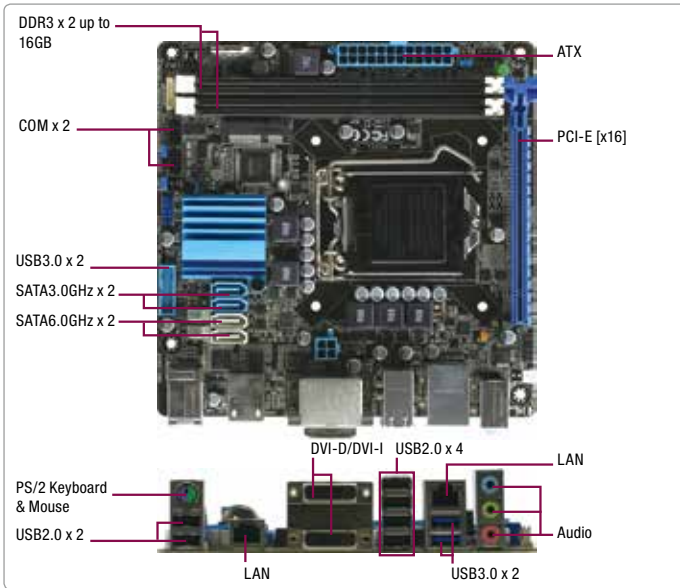


EMB-Q77A

Mini-ITX Embedded Motherboard with Intel® 3rd/2nd Generation Core™ i7/i5/i3 Processor, USB 3.0 x 4 and SATA3 x 2



Features

- Intel® 3rd/2nd Generation Core™ i7/i5/i3/Processors
- DDR3 1600/1333MHz DIMM x 2, Up to 16GB
- Dual Independent Display: DVI-D, DVI-I
- Dual Intel® Gigabit Ethernet
- Onboard TPM Infineon SLB9635 TT 1.2
- PCI-E [x16] x 1, Half-size Mini Card x 1 (mSATA Optional)
- Support USB3.0 and SATA 6.0 Gb/sec



Specifications

System	
Processor	LGA1155 socket for Intel® 3rd/2nd Generation Core™ i7/i5/i3/Pentium®/Celeron® Processors
Chipset	Intel® Q77 Express Chipset
System Memory	DDR3 1600/1333MHz, non-ECC, un-buffered DIMM x 2, up to 16GB
Graphics	Intel® Graphics Media Accelerator
I/O Chipset	NCT 6779
Ethernet	Intel® 82579LM (Support AMT 8.X) x 1, Intel® 82583V x 1
Audio	Realtek® ALC887
TPM	Infineon SLB9635 TT 1.2
Expansion Interface	PCI-E3.0/2.0 x16 Slot x 1, Mini Card (USB+PCIe) Half size x 1 (mSATA optional)
BIOS	128 Mbit Flash ROM, AMI BIOS
H/W Monitor	Temperature Monitor on CPU/Chassis, Voltage Monitor on Vcore/3.3V/5V/12V, Fan Monitor on CPU/ Chassis
Watchdog Timer	1~255 steps by software program
Smart Fan Control	CPU Fan / Chassis Fan
Wake On LAN / PXE	Yes (WOL / PXE)
Power State	S3, S4, S5
Battery	Lithium battery
Power Requirement	24-pin ATX connector x 1, 4-pin ATX 12V Power connector x 1
Power Consumption	intel® Core™ i7-3770, DDR3 1600 8GB DIMM x 2, ATX 87.8W
Power Compliance	Compliant with EuP / ErP
Mechanical	
Form Factor	Mini-ITX Form Factor, 6.7" x 6.7" (170mmx170mm)
Gross Weight	1.1 lb (0.5 Kg)
Environmental	
Operating Temperature	14°F ~ 131°F (0°C ~ 60°C)
Storage Temperature	-40°F ~ 185°F (-40°C ~ 85°C)
Operating Humidity	0% ~ 90% RH, non-condensing
Certificate	CE & FCC
MTBF	—
Display	
Chipset	Intel® Graphics Media Accelerator
Multi Display	DVI-D+DVI-I
VGA	—
DVI	DVI-D: Up to 1920 x 1200 @60 Hz, DVI-I: Up to 1920 x 1200 @60 Hz
HDMI	—
LVDS	—
Backlight Control	—

I/O	
Storage	SATA 6.0 Gb/s port x 2, SATA 3.0 Gb/s port x 2 (Supports RAID 0/1/5/10)
USB	USB 3.0 x 4 (2 ports at mid-board, 2 ports at back panel), USB 2.0 x 8 (2 ports at mid-board, 6 ports at back panel)
Display I/O	DVI-I x 1, DVI-D x 1
Audio I/O	Line-in, Mic-in, Line-out, internal Speaker
LAN I/O	RJ-45 x 2
Serial Port	RS-232/422/485 x 1 supports 5/12V/RI, (COM1, box header), RS-232 x 1
PS/2 Port	PS/2 Port x 1 (Keyboard & Mouse)
DIO	—
FAN	CPU Fan connector(s) (4-pin) x 1, Chassis Fan connector(s) (4-pin) x 1
Operating System	
MS Windows	Windows® XP 32/64 bit, Windows® 7 32/64 bit (WHQL), Windows® 8 (WHQL)
Linux	Fedora

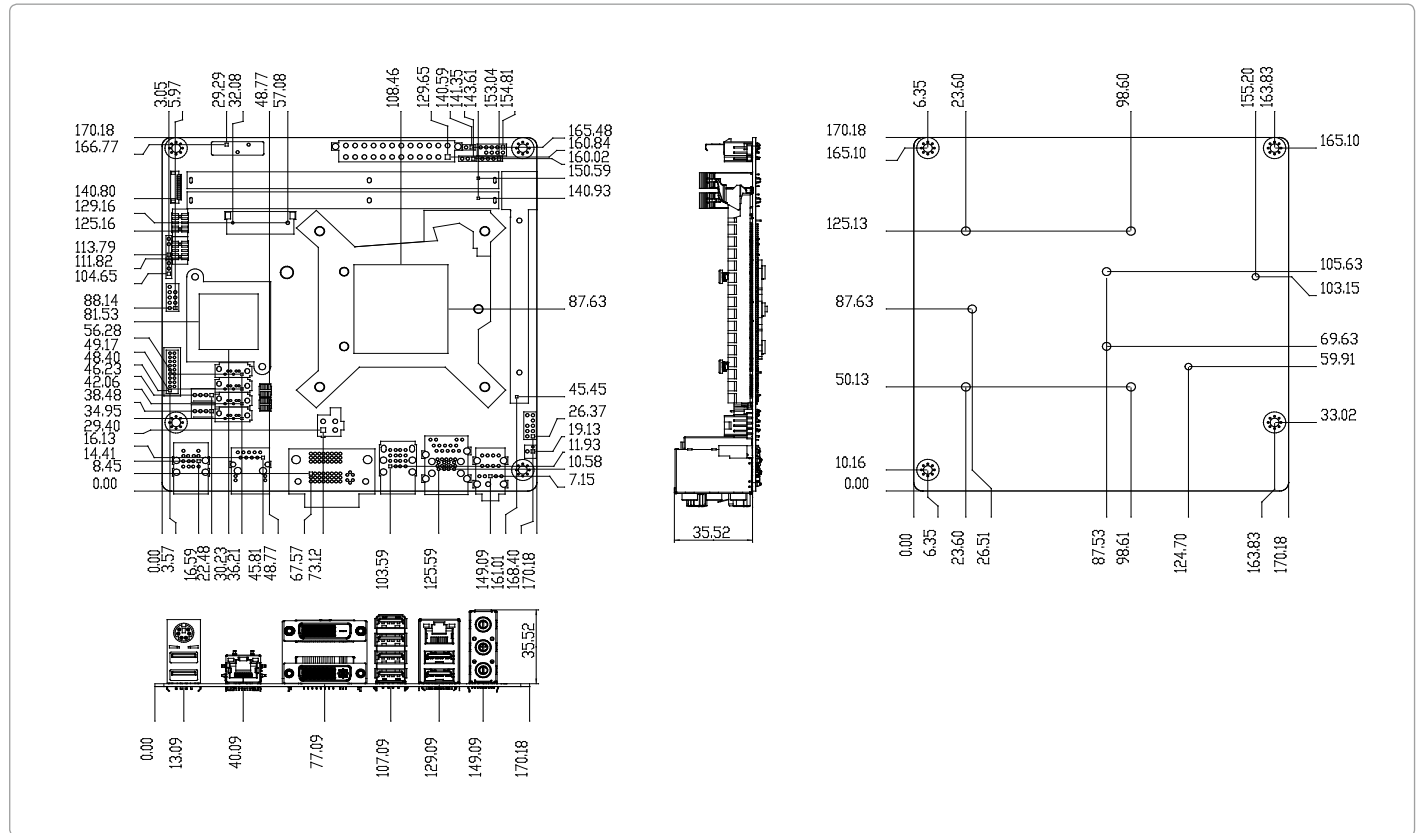
Packing List

- SATA Cable (7P, 180; 90, 500MM) 2 pcs
- I/O Shield
- Product DVD
- EMB-Q77A

EMB-Q77A

Dimension

Unit: mm



Order Information

Part Number	CPU	RAM	Fan/Fanless	Storage	Display	LVDS	LAN	USB	RS-232	RS-232/422/485	Expansion Slot	Power	Temp.
EMB-Q77A-A10	Socket	DIMM	Fan	SATA 6.0GHz x 2	DVI-I, DVI-D	—	GbE x 2	USB2.0 x 8, USB3.0 x 4	1	1	PCI-E [x16] x1, Mini Card x1	ATX	0°C ~ 60°C

Optional Accessories

- **1759200172**
2U CPU Cooler (2-Ball, Screw with Retention Plate)
- **175921156B**
2U CPU Cooler (2-Ball, Push-pin Type)
- **1700190450**
USB3.0 Cable (450MM, p=2.54mm)
- **1709070800**
SATA Cable
- **1701100206**
COM Cable (200MM, p=2.00mm)
- **1709100201**
USB2.0 Cable (10P, 220MM, p=2.00mm)