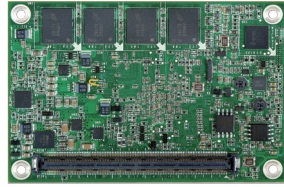
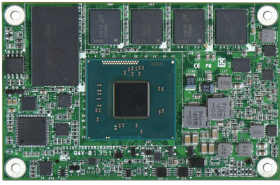


PCOM-BA00

Intel® Atom® E3800 series SoC based on Type 10 Mini COM-Express® module with DDR3L SDRAM, NANDrive and USB 3.0



FEATURES

- Intel® Atom® Processor E3800 Series (Bay Trail)
- On Board DD3L SDRAM up to 4GB, On Board SSD up to 64GB
- Low Power Consumption (3 to 10W)
- Supports Wide Operating Temperature and Wide Voltage
- Support VGA, LVDS, DP, eDP and USB 3.0



PCOM-BA00, a Type 10 Mini COM Express® (84 x 55 mm) module which based on Intel® Bay Trail Atom® E3800 series SoC. In this architecture, it could provide VGA, LVDS, eDP and DP multiple displays, and expandability I/O interfaces, including 3 x PCIe 2.0 x 1, 1 x USB 3.0, 4 x USB 2.0, 2 serial ports and 2 x SATA II devices. With ultra low power consumption(3 to 10W), wide-temp support, it could provide very energy saving and high effective performance. Portwell want to promotes PCOM-BA00 as vertical solution to aim in the different versatile applications.

General

Product	PCOM-BA00				
Form Factor	Type 10, Mini Form Factor COM-Express® (84 x 55 mm)				
Processor	Intel®				
	E3845	E3827	E3825	E3815	E3805
Core	4	2	2	1	2
Freq.	1.91 GHz	1.75 GHz	1.33 GHz	1.46 GHz	1.33 GHz
Turbo	N/A				
Cache	2MB	1MB	1MB	512KB	1MB
Processor Graphics	Intel® HD Graphics for Intel Atom® Processor Z3700 Series, not Include E3805				N/A
Graphics Base Frequency	542 MHz	542 MHz	533 MHz	400 MHz	533 MHz
Graphics Max Dynamic Frequency	792 MHz	792 MHz	533 MHz	400 MHz	533 MHz
HW Encoding	H.264 and MPEG2				
HW Decoding	H.264, MPEG2, MVC, VC-1, WMV9, JPEG/MKPEG, VP8				
HW Acceleration	Gen7LP, DirectX 11, OpenGL 3.2, OpenCL 1.2, OGL ES Halti/2.0/1.1				
Processor TDP	10W	8W	6W	5W	3W
BIOS	AMI BIOS				
ECC Memory Supported	YES				
Memory	On board DDR3L SDRAM up to 4GB 1333 MT/s				

I/O Interface

SATA	2x SATA II		
USB	1 x USB 3.0 4 x USB 2.0		
Ethernet	Intel® Ethernet Controller I210T		
Serial I/O	GPIO	8 GPIO	
	I ² C	Baud Rate: 400KHz	
	SMBus	Baud Rate: 100KHz	
	UART	2 Serial Port (Tx/Rx)	
PEG	N/A		
PCI Express	3 x PCIe 2.0 x 1 (Option 4 x PCIe 2.0 x1)		
Display	Default	Options	Resolution
	DP	DP	up to 2560x 1600 @ 60Hz
		VGA	up to 2560x 1600 @ 60Hz
		HDMI	up to 1920x 1080 @ 60Hz
	eDP	eDP	up to 2560x 1600 @ 60Hz
LVDS(24bit, dual channel)		up to 1920x 1200 @ 60Hz	
Security	Intel® AES		

MECHANICAL & ENVIRONMENT

Dimension	84 x 55 mm
Power DC IN	+4.75VDC to +20VDC, AT/ATX Mode
Storage Temperature	-40°C to 80°C
Operation Temperature	-40°C to 80°C
Certification	Contact us
MTBF	Over 120,000 hours at 40°C
Vibration	Contact us
OS	Windows 7, WEST7/8, Embedded Compact7 Linux Fedora/Tizen/Yocto RTOS Windriver

ORDERING GUIDE

Product	Ordering P/N	Status
PCOM-BA00-E3845-2G	AB1-3B51	Available
PCOM-BA00-E3827-2G	AB1-3B50	Available
PCOM-BA00-E3825-2G	AB1-3B47	Available
PCOM-BA00-E3815-2G	AB1-3B49	Available
PCOM-BA00-E3805-2G	AB1-3C19	Available
PCOM-BA00-E3845-4G	AB1-3B48	Available

Accessory	Ordering P/N	Status
Heat Spreader	B8306940	Available
PCOM-CA00 (uATX Carrier Board)	AB1-3917	Available

BLOCK DIAGRAM

PCOM-BA00

