | Socket | 2 x 260-pin SO-DIMM | | | | | |
| Graphics | Chipset | Intel® UHD Graphics 630 | | | | | |
| | Graphic Engine | DirectX 12, OpenGL 4.5 HW Encode: H.265/HEVC, H.264/MPEG-4 AVC, MPEG-2, JPEG/MJPEG and VP8. HW Decode: H.265/HEVC, H.264/MPEG-4 AVC, MPEG-2, VC-1/WMV9, JPEG/MJPEG, VP8 and VP9 | | | | | |
| | VGA | 1920x1200@60Hz | | | | | |
| | HDMI | 1 HDMI port, HDMI 1.4 for HD video playback, 4096x2160@30Hz | | | | | |
| | Optional 3rd Display module | DVI-D / DP / HDMI Display Port | | | | | |
| Triple Display | VGA+HDMI + 3rd display module | | | | | | |
| Ethernet | LAN1 | 10/100/1000 Mbps Intel I219-LM GbE, support Wake On Lan | | | | | |
| | LAN2, 3, 4 | 10/100/1000 Mbps Intel I210 GbE, support Wake On Lan | | | | | |
| Audio | Interface | Realtek ALC888S, High Definition Audio, Line-out/Mic-in (switch) | | | | | |
| Others | Watch dog Timer | 255-level timer interval, setup by software | | | | | |
| | TPM | TPM 2.0 (by optional AMO-I029) | | | | | |
| I/O Interface | Serial Port | 4 x RS-232/422/485 port with auto flow control, 2 x RS-232; COM3 support 5V/12V power supply (by jumper) | | | | | |
| | USB | 4 x USB 3.2 (10Gps), 2 x USB 3.0, 2 x Independent USB 3.0 | | | | | |
| | GPIO | 16bit GPIO | | | | | |
| Expansions | Mini PCIe | 1 x Full-size Mini PCIe (1 x support mSATA, 1 x support SIM holder) #1 | | | | | |
| | M.2 | 1 x E key for WiFi #1 | | | | | |
| | Add-on Card Slot | 1 Slot PCIe4 + 2 Slot PCI Suggest maximum power consumption 10W for each slot | | | | | |
| | Maximum card size | 110mm (H) x 180mm (L) | | | | | |
| Storage | HDD | 2 x 2.5" SATAIII 15mm height HDD bay support Intel SW RAID (Up to 4 x 2.5" SATAIII HDD bays by optional AMK-A0035) | | | | | |
| | mSATA | 1 x mSATA socket (Share with Mini PCIe) | | | | | |
| Software Support | Microsoft Windows | Windows 10 | | | | | |
| | Linux | By Project Support | | | | | |
| Power Requirements | Power Type | AT/ATX | | | | | |
| | Power Input Voltage | 12-36V | | | | | |
| | Power Adapter | AC to DC, 230W (Optional) | | | | | |
| Power Consumption (CPU/Memory Only) | Typical | 30W | | | | | |
| | Max. | 64.8W | | | | | |
| Mechanical | Construction | Aluminum housing | | | | | |
| | Mounting | Desk mounting | | | | | |
| | Dimensions (W x H x D) | 156 x 204 x 230 mm | | | | | |
| | Weight | 5.705Kg | | | | | |
| Environment | Operating Temperature | Up to 65W processor with extended temp peripherals: -20 ~ 60° C with 0.7m/s air flow with HDD: 0 ~ 40° C with 0.7m/s air flow | | | | | |
| | Storage Temperature | -40 ~ 85° C | | | | | |
| | Relative Humidity | 95% @ 40° C (non-condensing) | | | | | |
| | Vibration During Operation | With SSD: 3 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 hr/axis. | | | | | |
| | Shock During Operation | With SSD: 30 G, IEC 60068-2-27, half sine, 11 ms duration | | | | | |
| | EMC | CE/FCC Class B, CCC, BSMI | | | | | |
| | Safety | CB, UL, CCC, BSMI | | | | | |

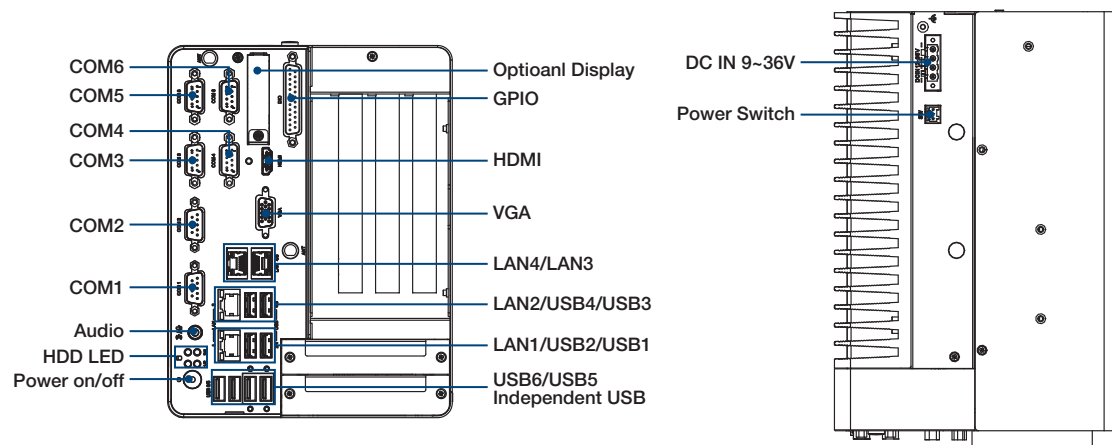
#1 SIM holder and M.2 slot are hardware interfaces for wireless communication integration only. System level RF certification is not available.

Dimensions

Unit: mm



External I/O Mechanical Layout/Drawing



Ordering Information

| Part No. | CPU | DDR4 | Gbe | VGA | HDMI | Option 3rd display module | RS-232 | RS-232/422/485 | Audio | USB | MiniPCIe | SIM | M.2 | DC Input | Expansion | Made in |
|-----------------|---------------------|------------|-----|-----|------|---------------------------|--------|----------------|--------------------|-----|----------|-----|-----|----------|---------------|---------|
| ARK-3532C-00A1 | LGA1200 Socket Type | Up to 64GB | 4 | 1 | 1 | 1 | 2 | 4 | Mic-in or Line-out | 8 | 1 | 1 | 1 | 12-36V | PCIex4 + 2PCI | China |
| ARK-3532C-00A1U | LGA1200 Socket Type | Up to 64GB | 4 | 1 | 1 | 1 | 2 | 4 | Mic-in or Line-out | 8 | 1 | 1 | 1 | 12-36V | PCIex4 + 2PCI | Taiwan |

Note: CPU/Memory/Storage and operating system bundled by request.

Packing List

| Part Number | Description |
|----------------|--|
| - | ARK-3532C Unit |
| - | User Manual (Simplified Chinese) |
| - | China RoHS |
| - | Desk mounting kit |
| 36WSWPDOBUND11 | WISE-DeviceOn |
| 36WSWPDOB0211 | McAfee Application Control Lite/Acronis Backup 11.7 for Windows PC |

Embedded OS

| Part Number | Description |
|----------------|---|
| 20706WX9HS0125 | Windows 10 IoT Enterprise 2019 LTSC 64bit for Xeon/Core i9/Core i7 |
| 20706WX9VS0129 | Windows 10 IoT Enterprise 2019 LTSC 64bit for Celeron/Core i5/Core i3 |
| 20706WX1HS0102 | img W10 21HL ARK-3532 64b 21H2 ENU for Xeon/Core i7/Core i9 |
| 20706WX1VS0102 | img W10 21VL ARK-3532 64b 21H2 ENU for Core i3/Core i5 |
| 20706WX1ES0102 | img W10 21EL ARK-3532 64b 21H2 ENU for Celeron |
| 20706WLH1S0016 | Windows 11 IoT Enterprise 2024 LTSC 64bit for Xeon/Core i9/Core i7 |
| 20706WLV1S0016 | Windows 11 IoT Enterprise 2024 LTSC 64bit for Celeron/Core i5/Core i3 |

ARK-3532C Default SKU Option Items

Optional Item for Default SKU

| Part Number | Description |
|-------------------|--|
| 96PSA-A230W24P4-3 | AC to DC adapter, DC 24V 230W, -20 ~ 60 °C |
| 1702002600 | Power cable 3-pin 183cm, USA type |
| 1702002605 | Power cable 3-pin 183cm, EU type |
| 1702031801 | Power cable 3-pin 183cm, UK type |
| 1700000237 | Power cable, 3-Pin 183cm, PSE type |

ARK-3532C Optional HDD expansion Kit

| Part Number | Description |
|-------------|---|
| AMK-A0035 | 2 x internal HDD bays kit (Max Height 15mm) |

Optional Display Module

| Part Number | Description |
|-------------|--------------|
| AMO-D001E | DVI-D module |
| AMO-D002E | DP module |
| AMO-D003E | HDMI module |

Optional TPM Module

| Part Number | Description |
|-------------|------------------------------|
| AMO-I029 | TPM 2.0 Infineon SLB9670V2.0 |