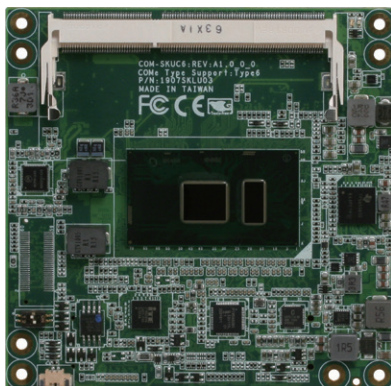


06 COM-KBUC6

COM Express Type 6 Compact Size with 7th Gen. Intel® Core™ U Processors

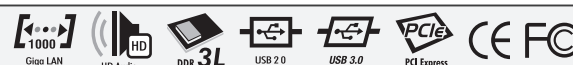


Features

- Intel® Core™ i7-7600U Processors
- DDR3L Socket x1, up to 8 GB, non-ECC
- Gigabit Ethernet x 1
- VGA, LVDS 24b 2ch, DDI display Support x 1 (up to 2)
- SATA x 3, USB2.0 x 8, USB 3.0 x 2, GPIO x 8b
- PCIe[x1] x5 Devices
- COM Express Type 6, Compact Size, 95mm x 95mm

Specifications

System	
Form Factor	COM Express, Compact Module, Pin-out Type 6
CPU	Onboard 7th Generation Intel® Core™ U-series Processor, BGA type
CPU Frequency	up to i7-7600U - 2C/4T 2.8GHz
Chipset	Onboard 7th Generation Intel® Core™ SoC
Memory Type	DDR3L 1600 SO-DIMM x1, non-ECC
Max. Memory Capacity	8GB
BIOS	AMI BIOS
Wake on LAN	Yes
Watchdog Timer	255 Levels
Power Requirement	Nominal: +12V
Power Supply Type	AT/ ATX
Power Consumption (Typical)	1.3A @ 12V, i7 sku 100% loading
Dimension (L x W)	3.74" x 3.75" (95mm x 95mm)
Operating Temperature	32 °F ~ 140 °F (0 °C ~ 60 °C) -40 °F ~ 185 °F (-40°C ~ 85°C) for WITAS 2
Storage Temperature	-40°F ~ 176°F (-40°C ~ 80°C)
Operating Humidity	0% ~ 90% relative humidity, non-condensing
MTBF (Hours)	80,000
Certification	CE/FCC
Display	
VGA/LCD Controller	GT2-520/510
Video Output	CRT, 2ch LVDS/eDP, default 1x DDI
I/O	
Ethernet	Intel® 219LM, Gigabit Ethernet
Audio	High definition audio
USB Port	USB 2.0 x 8, USB 3.0 x 4
Serial Port	TX/RX x 2
HDD Interface	SATA 3.0 x 3
Onboard SSD	—
Expansion Slot	PCI-Express [x1] x 5 default. upto 8 lanes LPC bus x1, SMBus x 1
DIO	GPIO 8-bit
TPM	Optional



Packing List

- M2.5 Screw x 4
- Product CD
- COM-KBUC6

Optional Accessories

- **ECB-920A-A10-0001**
COM Express Type 1/6/10 Carrier Board, Gigabit Ethernet, USB, 2 COM, 4 SATA, PCIe, AT/ATX, Legacy Free, Rev. A1.0
- **COM-FAN02**
CPU Cooler, 95 x 95 x 26.5mm, Silver, use with HSP
- **COM-KBUC6-HSP01**
Heat Spreader, For COM-KBUC6, Onboard CPU

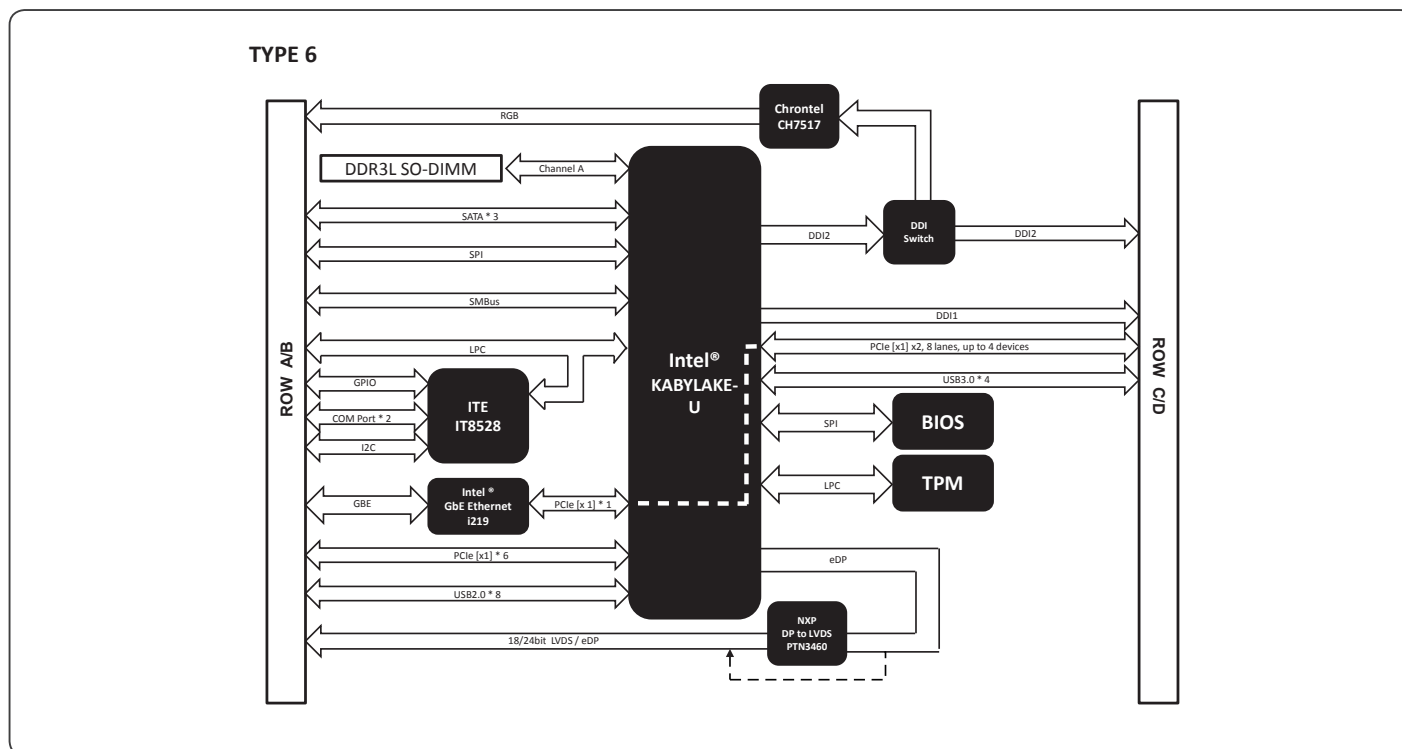
HSIO Configurable Options

PICMG PCIe No.	Config 1 (Default)	Config 2 (Custom BIOS need)
PCIe#0	PCIe[x1]	PCIe[x4]
PCIe#1	PCIe[x1]	PCIe[x4]
PCIe#2	PCIe[x1]	PCIe[x4]
PCIe#3	PCIe[x1]	PCIe[x4]
PCIe#4	PCIe[x1]	PCIe[x1]
PCIe#5	x	PCIe[x1]
PCIe#6	x	PCIe[x1]
PCIe#7	x	PCIe[x1]
GbE	GbE	GbE
SATA#0	SATA#0	SATA#0
SATA#1	SATA#1	SATA#1
SATA#2	SATA#2	SATA#2
Remark	6 PCIe Devices 9 PCIe Lanes	6 PCIe Devices 12 PCIe Lanes

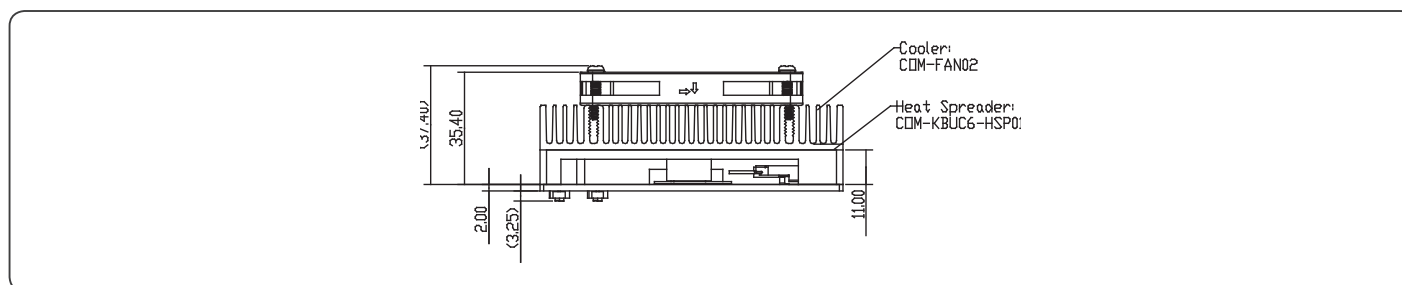
*Only a maximum of 6 PCIe port or (Devices) or 12 PCIe Lanes can be enabled at any time

**SATA#2 default disable, and only functional with i5/i7

Block Diagram Unit: mm



Dimension Unit: mm



Ordering Information

Part Number	COM Express Type	CPU	Memory	Display	LVDS	Storage	LAN	USB	UART	Expansion Slot	Power	Working Temp	Others
COM-KBUC6-A10-0001	6 (COM.0 Rev 3.0)	7th Gen. Intel® Core™ i7-7600U 2c/2.8GHz	DDR3L Socket, up to 8GB	CRT, LVDS/eDP, DDI x1 (upto 2)	18/24b 2CH (LVDS share with eDP)	SATA x2 (3rd disable in default)	GbE x1	USB3.0 x 4 USB2.0 x 8	2 (Tx/Rx)	PCI-E[x1] x5 (up to 8)	12V	0°C ~ 60°C	LPC, GPIO 8Bit, HDA, I2C, SMBus

CPU Support Chart

CPU	Base Frequency/ Turbo Boost GHz	Core/ Thread	Last level Cache	TDP	Graphic
i7-7600U	2.8/3.9	2/4	4M	15W	GT2 - 520
i5-7300U	2.6/3.5	2/4	3M	15W	GT2 - 520
i3-7100U	2.4	2/4	3M	15W	GT2 - 520
C-3965U	2.2	2/2	2M	15W	GT1 - 510