

Встраиваемые промышленные компьютеры серии ARK

ТЕХНИЧЕСКИЕ ХАРАКТЕРИСТИКИ

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Санкт-Петербург (812)309-46-40
Саратов (845)249-38-78

Смоленск (4812)29-41-54
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Томск (3822)98-41-53
Тула (4872)74-02-29
Тюмень (3452)66-21-18
Ульяновск (8422)24-23-59
Уфа (347)229-48-12
Челябинск (351)202-03-61
Череповец (8202)49-02-64
Ярославль (4852)69-52-93

ARK-3400

Cost Effective Intel® Celeron® M Solution with 2 PCI Expansion Slots and Multiple I/O

NEW



Features

- Fanless, Intel® Celeron™ M Compact Embedded Box IPC
- Dual display and support for wide screen with high resolution
- Supports 2 GbE, eSATA, 6 USB 2.0 and 4 COM ports
- Internal one 2.5" SATA HDD drive bays
- 2 x PCI expansion slot for diverse applications
- Easy integration, easy maintenance, and wide input voltage range
- Supports 48-Bit LVDS panel (by option)
- Compliant with IP40

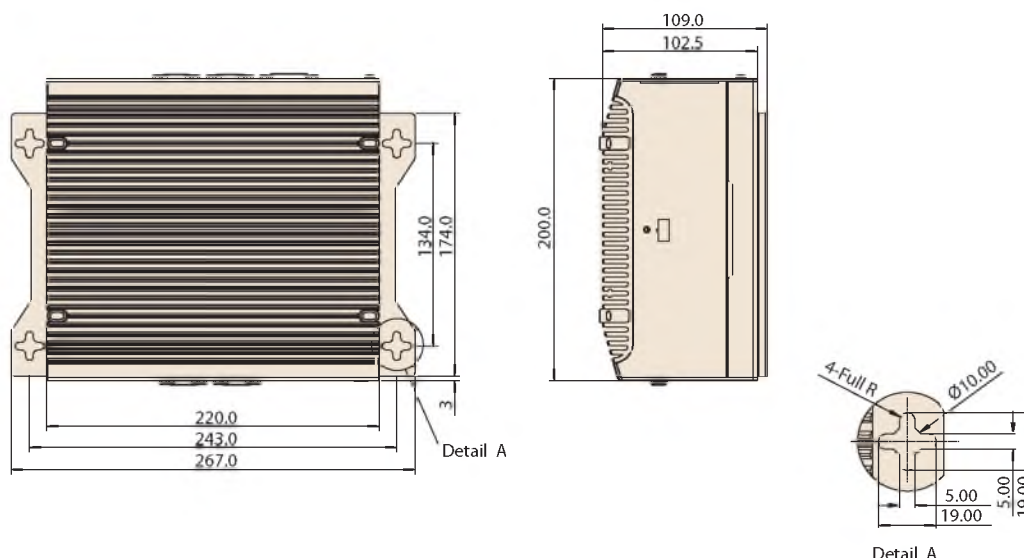


Specifications

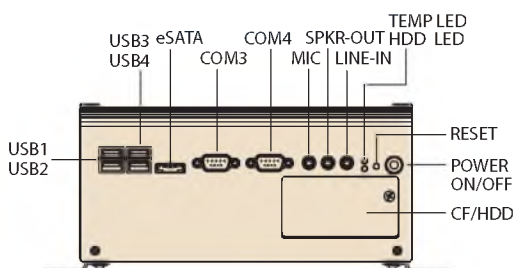
Processor System	CPU	Mobile Intel Celeron	Mobile Intel Celeron
	Max. Speed	370 (1.5 GHz)	373 (1.0 GHz w/o L2 cache)
	System Chipset	Intel 910GML + ICH6-M Chipset	
	Front Side Bus	400 MHz	400 MHz
Memory	BIOS	AWARD 4 Mbit. FWH	
	Technology	DDR2 400 MHz (910GML)	
	Max. Capacity	2 GB	
	Socket	1 x 200-pin SODIMM	
Graphics	Chipset	Integrated graphics built in Intel 910GML, Mobile Intel Graphics Media Accelerator 900	
	Interface	CRT Interface (Optional by cable)	
		DVI Interface, compliant with DVI 1.0	
		LVDS 1 48-bit LVDS interface (Optional)	
Ethernet	LAN 1	10/100/1000 Mbps Ethernet controller, supports Wake On LAN	
	LAN 2	10/100/1000 Mbps Ethernet controller, supports Wake On LAN	
Audio	Interface	Line-out, Mic-in, Line-in	
I/O interface	Serial Interface	2 x RS-232 port and 2 x RS-232/422/485 port (RS485 with autoflow control)	
	USB Interface	6 x USB ports, Compliant with USB 2.0	
Other	Digital I/O	Support 16 bit Digital I/O (optional)	
	Thermal Alarm	Yellow LED lighting	
	Watchdog Timer	255 level timer interval, setup by software	
Expansion	ISA/PCI/PCIe Slot	2 x PCI Slots	
	Mini PCI/Mini PCIe	1 x Mini PCI	
Storage	HDD	Supports drive bay space for 1 x SATA 2.5" HDD	
	SSD	Supports CompactFlash socket for type I/II CompactFlash disk	
Software Support	Microsoft Windows	Vista, XP Professional, XP Embedded	
	Linux	Fedora 9.0	
Power Requirement	Power Type	AT/ATX	
	Power Input Voltage	14 V _{DC} ~ 24 V _{DC}	
	Minimum Power Input	14 V-24 V --- 3.0 A-1.8 A	
	Power Adapter	AC to DC, DC19 V/7.89 A, 150 W (Optional)	
Power Consumption	Typical	Typical 21 W (CPU is Mobile Intel Celeron 370 1.5 GHz and w/o expansion)	
	Max.	Max. 26 W (CPU is Mobile Intel Celeron 370 1.5 GHz and w/o expansion)	
Mechanical	Construction	Aluminum housing	
	Mounting	Desk/Wall-mounting	
	Dimensions (W x H x D)	220 mm x 102.5 mm x 200 mm (8.66" x 4.04" x 7.87")	
	Weight	4 kg (8.8 lb)	
Environment	Operating Temperature	With Industrial Grade CompactFlash disk: -20 ~ 55° C With 2.5-inch extended temperature hard disk -20 to 45° C, with air flow	
	Storage Temperature	-40 ~ 85° C (-40 ~ 185° F)	
	Relative Humidity	95% @ 40° C (non-condensing)	
	Vibration Loading During Operation	With CompactFlash disk: 5 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis. With 2.5-inch hard disk: 1 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis.	
	Shock During Operation	With CompactFlash disk: 50 G, IEC 60068-2-27, half sine, 11 ms duration With hard disk: 20 G, IEC 60068-2-27, half sine, 11 ms duration	
	EMC	CE/FCC Class A, CCC, BSMI	
	Safety Certifications	UL, CCC, BSMI	

Dimensions

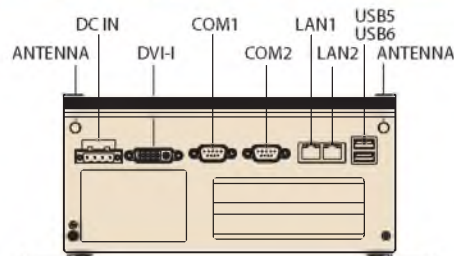
Unit: mm



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Packing List

Part Number	Description
-	1 x ARK-3400 Unit
1960014487T00C	2 x Desk/Wall mount plate
1652003234	1 x 4-pin Phoenix DC power connector
1654000446	1 x DVI-I to CRT connector
-	1 x Utility CD

Ordering Information

Part Number	Description
ARK-3400F-S5A1E	Celeron M 370 1.5 GHz Compact Embedded Box IPC
ARK-3400F-U0A1E	Celeron M 373 1.0 GHz Compact Embedded Box IPC

Optional Items

Part Number	Description
1757002161	AC-to-DC Adapter, DC19 V/7.89 A 150 W, with Phoenix Power Plug, 0 ~ 40° C for Home and Office Use
1702002600	Power cable 3-pin 180 cm, USA type
1702002605	Power cable 3-pin 180 cm, EU type
1702031801	Power cable 3-pin 180 cm, UK type
1700004713	CABLE DVI-I to DVI and CRT
1700009398	LVDS cable for ARK-3400
1700009396	LVDS power cable for ARK-3400
1700009407	Digital I/O cable for ARK-3400
1700009405	Printer cable for ARK-3400

ARK-3420

High Performance Solution with PCIe Expansion and Dual SATA HDDs for Image Processing and Surveillance Applications

NEW



Features

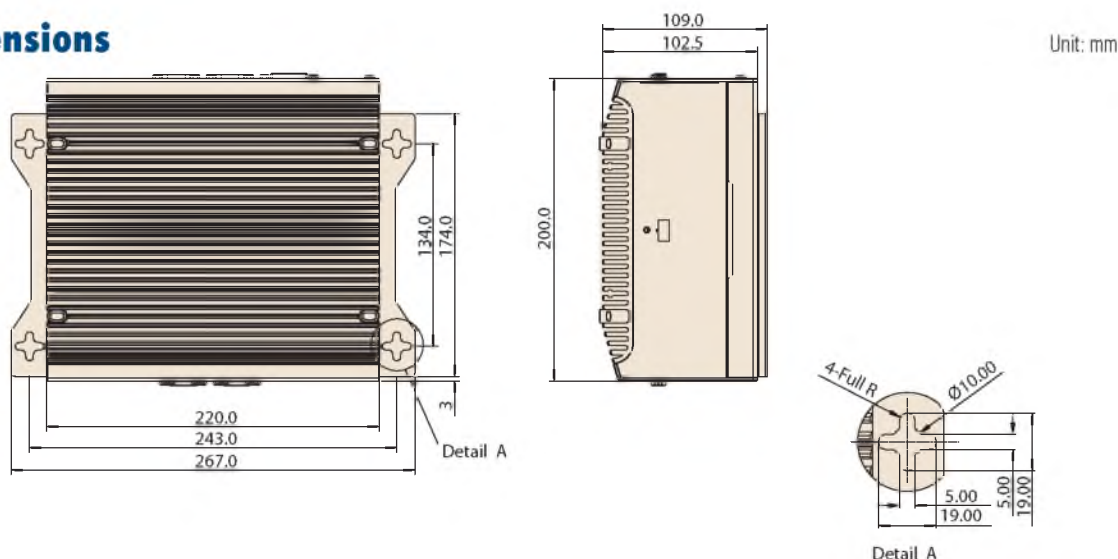
- Fanless, Intel® Core™ 2 Duo Compact Embedded Box IPC
- Dual display and support for wide screen with high resolution
- Supports 2 GbE, eSATA, 6 USB 2.0 and 4 COM ports
- Two internal 2.5" SATA HDD drive bays
- Various expansion interfaces for diverse applications
- 6 programmable function keys
- Easy integration, easy maintenance, and wide input voltage range
- IP40



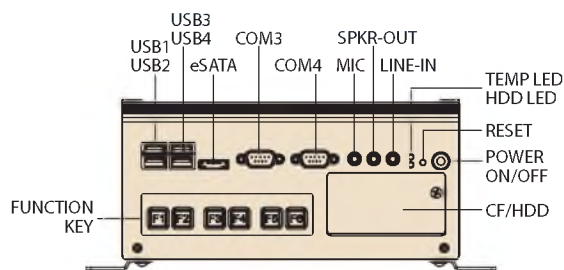
Specifications

Processor System	CPU	Intel Core 2 Duo	Intel Core 2 Duo	Mobile Intel Celeron
	Max. speed	L7500 (1.6 GHz)	U7500 (1.06 GHz)	550 (2.0 GHz)
	System Chipset	Intel GME965 + ICH8-M Chipset		
	Front Side Bus	800 MHz	533 MHz	533 MHz
Memory	BIOS	AWARD 4 Mbit, FWH		
	Technology	DDR2 533/800 MHz (GME965)		
	Max. Capacity	4 GB		
Graphics	Socket	2 x 200-pin SODIMM		
	Chipset	Integrated graphics built in Intel GME965, Mobile Intel Graphics Media Accelerator X3100		
	Interface	CRT Interface (Optional by cable) DVI Interface, compliant with DVI 1.0 48-bit LVDS interface (Optional)		
Ethernet	LAN 1	10/100/1000 Mbps Ethernet controller, supports Wake On LAN		
	LAN 2	10/100/1000 Mbps Ethernet controller, supports Wake On LAN		
Audio	Amplifier	Dual output 2.2 W amplifier		
	Interface	Spkr-out, Mic-in, Line-in		
I/O Interface	Serial Interface	2 x RS-232 ports and 2 x RS-232/422/485 ports (RS485 with autoflow control)		
	USB Interface	6 x USB ports, Compliant with USB 2.0		
	Digital I/O	Support 16 bit Digital I/O (optional)		
Other	Thermal Alarm	Yellow LED lighting		
	Watchdog Timer	255 level timer interval, setup by software		
	Function Key	6 programmable functional keys		
Expansion	ISA/PCI/PCIe Slot	2 Slots PCI (default); 2 Slots PCIe x1 (optional); 2 Slots PCIe x4 (optional); 1 Slot PCI and 1 Slot PCIe x1 (optional); 1 Slot PCI and 1 Slot PCIe x4 (optional)		
	Mini PCI/Mini PCIe	1 x Mini PCIe		
Storage	HDD	Supports drive bay space for 2 x SATA 2.5" HDD		
	SSD	Supports CompactFlash socket for type I/II CompactFlash disk		
Software Support	Microsoft Windows	Vista, XP Professional, XP Embedded		
	Linux	Fedora 9.0		
Power Requirement	Power Type	AT/ATX		
	Power Input Voltage	9 V _{DC} ~ 34 V _{DC}		
	Minimum Power Input	9 V-34 V --- 6.0 A-1.5 A		
	Power Adapter	AC to DC, DC19 V/7.89 A, 150 W (Optional)		
Power Consumption	Typical	Typical 29 W (CPU is Intel Core 2 Duo L7500 1.6 GHz and w/o expansion)		
	Max.	Max. 35 W (CPU is Intel Core 2 Duo L7500 1.6 GHz and w/o expansion)		
Mechanical	Construction	Aluminum housing		
	Mounting	Desk/wall-mounting		
	Dimensions (W x H x D)	220 mm x 102.5 mm x 200 mm (8.66" x 4.04" x 7.87")		
	Weight	4 kg (8.8 lb)		
Environment	Operating Temperature	With Industrial Grade CompactFlash disk: -20 ~ 55° C With 2.5-inch extended temperature hard disk -20 to 45° C, with air flow		
	Storage Temperature	-40 ~ 85° C (-40 ~ 185° F)		
	Relative Humidity	95% @ 40° C (non-condensing)		
	Vibration Loading During Operation	With CompactFlash disk: 5 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis. With 2.5-inch hard disk: 1 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis.		
	Shock During Operation	With CompactFlash disk: 50 G, IEC 60068-2-27, half sine, 11 ms duration With hard disk: 20 G, IEC 60068-2-27, half sine, 11 ms duration		
	EMC	CE/FCC Class A, CCC, BSMI		
	Safety Certifications	UL, CCC, BSMI		

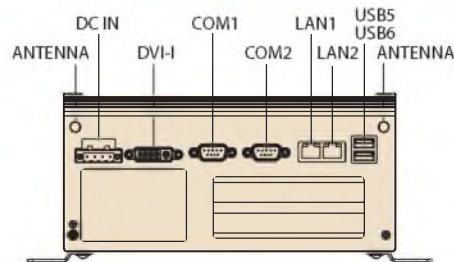
Dimensions



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Packing List

Part Number	Description
-	1 x ARK-3420 Unit
1960014487T00C	2 x Desk/Wall mount plate
1652003234	1 x 4-pin Phoenix DC power connector
1654000446	1 x DVI-I to CRT connector
-	1 x Utility CD

Ordering Information

Part Number	Description
ARK-3420F-S6A1E	Intel Core 2 Duo L7500 1.6 GHz Compact Embedded Box IPC
ARK-3420F-S1A1E	Intel Core 2 Duo U7500 1.06 GHz Compact Embedded Box IPC
ARK-3420F-U0A1E	Mobile Intel Celeron 550 2.0 GHz Compact Embedded Box IPC

Optional Items

Part Number	Description
1757002161	AC-to-DC Adapter, DC19 V/7.89 A 150 W, with Phoenix Power Plug, 0 ~ 40° C for Home and Office Use
1702002600	Power cable 3-pin 180 cm, USA type
1700004713	CABLE DVI-I to DVI and CRT
1700009398	LVDS cable for ARK-3420
1700009396	LVDS power cable for ARK-3420
1700009399	Digital I/O cable for ARK-3420
1700009397	Printer cable for ARK-3420
*9696R00100E	2 slots riser card, 2 x PCIe4
*9696R00200E	2 slots riser card, 2 x PCIe1
*9696R00400E	2 slots riser card, 1 x PCIe4 + 1 x PCI
*9696R00500E	2 slots riser card, 1 x PCIe1 + 1 x PCI

* For project base use

Embedded OS (Only available for T-Parts OEM, and CTOS service)

Part Number	Description
2070006511	Windows XP WES for ARK-3420 V4.0 ENG
2070006512	Windows XP WES for ARK-3420 V4.0 ENG_CHT_CHS_JPN
2070006513	Windows XP WES for ARK-3420 V4.0 ENG_FRE_GER_JTA
2070006510	Windows CE 6.0 Pro ARK-3420 V1.1 ENG

ARK-1360

Cost Effective Intel® Atom™ Solution with miniPCle Expansion Slot

NEW



Features

- Fanless, ultra compact embedded box IPC
- Built-in Intel® Atom™ processor Z510P 1.1 GHz/ Z530P 1.6 GHz
- Ultra Low power consumption solution
- One mini-PCle socket expansion for wireless application
- 1 x 10/100/1000 Base-T Ethernet Ports, 4 x USB 2.0, 2 x COM
- Ultra compact size, VESA mounted, robust construction with fanless operation
- IP40

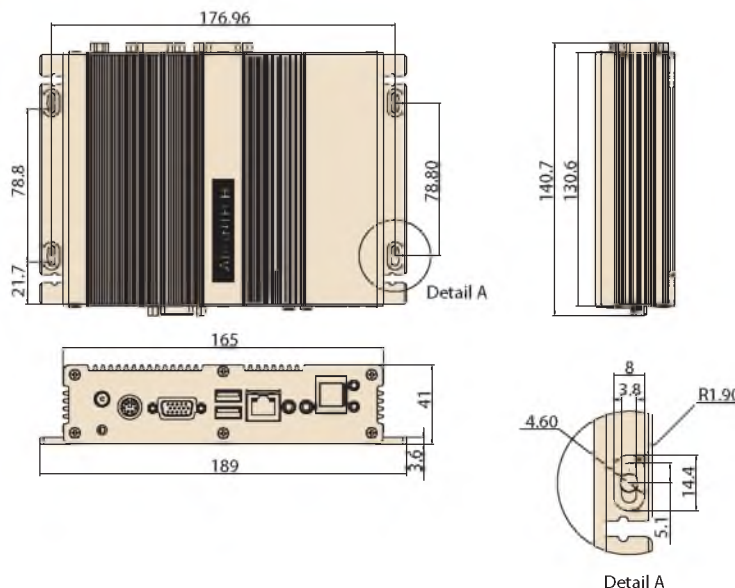


Specifications

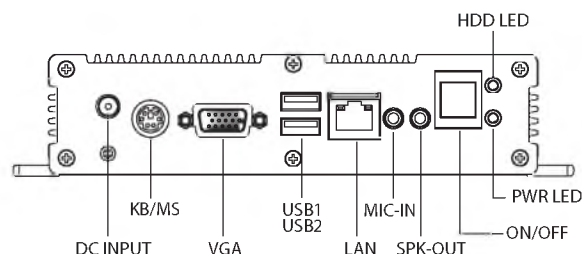
Processor System	CPU	Intel® Atom™ processor Z510P 1.1 GHz/ Z530P 1.6 GHz
	Max. Speed	1.1 GHz/1.6 GHz
	Front Side Bus	400/533 MHz FSB
	System Chipset	Intel® System Controller Hub US15WP
	BIOS	Award 8 Mb FHW BIOS
Memory	Technology	DDR2 400/533 MHz
	Max. Capacity	2 GB
	Socket	1 x 200-pin SODIMM
Graphics	Chipset	Intel® System Controller Hub US15WP
	Interface	CRT interface Single 18/24-bit LVDS interface (optional)
Ethernet	LAN	10/100/1000 Base-T Ethernet controllerr, Support Wake on LAN
	Interface	Line-out, Mic-in
I/O Interface	Serial Ports	2 x RS-232
	USB Interface	4 x USB ports, USB 2.0 Compliant
	Keyboard/Mouse	1 x PS/2 port, Supports PS/2 Mouse and Keyboard
Others	Watchdog timer	255 levels timer interval, setup by software
Expansion	Mini PCle	1 x Mini PCle
Storage	HDD	N/A
	SSD	Supports CompactFlash socket for type I/II CompactFlash disk
Software Support	Microsoft Windows	XP Professional, XP Embedded, CE 6.0
Power Requirement	Power Type	ATX
	Power Input Voltage	12 V _{DC} ~ 24 V _{DC}
	Minimum Power Input	12 V @ 1.5 A ~ 24 V @ 0.75 A
	Power Adaptor	AC to DC, DC12 V/3 A, 36 W
Power Consumption	Typical	8W
	Max	11W
Mechanical	Construction	Aluminum housing
	Mounting	Din-Rail mounting; Desk/wall-mounting; VESA mounting
	Dimensions (W x H x D)	189 x 41 x 130.6 mm (7.44" x 1.61" x 5.14")
	Weight	1.15 kg (2.53 lb)
Environment	Operating Temperature	0 ~ 55° C (32 ~ 131° F)
	Storage Temperature	-40 ~ 85° C (-40 ~ 185° F)
	Relative Humidity	95% @ 40° C (non-condensing)
	Vibration During Operation	With CompactFlash disk: 5Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1hr/axis.
	Shock During Operation	With CompactFlash disk: 50Grms, IEC 60068-2-27, half sine, 11 ms duration
	EMC	CE/FCC Class A, CCC
	Safety Certifications	UL, CCC

Dimensions

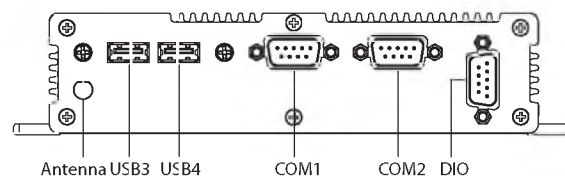
Unit: mm



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Packing List

Part Number	Description
-	1 x ARK-1360 unit
-	1 x Driver/Utility CD/manual
-	1 x Traditional chinese user manual for CCC
-	1 x China RoHS

Ordering Information

Part Number	Description
ARK-1360F-S1A1E	Intel Atom Z510 1.1 GHz w/ mini-PCIe, 8bits DIO
ARK-1360F-S6A1E	Intel Atom Z530 1.6 GHz w/ mini-PCIe, 8bits DIO

Optional Items

Part Number	Description
1757002942	AC-to-DC Adapter DC12 V/3 A 36 W, with DC-Jack, 0 ~ 40° C for Home and Office Use
1700001524	Power Cable 3-pin 180 cm, USA type
170203183C	Power Cable 3-pin 180 cm, Europe Type
170203180A	Power Cable 3-pin 180 cm, UK Type
1700008921	Power Cable 3-pin PSE Mark 180cm
9666K10000E	DIN-rail Mounting Kit
9666K10001E	VESA Mounting plate
1700060202	PS2 Keyboard/Mouse Cable
968EMC0010	7.2 Mbps HSDPA PCI Express Mini Card
968EMW0021	Wireless IEEE 802.11b/g/n, miniPCIe interface WLAN

Embedded OS (Only available for T-Parts OEM, and CTOS service)

Part Number	Description
2070009506	ARK-1360 XPE , English, Chinese-Traditional, Chinese-Simplified, Japanese
2070009505	ARK-1360 XPE , English, French, German, Italian, Spanish

ARK-3202V

Mobile Intel® Atom™ N270 Fanless Solution with Dual Display and Multiple I/O



Features

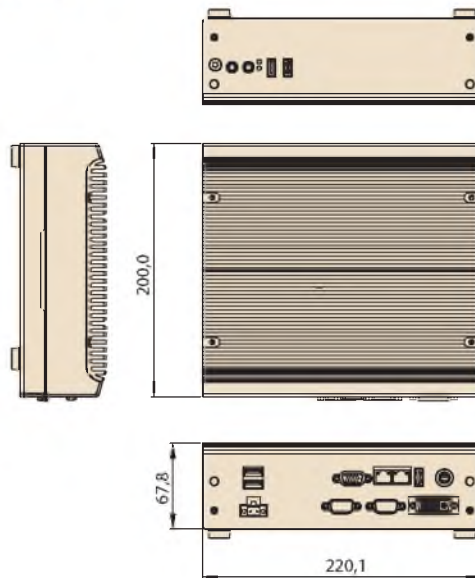
- Intel® Atom™ N270 Processor at 1.6 GHz
- Dual display and support for wide screen with high resolution
- Supports 2 GbE, 5 x USB 2.0 ports and 5 COM ports
- Optional WLAN and HSDPA modules for advanced in-vehicle solutions
- In-vehicle power design and IGN support, compliant with ISO-7637-2
- GPS on-board for in-vehicle applications
- Works with both 12 and 24-volt systems
- IP40 rating

Specifications

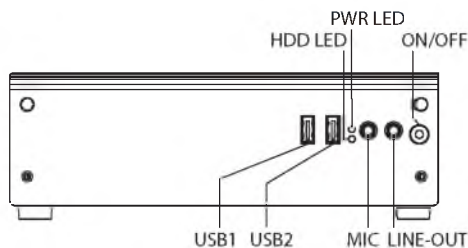
		ARK-3202V-S6A1E
Processor System	CPU	Intel Atom N270
	Max. speed	1.6 GHz
	System Chipset	Intel 945GSE + ICH7-M Chipset
	Front Side Bus	400/533MHz
	BIOS	Award 4 MB SPI BIOS
Memory	Technology	DDR2 400/533 MHz (945GSE)
	Max. Capacity	2 GB
	Socket	1 x 200-pin SODIMM
Graphics	Chipset	Integrated graphics built in Intel 945GSE
	Interface	CRT Interface
		DVI (Optional) 36-bit LVDS interface (Optional)
Ethernet	LAN 1	10/100/1000 Mbps Ethernet controller, support Wake On LAN
	LAN 2	10/100/1000 Mbps Ethernet controller, support Wake On LAN
Audio	Amplifier	2.2W amplifier
	Interface	Spkr-out, Mic-in
IO interface	Serial Interface	2 x RS-232 & 3 x RS-232/422/485 w/ Auto Flow Control
	USB Interface	5 x USB ports, Compliant with USB 2.0
Other	GPS	GPS onboard
	Watchdog timer	255-level timer interval, setup by software
Expansion	Mini PCIe	2 x Mini PCIe (with one SIM socket)
Storage	SSD	Supports CompactFlash socket for type I/II CompactFlash disk
Software Support	Microsoft Windows	XP Professional, XP Embedded
	Linux	Fedora 9.0
Power Requirement	Power Type	AT/ATX
	Power Input Voltage	9 V _{DC} ~ 32 V _{DC} (for In Vehicle)
	Minimum Power Input	9V-32V, 7.2A-2.0A
	Power Adapter	AC to DC, DC19 V/3.42 A, 65 W (Optional)
Power Consumption	Typical	Typical 13.3W (CPU is Intel Atom N270 1.6 GHz and w/o expansion)
	Max.	Max. 17.1W (CPU is Intel Atom N270 1.6 GHz and w/o expansion)
Mechanical	Construction	Aluminum housing
	Mounting	Desk/wall-mounting
	Dimensions (W x H x D)	220 mm x 68 mm x 200 mm (8.66" x 2.67" x 7.87")
	Weight	3 kg (6.6 lb)
Environment	Operating Temperature	With Industrial Grade CompactFlash disk: -20 ~ 60° C (-4 ~ 140° F)
	Storage Temperature	-40 ~ 85° C (-40 ~ 185° F)
	Relative Humidity	95% @ 40° C (non-condensing)
	Vibration Loading During Operation	With CompactFlash disk: 5 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis. MIL-810 STD 514.5C-3
	Shock During Operation	With CompactFlash disk: 50 G, IEC 60068-2-27, half sine, 11 ms duration
	EMC	CE/FCC Class A, CCC, BSMI
	Safety Certifications	UL, CCC, BSMI
	In-Vehicle Certification	E-Mark E13, ISO-7637-2

Dimensions

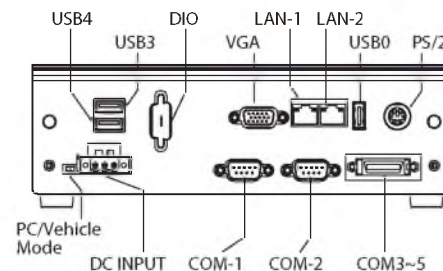
Unit: mm (inch)



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Packing List

Part Number	Description
-	1 x ARK-3202V Unit
-	1 x Driver/Utility CD/Manual
-	1 x User Manual (Simplified Chinese)
1960014487T00C	2 x Desk/Wall mount plate
1700018432	1 x 2-pin Phoenix DC power connector
1700018308	M Cable SCSI 26P(M)/D-SUB 9P(M)X3 COM, 10CM
1750001782	1 x Antenna GPS Active 5v 38 x 40 with 5M SMA cable

Ordering Information

Part Number	Description
ARK-3202V-S6A1E	Intel Atom N270 1.6 GHz Compact Embedded Box IPC, w/ 2 x GbE, 5 x USB 2.0, 5 x COM, 2 x Mini PCIe, GPS, VGA, Audio

Optional Items

Part Number	Description
1757003659	AC-to-DC Adapter, DC19 V/3.42A 65W, with Phoenix Power Plug, 0 ~ 40° C for Home and Office Use
1757002682	AC-toDC adaptor DC19V/3.42A 65W, 0-40C, for Japan with PSE
1700001947	Power cable 2-pin 180 cm, USA for ARK-338X
1700001948	Power cable 2-pin 180 cm, Europe for ARK-338X
1700001949	Power cable 2-pin 180 cm, UK for ARK-338X
1700008921	Power cable 3-pin 180cm, Japan for 1757002682
1652004519	3pin terminal block for ARK-3202V DC input, use with 1757002682
1700009398	LVDS power cable for ARK-3202
AMC-HSDPA01E	3.5G HSPPA Module

Embedded OS

Part Number	Description
2070009503	WES 2009 ENG/FR/GE/IT/SP
2070009504	WES2009 ENG/CHT/CHS/JPN
2070010050	Win CE 6.0 Pro

ARK-3202

Mobile Intel® Atom™ N270 Fanless Solution with Dual Display and Multiple I/O



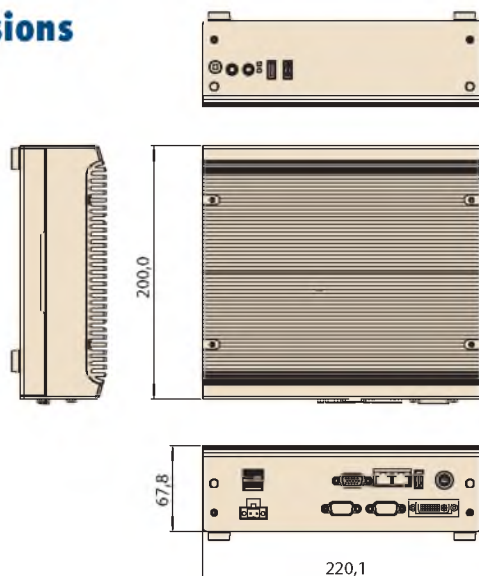
Specifications

Features

- Intel® Atom N270 Processor at 1.6 GHz
- Dual display and support for wide screen with high resolution
- Supports 2 GbE, 5 USB 2.0 and max to 5 COMs ports
- Supports two MiniPCle expansion slots and one SIM socket (ARK-3202F only)
- IP40

		ARK-3202L-S6A1E	ARK-3202F-S6A1E
Processor System	CPU	Intel Atom N270	
	Max. speed	1.6 GHz	
	System Chipset	Intel 945GSE + ICH7-M Chipset	
	Front Side Bus	400/533MHz	
	BIOS	Award 4 MB SPI BIOS	
Memory	Technology	DDR2 400/533 MHz (945GSE)	
	Max. Capacity	2 GB	
	Socket	1 x 200-pin SODIMM	
Graphics	Chipset	Integrated graphics built in Intel 945GSE	
	Interface	CRT Interface	
		DVI Interface, compliant with DVI 1.0	DVI (Optional)
Ethernet	LAN 1	10/100/1000 Mbps Ethernet controller, support Wake On LAN	
	LAN 2	10/100/1000 Mbps Ethernet controller, support Wake On LAN	
Audio	Amplifier	2.2W amplifier	
	Interface	Spkr-out, Mic-in	
IO interface	Serial Interface	2 x RS-232 port	2 x RS-232 & 3 x RS-232/422/485 w/ Auto Flow Control
	USB Interface	5 x USB ports, Compliant with USB 2.0	
Other	Digital I/O	-	8-bit DIO
	Watchdog timer	255-level timer interval, setup by software	
Expansion	Mini PCIe	-	2 x Mini PCIe
Storage	HDD	1 x SATA 2.5" HDD (support 9.5mm height only)	1x SATA 2.5" HDD (support 9.5 mm height only)
	SSD	Supports CompactFlash socket for type I/II CompactFlash disk	
Software Support	Microsoft Windows	Vista, XP Professional, XP Embedded	
	Linux	Fedora 9.0	
Power Requirement	Power Type	AT/ATX	
	Power Input Voltage	12 V _{DC} ~ 24 V _{DC}	
	Minimum Power Input	12V-24V, 3.0A-1.5A	
	Power Adapter	AC to DC, DC19V/3.42A, 65W (Optional)	
Power Consumption	Typical	Typical 13.3W (CPU is Intel Atom N270 1.6 GHz and w/o expansion)	
	Max.	Max. 17.1W (CPU is Intel Atom N270 1.6 GHz and w/o expansion)	
Mechanical	Construction	Aluminum housing	
	Mounting	Desk/wall-mounting	
	Dimensions (W x H x D)	220 mm x 68 mm x 200 mm (8.66" x 2.67" x 7.87")	
	Weight	3 kg (6.6 lb)	
Environment	Operating Temperature	With Industrial Grade CompactFlash disk: -20 ~ 60° C (-4 ~ 140° F) With 2.5-inch extended temperature hard disk 0 to 45° C (32 ~ 112° F), with air flow	
	Storage Temperature	-40 ~ 85° C (-40 ~ 185° F)	
	Relative Humidity	95% @ 40° C (non-condensing)	
	Vibration Loading During Operation	With CompactFlash disk: 5 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis. With 2.5-inch hard disk: 1 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis.	
	Shock During Operation	With CompactFlash disk: 50 G, IEC 60068-2-27, half sine, 11 ms duration With hard disk: 20 G, IEC 60068-2-27, half sine, 11 ms duration	
	EMC	CE/FCC Class A, CCC, BSMI	
	Safety Certifications	UL, CCC, BSMI	

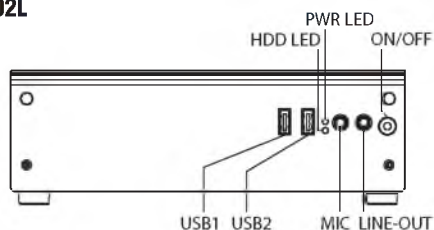
Dimensions



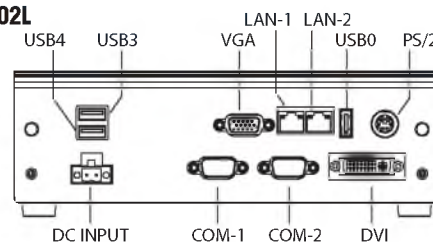
Unit: mm (inch)



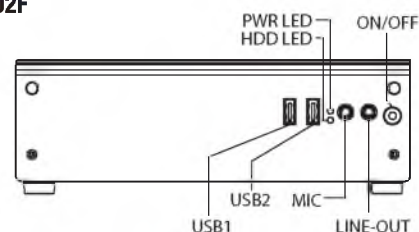
Front Panel External I/O Mechanical Layout/Drawing ARK-3202L



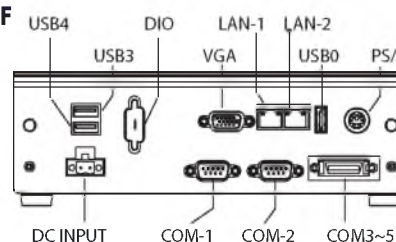
Rear Panel External I/O Mechanical Layout/Drawing ARK-3202L



Front Panel External I/O Mechanical Layout/Drawing ARK-3202F



Rear Panel External I/O Mechanical Layout/Drawing ARK-3202F



Packing List

Part Number	Description
-	1 x ARK-3202 Unit
-	1 x Driver/Utility CD/Manual
-	1 x User Manual (Simplified Chinese)
1960014487T00C	2 x Desk/Wall mount plate
1700009001	1 x 2-pin Phoenix DC power connector

Ordering Information

Part Number	Description
ARK-3202F-S6A1E	Intel Atom N270 1.6 GHz Compact Embedded Box IPC, w/ 2 x GbE, 5 x USB 2.0, 5 x COM, 2 x Mini PCIe, VGA, Audio
ARK-3202L-S6A1E	Intel Atom N270 1.6 GHz Compact Embedded Box IPC, w/ 2 x GbE, 5 x USB 2.0, 2 x COM, VGA, DVI, Audio

Optional Items

Part Number	Description
1757003659	AC-to-DC Adapter, DC19 V/3.42A 65W, with Phoenix Power Plug, 0 ~ 40° C for Home and Office Use
1700001947	Power cable 2-pin 180 cm, USA for ARK-338X
1700001948	Power cable 2-pin 180 cm, Europe for ARK-338X
1700001949	Power cable 2-pin 180 cm, UK for ARK-338X
1700009398	LVDS power cable for ARK-3202L
1700018308	M Cable SCSI 26P(M)/D-SUB 9P(M)X3 COM, 10CM

Embedded OS

Part Number	Description
2070009503	WES 2009 ENG/FR/GE/IT/SP
2070009504	WES 2009 ENG/CHT/CHS/JPN
2070010050	Win CE 6.0 Pro

ARK-3403

Low Power Intel® Atom™ D510/D525 with
PCI/PCIe Expansion and Dual SATA HDDs

NEW



Features

- Intel® Atom™ D510/D525 dual core up to 1.8 GHz fanless embedded IPC
- Supports VGA and LVDS dual display and support for widescreens with high resolution
- Supports 2 GbE, eSATA, 6 USB 2.0, audio and 4 COM ports
- Two internal 2.5" SATA HDD drive bays
- Supports 2 x MiniPCIe, 2 x PCI/PCIe expansion interfaces for diverse applications
- Easy integration, easy maintenance, and wide input voltage range
- IP40

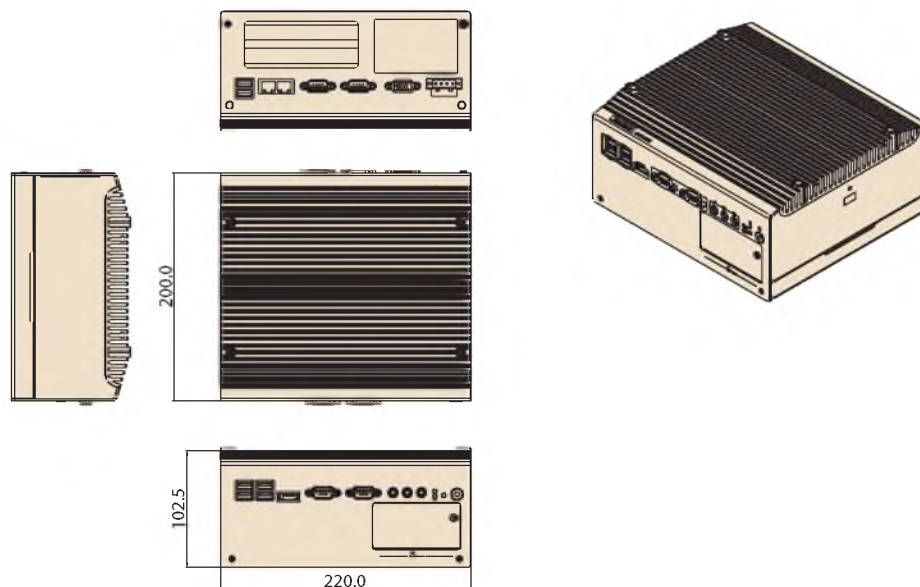


Specifications

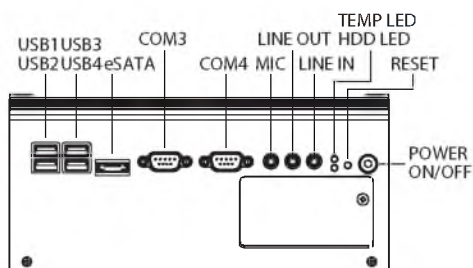
Processor System	CPU	Intel® Atom D510 processor	Intel Atom D525 processor
	Max. speed	1.66 GHz	1.8 GHz
	System Chipset	Intel™ ICH8M Chipset	
	BIOS	AMI™ 16Mbit, SPI	
Memory	Technology	DDR2 667 MHz	
	Max. Capacity	2 GB	
	Socket	1 x 200-pin SODIMM	
Graphics	Chipset	Intel 3.5 Gen Integrated Graphic Engine + GFX core	
	Interface	CRT Interface 18-bit LVDS interface(Optional)	
Ethernet	LAN 1	10/100/1000 Mbps Ethernet controller, support Wake On LAN	
	LAN 2	10/100/1000 Mbps Ethernet controller, support Wake On LAN	
Audio	Amplifier	-	
	Interface	Line-out, Mic-in, Line-in	
IO interface	Serial Interface	4 COM, 2 x RS-232 and 2 x RS-232/422/485 port, RS-485 w/ auto flow control, 2 extra RS-232 ports (optional)	
	USB Interface	6 x USB ports, Compliant with USB 2.0	
	Parallel Port	Supports D-sub 25-pin connector (optional)	
	Digital I/O	Support 16-bit digital IO (optional)	
Others	Thermal Alarm	Yellow LED lighting	
	Watchdog Timer	255 levels timer interval, setup by software	
Expansion	ISA/PCI/PC e Slot	1 Slot PCI and 1 Slot PCIe x1 (default); 2 Slots PCIe x1 (optional); 2 Slots PCI (optional)	
		Supports maximum dimension of 167 mm (width) x 106 mm (length) for expansion PC board	
	Mini PCI/Mini PCIe	2 x Mini PCIe	
Storage	HDD	Supports drive bay space for 2 x SATA 2.5" HDD (9.5 mm height only)	
	SSD	Supports CompactFlash socket for type I/II CompactFlash disk	
Software Support	Microsoft Windows	Win 7, XP Professional, XP Embedded, WinCE 6.0	
	Linux	Fedora 12	
Power Requirement	Power Type	AT/ATX	
	Power Input Voltage	12 V _{DC} ~ 24 V _{DC}	
	Minimum Power Input	12 V _{DC} ~ V _{DC} @ 4.6 A ~ 2.4 A	
	Power Adapter	AC to DC, DC19V/7.89A, 150W(Optional)	
Power Consumption	Typical	Typical 13 W (Intel Atom D510 1.66 GHz w/o expansion)	
	Max.	Max. 15 W (Intel Atom D510 1.66 GHz w/o expansion)	
Mechanical	Construction	Aluminum housing	
	Mounting	Desk/wall-mounting	
	Dimensions (W x H x D)	220 mm x 102.5 mm x 200 mm (8.66" x 4.04" x 7.87")	
	Weight	4 kg (8.8 lb)	
Environment	Operating Temperature	With extend temperature peripherals CompactFlash disk: -10 ~ 55° C With extend temperature peripherals 2.5-inch hard disk -10 to 45° C, with air flow	
	Storage Temperature	-40 ~ 85° C (-40 ~ 185°F)	
	Relative Humidity	95% @ 40° C (non-condensing)	
	Vibration Loading During Operation	With CompactFlash disk: 5 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis. With 2.5-inch hard disk: 1 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis.	
	Shock During Operation	With CompactFlash disk: 50 G, IEC 60068-2-27, half sine, 11 ms duration With hard disk: 20 G, IEC 60068-2-27, half sine, 11 ms duration	
	EMC	CE/FCC Class A, CCC, BSMI	
	Safety Certifications	UL, CCC, BSMI	

Dimensions

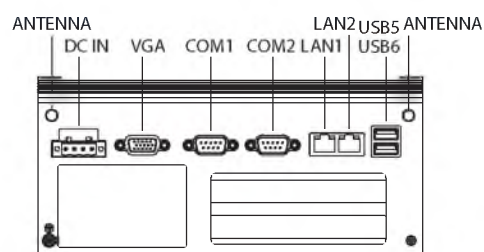
Unit: mm (inch)



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Packing List

Part Number	Description
-	1 x ARK-3403 unit
1960014487T00C	2 x desk/wall mount plate
1652003234	1 x 4-pin phoenix DC power connector
-	1 x utility CD

Ordering Information

Part Number	Description
ARK-3403-D5A1E	Intel Atom D510 1.66 GHz compact embedded box IPC, w/ VGA, 2 x Giga LAN, 6 x USB 2.0, 4 x COM, 2 MiniPCIe, Audio
ARK-3403-D6A1E	Intel Atom D525 1.8 GHz compact embedded box IPC, w/VGA, 2 x GLAN, 6 x USB2.0 4 x COM, 2 MiniPCIe, audio

Optional Items

Part Number	Description
1757002161	AC-to-DC adapter, DC19 V/7.89A 150 W, with phoenix power plug, 0 ~ 40° C for home and office use
1702002600	Power cable 3-pin 180 cm, USA type
1702002605	Power cable 3-pin 180 cm, EU type
1702031801	Power cable 3-pin 180 cm, UK type
1700008871	COM Cable D-SUB 9P(M)/IDE#2 10P-2.0 20 cm
1700018187	LPT cable 2 x 13p-2.0/D-SUB 25P(F) 20 cm for ARK-3440
1700017944	LVDS cable for ARK-3403
1700009407	DIO cable D-SUB 25P(M)/2*10P-1.25 15cm
*9696R01000E	2 slot riser card, 1 x PCIe x1 + 1 x PCI
*9696R01300E	2 slot riser card, 2 x PCI
*9696R00900E	2 slot riser card, 2 x PCIe x1

* for project base

Embedded OS

Part Number	Description
2070009923	WinCE 6.0 ARK-3403 ENG
2070009030	XPE WES2009 Luna Pier V4.0 ENG

ARK-5260

Intel® Atom™ D510 with Dual PCI/PCIe Expansion and Dual Mobile HDDs

NEW



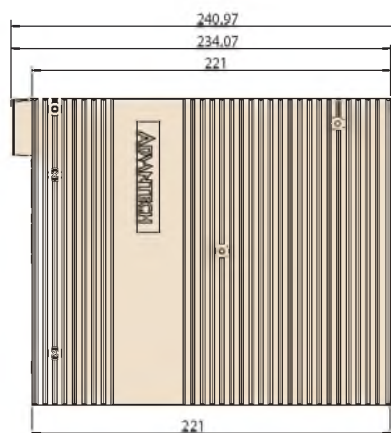
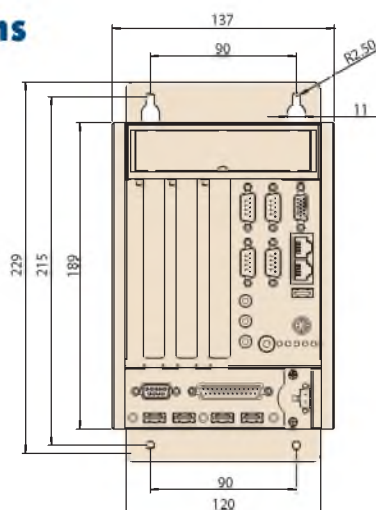
Specifications

Features

- Extremely compact, sealed construction with fanless operation, supports Intel® Atom® D510 up to 1.66 GHz
- Supports 2 Giga LAN and 5 USB 2.0 ports
- Supports 4 RS-232/422/485 with Auto-flow control
- Built-in 1 x PCIe, and 2 x PCI expansion slots
- Rubber anti-vibration card-holder for PC expansion boards
- Supports wide power range of 12- 24V DC input
- IP40

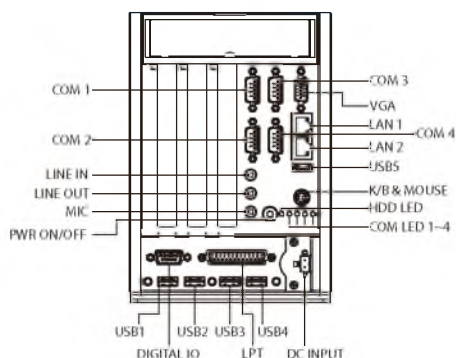
Processor System	CPU	Intel Atom™ D510 processor
	Max. Speed	1.66 GHz
	System Chipset	ICH8M
	BIOS	AMI 16 MB SPI BIOS
Memory	Technology	Single channel DDR2 667 MHz
	Max. Capacity	2 GB SODIMM
	Socket	1 x 200-pin SODIMM
Graphics	Chipset	Embedded Gen3.5+ GFX Core technology, Direct X 9/Pixel Shader 2.0 compliant
	VRAM	Shared 224 MB
	Interface	VGA: Supports up to 2048 x 1536 @ 60 Hz
Ethernet	LAN1	10/100/1000 Mbps GigaLAN Controller, Supports Wake On LAN
	LAN2	10/100/1000 Mbps GigaLAN Controller, Supports Wake On LAN
Audio	Interface	Line-in, Line-out, Mic-in
IO Interface	Serial Ports	4 x RS-232/422/485 port, support Auto-flow control
	USB Interface	5 x USB ports, USB 2.0 compliant
	Keyboard/Mouse	1 x PS/2 port, supports PS/2 mouse and keyboard
	Parallel Port	Supports D-sub 25-pin connector
	Digital I/O	Supports 8-bit digital I/O
Other	Watchdog timer	255-level timer interval, setup by software
	COM LED	4 COM LED lighting
Storage	HDD	Supports two drive bays space for SATA 2.5" HDD (9.5 mm height only)
	SSD	Supports one internal CompactFlash socket for type I/II CompactFlash disk
Expansion	PCI/PCIe Slot	2 PCI Slot, and 1 PCIe x1 Slot Supports maximum 15W power for expansion Supports maximum dimension of 99 mm (width) x 186 mm (length) for expansion PC board
Software Support	Microsoft Windows	Windows 7, XP Embedded, WinCE 6.0
Power Requirement	Power Type	ATX
	Power Input Voltage	12 V _{DC} ~ 24 V _{DC}
	Minimum Power Input	12 V @ 5 A ~ 24 V @ 2.5 A
	Power Adapter	AC-to-DC, 65 W DC19 V/3.4 A
Power Consumption	Typical	20W
	Max.	23W
Mechanical	Construction	Aluminum housing
	Mounting	Desk/wall-mounting
	Dimensions (W x H x D)	137 x 189 x 221 mm (5.39" x 7.44" x 8.70")
	Weight	4.2 kg (9.24 lbs)
Environment	Operating Temperature	With extended temperature peripherals 2.5-inch HDD without PC expansion Boards: 0 ~ 45° C With extended temperature peripherals CompactFlash disk without PC expansion Boards: -20 ~ 55° C
	Storage Temperature	-40 ~ 85° C (-40 ~ 185° F)
	Relative Humidity	95% @ 40° C (non-condensing)
	Vibration Loading During Operation	With 2.5-inch HDD: 1 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis With Compact Flash disk: 5 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis
	Shock During Operation	With 2.5-inch HDD: 20 G, IEC 60068-2-27, half sine, 11 ms duration With Compact Flash disk only: 50 G, IEC 60068-2-27, half sine, 11 ms duration
	EMC	CE/FCC, CCC, BSMI
	Safety Certifications	CCC, BSMI

Dimensions

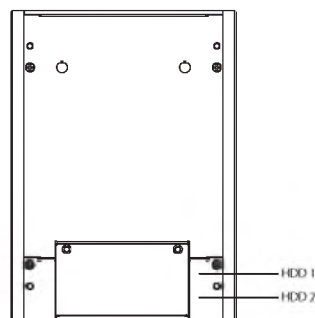


Unit: mm (inch)

Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Packing List

Part Number	Description
-	1 x ARK-5260 Unit
-	1 x Driver/Utility CD/Manual
-	1 x User Manual (Simplified Chinese)
1960049826N001	1 x Mounting bracket upper
1960049827N001	1 x Mounting bracket lower
1990000505	3 x Shock proof rubber

Ordering Information

Part Number	Description
ARK-5260F-D5A1E	Intel Atom D510 1.66 GHz embedded box computer, with VGA, 2 x GbE, 5 x USB ports, 4 x COM ports, audio, 2xPCI and 1xPCIe expansion slots

Optional Items

Part Number	Description
1757003659	AC-to-DC Adapter, DC19 V/3.42A 65 W, with phoenix power plug
1700001947	Power cable 2-pin 180 cm, USA for ARK-338X
1700001948	Power cable 2-pin 180 cm, Europe for ARK-338X
1700001949	Power cable 2-pin 180 cm, UK for ARK-338X
1757000537	AC-to-DC Adapter 4-Pin DC 19V/6.32A, 120 W
*1700018474	4-pin DC connector cable (compatible with 1960048412N001)
*1960048412N001	4-pin DC bracket for ARK-5260 (compatible with 1700018474)
1700060202	PS/2 keyboard/mouse cable

* for project base

Embedded OS

Part Number	Description
2070010215	Windows XP Embedded WES2009 for ARK-5260, English version (610 MB)
2070010216	Windows XP Embedded WES2009 for ARK-5260, 24-in-1 languages version (610 MB)
2070010257	WinCE 6.0 Pro ARK-5260 V1.3 ENG (customized BIOS required)

ARK-3500

3rd Gen. Intel® Core™ i3/ i5/ i7 with 2 Expansion slots and wide range power Fanless Box PC

NEW



Features

- Supports Intel® Core™ i3/i5/i7 mobile processor(rPGA) + Intel QM77 PCH
- Triple independent display with 3rd gen Core i processor : DVI + HDMI + DisplayPort
- DDR3/DDR3L SO-DIMM memory support up to 16 GB
- 2 expansion slots with vary interface: PCI, PCIe x 1 & PCIe x 4
- 2 x miniPCIe slots with SIM card holders
- 9-34V wide range lockable DC jack design
- Versatile I/Os including 4 x high speed USB 3.0 and 8 x COM ports
- Flexible Storage Support including 2x mSATA, 1x CFast and 2x 2.5" SATA HDD/ SSD bays
- Supports iManager, SUSIAccess and Embedded Software APIs



SUSIAccess iManager

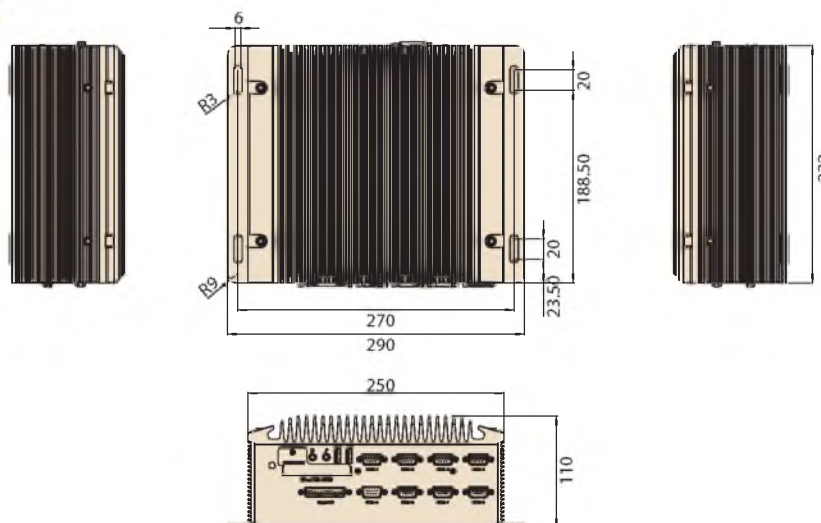


Specifications

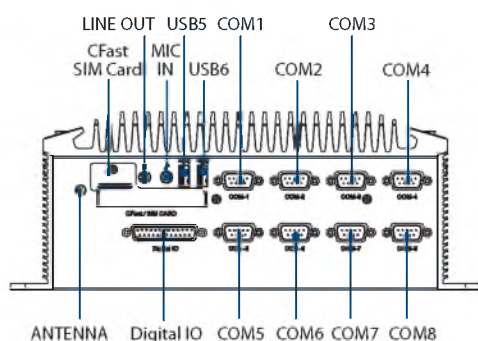
Processor System	CPU (rPGA)	Intel Core i7-3610QE	Intel Core i5-3610ME	Intel Core i3-3120ME	Celeron 1020E
	Frequency	2.3 GHz (Quad Core)	2.7 GHz (Dual Core)	2.4 GHz (Dual Core)	2.2 GHz (Dual Core)
	L3 Cache	6 MB	3 MB	3 MB	2 MB
	Watts	45W	35W	35W	35W
	System Chipset	Intel QM77			
	BIOS	AMI EFI 64Mbit			
Memory	Technology	DDR3/DDR3L 1600MHz			
	Max. Capacity	16 GB			
	Socket	2 x 204-pin SO-DIMM			
Graphics	Chipset	Intel QM77 Integrated GFX Gen 7			
	Graphic Engine	DirectX11, OpenGL 3.1, and Open CL 1.1; Hardware decode acceleration: AVC/H.264, MPEG-2, VC-1			
	CRT	VGA integrated in DVI-I port			
	DVI-I	1920 x 1200 @ 60 Hz			
	HDMI	Support HDMI 1.4, 1920 x 1200 @ 60 Hz			
	Display port	2560 x 1600 @ 60Hz (Video only, and only support on 3rd generation processor)			
Ethernet	Dual Display	VGA+DVI, VGA+HDMI, VGA+DP, DVI+HDMI, DVI+DP, HDMI+DP			
	Triple Display	DVI-D + HDMI + DisplayPort (Main display)			
		N/A			
Ethernet	LAN1	10/100/1000 Mbps Intel 82579LM GbE, support Wake On Lan			
	LAN2	10/100/1000 Mbps Intel I-2101T GbE, support Wake On Lan			
Audio	Interface	Realtek ALC892, High Definition Audio, Line-out, Mic-in			
I/O Interface	Serial Port	4 x RS-232 ports, 4 x RS-232/422/485 port with auto flow control			
	USB	4 x USB 3.0 ports (USB1,2,3,4); 2 x USB 2.0 ports (USB5,6)			
	DIO	16 bit DIO			
Expansions	Mini PCIe	2 x Full-size Mini PCIe with SIM holder (Supports mSATA)			
	Add-on Card Slot	ARK-3500P-00A1E : 2 x PCI; Maximum card size: 110 mm (H) x 180 mm (L) ARK-3500F-00A1E : PCIe x 1 + PCIe x 4; Maximum card size: 110 mm (H) x 180 mm (L) Suggest maximum power consumption 10w for each slot			
Storage	HDD	Two 2.5" SATA HDD Bays with maximum device height 9.5mm, SATA III, Gen 3 Support (Max. Data Transfer Rate 600 MB/s), Support SATA RAID 0, 1			
	Solid State Disk	1 x CFast Card slot			
Software Support	Microsoft Windows	Windows 8, Windows 7, XP Professional (32bit), XP Embedded (32bit)			
	Linux	Ubuntu 12.04			
Power Requirements	Power Type	AT/ATX			
	Power Input Voltage	9 ~ 34 V _{DC}			
	Power Adapter	AC to DC, DC19V / 6.32A, 120W (Optional)			
Power Consumption	Typical	19.2W	16.4W	14.8W	16.4W
	Max.	60W	36.5W	30W	31.8W
Mechanical	Construction	Aluminum housing			
	Mounting	Desk/wall-mounting			
	Dimensions (W x H x D)	290 x 110 x 232mm (11.4" x 4.33" x 9.13")			
	Weight	4.8 kg			
Environment	Operating Temperature	with SSD: -10 ~ 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: 5 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 hr/axis.			
	Shock During Operation	With SSD: 50 G, IEC 60068-2-27, half sine, 11 ms duration			
	EMC	CE/FCC Class A, CCC, BSMI			
	Safety	CB, UL, CCC, BSMI			

Dimensions

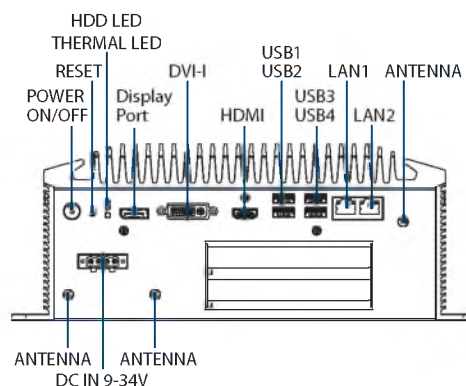
Unit: mm



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Ordering Information

Part No.	CPU	DDR3	DP	HDMI	DVI-I	RS-232/422/485	RS-232	USB 3.0	USB 2.0	MiniPCIe	SIM	DC input	Expansion
ARK-3500P-00A1E	PGA Socket Type	up to 16 GB	1	1	1	4	4	4	2	2	2	9 ~ 34 V	2 x PCI
ARK-3500F-00A1E	PGA Socket Type	up to 16 GB	1	1	1	4	4	4	2	2	2	9 ~ 34 V	1 x PCIe x 1 1 x PCIe x 4

Note: Memory, storage and operating system bundled by request

Packing List

Part Number	Description
1654009744	DVI-I to VGA adaptor
968EMLSAP2	SUSI CD
-	User Manual (Simplified Chinese)
-	China RoHS for ARK-3500 Electronic Pollution 1st
1652003234	4 pin DC in terminal block
1930001241	HDD screws
2190000902	CARDBOARD-WARRANTY REV. A2

Embedded OS

Part Number	Description
2070012570	WES2009 32bit ENG/CHT/CHS/JPN
2070011884	WES7E 64bit ENG
2070012628	WES7P 64bit ENG/CHT/CHS/JPN

Optional Items

Part Number	Description
1757004523-01	AC-to-DC Adapter, DC 19V/6.32A 120W, 0-40° C for Home and Office Use
1757004529-01	AC-to-DC Adapter, DC 19V/6.84A, 130W, -20 ~ 70° C
1702002600	Power cable 3-pin 180cm, USA type, for 1757004523-01 and 1757004529-01
1702031801	Power cable 3-pin 180cm, UK type, for 1757004523-01 and 1757004529-01
1702002605	Power cable 3-pin 180cm, EU type, for 1757004523-01 and 1757004529-01
1700000237	Power cable 3-pin 180cm, with PSE, for 1757004523-01
96MPI7M-2.3-6M9T	CORE 2.3G 6M 988P 4CORE I7-3610QE(G)
96MPI5-2.7-3M9T	CORE 2.7G 3M 988P 2CORE I5-3610ME(G)
96MPI3M-2.4-3M9T	CORE 2.4G 3M 988P 2CORE I3-3120ME(G)
96MPCM-2.2-2M9T	CELERON M 2.2G 2M 988P 2CORE 1020E(G)

ARK-3440 A2

1st Gen. Intel® Core™ i3/i5/i7 with PCI/PCIe Expansion Slots Fanless Box PC



Features

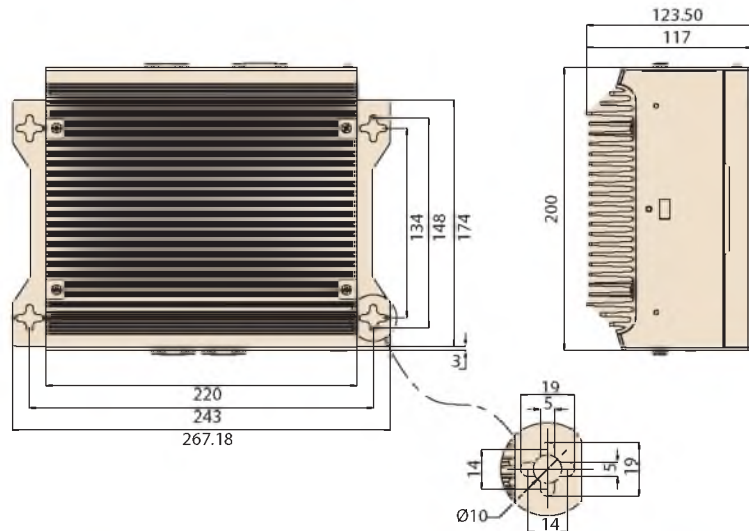
- Intel® Core™ i3/i5/i7 Fanless Embedded Box PC
- Multi-display and support for wide screen with high resolution
- Supports 2 GbE, eSATA, 6 USB 2.0, audio and 3 COM ports
- Two internal 2.5" SATA HDD bays
- Various expansion interfaces for diverse applications
- Easy integration, easy maintenance, and wide input voltage range 9 – 34 V
- IP40 sealed design



Specifications

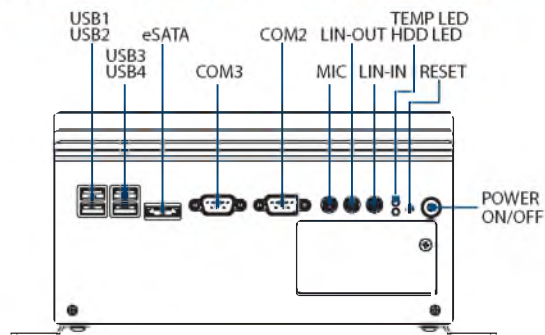
Processor System	CPU	Intel Core i7 610E (Dual Core)	Intel Core i5 520E (Dual Core)	Intel Core i3 330E (Dual Core)
	Frequency	2.53 GHz	2.4 GHz	2.13 GHz
	L2 Cache	4MB	3MB	3MB
	System Chipset	Intel QM57		
	BIOS	AMI 16 Mbit SPI BIOS		
Memory	Technology	DDR3 1066 MHz		
	Max. Capacity	8 GB		
	Socket	2 x 204-pin SO-DIMM		
Graphics	Chipset	Integrated graphics built in Intel QM57		
	Interface	VGA: up to 2048 x 1536 (By DVI-I to VGA adaptor)		
		DVI-D: up to 1920 x 1200		
Ethernet	LAN 1	10/100/1000 Mbps, Intel 82577LM, support Wake On LAN		
		10/100/1000 Mbps, Intel 82583V, support Wake On LAN		
	LAN 2	10/100/1000 Mbps, Intel 82583V, support Wake On LAN		
Audio	Amplifier	-		
	Interface	Line-in, Line-out, Mic-in		
		2 x RS232, 1 x RS232/422/485 (w/auto flow control)		
IO interface	Serial Interface	2 x RS232, 1 x RS232/422/485 (w/auto flow control)		
	USB Interface	6 x USB ports, compliant with USB 2.0		
	Parallel Port	Supports D-sub 25-pin connector (optional)		
Expansion	Digital I/O	-		
	PCI/PCIe Slot	1 Slot PCI and 1 Slot PCIe x1 (default);		
		2 Slots PCIe x1 (optional); 2 Slots PCI (optional); 1 Slot PCI and 1 Slot PCIe x4 (optional)		
Storage	HDD	Supports 2 x SATA 2.5" HDD Bays (Max. Data Transfer Rate 300 MB/s)		
		(Internal bay: up to 12.8mm height, Removable bay: up to 9.5mm height)		
	SSD	Supports CompactFlash socket for type I/II CompactFlash disk		
Software Support	Microsoft Windows	Windows 7, XP Professional, XP Embedded		
	Linux	Fedora 14		
Power Requirement	Power Type	AT/ATX		
	Power Input Voltage	9 V _{DC} ~ 34 V _{DC}		
	Minimum Power Input	DC 9-34V @ 6.0-1.5A		
Power Consumption	Power Adapter	AC to DC, DC19V/7.89A, 150W (Optional)		
	Typical	17.1 W		
	Max.	53 W		
Mechanical	Construction	Aluminum housing		
	Mounting	Desk/wall-mounting		
	Dimensions (W x H x D)	220 mm x 117 mm x 200 mm (8.66" x 4.61" x 7.87")		
Environment	Weight	4 kg (8.8 lb)		
	Operating Temperature	With extended temperature peripherals CompactFlash disk: 0 ~ 50° C, with 0.7m/sec air flow		
		With extended temperature memory and consumer grade 2.5-inch hard disk on internal drive bay 0 ~ 45° C, with 0.7m/sec air flow		
	Storage Temperature	-40 ~ 85° C (-40~185°F)		
	Relative Humidity	95% @ 40° C (non-condensing)		
	Vibration Loading During Operation	With CompactFlash disk: 5 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis.		
		With 2.5-inch hard disk: 1 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis.		
	Shock During Operation	With CompactFlash disk: 50 G, IEC 60068-2-27, half sine, 11 ms duration		
Safety Certifications	EMC	With hard disk: 20 G, IEC 60068-2-27, half sine, 11 ms duration		
		CE/FCC Class A, CCC, BSMI		

Dimensions

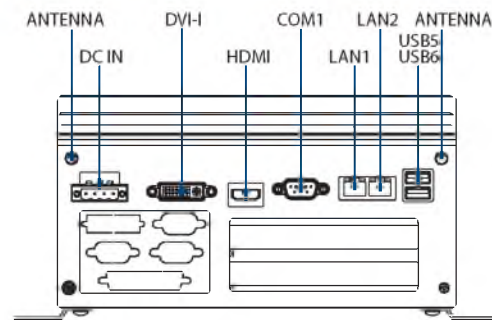


Unit: mm (inch)

Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Ordering Information

Part No.	CPU	L2 Cache	HDMI	DVI-I	GbE	RS-232/422/485	RS-232	USB 2.0	MiniPCIe	DC input	Expansion
ARK-3440F-U5A2E	Intel Core i7 610E 2.53 GHz	4 MB									
ARK-3440F-U4A2E	Intel Core i5 520E 2.4 GHz	3 MB	Yes	Yes	2	1	2	6	2	9 ~ 34 V _{DC}	1 PCIe x1 + 1 PCI
ARK-3440F-U1A2E	Intel Core i3 330E 2.13 GHz	3 MB									

Note: Memory, storage and operating system bundled by request.

Packing List

Part Number	Description
-	1 x ARK-3440 Unit
-	1 x Driver/Utility CD/Manual
1960014487T00C	2 x desk/wall mount plate
1652003234	1 x 4-pin Phoenix DC power connector
1654009744	1 x DVI-I to CRT connector
1990020592N001	1x HDD thermal pad
1990020828N001	1 x CPU thermal grease pad

Embedded OS

Part Number	Description
2070009811	WES2009 ARK-3440 ENG_FRE_GER_ITA_SPA
2070009812	WES2009 ARK-3440 ENG_CHT_CHS_JPN
2070011270	WES7E ARK-3440 ENG 32 bit

Optional Items

Part Number	Description
1757002161	AC-to-DC adapter, DC19 V/7.89A 150 W, with phoenix power plug, 0 ~ 40° C for home and office Use
1757004529-01	AC-to-DC Adapter, DC 19V/6.84A 130W, -20 ~ +70° C
1702002600	Power cable 3-pin 180cm, USA type, for 1757002161 and 1757004529-01
1700004713	CABLE DVI-I to DVI-D and CRT
1702002605	Power cable 3-pin 180cm, EU type, for 1757002161 and 1757004529-01
1702031801	Power cable 3-pin 180cm, UK type, for 1757002161 and 1757004529-01
1700018187	LPT cable 2 x 130-2.0/D-SUB 25P(F) 20 cm for ARK-3440
1700008871	COM Cable D-SUB 9P(M)/IDE#2 10P-2.0 20 cm
AMO-R010E	2 slot riser card, 1 x PCIe x1 + 1 x PCI
AMO-R009E	2 slot riser card, 2 x PCIe x1
AMO-R013E	2 slot riser card, 2 x PCI
AMO-R014E	2 slot riser card, 1 x PCI + 1 x PCIe x4 with BIOS V2.01 (P/N: 1420032188)

ARK-1550

Intel® 4th Generation Core i5 4300U / Celeron 2980U
SoC Slim and Panel Mountable Fanless Box PC

Preliminary



Features

- Intel® Dual Core Celeron 2980U 1.6 GHz / Core i5 4300U 1.9 GHz SoC
- One Hot Swappable 2.5" SATA HDD Bay and mSATA slot
- Triple Independent Displays by VGA + HDMI + LVDS (LVDS option)
- Optional VESA / DIN Rail Mounting kits
- Supports 2 x Intel GbE and 1 x GPIO
- Built-in 1 x full size MiniPCle (i.e.: 3G module) and 1 x half size MiniPCle slot (i.e.: WIFI module)
- Lockable DC jack design
- Supports iManager, SUSIAccess and Embedded Software APIs
- Support Intel Turbo Boost Technology 2.0 in Core i5 4300U



SUSIAccess

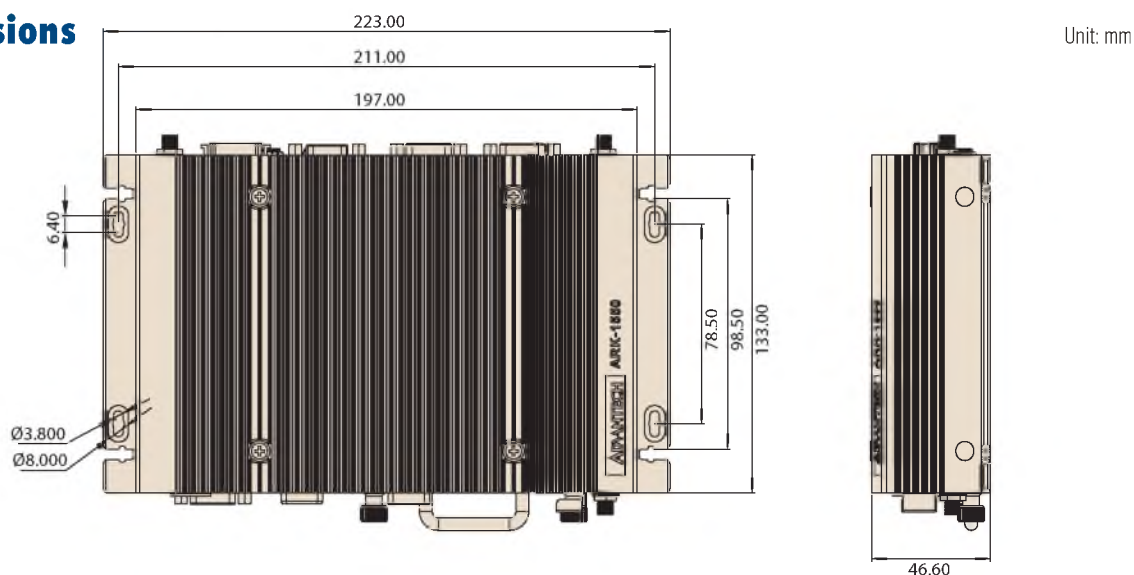
iManager



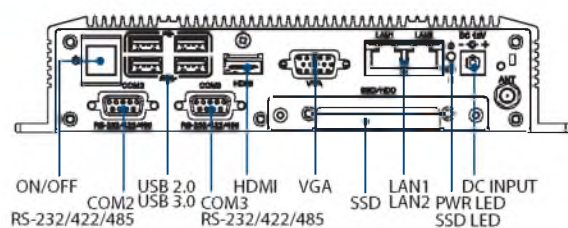
Specifications

		ARK-1550-S6A1E	ARK-1550-S9A1E
Processor System	CPU	Intel Celeron 2980U Dual Core	Intel i5-4300U Dual Core
	Frequency	1.6 GHz	1.9 GHz (Up to 2.9 GHz w/ Turbo Boost 2.0 enabled)
	L3 Cache	2 MB	3 MB
	BIOS	AMI EFI 128 Mbit	
Memory	Technology	DDR3L 1333 MHz	DDR3L 1600 MHz
	Max. Capacity	8 GB	
	Socket	1 x 204-pin SO-DIMM	
Graphics	Chipset	Intel HD Graphics	Intel GT2-4400 Graphics
	Graphic Engine	DirectX11.1, OpenGL 4.0, and OpenCL 1.2	
	VGA	Up to 1920 x 1200 at 60 Hz	
	HDMI	Lockable HDMI connector, up to 4096 x 2304 at 24 Hz (Lockable HDMI cable optional)	
	LVDS (Option)	Dual channel 24-bit LVDS, max resolution up to 1920 x 1200 with 60Hz	
Audio	Main System	Realtek ALC888S, High Definition Audio (HD), Line-in, Line out, Mic-in	
Ethernet	LAN #1	10/100/1000 Mbps Intel I218 GbE, support Wake on LAN	
	LAN #2	10/100/1000 Mbps Intel I210 GbE, support Wake on LAN	
I/O Interface	Serial Ports	1 x RS-232 & 2 x RS-232/422/485 (BIOS selectable)	
	USB Interface	2 x USB 2.0 & 2 x USB3.0	
	GPIO	8 bit GPIO	
Other	Watchdog timer	255-level timer interval, setup by software	
Expansion	Mini PCle #1	1 x Full-size Mini PCle, support mSATA storage or WWAN module	
	Mini PCle #2	1 x Half-size Mini PCle, support WLAN module	
Storage	2.5" Drive Bay	1 x Hot Swappable 2.5" SATA drive bay (Max Height 9.5 mm)	
	mSATA	Lverage MiniPCle #1 slot	
Software Support	Microsoft Windows	WES8, WES7, Windows 8, Windows 7	
	Linux	Support (by Project)	
Power Requirement	Power Type	ATX/AT	
	Power Input Voltage	12 V _{DC}	
Mechanical	Construction	Aluminum housing	
	Mounting	Desk/Wall Mounting (Standard), VESA & DIN-Rail Mounting Kit (Optional)	
	Dimensions (W x H x D)	223 x 46.6 x 133.0 mm (8.69" x 1.81" x 5.18")	
Environment	Operating Temperature	With extended temperature SSD/mSATA/RAM :-20 ~ 55° C with 0.7m/s air flow With standard temperature HDD/SSD/mSATA/RAM peripherals:0 ~ 40° C with 0.7m/s air flow	
	Storage Temperature	-40 ~ 85° C (-40 ~ 185° F)	
	Relative Humidity	95% @ 40° C (non-condensing)	
	Vibration During Operation	With mSATA/SSD: 3 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 hr/axis	
	Shock During Operation	With mSATA/SSD: 30G, IEC 60068-2-27, half sine, 11 ms duration	
Regulation	EMC	CE/FCC Class A, CCC, BSMI	
	Safety	UL, CCC, BSMI, CB	

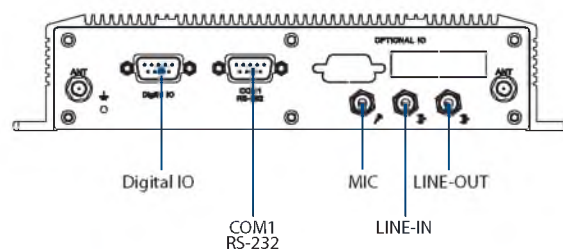
Dimensions



Front Panel External I/O



Rear Panel External I/O



Ordering Information

Part Number	Intel CPU	RAM	VGA	HDMI	GbE	USB 2.0	USB 3.0	GPIO	RS-232	RS-232/422/485	Audio	MiniPCIe	2.5" HDD bay	mSATA	Operating Temperature
ARK-1550-S6A1E	Intel Celeron 2980U 1.6GHz	Up to 8GB	1	1	2	2	2	1	1	2	Line in Line out Mic in	1 Half size 1 Full size w/SIM	1	1	-20 ~ 55° C
ARK-1550-S9A1E	Intel Core i5 4300U 1.9GHz														

Note: Memory, storage and operating system bundled by request.

Packing List

Part Number	Description
-	1 x ARK-1550 Unit
-	1 x User Manual (Simplified Chinese)
-	1 x Power bracket

Embedded OS

Part Number	Description
2070012825	WES7E 64bit with EN/JP/TC/SC

Optional Items

Part Number	Description
1757003934	AC-to-DC Adapter, DC 12V/5A 60W, with DC Jack Plug, 0 ~ 40° C for Home and Office Use
1757004522-01	AC-to-DC Wide Temperature Adapter, DC 12V/3.33A 40W, -20° C ~ 70° C
1702002600-01	Power cable 3-pin 183 cm, USA type (For power adapter 1757004522-01 & 1757003934)
1700018705	Power cable 3-pin 183 cm, Europe type (For power adapter 1757004522-01 & 1757003934)
1700018704	Power cable 3-pin 183 cm, UK type (For power adapter 1757004522-01 & 1757003934)
1700000237-01	Power cable 3-pin 183 cm, PSE type (For power adapter 1757004522-01 & 1757003934)
AMK-V004E	VESA mounting kit
AMK-R002E	DIN-rail mounting kit
9696025601E	LVDS Module w/ cables. (Support by T-Part or CTOS)
1700022376-01	
1700020577-01	

ARK-1122HS

**Independent Dual Displays and All in One
System Intel® Atom™ N2600 Low Power
Fanless Embedded Box PC**

NEW



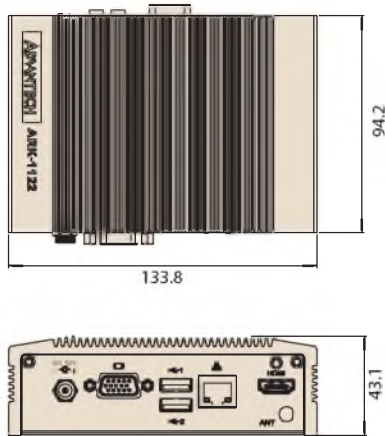
Features

- Plug and Play : 3 STEPs to power on the appliance unit for instant use
- Fanless design with Intel® Atom™ N2600, 1.6 GHz
- 2G DDR3 Memory & 500G 2.5" HDD built-in
- Window Embedded 7 & SUSIAccess Pro (w/ Acronis and McAfee) preload
- Palm-size form factor : 134 x 94 x 43 mm
- Supports independent dual displays interfaces : VGA + HDMI
- Supports 1 x GbE LAN and 4 USB 2.0 ports
- Supports 1 x RS-232 and 1 x line in / line out
- Built-in 1 x half size Mini PCIe expansion slot (i.e.: WiFi module)
- Optional VESA / DIN-Rail / Wall mounts

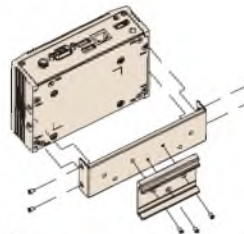
Specifications

ARK-1122HS-S6A1E		
Processor System	CPU	Intel Atom DC N2600 1.6 GHz
	System Chipset	Intel NM10
	BIOS	AMI EFI 16 Mbit
Memory	Technology	2GB DDR3 memory built-in
	Chipset	Intel Atom N2600
Graphics	Interface	VGA (1920 x 1200)
	Interface	HDMI (1920 x 1200) with lockable design
Ethernet	LAN	1 x GbE Intel 82583V LAN
Audio	Chipset	Realtek ALC892, High Definition Audio (HD)
	Interface	Line-in and Line-out
I/O Interface	Serial Ports	1 x RS-232
	USB Interface	4 x USB ports, USB2.0 Compliant
Other	Watchdog timer	255-level timer interval, setup by software
Expansion	Mini PCIe	1 x half-size Mini PCIe
Storage	2.5" HDD	500 GB 2.5" SATA HDD built-in
	mSATA	1 x full-size Mini PCIe slot
Software	Operating System	Window Embedded Standard 7 (Eng/Jpn/Chs/Cht/Spain) Preload
	Remote management & Security	SUSIAccess Pro (w/ Acronis and McAfee) Preload
Power Requirement	Power Input Voltage	Supports single 12 V input, $\pm 10\%$
	DC Jack Type	Support lockable design
	Power Adaptor	AC to DC, DC12 V/3 A, 36 W with lockable design
Mechanical	Construction	Aluminum housing
	Mounting	Support VESA/DIN Rail/Wall mounting (Optional)
	Dimensions (W x H x D)	133.8 x 43.1 x 94.2 mm (5.27" x 1.7" x 3.71")
Environmental and Certifications	Operating Temperature	0 ~ 40° C
	Storage Temperature	-40 ~ 85° C
	Relative Humidity	95% @ 40° C (non-condensing)
	EMC	CE/FCC Class A, CCC, BSMI
	Safety Certifications	CB, UL, CCC, BSMI

Dimensions



DIN Rail

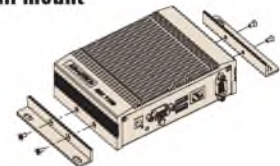


Unit: mm

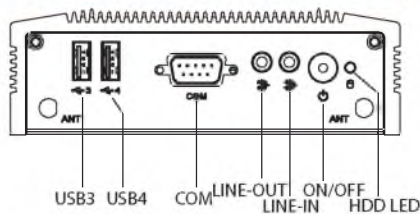
VESA mount



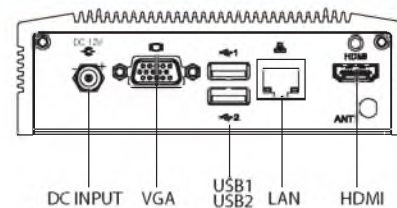
Wall mount



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



ARK-1122 Product Ordering Information



ARK-1122HS-S6A1E

- ARK-1122H-S6A1E
- 2G RAM+500G HDD+WES7+SUSIAccess Pro

ARK-1122H-S6A1E

- Intel Atom N2600 1.6GHz w/HDMI+VGA+LAN



ARK-1122F-S8A1E

- Intel Atom N2800 1.8GHz w/HDMI+3USB+2LAN



ARK-1122C-S6A1E

- Intel Atom N2600 1.6GHz w/4COM+4USB+LAN

Packing List

Part Number	Description
-	1 x ARK-1122 unit
-	1 x Driver/Utility CD/Manual
-	1 x Traditional Chinese user manual for CCC
-	1 x China RoHS
1757004096-01	1 x AC to DC adapter DC12 V/3 A 36 W, 0 ~ 40° C with lockable design

Optional Items

Part Number	Description
1700001524	Power Cable 3-pin 180cm, USA type
170203183C	Power Cable 3-pin 180cm, Europe type
170203180A	Power Cable 3-pin 180cm, UK type
1700008921	Power Cable 3-pin PSE Mark 183cm
AMK-V003E	ARK-112X series VESA mount kits
AMK-R001E	ARK-112X series DIN Rail mount kits
AMK-W001E	ARK-112X series wall mount kits

ARK-1122F

Intel® Atom™ Dual Core N2800 with
Diverse Communications Fanless Box PC



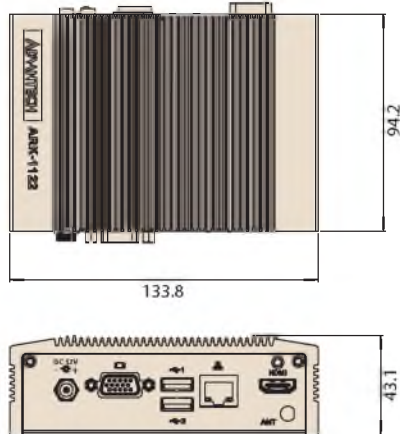
Features

- Intel® Atom™ Dual Core N2800, 1.86 GHz
- Palm-size form factor : 133.8(W) x 43.1(H) x 94.2(D) mm
- Supports 2 x Intel GbE
- Built-in 2 x Mini PCIe slots for Wi-Fi/3G communications (1 w/ SIM)
- Supports independent dual displays interfaces : VGA + HDMI
- Supports 1 x RS-232, Audio line in / line out and 3 USB 2.0 ports
- Supports mSATA storage
- Wide operating temperature -20 ~ 60 C support
- Optional VESA / DIN-Rail / Wall mounts
- Lockable DC jack design
- IP40 sealed design
- Supports SUSIAccess and Embedded Software APIs

Specifications

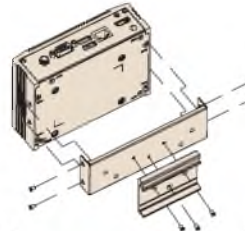
ARK-1122F-S8A1E		
Processor System	CPU	Intel Atom Dual Core N2800 1.86 GHz
	L2 Cache	1MB
	System Chipset	Intel NM10
	BIOS	AMI EFI 16 Mbit
Memory	Technology	DDR3 1066 MHz up to 4 GB
	Socket	1 x 204-pin SO-DIMM
Graphics	Chipset	Intel Atom N2800
	Interface	VGA (1920 x 1200) HDMI (1920 x 1200) with lockable design (please choose the lockable HDMI cable)
Ethernet	LAN	2 x 10/100/1000 Mbps Intel 82583V GbE
Audio	Chipset	Realtek ALC892, High Definition Audio (HD)
	Interface	Line-in and Line-out
I/O Interface	Serial Ports	1 x RS-232
	USB Interface	3 x USB ports, USB2.0 Compliant
Other	Watchdog timer	255-level timer interval, setup by software
Expansion	Mini PCIe	1 x half-size Mini PCIe 1 x full-size Mini PCIe w/SIM Holder
Storage	mSATA	1 x full-size Mini PCIe slot (Suggest to assembly by CTOS or T-Part due to complex installation)
Software Support	Microsoft Windows	Windows 7 Pro, WES7, XP Embedded (XP Embedded by project support)
Power Requirement	Power Input Voltage	12 V _{DC} , ± 10%
	DC Jack Type	Support lockable design
	Power Adaptor	AC to DC, DC12 V/3 A, 36 W with lockable design
Power Consumption	Typical	7.84 W
	Max.	13.15 W
Mechanical	Construction	Aluminum housing
	Mounting	Support VESA/DIN Rail/Wall mounting (Optional)
	Dimensions (W x H x D)	133.8 x 43.1 x 94.2 mm (5.27" x 1.7" x 3.71")
Environmental and Certifications	Operating Temperature	With standard temperature mSATA devices: 0 ~ 40° C With extended temperature mSATA devices: -20 ~ 60° C
	Storage Temperature	-40 ~ 85° C
	Relative Humidity	95% @ 40° C (non-condensing)
	Vibration During Operation	With mSATA: 3Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1hr/axis
	Shock During Operation	With mSATA: 30Grms, IEC 60068-2-27, half sine, 11ms duration
	EMC	CE/FCC Class A, CCC, BSMI
	Safety Certifications	CB, UL, CCC, BSMI

Dimensions

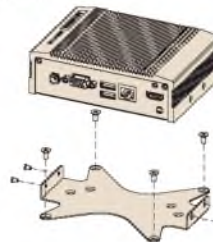


DIN Rail

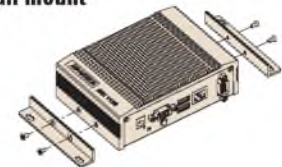
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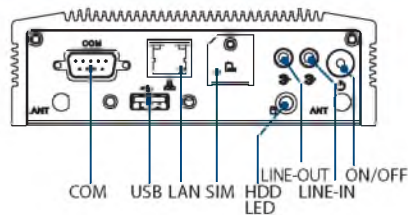
VESA mount



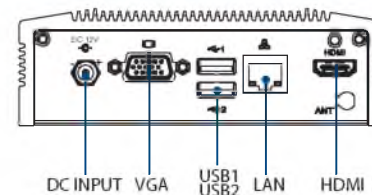
Wall mount



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Ordering Information

Part Number	Intel CPU	RAM	VGA	HDMI	Audio	GbE	2.5" HDD bay	mSATA Storage	USB 2.0	RS-232	RS-232/422/485	MiniPCIe	Operating Temp.
ARK-1122F-S8A1E	Atom N2800 1.8GHz	Up to 4GB	1	1	Line in, Line out	2	N/A	1	3	1	N/A	1 Half size, 1 Full size w/ SIM	-20 ~ 60° C

Note: Memory, storage and operating system bundled by request.

Packing List

Part Number	Description
-	1 x ARK-1122 unit
-	1 x Driver/Utility CD/Manual
-	1 x Traditional Chinese user manual for CCC
-	1 x China RoHS
1757004096-01	1 x AC to DC adapter DC12 V/3 A 36 W, 0 ~ 40° C with lockable design
9680015085	1 x L type Wrench 18x51mm for SIM cover

Embedded OS (Only available for T-Parts OEM, and CTOS service)

Part Number	Description
2070011879	WES7 for ARK-1122H & ARK-1122F

Optional Items

Part Number	Description
1700001524	Power Cable 3-pin 180cm, USA type (For power adapter 1757004096-01)
170203183C	Power Cable 3-pin 180cm, Europe type (For power adapter 1757004096-01)
170203180A	Power Cable 3-pin 180cm, UK type (For power adapter 1757004096-01)
1700008921	Power Cable 3-pin PSE Mark 183cm (For power adapter 1757004096-01)
1757004522-01	AC-to-DC Wide Temperature Adapter, DC 12V/3.33A 40W, -20° C ~ 70° C
1702002600-01	Power cable 3-pin 183 cm, USA type (For power adapter 1757004522-01)
1700018705	Power cable 3-pin 183 cm, Europe type (For power adapter 1757004522-01)
1700018704	Power cable 3-pin 183 cm, UK type (For power adapter 1757004522-01)
1700000237-01	Power cable 3-pin 183 cm, PSE type (For power adapter 1757004522-01)
AMK-V003E	ARK-112X series VESA mounting kit
AMK-R001E	ARK-112X series DIN-rail mounting kit
AMK-W001E	ARK-112X series Wall mounting kit

ARK-2120F

Intel® Atom™ Dual Core D2550 with 3 GbE,
6 COM & Wide Range Power Fanless Box PC



SUSIAccess iManager



Features

- Intel® Atom™ Dual Core D2550 1.86 GHz, DDR3 memory supports up to 4 GB
- VGA, HDMI, 48-bit LVDS, support dual independent display and DirectX 9
- Mini PCIe expansion with SIM holder for communication module, i.e. HSDPA, WLAN
- Supports up to 3 x GbE, 5 x USB 2.0 and 6 x COMs ports
- Supports external CFast socket and 1 x 2.5" SATA HDD Bay
- Supports 12 ~ 24V wide range DC input
- Lockable DC jack design
- IP40 sealed design
- Supports iManager, SUSIAccess and Embedded Software APIs

Specifications

		ARK-2120F-S8A1E
Processor System	CPU	Intel Atom D2550
	Frequency	1.86 GHz (Dual Core)
	L2 Cache	1MB
	System Chipset	D2550 + Intel NM10
	BIOS	AMI EFI 16Mbit
Memory	Technology	DDR3 1066 MHz (D2550)
	Max. Capacity	4 GB
	Socket	1 x 204-pin SO-DIMM
Graphics	Chipset	Intel Atom D2550
	Graphic Engine	DirectX 9 and OpenGL3.0 support Hardware decode H/W acceleration: MPEG2 H/W Decode/Acceleration: H.264/VC1/WMV9
	VGA	Up to 1920 x 1200
	HDMI	Supports 1920 x 1200, Max data rate: up to 1.65 Gb/s, Supports HDMI v1.3 Up to 1080p support
	LVDS	Supports 48-bit LVDS, up to 2560 x 1600 (D2550)
	Dual Display	Yes, (VGA + HDMI, VGA + LVDS, HDMI + LVDS)
Ethernet	LAN1	10/100/1000 Mbps Intel 82583V GbE, support Wake On Lan
	LAN2	10/100/1000 Mbps Intel 82583V GbE, support Wake On Lan
	LAN3	10/100/1000 Mbps Intel 82583V GbE, support Wake On Lan
Audio	Interface	Realtek ALC892, High Definition Audio, Line-out, Mic-in, Line-in
IO Interface	Serial Ports	2 x RS-232 ports, 4 x RS-232/422/485 port with auto flow control (by BIOS setting)
	USB Interface	5 x USB ports, USB 2.0 Compliant
Other	Digital IO	8-bit
	Watchdog Timer	255 levels timer interval, setup by software
Expansion	Mini PCIe	1 x full size Mini PCIe with SIM holder
Storage	HDD	Supports one SATA 2.5" SATA HDD Bay (Compatible with 12.5mm height HDD) (Max. Data Transfer Rate 300 MB/s)
	SSD	Supports one external CFast socket
Software Support	Microsoft Windows	Windows 7, Windows 7 Embedded (XP Professional & XP Embedded support by project)
	Linux	Ubuntu v12.04
Power Requirement	Power Type	AT/ATX
	Power Input Voltage	12 V _{DC} ~ 24 V _{DC}
	Minimum Power Input	12 V ~ 24 V, 3.0 A ~ 1.5 A
	Power Adapter	AC to DC, DC19 V/3.42 A, 65 W (Optional)
Power Consumption	Typical	9.2 Watt (with Intel Atom D2550 at 1.8 GHz)
	Max.	11.59 Watt (with Intel Atom D2550 at 1.8 GHz)
Mechanical	Construction	Aluminum housing
	Mounting	Din-Rail mounting, Desk/wall-mounting, VESA mounting
	Dimensions (W x H x D)	264.50 x 68.39 x 133.0 mm (10.41" x 2.69" x 5.24")
	Weight	2.5 kg (5.51 lb)
Environment	Operating Temperature	With extended temperature peripherals: -20 ~ 60° C (-4 ~ 140° F) with air flow With 2.5-inch hard disk 0 ~ 45° C (32 ~ 112° F) with air flow
	Storage Temperature	-40 ~ 85° C (-40 ~ 185° F)
	Relative Humidity	95% @ 40° C (non-condensing)
	Vibration During Operation	With SSD: 5 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 hr/axis.
	Shock During Operation	With SSD: 50 G, IEC 60068-2-27, half sine, 11 ms duration
	EMC	CE/FCC Class A, CCC, BSMI
	Safety Certifications	UL, CCC, BSMI

Technical drawing of a door assembly, showing front and side views with dimensions.

Front View (Left):

- Overall width: 264,5
- Inner width: 252,5
- Outer width: 238,2
- Top edge dimensions (from left to right): 11,6, 72,5, 78,5, 84,5, 133
- Bottom edge dimensions (from left to right): 11,6, 72,5, 78,5, 84,5, 133
- Door panel width: 102,5
- Door panel thickness: 3,5
- Door panel height: 68,39
- Door panel material: 133
- Door panel color: 102,5
- Door panel texture: 3,5
- Door panel finish: 68,39

Side View (Right):

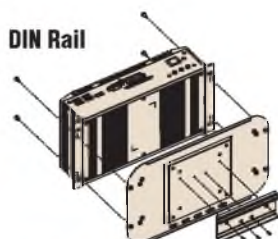
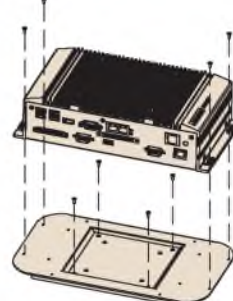
- Overall height: 140
- Inner height: 130
- Outer height: 120
- Top edge dimensions (from left to right): 8,0, 5,0, 14,0
- Bottom edge dimensions (from left to right): 8,0, 5,0, 14,0
- Door panel width: 102,5
- Door panel thickness: 3,5
- Door panel height: 68,39
- Door panel material: 133
- Door panel color: 102,5
- Door panel texture: 3,5
- Door panel finish: 68,39

Detail A (Top Left):

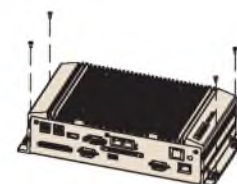
- Circle diameter: $\varnothing 2,5$
- Circle diameter: $\varnothing 4$
- Circle diameter: $\varnothing 4,6$

Detail A (Bottom Left):

- Circle diameter: $\varnothing 4,6$
- Circle diameter: $\varnothing 2,5$
- Circle diameter: $\varnothing 4$

**VESA mount**

Wall mount



Part No.	CPU	VGA	HDMI/ DP	LVDS	GbE	USB 2.0	RS-232	RS-232/ 422/485	DIO	Audio	Full-size MiniPCle	SIM	CFast	2.5" SATA II HDD Bay	Power Input	Operating Temp.
ARK-2120F-S8A1E	Intel Atom D2550 1.86 GHz	Yes	Yes	48- bits	3	5	2	4	8-bits	Lin-out, Line-in, MIC	1	1	1		DC 12V-24V 2-pin phoenix head	-20 – 60° C

Packing List

Part Number	Description
-	1 x ARK-2120 Unit
-	1 x Utility CD
-	1 x User Manual (Simplified Chinese)
-	1 x China RoHS
1700009001	1 x 2-pin Phoenix to DC-Jack power cable

Part Number	Description
2070011953	Image WES7E SP1 x32 ENG/GER/IPN/CT

Part Number	Description
1757003659	AC-to-DC Adapter, DC19 V/3.42 A 65 W, with Phoenix Power Plug, 0 ~ 40 °C for Home and Office Use
1757004595-01	AC-to-DC Adapter, DC 12V/3.33A 40W, -20 ~ +70 °C
1702002600	Power cable 3-pin 180cm, USA type, for extend temperature power adapter
1702002605	Power cable 3-pin 180cm, EU type, for extend temperature power adapter
1702031801	Power cable 3-pin 180cm, UK type, for extend temperature power adapter
1700001947	Power cable 2-pin 180 cm, USA type (For adapter 1757003659)
1700001948	Power cable 2-pin 180 cm, Europe type (For adapter 1757003659)
1700001949	Power cable 2-pin 180 cm, UK type (For adapter 1757003659)
1700002141	Power cable 2-pin 180 cm, PSE type (For adapter 1757003659)
AMK-V004E	VESA mounting bracket
AMK-V009E	DIN-rail mounting kit for ARK-2000 series

ARK-2150L

3rd Generation Intel® Core™ i3/i7 with Dual Independent Display Fanless Box PC



Features

- Intel® Core i7, i3 and Celeron processors + Intel QM77 PCH
- 1 x DDR3/DDR3L, SO-DIMM support up to 8 GB
- DirectX11, OpenGL3.1, OpenCL1.1, dual independent display: VGA + HDMI/DisplayPort*
- Supports Intel AMT8.0,
- Supports up to 2 x GbE, 2 x USB 3.0, 4 x USB 2.0 and 4 x COMs ports
- Supports 1 x internal mSATA socket and 1 x 2.5" SATA HDD Bay
- Lockable DC jack design
- Supports iManager, SUSIAccess and Embedded Software APIs

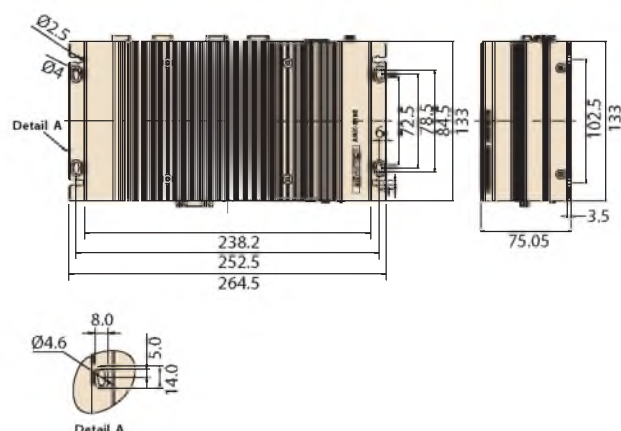


Specifications

		ARK-2150L-S4A1E	ARK-2150L-S6A1E	ARK-2150L-S7A1E
Processor System	CPU	Intel Celeron 1047UE	Intel ULV Core i3 3217UE	Intel ULV Core i7 3517UE
	Frequency	Dual Core 1.4 GHz	Dual Core 1.6 GHz	Dual Core 1.7 GHz (Max Turbo Frequency 2.8 GHz)
	L3 Cache	2 MB	3 MB	4 MB
	System Chipset	Intel QM77		
	BIOS	AMI EFI 64Mbit		
Memory	Technology	DDR3 1600MHz, DDR3L 1333 MHz		
	Max. Capacity	8 GB		
	Socket	1 x 204-pin SO-DIMM		
Graphics	Chipset	Intel QM77 Integrated GFX Gen 7		
	Graphic Engine	DirectX11, OpenGL 3.1, and Open CL 1.1 Hardware decode acceleration: AVC/H.264, M PEG-2, VC-1		
	VGA	Integrated 340.4MHz RAMDAC, Max resolution up to 2048 x 1536 @ 75Hz		
	HDMI	Supports HDMI 1.4 for HD Video playback Max resolution up to 2560 x 1600 @ 60Hz on DisplayPort*, Max resolution up to 1920 x 1200 @ 60Hz on HDMI		
	Dual Display	Yes, VGA + HDMI or VGA + DisplayPort*		
Ethernet	LAN1	10/100/1000 Mbps Intel 82579LM GbE, support Wake On Lan		
	LAN2	10/100/1000 Mbps Intel 82583V GbE, support Wake On Lan		
Audio	Interface	Realtek ALC892, High Definition Audio, Line-out, Mic-in, Line-in		
I/O Interface	Serial Ports	2 x RS-232 ports, 2 x RS-232/422/485 port with auto flow control		
	USB Interface	2 x USB 3.0 ports and 4 x USB 2.0 ports		
Other	Digital I/O	8-bits programmable general purpose input/output		
	Watchdog timer	255 levels timer interval, setup by software		
Expansion	Mini PCIe	2 x Full-size Mini PCIe (One supports mSATA & the other with SIM holder) 1 x Half-size Mini PCIe		
Storage	HDD	Supports one SATA 2.5" SATA HDD Bay (Compatible with 12.5mm height HDD) (Max. Data Transfer Rate 600 MB/s)		
	SSD	Supports one internal mSATA socket		
Software Support	Microsoft Windows	Windows 7, Windows 7 Embedded, XP Professional, XP Embedded		
	Linux	Ubuntu 12.04		
Power Requirement	Power Type	AT/ATX		
	Power Input Voltage	12 V _{DC} , ± 10%		
	Minimum Power Input	12 V, 4 A		
	Power Adapter	AC to DC, DC12 V/5 A, 60 W (Optional)		
Power Consumption	Typical	9.6 Watt (with Intel Core i7 3517UE CPU and 2 GB memory)		
	Max.	24.96 Watt (with Intel Core i7 3517UE CPU and 2 GB memory)		
Mechanical	Construction	Aluminum housing		
	Mounting	Din-Rail mounting, Desk/wall-mounting, VESA mounting		
	Dimensions (W x H x D)	264.5 x 75.1 x 133.0 mm (10.41" x 2.96" x 5.24")		
	Weight	2.3 kg (5.07 lb)		
Environment	Operating Temperature	With extended temperature peripherals: -20 ~ 60° C (-4 ~ 140° F) with 0.7m/s air flow With 2.5-inch hard disk 0 ~ 45° C (32 ~ 112° F) with 0.7m/s air flow		
	Storage Temperature	-40 ~ 85° C (-40 ~ 185° F)		
	Relative Humidity	95% @ 40° C (non-condensing)		
	Vibration During Operation	With SSD: 5 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 hr/axis.		
	Shock During Operation	With SSD: 50 G, IEC 60068-2-27, half sine, 11 ms duration		
	EMC	CE/FCC Class A, CCC, BSMI		
	Safety Certifications	UL, CCC, BSMI		

*DisplayPort function is supported by project.

Dimensions

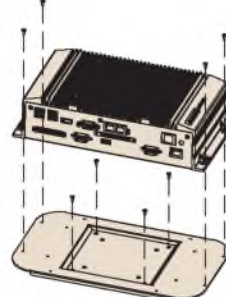


DIN Rail

Unit: mm (inch)



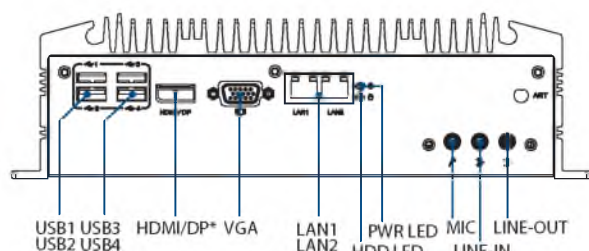
VESA mount



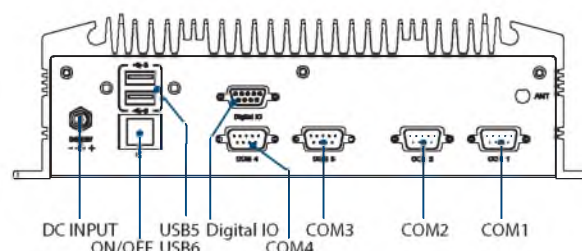
Wall mount



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Ordering Information

Part No.	CPU	RAM	VGA	HDMI/DP*	GbE	USB 3.0	USB 2.0	RS-232	RS-232/422/485	DIO	Half-size Mini PCIe	Full-size Mini PCIe	SIM	2.5" SATAII HDD Bay	Power Input	Operation Temp.	OS
ARK-2150L-S4A1E	Intel Celeron 1.4GHz 1047UE	upto 8GB	Yes	Yes	2	2	4	2	2	8-bits	1	2	1	1	DC 12V Lockable DC Jack	-20 ~ 60° C	-
ARK-2150L-S6A1E	Intel Core i3 ULV 1.6GHz 3217UE	upto 8GB	Yes	Yes	2	2	4	2	2	8-bits	1	2	1	1	DC 12V Lockable DC Jack	-20 ~ 60° C	-
ARK-2150L-S7A1E	Intel Core i7 ULV 1.7GHz 3517UE	upto 8GB	Yes	Yes	2	2	4	2	2	8-bits	1	2	1	1	DC 12V Lockable DC Jack	-20 ~ 60° C	-
ARK-2150L-S7A1E	Intel Core i7 ULV 1.7GHz 3517UE	4GB built in	Yes	Yes	2	2	4	2	2	8-bits	1	2	1	500GB HDD built in	DC 12V 1757004339-01 bundled	0 ~ 45° C	WES7E 64 bit built-in ENG/JP/TC/SC

Note: Memory, storage and operating system bundled by request.

*DP function is supported by project.

Packing List

Part Number	Description
-	1 x ARK-2150 Unit
-	1 x Utility CD
-	1 x User Manual (Simplified Chinese)
-	1 x China RoHS

Embedded OS

Part Number	Description
2070011831	Image WES7E SP1 x32 ENG/JP/TC/SC
2070011830	Image WES2009 V4.2 multi 24 language

Optional Items

Part Number	Description
1757004349-01	AC to DC Adaptor, DC 12V/5A 60W, with lock, 0 ~ 40° C, for Home and Office use
1757004522-01	AC-to-DC Adapter, DC 12V/3.33A 40W, -20 ~ +70° C
1702002600	Power cable 3-pin 180cm, USA type, for 1757004522-01 and 1757004349-01
1702031801	Power cable 3-pin 180cm, UK type, for 1757004522-01 and 1757004349-01
1702002605	Power cable 3-pin 180cm, EU type, for 1757004522-01 and 1757004349-01
1700000237	Power cable 3-pin 180cm, with PSE, for 1757004349-01
1960025333N011	VESA mounting bracket
9666K10000E	DIN-rail mounting kit

ARK-2150F

3rd Generation Intel® Core™ i7 with
4 x GbE, Isolated DIO & wide range
power Fanless Box PC

NEW



Features

- Intel® Core™ i7 processors + Intel QM77 PCH
- 1 x DDR3/DDR3L SO-DIMM, support up to 8 GB
- DirectX11, OpenGL3.1, OpenCL1.1, triple independent display: VGA + HDMI/DisplayPort*+DVI-D
- Supports Intel AMT8.0
- Supports 4 x Intel GbE
- Support 4ch digital input and 4ch digital output with 2.5KV isolation
- Supports 2 x USB 3.0, 3 x USB 2.0, 4 COMs ports
- Supports 1 x internal mSATA socket and 1 x 2.5" SATA HDD Bay
- 12-24V wide range DC input with lockable connector
- Supports iManager, SUSIAccess and Embedded Software APIs



SUSIAccess iManager

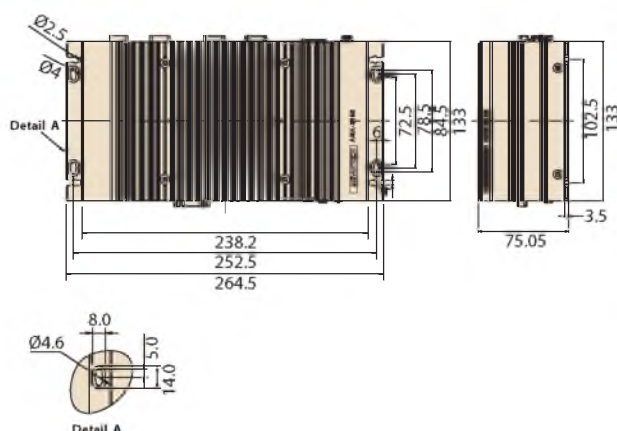


Specifications

		ARK-2150F-S7A1E
Processor System	CPU	Intel ULV Core i7 3517UE
	Frequency	Dual Core 1.7 GHz (Max Turbo Frequency 2.8 GHz)
	L3 Cache	4 MB
	System Chipset	Intel QM77
	BIOS	AMI EFI 64Mbit
Memory	Technology	DDR3 1600MHz, DDR3L 1333 MHz
	Frequency	8 GB
	Socket	1 x 204-pin SO-DIMM
Graphics	Chipset	Intel QM77 Integrated GFX Gen 7
	Graphic Engine	DirectX11, OpenGL 3.1, and Open CL 1.1 Hardware decode acceleration: AVC/H.264, M PEG-2, VC-1
	VGA	Integrated 340.4MHz RAMDAC, Max resolution up to 2048 x 1536 @ 75Hz
	HDMI/DP*	Supports HDMI 1.4 for HD Video playback Max resolution up to 2560 x 1600 @ 60Hz on DisplayPort*, Max resolution up to 1920 x 1200 @ 60Hz on HDMI
	DVI-D	Max resolution up to 1920 x 1200
	Dual independent display	Yes, VGA+HDMI/DisplayPort*, VGA+HDMI/DVI-D, VGA+DVI-D, HDMI/DisplayPort*+DVI-D
Ethernet	LAN1	10/100/1000 Mbps Intel 82579LM GbE, support Wake On Lan
	LAN2/LAN3/LAN4	10/100/1000 Mbps Intel 82583V GbE
Audio	Interface	Realtek AL C892, High Definition Audio, Line-out, Mic-in, Line-in
I/O Interface	Serial Ports	4 x RS-232/422/485 port with auto flow control
	USB Interface	3 x USB 3.0 ports and 3 x USB 2.0 ports
Other	Digital I/O	4ch digital input and 4ch digital output with 2.5KV isolation
	Watchdog timer	255 levels timer interval, setup by software
Expansion	Mini PCIe	2 x Full-size Mini PCIe (Supports mSATA & SIM) 1 x Half-size Mini PCIe
Storage	HDD	Supports one SATA 2.5" HDD Bay (Compatible with 12.5mm height HDD) (Max. Data Transfer Rate 600 MB/s)
	SSD	Supports one internal mSATA socket
Software Support	Microsoft Windows	Windows 7, Windows 7 Embedded, XP Professional, XP Embedded
	Linux	Ubuntu 12.04
Power Requirement	Power Type	AT/ATX
	Power Input Voltage	12 ~ 24 V _{DC}
	Minimum Power Input	12 V ~ 24 V, 4.0 A ~ 2 A
Power Consumption	Power Adapter	AC to DC, DC 19V/3.42A 65W (Optional)
	Typical	10.3 Watt
Mechanical	Max.	25.7 Watt
	Construction	Aluminum housing
	Mounting	Din-Rail mounting, Desk/wall-mounting, VESA mounting
	Dimensions (W x H x D)	264.5 x 75.1 x 133.0 mm (10.41" x 2.96" x 5.24")
	Weight	2.8kg (6.17lb)
Environment	Operating Temperature	With extended temperature peripherals: -20 ~ 60° C (-4 ~ 140° F) with 0.7m/s air flow With 2.5-inch hard disk 0 ~ 45° C (32 ~ 112° F) with 0.7m/s air flow
	Storage Temperature	-40 ~ 85° C (-40 ~ 185° F)
	Relative Humidity	95% @ 40° C (non-condensing)
	Vibration During Operation	With SSD: 5 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 hr/axis.
	Shock During Operation	With SSD: 50 G, IEC 60068-2-27, half sine, 11 ms duration
	EMC	CE/FCC Class A, CCC, BSMI
	Safety Certifications	UL, CCC, BSMI

*DisplayPort function is supported by project.

Dimensions



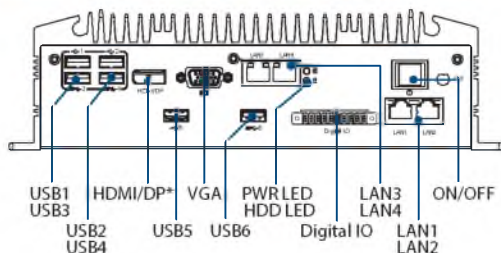
DIN Rail

Unit: mm (inch)

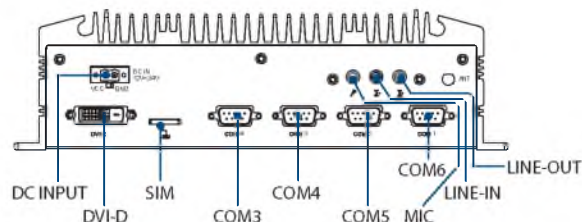
VESA mount

Wall mount

Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Ordering Information

Part No.	CPU	VGA	HDMI/DP*	DVI-D	GbE	USB 3.0	USB 2.0	RS-232/422/485	DIO	Audio	Half-size Mini PCIe	Full-size Mini PCIe	SIM	2.5" SATA/II HDD Bay	Power Input	Operation Temp.
ARK-2150F-S7A1E	Intel Core i7 ULV 1.7GHz 3517UE	Yes	Yes	Yes	4	3	3	4	4ch DI and 4ch DO with 2.5KV Isolation	Line-out, Line-in, MIC	1	2	1	1	DC 12-24V 2-pin phoenix head	-20 ~ 60° C

Note: Memory, storage and operating system bundled by request

*DP is supported by project.

Packing List

Part Number	Description
-	1 x ARK-2150 Unit
-	1 x Utility CD
-	1 x User Manual (Simplified Chinese)
-	1 x China RoHS
1700009001	1 x 2-pin Phoenix to DC-Jack power cable

Embedded OS

Part Number	Description
2070011831	Image WES7E SP1 x32 ENG/JP/TC/SC
2070011830	Image WES2009 V4.2 multi 24 language

Optional Items

Part Number	Description
1757003659	AC-to-DC Adapter, DC19 V/3.42 A 65 W, with Phoenix Power Plug, 0 ~ 40° C for Home and Office Use
1757004595-01	AC-to-DC Adapter, DC 12V/3.33A 40W, -20 ~ +70° C
1702002600	Power cable 3-pin 180cm, USA type, for extend temperature power adapter
1702002605	Power cable 3-pin 180cm, EU type, for extend temperature power adapter
1702031801	Power cable 3-pin 180cm, UK type, for extend temperature power adapter
1700001947	Power cable 2-pin 180 cm, USA type (For adapter 1757003659)
1700001948	Power cable 2-pin 180 cm, Europe type (For adapter 1757003659)
1700001949	Power cable 2-pin 180 cm, UK type (For adapter 1757003659)
1700002141	Power cable 2-pin 180 cm, PSE type (For adapter 1757003659)
1960025333N011	VESA mounting bracket
9666K10000E	DIN-rail mounting kit

ARK-1123H

Intel® Atom Quad Core J1900 SoC with
Dual HDMI and Dual GbE Fanless Box PC

NEW



Features

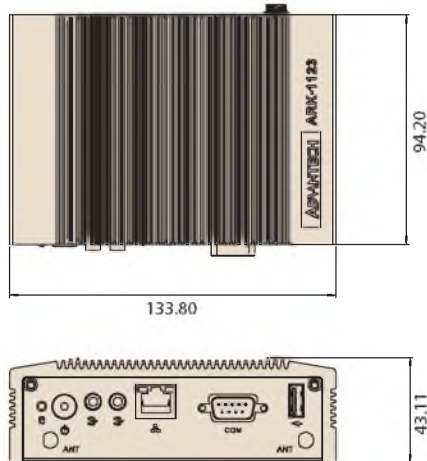
- Intel® Celeron J1900 Quad Core 2.0 GHz SoC
- 1 x 2.5" SATA HDD/SSD Bay
- 2 x GbE for Multiple Internet Transmission
- 2 x Independent HDMI
- 1 x RS-232/422/485 (BIOS selection)
- 1 x Full-Size MiniPCle (ex. WLAN or WWAN module)
- 1 x Half Size MiniPCle (ex. mSATA)
- Optional VESA / DIN Rail / Wall Mounting kits
- Threaded DC jack design
- Supports SUSIAccess and Embedded Software APIs



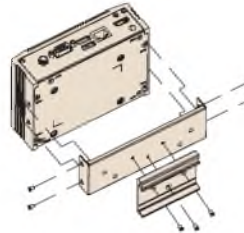
Specifications

ARK-1123H-U0A1E		
Processor System	CPU	Intel® Celeron™ Processor J1900 Quad Core 2.0 GHz SoC
	Frequency	2.0 GHz (Up to 2.41 GHz w/ burst frequency enabled)
	L2 Cache	2 MB
	BIOS	AMI EFI 64 Mbit (Default BIOS is supported for 64-bit OS installation, BIOS for 32-bit OS is supported by project)
Memory	Technology	DDR3L 1333MHz
	Max. Capacity	8 GB
	Socket	1 x 204-pin SO-DIMM
Graphics	Chipset	Intel® Atom SoC integrated
	Graphic Engine	DirectX® 11.1, OGL 3.0, OCL 1.1, OGL ES 2.0 Encode: H264, MPEG2/4, VC1, WMV9 Decode: H264, MPEG2
	HDMI	2 x Lockable HDMI connector, support up to 1920 x 1080 at 60Hz
Audio	Main System	ALC-888S, High Definition Audio, Line-out & Line-in
Ethernet	LAN #1	10/100/1000 Mbps Intel I210 GbE, support Wake on LAN
	LAN #2	10/100/1000 Mbps Intel I210 GbE, support Wake on LAN
I/O Interface	Serial Ports	1 x RS-232/422/485 (BIOS selectable)
	USB Interface	2 x USB 2.0 & 1 x USB3.0
Other	Watchdog timer	255-level timer interval, setup by software
Expansion	Mini PCle #1	1 x Full-size Mini PCle, support WLAN or WWAN module
	Mini PCle #2	1 x Half-size Mini PCle, support Half-size mSATA module
Storage	2.5" Drive Bay	1 x 2.5" SATA HDD Bay (Max Height 7mm)
	mSATA	Leverage MiniPCle #2 slot (Suggest to assembly by CTOS or T-Part due to complex installation)
Software Support	Microsoft Windows	WES7, Windows 7, WE8S, Windows 8 (32-bit support by project)
	Linux	Support (by Project)
Power Requirement	Power Input Voltage	Single 12 V _{DC}
	Power Adapter	AC to DC, DC12 V/3 A, 36 W with threaded design
Mechanical	Construction	Aluminum housing
	Mounting	VESA/DIN Rail/Wall Mounting Kits (Optional)
	Dimensions (W x H x D)	133.8 x 43.1 x 94.2 mm (5.27" x 1.7" x 3.71")
Environment	Operating Temperature	With extended temperature SSD/mSATA/RAM : -20 ~ 60° C with 0.7m/s air flow With standard temperature HDD/SSD/mSATA/RAM peripherals: 0 ~ 40° C with 0.7m/s air flow
	Storage Temperature	-40 ~ 85° C (-40~185° F)
	Relative Humidity	95% @ 40° C (non-condensing)
	Vibration During Operation	With mSATA/SSD: 3 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 hr/axis With HDD: 0.5Grms, IEC 60068-2-64, random, 5~500Hz, 3 axes, 1hr/axis
	Shock During Operation	With mSATA/SSD: 30 G, IEC 60068-2-27, half sine, 11 ms duration With HDD: 10G, IEC 60068-2-27, half sine, 11 ms duration
Regulation	EMC	CE/FCC Class A, CCC, BSMI
	Safety	UL, CCC, BSMI, CB

Dimensions

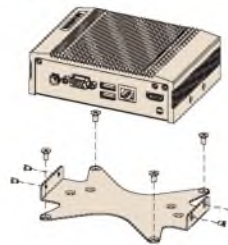


DIN Rail

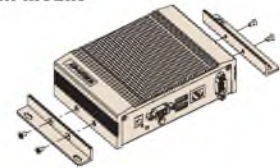


Unit: mm

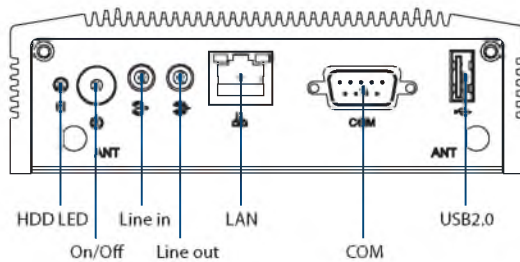
VESA mount



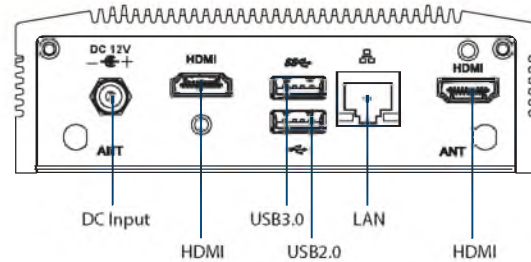
Wall mount



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Ordering Information

Part Number	CPU	RAM	HDMI	GbE	USB 2.0	USB 3.0	RS-232/422/485	Audio	MiniPCIe	2.5" HDD bay	mSATA	Operating Temperature
ARK-1123H-U0A1E	Intel Celeron J1900	Up to 8GB	2	2	2	1	1	Line in Line out	1 Half size 1 Full size	1	1	-20 ~ 60° C

Note: Memory, storage and operating system bundled by request.

Packing List

Part Number	Description
-	1 x ARK-1123H Unit
-	1 x User Manual (Simplified Chinese)
1757004096-01	1 x AC to DC adapter DC12 V/3 A 36 W, 0 ~ 40° C with threaded design

Embedded OS (Only available for T-Parts OEM, and CTOS service)

Part Number	Description
2070013033	WES7E 64-bit with EN/JP/TC/SC (OS size around 11G)

* Default BIOS is supported for 64-bit OS installation, BIOS for 32-bit OS is supported by project.

Optional Items

Part Number	Description
1700001524	Power Cable 3-pin 180cm, USA type (For power adapter 1757004096-01)
170203183C	Power Cable 3-pin 180cm, Europe type (For power adapter 1757004096-01)
170203180A	Power Cable 3-pin 180cm, UK type (For power adapter 1757004096-01)
1700008921	Power Cable 3-pin PSE Mark 183cm (For power adapter 1757004096-01)
1757004522-01	AC-to-DC Wide Temperature Adapter, DC 12V/3.33A 40W, -20° C ~ 70° C
1702002600-01	Power cable 3-pin 183 cm, USA type (For power adapter 1757004522-01)
1700018705	Power cable 3-pin 183 cm, Europe type (For power adapter 1757004522-01)
1700018704	Power cable 3-pin 183 cm, UK type (For power adapter 1757004522-01)
1700000237-01	Power cable 3-pin 183 cm, PSE type (For power adapter 1757004522-01)
AMK-V003E	ARK-112X series VESA mounting kit
AMK-R001E	ARK-112X series DIN-rail mounting kit
AMK-W001E	ARK-112X series Wall mounting kit

ARK-2151V

In-Vehicle Full HD NVR w/4 PoE Ports 4th Gen. Intel® Core i5 4300U / Celeron 2980U SoC Fanless Box PC

Preliminary



Features

- Intel® Celeron 2980U 1.6GHz / Core i5-4300U 1.9 GHz SoC
- 4 PoE Ports to Support Mainstream IP Cameras
- Diversity Communication Abilities, ex. WWAN, WLAN
- Built-in GPS and G-Sensor for GIS application
- Intelligent Vehicle Power Ignition
- 9 ~ 36 V_{DC} Wide Power Input w/isolation
- 1x Hot-swappable 2.5" drive bay
- Supports iManager, SUSIAccess and Embedded Software APIs



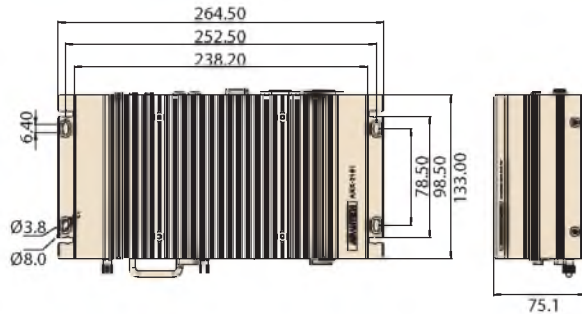
SUSIAccess iManager



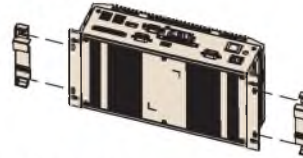
Specifications

		ARK-2151V-S6A1E	ARK-2151V-S9A1E
Processor System	CPU	Intel Celeron 2980U Dual Core	Intel i5-4300U Dual Core
	Frequency	1.6 GHz	1.9 GHz
	L3 Cache	2 MB	3 MB
	BIOS	AMI EFI 128 Mbit	
Memory	Technology	DDR3L 1333 MHz	DDR3L 1600 MHz
	Max. Capacity	8 GB	
	Socket	1 x 204-pin SO-DIMM	
Graphics	Chipset	HD Graphics	GT2-4400 Graphics
	Graphic Engine	DirectX11.1, OpenGL 4.0, and OpenCL 1.2	
	VGA	Full AVC/VC1/MPEG2 HW Decode	
	HDMI	Up to 1920 x 1200 with 60 Hz, 154 MHz pixel clock rate Lockable HDMI connector, up to 4096 x 2304 at 24 Hz	
Audio	Main System	Realtek ALC888S, High Definition Audio (HD), Line-in, Line out, Mic-in	
	Cellular Voice	Support WWAN voice function, Line-out, Mic-in	
Ethernet	LAN #1	10/100/1000 Mbps Intel I218 GbE, support Wake on LAN	
	LAN #2	10/100/1000 Mbps Intel I210-IT, support Wake on LAN	
I/O Interface	Power over Ethernet, PoE	N/A	4 x 10/100 Mbps - 4ports full-load, IEEE802.3af Class 2 (7Watt) - 2ports full-load, IEEE802.3af Class 3 (15.4Watt)
	Serial Ports	2 x RS-232/422/485 ports w/ 3KV isolation (support auto flow control, jumper selectable)	2 x RS-232/422/485 ports (support auto flow control, BIOS selectable)
	Optional COM or CANBus	2 x RS-232 (Standard) or 2 x CANBus 2.0 A/B (project request)	N/A
	USB Interface	2 x USB 2.0 & 2 x USB3.0	
	GPIO	6 x DI & 2 x DO w/ 3KV isolation Input Voltage: 0 to 30 VDC at 25 Hz, Output Current: Max. 500 mA per channel On-state Voltage: 24 V _{DC} nominal, open collector to 30 V _{DC}	
Other	GPS	On board standalone GPS, support GPS, GLONASS, GALILEO and QZSS signals	
	G-Sensor	On board high resolution G-Sensor, up to 13-bit resolution at ±16g	
	Watchdog timer	255-level timer interval, setup by software	
Expansion	Mini PCIe #1	Full-size Mini PCIe, support mSATA	
	Mini PCIe #2	Half-size Mini PCIe, support WLAN module	
	Mini PCIe #3/4	2x Full-size Mini PCIe w/SIM holders, support WWAN module	
Storage	2.5" Drive Bay	1x Hot-swappable 2.5" drive bay (Max 9.5mm height)	
	mSATA	Leverage MiniPCIe #1 slot	
Software Support	Microsoft Windows	WES8, WES7, Windows 8, Windows 7	
	Linux	Support by project	
Power Requirement	Power Type	ATX/AT	
	Power Input Voltage	PC Mode: 9 ~ 36 V _{DC} VH Mode: 12 V battery (11 ~ 16 V _{DC}), 24 V battery (22 ~ 32 V _{DC})	
	Vehicle Power Ignition	Selectable boot-up & shut-down voltage, on/off delay time	
	Isolation	1.5 KV Isolated	
Mechanical	Construction	Aluminum housing, Silver	
	Mounting	Din-Rail mounting, Desk/wall-mounting, VESA mounting	
	Dimensions (W x H x D)	264.5 x 75.1 x 133.0 mm (10.41" x 2.96" x 5.24")	
Environment	Operating Temperature	With extended temperature peripherals: -20 ~ 60° C with 0.7m/s air flow With standard temperature peripherals: 0 ~ 45° C with 0.7m/s air flow	
	Storage Temperature	-40 ~ 85° C (-40~185° F)	
	Relative Humidity	95% @ 40° C (non-condensing)	
	Vibration/Shock	With mSATA/SSD: IEC 60721-3-5 Class 5M3	
Regulation	EMC	CE/FCC Class A, CCC, BSMI	
	Safety	UL, CCC, BSMI, E-Mark (E13)	
	In-Vehicle Power	ISO7637-2 Lev 4	

Dimensions

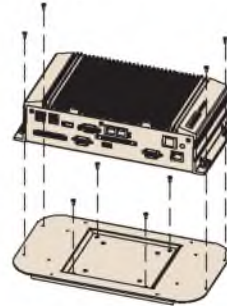


DIN Rail



Unit: mm

VESA mount

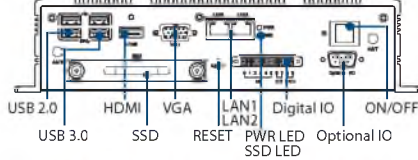


Wall mount

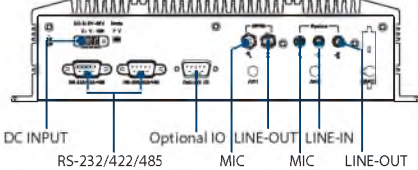


ARK-2151V-S6A1E External I/O Mechanical Layout/Drawing

Front Panel

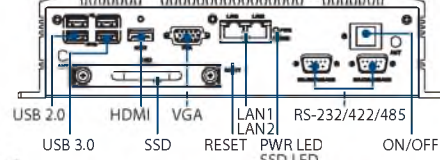


Rear Panel

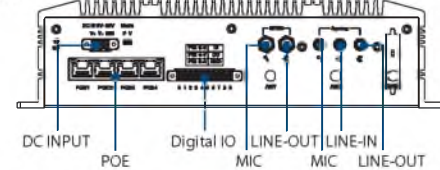


ARK-2151V-S9A1E External I/O Mechanical Layout/Drawing

Front Panel



Rear Panel



Ordering Information

Part Number	Intel CPU	RAM	2.5" Drive	mSATA	Display	GbE	PoE	USB	DIO	Optional COM or CANBus	RS-232/422/485	MiniPCle	SIM Holder	Power Input	Operating Temperature
ARK-2151V-S6A1E	Intel Celeron 2980U 1.6 GHz	Up to 8GB	1	1	1 x HDMI 1 x VGA	2	N/A	2 x USB2.0 2 x USB3.0	6Di 2Do	2 x RS-232 or 2 x CANBus 2.0A/B	2	3 x Full Size 1 x Half Size	2	9 ~ 36 V _{DC}	-20 ~ 60° C
ARK-2151V-S9A1E	Intel i5-4300U 1.9 GHz						4			N/A					

Packing List

Part Number	Description
-	1 x ARK-2151 Unit
-	1 x Driver/Utility CD/Manual
-	1 x User Manual (Simplified Chinese)
1652000049	3-pole phoenix power block 3.81mm
1750001782	1 x GPS antenna Active with 5M SMA cable

Embedded OS

Part Number	Description
TBC	WE8 OS image
TBC	WE7 OS image

Optional Items

Part Number	Description
TBC	AC-to-DC Adapter with Phoenix Power Plug, 0 ~ 40° C for Home and Office Use
1700001947	Power cable 2-pin 180 cm, USA type
1700001948	Power cable 2-pin 180 cm, Europe type
1700001949	Power cable 2-pin 180 cm, UK type
1700002141	Power cable 2-pin 180 cm, PSE type
AMK-V004E	VESA mounting kit
AMK-R003E	DIN-rail mounting kit

ARK-1122C

Intel® Atom™ Dual Core N2600 with
4 COM Port Extendibility Fanless Box PC

NEW



susiAccess



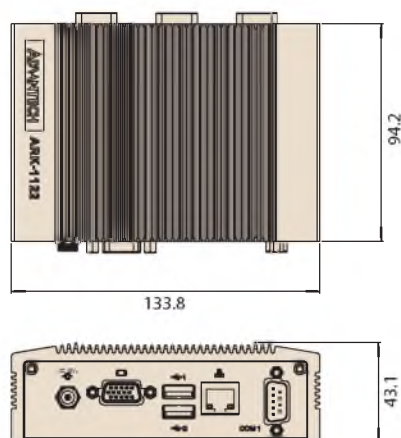
Features

- Intel® Atom™ Dual Core N2600, 1.6 GHz
- Palm-size form factor : 133.8(W) x 43.1(H) x 94.2(D) mm
- Supports 4 x COM ports (2 x RS-232 & 2 x RS-232/422/485, select by BIOS)
- Supports 1 x VGA and 4 x USB 2.0 ports
- Built-in 1 x half size Mini PCIe expansion slot (i.e.: Wi-Fi module)
- Supports mSATA storage (Hard drive bay by request)
- Wide operating temperature -20 ~ 60° C support
- Optional VESA / DIN-Rail / Wall mounts
- Lockable DC jack design
- IP40 sealed design
- Supports susiAccess and Embedded Software APIs

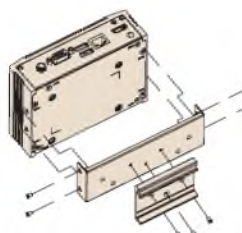
Specifications

ARK-1122C-S6A1E		
Processor System	CPU	Intel Atom Dual Core N2600 1.6 GHz
	L2 Cache	1MB
	System Chipset	Intel NM10
	BIOS	AMI EFI 16 Mbit
Memory	Technology	DDR3 800 MHz, up to 4 GB
	Socket	1 x 204-pin SO-DIMM
Graphics	Chipset	Intel Atom N2600
	Interface	VGA (1920 x 1200)
Ethernet	LAN	1 x 10/100/1000 Mbps Intel 82583V GbE
I/O Interface	Serial Ports	2 x RS-232, 2 x RS-232/422/485, selected by BIOS
	USB Interface	4 x USB ports, USB2.0 Compliant (Standard) or 2 x USB ports (Option 2.5" drive bay version)
Other	Watchdog timer	255-level timer interval, setup by software
Expansion	Mini PCIe	1 x half-size Mini PCIe
	2.5" HDD/SSD	1 x SATA II HDD bay (Optional by T-Part)
Storage	mSATA	1 x full-size Mini PCIe slot
	Software Support	Microsoft Windows
Power Requirement	Power Input Voltage	Windows 7 Pro, WES7, XP Embedded (XP Embedded by project support)
	DC Jack Type	12 V _{DC} , ± 10%
	Power Adaptor	Support lockable design
Power Consumption	AC to DC, DC12 V/3 A, 36 W with lockable design	
	Typical	5.4 W
Mechanical	Max	9.47 W
	Construction	Aluminum housing
	Mounting	Support VESA/DIN Rail/Wall mounting (Optional)
Environmental and Certifications	Dimensions (W x H x D)	133.8 x 43.1 x 94.2 mm (5.27" x 1.7" x 3.71")
	Operating Temperature	With standard temperature HDD/SSD/mSATA devices: 0 ~ 40° C With extended temperature SSD/mSATA devices: -20 ~ 60° C
	Storage Temperature	-40 ~ 85° C
	Relative Humidity	95% @ 40° C (non-condensing)
	Vibration During Operation	With SSD/mSATA: 3Grms, IEC 60068-2-27, half sine, 11ms duration
	Shock During Operation	With SSD/mSATA: 30Grms, IEC 60068-2-27, half sine, 11ms duration
	EMC	CE/FCC Class A, CCC, BSMI
	Safety Certifications	CB, UL, CCC, BSMI

Dimensions

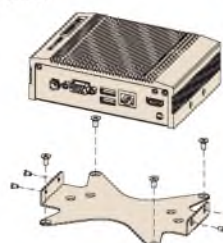


DIN Rail



Unit: mm

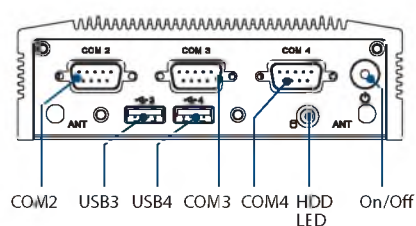
VESA mount



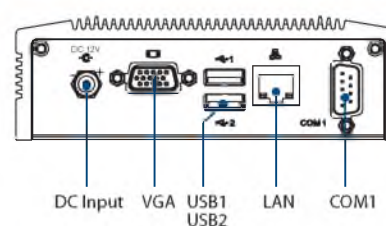
Wall mount



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Ordering Information

Part Number	Intel CPU	RAM	VGA	HDMI	Audio	GbE	2.5" HDD bay	mSATA Storage	USB 2.0	RS-232	RS-232/422/485	MiniPCIe	Operating Temp.
ARK-1122C-S6A1E	Atom N2600 1.6GHz	Up to 4GB	1	N/A	N/A	1	Optional by T-PN	1	4 (Standard) ; 2 (Option 2.5" HDD bay version)	2	2	1 Half size	-20 ~ 60° C

Note: Memory, storage and operating system bundled by request.

Packing List

Part Number	Description
-	1 x ARK-1122 unit
-	1 x Driver/Utility CD/Manual
-	1 x Traditional Chinese user manual for CCC
-	1 x China RoHS
1757004096-01	1 x AC to DC adapter DC12 V/3 A 36 W, 0 ~ 40° C with lockable design

Embedded OS

Part Number	Description
2070011881	WES7 for ARK-1122C
2070012167	XPE for ARK-1122C

Optional Items

Part Number	Description
1700001524	Power Cable 3-pin 180cm, USA type (For power adapter 1757004096-01)
170203183C	Power Cable 3-pin 180cm, Europe type (For power adapter 1757004096-01)
170203180A	Power Cable 3-pin 180cm, UK type (For power adapter 1757004096-01)
1700008921	Power Cable 3-pin PSE Mark 183cm (For power adapter 1757004096-01)
1757004522-01	AC-to-DC Wide Temperature Adapter, DC 12V/3.33A 40W, -20° C ~ 70° C
1702002600-01	Power cable 3-pin 183 cm, USA type (For power adapter 1757004522-01)
1700018705	Power cable 3-pin 183 cm, Europe type (For power adapter 1757004522-01)
1700018704	Power cable 3-pin 183 cm, UK type (For power adapter 1757004522-01)
1700000237-01	Power cable 3-pin 183 cm, PSE type (For power adapter 1757004522-01)
AMK-V003E	ARK-112X series VESA mounting kit
AMK-R001E	ARK-112X series DIN-rail mounting kit
AMK-W001E	ARK-112X series Wall mounting kit

ARK-3360F

Intel ATOM N450/D510 High Value Automation Control Box with 3 GigaLAN and Isolated COM ports

NEW



Features

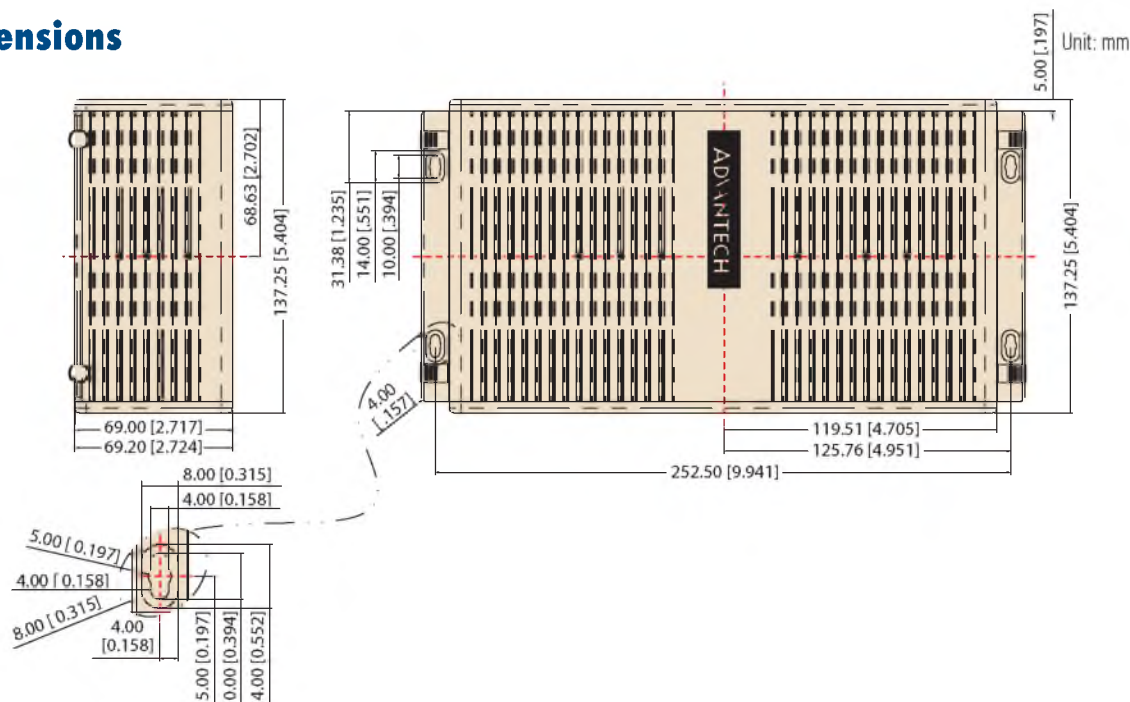
- Fanless, Intel® ATOM N450/D510 1.67 GHz Compact Box IPC
- MiniPCIe and MiniPCI expansion for communication module, i.e. HSDPA, WLAN
- Support 12 – 24 wide range DC input
- Supports up to 3 x GbE, 6 x USB 2.0 and 6 x COMs ports
- Serial port support RS-485 auto flow control and isolation (up to 7.5Kv)
- Easy integration, easy maintenance, and wide input voltage range
- IP40



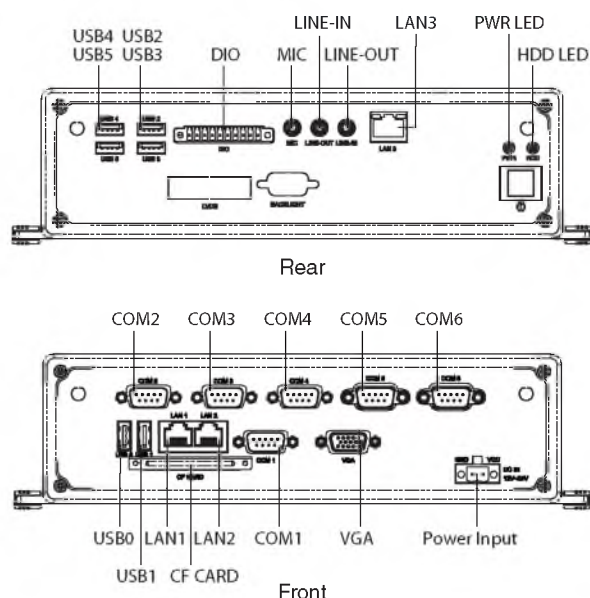
Specifications

ARK-3360F-N4A1E/ARK-3360F-D5A1E		
Processor System	CPU	Intel® ATOM N450/D510
	Max. speed	1.67 GHz
	System Chipset	Intel™ Pineview-M/D + ICH8-M Chipset
	Front Side Bus	667 MHz
	BIOS	AMI 16 Mbit
Memory	Technology	DDR2 667 MHz
	Max. Capacity	2 GB
	Socket	1 x 200-pin SODIMM
Graphics	Chipset	Intel 3.5 Gen Integrated Graphic Engine
	Interface	CRT Interface 18-bit LVDS Interface (Optional)
Ethernet	LAN 1	10/100/1000 Mbps Ethernet controller, support Wake On LAN
	LAN 2	10/100/1000 Mbps Ethernet controller, support Wake On LAN
	LAN3	10/100/1000 Mbps Ethernet controller, support Wake On LAN
Audio	Amplifier	-
	Interface	Line-in, Line-out, Mic-in
IO interface	Serial Interface	1 x RS-232, 3 x RS-232/422/485, 2 x RS-422/485 with 7.5Kv isolation protection & auto flow control
	USB Interface	6 x USB ports, Compliant with USB 2.0
Others	Digital I/O	8-Bits DIO
	GPS	-
	Thermal alarm	-
	Watchdog timer	255 levels timer interval, setup by software
Expansion	MiniPCI	1 x MiniPCI
	MiniPCIe	1 x MiniPCIe
Storage	HDD	Supports drive bay space for 1 x SATA 2.5" HDD
	SSD	Supports CompactFlash socket for type I/II CompactFlash disk
Software support	Microsoft Windows	Vista, XP Professional, XP Embedded
	Linux	Fedora 9.0
Power requirement	Power Type	AT/ATX
	Power Input Voltage	12 V _{DC} – 24 V _{DC}
	Minimum Power Input	12V-24 V, 3.0A-1.5A
	Power Adapter	AC to DC, DC19 V/3.42 A, 65 W(Optional)
Power consumption	Typical	12 W
	Max.	16 W
Mechanical	Construction	Aluminum housing
	Mounting	Desk/wall-mounting
	Dimensions (W x H x D)	264.5 mm x 69.2 mm x 137.25 mm (10.41" x 2.72" x 5.4")
	Weight	2 kg (4.4 lb)
Environment	Operating Temperature	With Industrial Grade CompactFlash disk: -20 ~ 60° C (32 ~ 140° F) With 2.5-inch hard disk 0 to 45° C (32 ~ 112° F), with air flow
	Storage Temperature	-40 ~ 85° C (-40 ~ 185° F)
	Relative Humidity	95% @ 40° C (non-condensing)
	Vibration Loading During Operation	With CompactFlash disk: 5 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis. With 2.5-inch hard disk: 1 Grms, IEC 60068-2-64, random, 5 ~ 500 Hz, 1 Oct./min, 1 hr/axis.
	Shock During Operation	With CompactFlash disk: 50 G, IEC 60068-2-27, half sine, 11 ms duration With hard disk: 20 G, IEC 60068-2-27, half sine, 11 ms duration
	EMC	CE/FCC Class A, CCC, BSMI
	Safety Certifications	UL, CCC, BSMI

Dimensions



ARK-3360F External I/O Mechanical Layout/Drawing



Packing List

Part Number	Description
-	1 x ARK-3360 Unit
1700009001	1 x 2-pin Phoenix DC power connector
-	1 x User Manual (Simplified Chinese)
-	1 x Utility CD

Ordering Information

Part Number	Description
ARK-3360F-N4A1E	Intel Atom N450 1.67 GHz Compact Box IPC, w/ 3 x GbE, 6 x USB 2.0, 6 x COM, 1x MiniPCIe, 1 x MiniPCI, VGA, DIO, Audio
ARK-3360F-D5A1E	Intel Atom D510 1.67 GHz Compact Box IPC, w/ 3 x GbE, 6 x USB 2.0, 6 x COM, 1x MiniPCIe, 1 x MiniPCI, VGA, DIO, Audio

Optional Items

Part Number	Description
1757000222	AC-to-DC Adapter, DC19 V/3.42 A 65 W, with Phoenix Power Plug, 0 ~ 40° C for Home and Office Use
1700001947	Power cable 2-pin 180 cm, USA for ARK-338X
1700001948	Power cable 2-pin 180 cm, Europe for ARK-338X
1700001949	Power cable 2-pin 180 cm, UK for ARK-338X

Embedded OS

Part Number	Description
2070009030	XPE WES2009 Luna Pier V4.0 ENG
2070009031	XPE WES2009 Luna Pier V4.0 MUI24

По вопросам продаж и поддержки обращайтесь:

Архангельск (8182)63-90-72
Астана +7(7172)727-132
Белгород (4722)40-23-64
Брянск (4832)59-03-52
Владивосток (423)249-28-31
Волгоград (844)278-03-48
Вологда (8172)26-41-59
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Калининград (4012)72-03-81
Калуга (4842)92-23-67
Кемерово (3842)65-04-62
Киров (8332)68-02-04
Краснодар (861)203-40-90
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Смоленск (4812)29-41-54
Сочи (862)225-72-31
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Тверь (4822)63-31-35
Томск (3822)98-41-53
Тула (4872)74-02-29
Тюмень (3452)66-21-18
Ульяновск (8422)24-23-59
Уфа (347)229-48-12
Челябинск (351)202-03-61
Череповец (8202)49-02-64
Ярославль (4852)69-52-93