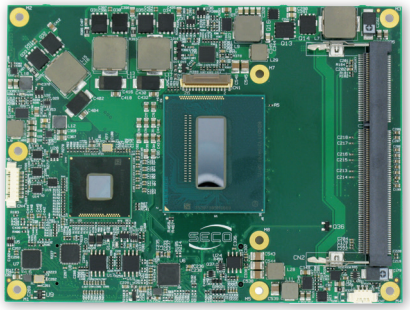
COM Express® Type 6

ECHO

COM Express® Basic Type 6 Module with Intel® Haswell Processors

High performance for any design in a scalable form factor



AI-ENABLED WITH CLEA

HIGHLIGHTS

- **CPU**: Intel® Haswell family CPUs
- **CONNECTIVITY**: 4x USB 3.0; 8x USB 2.0; 7x PCI-e x1
- **GRAPHICS**: Integrated Intel® HD Graphics 4600
- **MEMORY**: Up to 16GB DDR3L-1600 on two SO-DIMM slots

COM Express · PICMG · intel partner Gold

Windows 7 · Windows 8 · Windows 8.1 · Windows 10 · Windows IoT · Windows Embedded Standard 7 · Linux

MAIN FIELDS OF APPLICATION

- Biomedical/ Medical devices
- Digital Signage - Infotainment
- HMI
- Gaming

FEATURES

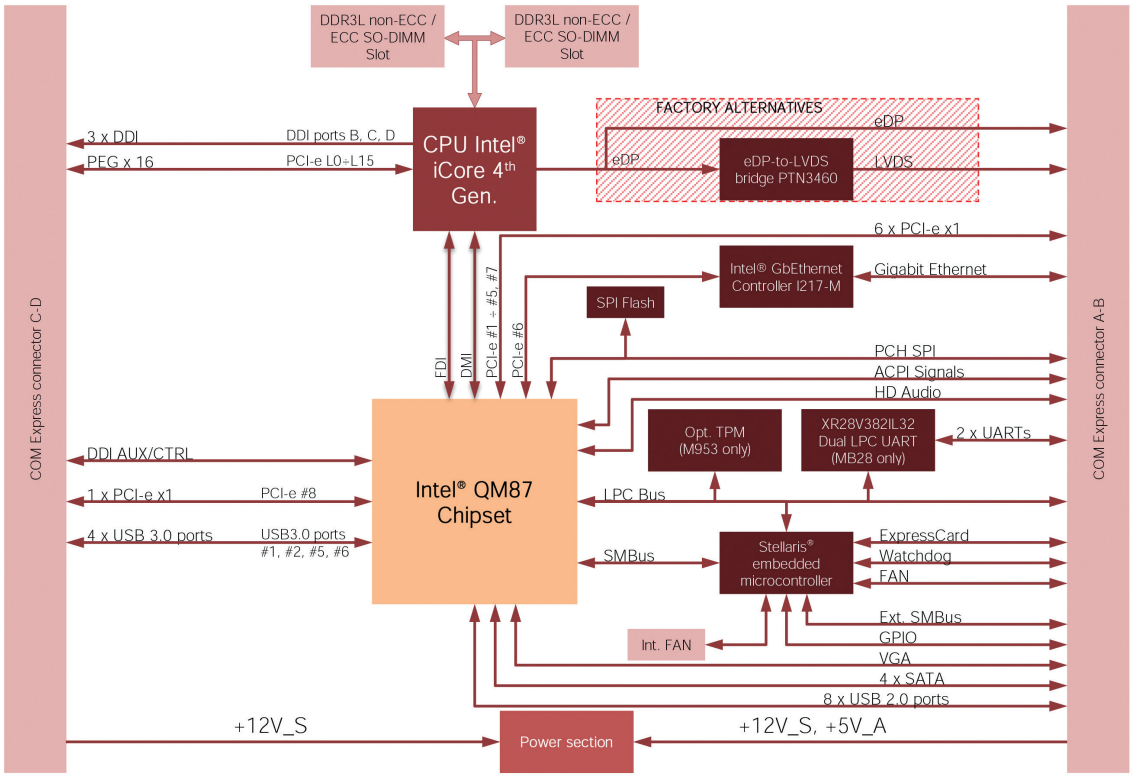
Processor	Intel® Core™ **i3-4100E**, Dual Core with HT @ 2.4GHz, 3MB Cache, 37W TDP Intel® Core™ **i3-4102E**, Dual Core with HT @ 1.6GHz, 3MB Cache, 25W TDP Intel® Core™ **i5-4400E** Dual Core with HT @ 2.7GHz, 3MB Cache, 37W TDP Intel® Core™ **i5-4402E** Dual Core with HT @ 1.6GHz, 3MB Cache, 25W TDP Intel® Core™ **i7-4700EQ** Quad Core with HT @ 2.4GHz, 6MB Cache, 47W TDP Intel® Celeron® **2002E** Dual Core @1.5GHz, 2MB Cache, 25W TDP Intel® Celeron® **2000E** Dual Core @2.2GHz, 2MB Cache, 37W TDP
Max Cores	4
Chipset	Intel® QM87 Chipset
Memory	Up to 16GB 1.35V DDR3L-1600 on two SO-DIMM slots, supporting Dual-Channel M953 modules support non-ECC SO-DIMMs only, MB28 modules support ECC modules only
Graphics	Integrated Intel® HD Graphics Up to 3 independent displays supported DirectX® 11, OpenGL4.0 supported
Video Interfaces	3 x HDMI / DVI / Multimode Display Port interfaces embedded Display Port **or** 18 / 24 bit single / dual channel LVDS interface CRT interface PCI Express Graphics (PEG) x 16 interface
Video Resolution	CRT Interface: up to 1920 x 1200 @ 60Hz HDMI: up to 4096x2304 @ 24Hz / 2560x1600 @ 60Hz DVI: up to 1920x1200 @ 60Hz Display Port: up to 3840 x 2160 @ 60Hz LVDS, eDP: up to 1920 x 1200 @ 60Hz
Mass Storage	4 x external SATA channels
Networking	Gigabit Ethernet interface Supports remote management (Intel® AMT Technology)

USB	8 x USB 2.0 Host ports 4 x USB 3.0 Host ports
PCI-e	7 x PCI-e x1 lanes (configurable as 1 PCI-e x4 + 3 PCI-e x1)
Audio	HD Audio interface
Serial Ports	2 x serial ports (Tx/Rx only, TTL interface) (MB28 module only)
Other Interfaces	2 x Express Card interfaces I2C Bus LPC Bus SM Bus 4 x GPI, 4 x GPO Thermal / FAN management Watch Dog timer Optional TPM on-board (M953 modules only) Power Management Signals
Power Supply	+12V_{DC} ± 10% and + 5V_{SB} (optional)
Operating System	Microsoft® Windows 7 (32/64 bit) Microsoft® Windows 8 (32/64 bit) Microsoft® Windows 8.1 (32/64 bit) Microsoft® Windows 10 (32/64 bit) Microsoft® Windows 10 IoT Microsoft® Windows Embedded Standard 7 (32/64 bit) Linux
Operating Temperature*	0°C ÷ +60°C (Commercial version)
Dimensions	125 x 95 mm (4.92" x 3.74")

*Measured at any point of SECO standard heatspreader for this product, during any and all times (including start-up). Actual temperature will widely depend on application, enclosure and/or environment. Upon customer to consider application-specific cooling solutions for the final system to keep the heatspreader temperature in the range indicated.

Information subject to change. Please visit www.edge.seco.com to find the latest version of this datasheet

BLOCK DIAGRAM



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