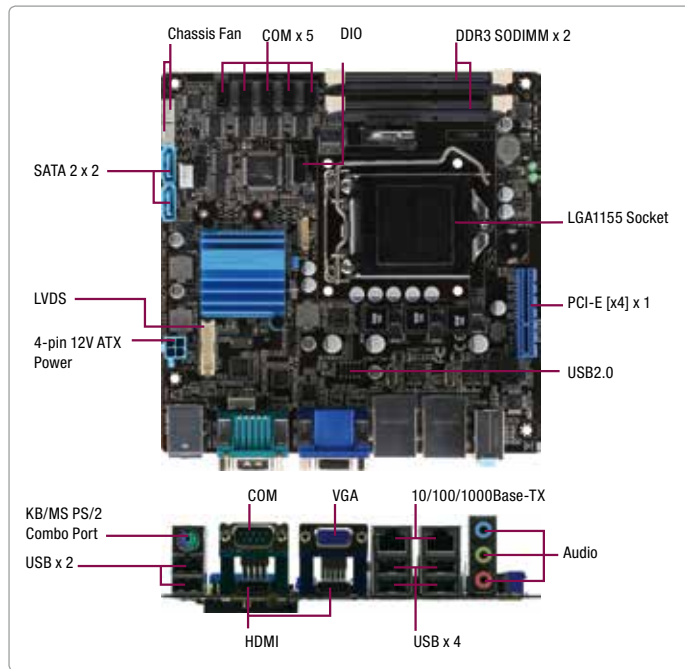


EMB-H61B

Mini-ITX Embedded Motherboard with Intel® 2nd/3rd Generation Core™ i7/i5/i3 Processor



Features

- Intel® Socket 1155 for 2nd/3rd Generation Core™ i7/i5/i3 Processor Up to 65W
- Intel® H61 Express Chipset
- DDR3 1066/1333MHz SODIMM x 2, Up to 16GB
- VGA, HDMI x 2, LVDS Dual Independent Display
- Realtek 8111F x 2, Gigabit Ethernet x 2
- PCI-E [x4] x 1, Full-size Mini Card x 1 (mSATA Optional) + SIM Card x 1
- TPM Infineon SLB9635 TT 1.2



Specifications

System	
Form Factor	Mini-ITX
Processor	LGA1155 socket for Intel® 2nd/3rd Generation Core™ i7/ i5/ i3/ Pentium®/ Celeron® Processors, Supports Intel® 22/32 nm CPU up to 65W. (65W CPU supported without Turbo Boost mode) (Note: please use proprietary CPU cooler)
System Memory	DDR3 1333/1066MHz SODIMM x 2, up to 16GB, Non-ECC, Un-buffered Memory
Chipset	Intel® H61 Express Chipset
I/O Chipset	Fintek F81866D-I
Ethernet	Realtek 8111F, Gigabit Ethernet, RJ-45 x 2
BIOS	64Mbit Flash ROM, AMI BIOS
Wake On LAN	Yes (WOL/ PXE)
Watchdog Timer	1~255 steps by software program
H/W Status Monitoring	Temperature Monitor on CPU/ System, Voltage Monitor on Vcore/5V/3.3V/12V, Fan Monitor on CPU/ Chassis
Expansion Interface	PCI-E[x4] x 1, Full size Mini PCI-E-socket with SIM Slot x 1 (mSATA optional)
Battery	Lithium battery
Power Requirement	12V DC with 4-Pin power connector
Power Consumption (Typical)	Intel® Core™ i7-3770S Processor, DDR3 1600 8GB x 2, 8.1A@+12V
Board Size	6.7" x 6.7" (170mm x 170mm)
Gross Weight	1.1 lb (0.5 Kg)
Operation Temperature	32°F ~ 131°F (0°C ~ 55°C)
Storage Temperature	-4°F ~ 158°F (-20°C ~ 70°C)
Operation Humidity	10% ~ 80% R/H, non-condensing
MTBF (Hours)	211,000
Display	
Graphic Engine	Intel® Graphics Media Accelerator
Resolution	Up to 2048 x 1536 @75 Hz for VGA Up to 1920 x 1200 @60 Hz for HDMI Up to 1920 x 1200 @60 Hz, Dual Channel 18/24-bit for LVDS
Output Interface	VGA, HDMI x 2, LVDS
I/O	
Storage	SATA 3Gb/s x 2, CF-SATA x 1 (SATA+IDE) optional
Serial Port	RS-232 (on back panel) x 5, RS-232/422/485 x 1, supports optional 5V/12V/RI (on mid-board)
Universal Serial Bus	USB2.0 x 8, 2 ports on mid-board, 6 ports on back panel
Digital I/O	8-bit programmable (4-in / 4-out)
PS/2 Port	keyboard / Mouse with PS/2 connector x 1
Audio	Line-in, Mic-in, Line-out

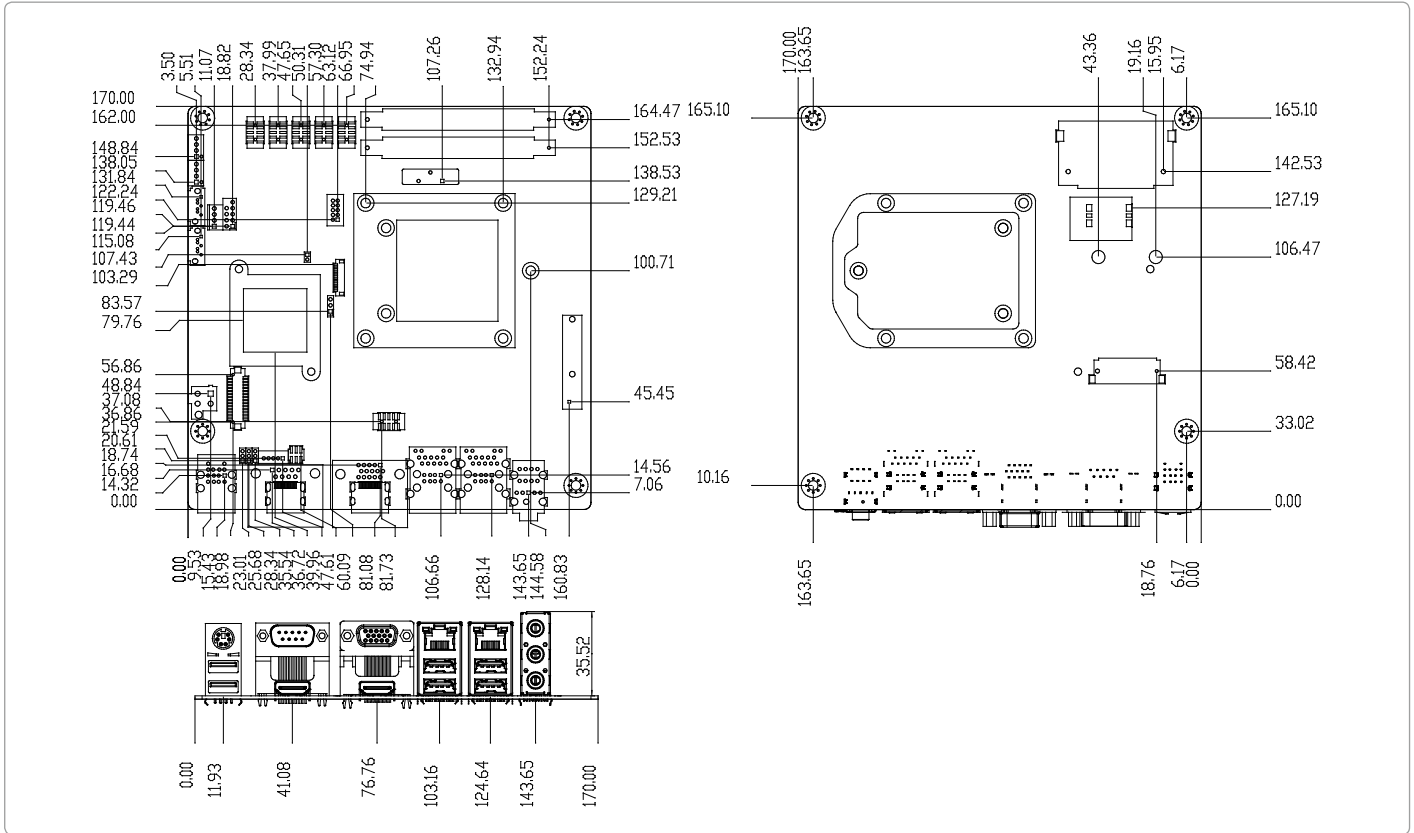
Packing List

- I/O Shield
- SATA Cable x 2
- SATA Power Cable
- Product CD
- EMB-H61B

EMB-H61B

Dimension

Unit: mm



Ordering Information

Part Number	CPU	RAM	Fan/ Fanless	Display	Storage	LVDS	LAN	USB	RS-232	RS-232/422/485	Expansion Slot	Power	Temp.
EMB-H61B-A10	Socket	SODIMM	Fan (Proprietary CPU Cooler)	VGA, LVDS, HDMI x 2	SATA2 x 2 CF-SATA x 1	18/24b, 2CH	GbE x 2	USB 2.0 x 8	5	1	PCI-E[x4] x 1, Mini Card x 1 (PCI-E [x1] and USB)	12V DC	0°C - 55°C
EMB-H61B-A10-NC	Socket	SODIMM	Fan (Proprietary CPU Cooler)	VGA, LVDS, HDMI x 2	SATA2 x 2	18/24b, 2CH	GbE x 2	USB 2.0 x 8	5	1	PCI-E[x4] x 1, Mini Card x 1 (PCI-E [x1] and USB)	12V DC	0°C - 55°C

Optional Accessories

- **1701100206**
COM Cable (200MM, p=2.00mm)
- **1709100201**
USB 2.0 Cable (10P, 220MM, p=2.00mm)
- **17592H61A0**
Proprietary CPU Cooler for EMB-H61B
- **1709070800**
SATA Cable