

### Features

- 7th/6th Generation Intel® Xeon® E3 / Core™ i7 / i5 / i3 / Pentium® / Celeron® QC/DC processors, up to 4GHz
- 2x DDR4 SO-DIMM, Max. 32GB, ECC compatible
- Intel® Processor integrated graphics device, supports DVI-D, HDMI and DisplayPort
- Dual Intel® Gigabit LAN
- 2x USB 2.0, 6x USB 3.0, 4x COM, 4x SATAIII
- 2x Mini PCI-E slots, 1x mSATA, 1x PCI-E(x16)
- Watchdog timer, Digital I/O, iAMT (11.0), TPM (1.2), iSMART

### System

CPU Type	LGA1151 for 7th/6th Generation Intel® Xeon® / Core™ i7/i5/i3/ Pentium® / Celeron® QC/ DC processors, up to 4GHz
System Memory	2x DDR4 SO-DIMM, Max. 32GB (Supports ECC by CPU SKUs)
System Chipset	Intel® C236 / Q170 (MI991AF) / H110 PCH (MI991EF)
BIOS	AMI
Watchdog Timer	256 levels
SSD	1x mSATA
H/W Monitor	Yes
Expansion Slot	1x PCI-E(x16), 2x Mini PCI-E

### Graphics

VGA Controller	6th Generation Intel® Xeon® / Core™ i7/i5/i3/ Pentium® processor Integrated
VGA Memory	Max. Shared memory – 1024MB
Display Interface	Supports DVI-D, HDMI and DisplayPort

### LAN

Controller	MI991AF: Intel® I219LM Gigabit LAN PHY MI991EF: Intel® I219V Gigabit LAN PHY Intel® I211AT PCI-E Gigabit LAN( as 2nd LAN)
Connector	RJ-45 on board

### Multi I/O

I/O Chipset	Fintek F81846D-I 3x RS232, 1x RS232/422/485(jumperless selection), 4x SATAIII (MI991AF) or 3x SATAIII (MI991EF)
USB	USB 3.0: 6 ports on board (MI991AF), 4 ports on board (MI991EF) USB 2.0: 2 ports on board (MI991EF), 2 ports via pin-header
Audio	Intel® C236/ Q170/ H110 PCH built-in HD audio + Realtek ALC662 codec
Others	Digital I/O(4-in/4-out), EuP/ErP, RAID, TPM(1.2), iAMT(11.0), iSMART

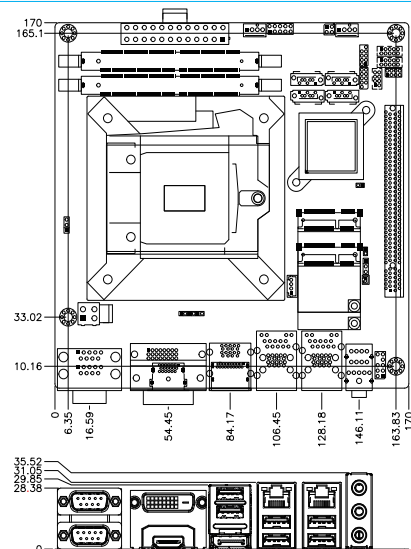
### Mechanical and Environmental

Dimensions	170mm x 170mm (6.7" x 6.7")
Max. Power Requirement	Intel® Core™ I5-6500TE 2.3GHz w/ 2x DDR4-2133 4GB +12V: 3.56A; +5V: 1.28A; +5VSB: 0.08A; +3.3V: 0.32A
Operating Temperature	0°C~60°C (32°F~140°F)
Storage Temperature	-20°C~80°C (-4°F~176°F)
Relative Humidity	90% (non-condensing @60°C)

### Ordering Information

MI991AF-C236	LGA1151 C236 Mini-ITX motherboard w/ DVI-D, HDMI, DisplayPort, dual Gigabit LAN, RAID, iAMT (11.0), TPM (1.2), iSMART 3.0
MI991AF	LGA1151 Q170 Mini-ITX motherboard w/ DVI-D, HDMI, DisplayPort, dual Gigabit LAN, RAID, iAMT (11.0), TPM (1.2), iSMART 3.0
MI991EF	LGA1151 H110 Mini-ITX motherboard w/ DVI-D, HDMI, DisplayPort, dual Gigabit LAN, EuP/ErP, iSMART 3.0

### Dimensions and Drawing



Remarks: 1. Specifications are subject to change without prior notice. 2. ODM/OEM-is available. 3. For user's manual & datasheet download, visit www.ibase.com.tw.

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