

ARK-3360F

Intel® Atom™ N450/D510 High Value Automation Control Box with 3 GigaLAN and Isolated COM Ports



Specifications

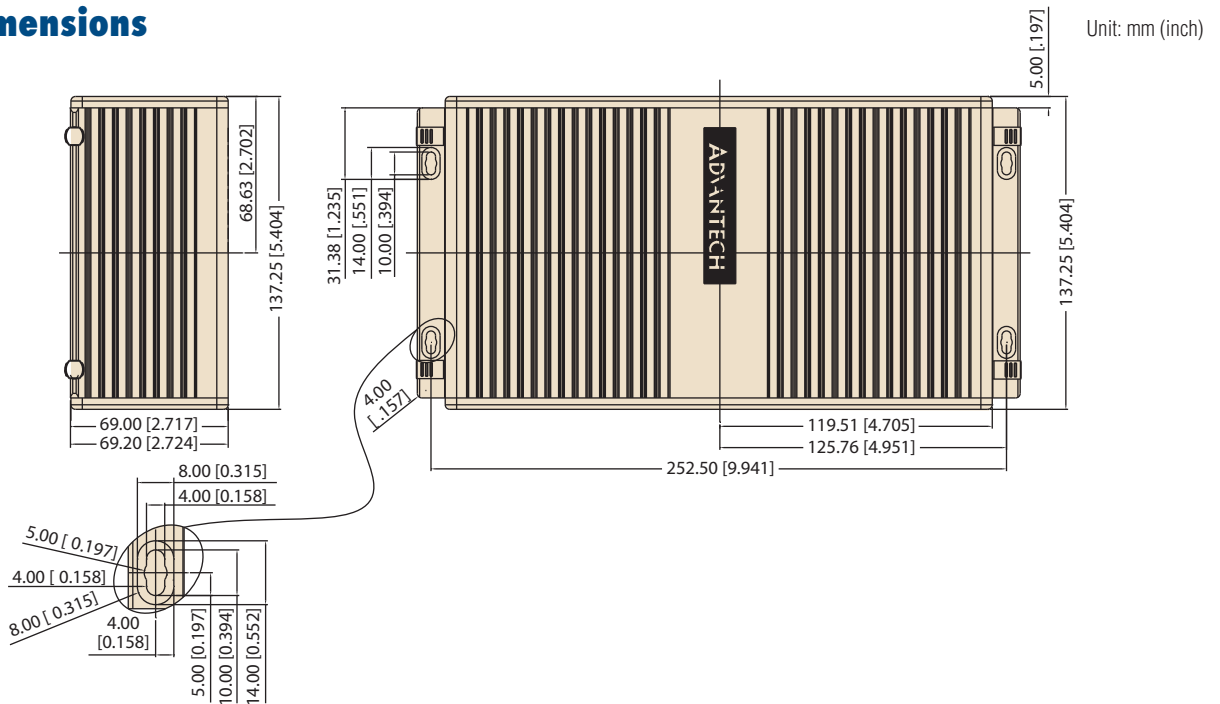
ARK-3360F-N4A1E/ARK-3360F-D5A1E

Processor System	CPU	Intel Atom N450/D510
	Max. speed	1.66 GHz
	System Chipset	ICH8-M Chipset
	Front Side Bus	667 MHz
	BIOS	AMI 16 MB SPI BIOS
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
	LAN 3	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
Other	Digital I/O	8-bit DIO
	GPS	-
	Thermal alarm	-
	Watchdog timer	255-level timer interval, setup by software
Expansion	Mini PCI	1 x Mini PCI
	Mini PCIe	1 x Mini PCIe
Storage	HDD	Supports drive bay space for 1 x SATA 2.5" HDD (support 9.5 mm height only)
	SSD	Supports CompactFlash socket for type I/II CompactFlash disk
Software Support	Microsoft Windows	XP Professional, XP Embedded, Windows 7, WinCE 6.0
	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	DIN-rail 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 extend temperature peripherals: -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, KC
	Safety Certifications	UL, CCC, BSMI, KC

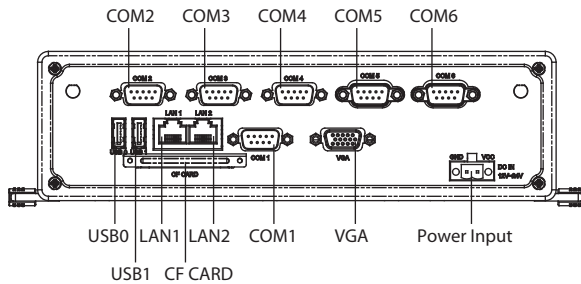
Features

- Fanless, Intel® Atom™ N450/D510 1.66 GHz Compact Box IPC
- Mini PCIe and Mini PCI expansion for communication module, i.e. HSDPA, WLAN
- Supports 12 ~ 24 V wide range DC input
- Supports up to 3 x GbE, 6 x USB 2.0 and 6 x COMs ports
- Serial ports support RS-485 auto flow control and isolation (up to 7.5Kv)
- Easy integration, easy maintenance, and wide input voltage range
- IP40

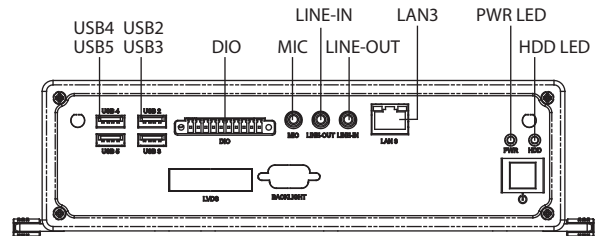
Dimensions



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Packing List

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

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
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

Ordering Information

Part Number	Description
ARK-3360F-N4A1E	Intel Atom N450 1.66 GHz Compact Box IPC, w/ 3 x GbE, 6 x USB 2.0, 6 x COM, 1x Mini PCIe, 1 x Mini PCI, VGA, DIO, Audio
ARK-3360F-D5A1E	Intel Atom D510 1.66 GHz Compact Box IPC, w/ 3 x GbE, 6 x USB 2.0, 6 x COM, 1x Mini PCIe, 1 x Mini PCI, VGA, DIO, Audio

Embedded OS

Part Number	Description
2070009030	XPE WES2009 V4.0 ENG
2070009031	XPE WES2009 V4.0 MUI24
2070009835	WES7E V5.0 ENG

ARK-3360L

Intel® Atom™ N450/D510 High Value Embedded Control Box with Multiple I/O



Features

- Fanless, Intel® Atom™ N450/D510 1.66 GHz compact embedded IPC
- Support extend temperature -40~70° C (ARK-3360LZ-N4A1E)
- Mini PCIe expansion for communication module, i.e. HSDPA, WLAN
- Dual display and supports for wide screen with high resolution
- Supports up to 2 x GbE, 6 x USB 2.0 and 4 x COMs ports
- Serial port support RS-485 auto flow control
- Easy integration, easy maintenance
- IP40

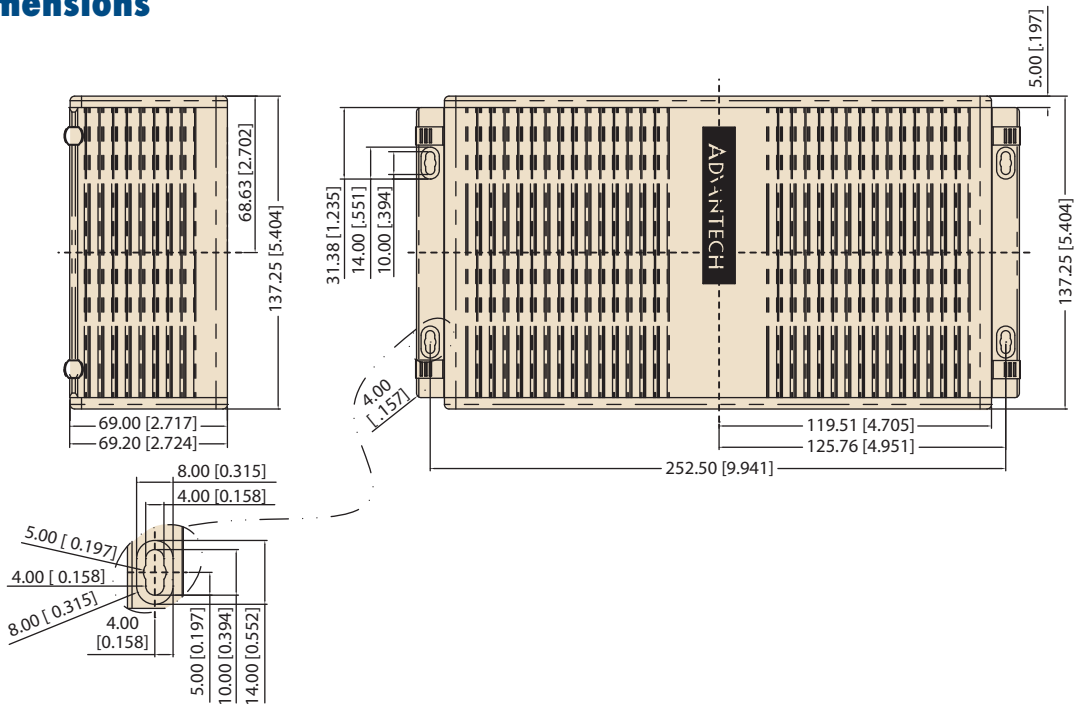


Specifications

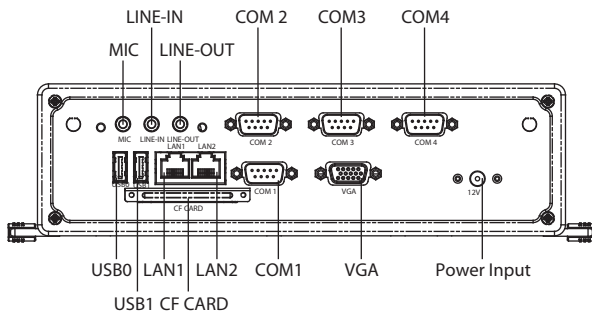
		ARK-3360L-N4A1E/ARK-3360L-D5A1E
Processor System	CPU	Intel Atom N450/D510
	Max. speed	1.66 GHz
	System Chipset	ICH8-M
	Front Side Bus	667 MHz
	BIOS	AMI 16 MB SPI BIOS
Memory	Technology	DDR2 667 MHz
	Max. Capacity	2 GB
	Socket	1 x 200-pin SODIMM
Graphics	Chipset	Intel 3.5 Gen Integrated Graphic Engine
	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
	LAN 3	-
Audio	Amplifier	-
	Interface	Line-in, Line-out, Mic-in
IO interface	Serial Interface	3 x RS-232 port, 1 x RS-232/422/485 port w/Auto flow control
	USB Interface	6 x USB ports, Compliant with USB 2.0
Other	Digital I/O	8-bit DIO
	GPS	-
	Thermal alarm	-
	Watchdog timer	255-level timer interval, setup by software
Expansion	Mini PCI	-
	Mini PCIe	1 x Mini PCIe
Storage	HDD	Supports drive bay space for 1 x SATA 2.5" HDD (support 9.5 mm height only)
	SSD	Supports CompactFlash socket for type I/II CompactFlash disk
Software Support	Microsoft Windows	XP Professional, XP Embedded, Windows 7, WinCE 6.0
	Linux	Fedora 9.0
Power Requirement	Power Type	AT/ATX
	Power Input Voltage	12 V
	Minimum Power Input	12 V, 1.12 A
	Power Adapter	AC to DC, DC 12 V/3.0 A, 36 W (Optional)
Power Consumption	Typical	11 W
	Max.	15 W
Mechanical	Construction	Aluminum housing
	Mounting	DIN-rail 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 extend temperature peripherals: -20 ~ 60° C (-4 ~ 140°F); -40 ~ 70° C (-40 ~ 158° F) for ARK-3360LZ-N4A1E 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, KC
	Safety Certifications	UL, CCC, BSMI, KC

Dimensions

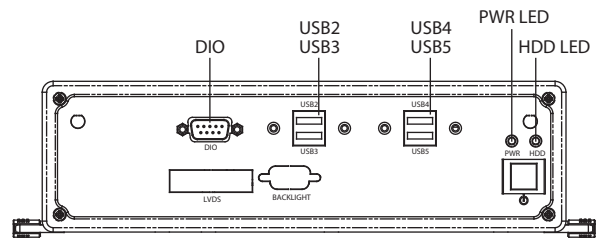
Unit: mm (inch)



Front Panel External I/O Mechanical Layout/Drawing



Rear Panel External I/O Mechanical Layout/Drawing



Packing List

Part Number	Description
-	1 x ARK-3360 Unit
-	1 x Driver/Utility CD/Manual
-	1 x User Manual (Simplified Chinese)
1960047289T001	Power adapter locker

Ordering Information

Part Number	Description
ARK-3360L-N4A1E	Intel Atom N450 1.66 GHz Compact Box IPC, w/ 2 x GbE, 6 x USB 2.0, 4 x COM, 1x Mini PCIe, VGA, DIO, Audio
ARK-3360L-D5A1E	Intel Atom D510 1.66 GHz Compact Box IPC, w/ 2 x GbE, 6 x USB 2.0, 4 x COM, 1x Mini PCIe, VGA, DIO, Audio
ARK-3360LZ-N4A1E	ARK-3360L-N4A1E, Atom N450, Wide temp, -40 ~ 70°C (Extend temp. peripherals are required)

Optional Items

Part Number	Description
1757003553	Adapter AC 90-264V 36W/12V FSP036-RAB for ARK-3360L
1700008921	Power Cord 3P Power Supply 180 cm PSE
170203180A	Power cable 3P 183 cm UK type
170203183C	Power Cable 3P 183 cm Europe
1700001524	Power Cable 3P 180 cm, USA type

Embedded OS

Part Number	Description
2070009030	XPE WES2009 V4.0 ENG
2070009031	XPE WES2009 V4.0 MUI24
2070009835	WES7E V5.0 ENG