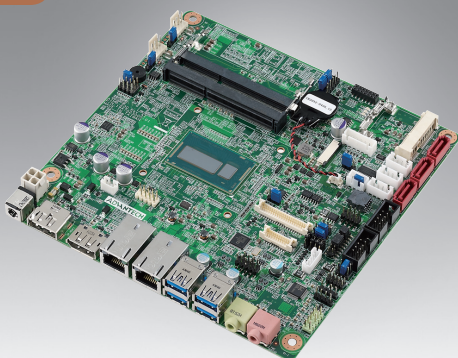


AIMB-230

Intel® Core™ i3-4010U/i5-4300U/ Celeron 2980U Mini-ITX with eDP/DP/DP++, 2 COM, and Dual LAN

NEW



iManager susiAccess



CE FCC

Features

- Supports Intel® Core™ i3-4010U, i5-4300U and Intel® Celeron 2980U processor (Dual core), 15W TDP, BGA 1168 (MCP) 22nm Processor
- Two 204-pin SO-DIMM up to 16 GB DDR3L 1600 MHz SDRAM
- Multiple display I/O supports versatile Tri display functions for eDP/LVDS, DP/HDMI, and DP++
- Realtek ALC892 supports 5.1 + 2 channel HD audio
- Dual Realtek RTL8111E Gigabit LAN
- 1 Full-sized Mini-PCIe, 1 Half-sized Mini-PCIe
- 2 COM, 3 SATA III, 1 mSATA
- 4 USB 3.0, 2 USB 2.0

Software APIs:



SMBus



H/W Monitor



Watchdog



GPIO



Brightness

Utilities:



BIOS flash

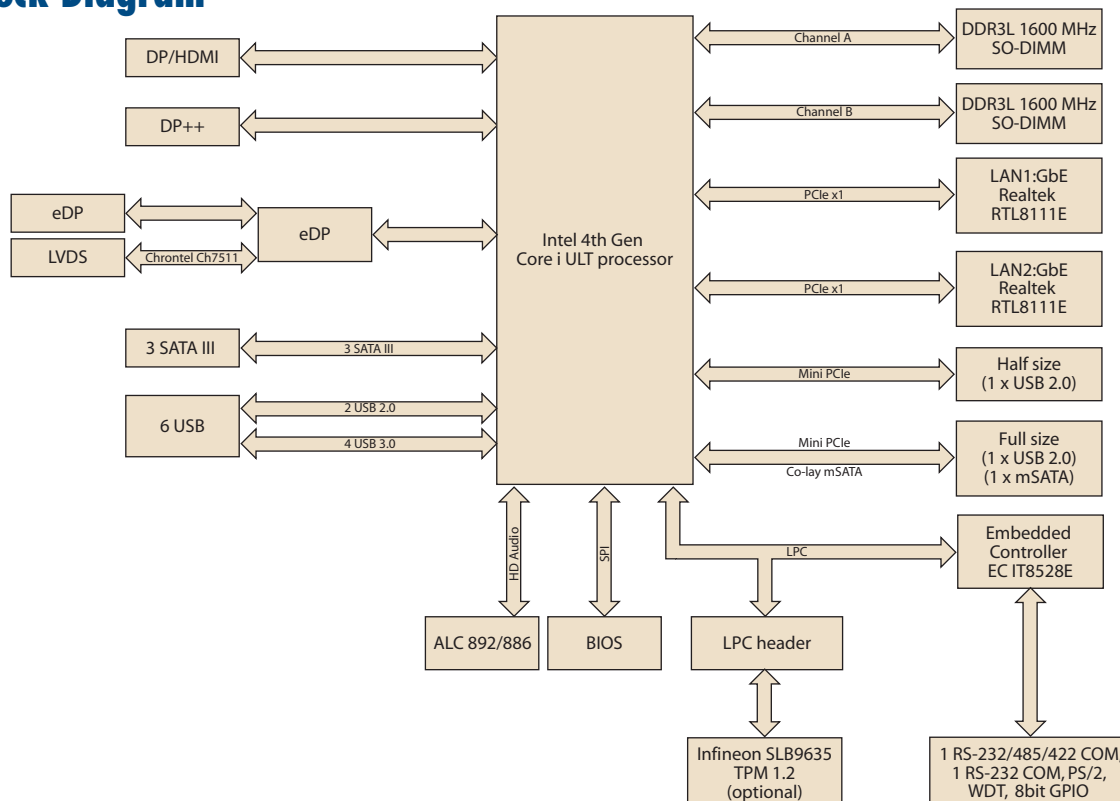


Monitoring

Specifications

		Intel Core i5-4300U	Intel Celeron 2980U	i3-4010U
Processor System	CPU	Intel Core i5-4300U	Intel Celeron 2980U	i3-4010U
	Max. Speed	1.9 GHz	1.6 GHz	1.7 GHz
	L3 Cache	3 MB / 2 MB		
	Chipset	4th Generation Intel® Core™ ULT processors + Lynx Point-LP		
Expansion Slot	BIOS	AMI EFI 128 Mbit, SPI		
	Full-size Mini-PCIe	1, Supports 1 x USB 2.0 and co-lay 1 x mSATA		
Memory	Half-size Mini-PCIe	1, Supports 1 x USB 2.0		
	Technology	Dual Channel DDR3L 1600 MHz		
	Max. Capacity	16 GB/8 GB per SO-DIMM		
Graphics	Socket	2 x 204-pin SO-DIMM (Non-ECC)		
	Controller	Intel® HD Graphics 5000 Supports DirectX 11.1, OpenGL 4.0, OpenCL 1.3, Full AVC, VC1, MPEG2 H/W encoder		
	LVDS+Inverter / eDP	Supports dual channel 48-bit up to 1920 x 1200, co-lay eDP (by BOM option)		
	DP/HDMI	1, Supports HDMI 1.4 for HD Video playback		
	DP++	Max resolution up to 3200 x 2000 at 60 Hz on DisplayPort (GT2), 4096 x 2304 at 24 Hz on HDMI (GT2)		
	Dual Display	1, DP++ connector, available with DP-to-DVI (HDMI) cable (no transmitter) to connector to normal LCD monitor		
	Tri Display	HDMI+LVDS (eDP), HDMI+DP++, LVDS(eDP)+DP++		
Ethernet	Dual Display Mode	HDMI + HDMI + DP, DP + DP + eDP, HDMI + DP + eDP		
	Interface	Extended Mode, Clone Mode		
	Controller	10/100/1000 Mbps		
SATA	Connector	LAN1: Realtek RTL8111E-VB-GR		
	Max Data Transfer Rate	LAN2: Realtek RTL8111E-VB-GR		
	Channel	600 MB/s (SATA 3.0)/ mSATA		
Rear I/O	S/W RAID	3 / 1		
	DP/HDMI	0,1,5		
	DP++	1		
	Ethernet	1		
	USB	2		
	Audio	4 x USB 3.0		
Internal Connector	DC Jack	2 single audio jack for Line-Out (Green), Mic-In (Red)		
	LVDS & Inverter	DC 12V Jack, single power		
	eDP	1		
	LVDS Inverter	1, by BOM optional		
	LVDS Connector	1 (5 pin support 5V and 12V)		
	USB	1 (3.3V / 5V / 12V) by jumper selected		
	Serial	2 ports USB 2.0 with 2.0mm pin-header		
	SATA	COM 1: RS-232/422/485 supports +5V, +12V(without H/W auto flow control)		
	SATA Power	COM 2: RS-232		
	PS/2 K/B & M/S	4 (3 x SATA 3.0, 1 x mSATA)		
	CPU/System/Chassis Fan Connector	3		
Watchdog Timer	Power Connector	Supports PS/2 K/S,M/S with 5-pin wafer		
	GPIO	1 CPU fan with 4-pin wafer		
Power Requirement	Output	1 System fan with 4-pin wafer		
	Interval	4-pin ATX, DC12V		
Environment	Temperature	8-bit (4-bit DI and 4-bit DO)		
	Power Type	System reset		
Physical Characteristics	Power Consumption (Max, test in HCT)	Programmable 1 ~ 255 sec/min		
	Dimensions	Single voltage 12 V DC input;1 x External DC jack;1 x Internal 4-pin (2 x 2) power connector, Supports AT/ATX mode		
		i5-4300, 3.5" SATA HDD x 1 + 8G RAM x 1		
		Celeron-2980U, 3.5" SATA HDD x 1 + 8G RAM x 1		
		12V		
		2.66A		
		Non-Operating		
		0 ~ 60° C (32 ~ 140° F), depends on CPU speed and cooler solution		
		-20 ~ 70° C (-4 ~ 158° F)		
		170 x 170 mm (6.69" x 6.69")		

Block Diagram



Ordering Information

Order Number	CPU	Display	GbE	TPM	Storage	USB	PCIe / PCI
AIMB-230G2-U5A1E	i5-4300U	DP/HDMI,	2	(1)	3 x SATA III	4 x USB 3.0	1 x Full-size Mini-PCIe
AIMB-230G2-U0A1E	Celeron 2980U	DP++/DVI/HDMI,			1 x mSATA	2 x USB 2.0	1 x Half-size Mini-PCIe
AIMB-230G2-U3A1E	i3-4010U	LVDS/eDP (optional)					

*() BOM options available on MP version.

Order Number	CPU	Display	GbE	COM	USB	Audio	Remark
AIMB-B12305-00Y1E	i5-4300U	DP/HDMI,	2	2	4 x USB 3.0	Line Out	Barebone, with thermal module
AIMB-B12300-00Y1E	Celeron 2980U	DP++/DVI/HDMI			2 x USB 2.0	Mic-In	

Packing List

Part Number	Description	Quantity
1700003194	SATA HDD cable	2
1700018785	SATA Power cable	2
2006023010	Startup manual	1
2066023000	Driver CD	1
1960062823N001	Fanless Heat Sink	1
19Z0000757T000	IO port bracket	1

Optional Accessories

Part Number	Description
1757003064	ADAPTER AC100-240V 84W +12V/7A (FSP)
1757003995	ADAPTER AC100-240V 60W +12V/5A (FSP)
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 183 cm
1960061914N001	Fan Cooler
1960063215T001	Heat Pipe Cooling module

I/O View



AIMB-230G2-U3A1E
AIMB-230G2-U5A1E
AIMB-230G2-U0A1E



Fanless Heat Sink



Fan Cooler



Heat Pipe Cooling Module