



## EMX-KBLU2P

6th/7th Gen Intel® Core™ SoC i7/i5/i3 & Celeron® BGA Onboard Processor Thin Mini ITX Motherboard

- > Onboard 6th/7th Gen. Intel® Core™ SoC i7/i5/i3 & Celeron® BGA Processor
- > 2 x 260-pin DDR4 2133 MHz SO-DIMM supports up to 32GB
- > 1x DP++, 1x HDMI/DP, 2CH LVDS/co-lay eDP
- > 1 x Intel® I211AT PCIe Gigabit Ethernet, 1 x Intel® I219LM Gigabit Ethernet PHY
- > Realtek ALC892 Audio Codec, TI TPA3113D2PWP Stereo Class-D 6W x 2 Audio Amplifier
- > 1 x M.2 Type B 3042/2242/2260/2280, 1 x M.2 Type A 2230 support WiFi module
- > 2 x SATA III, 2 x SATA Power, 4 x USB 2.0, 4 x USB 3.0
- > 4 x RS232, 2 x RS232/422/485, 16-bit GPIO
- > Mic-in, Line-out, 1 S/PDIF

### Spec

System	
<b>System Memory</b>	2 x 260-pin DDR4 2133 MHz SO-DIMM supports up to 32GB
<b>I/O Chip</b>	EC ITE IT8528E
<b>BIOS</b>	AMI 128Mbit SPI BIOS
<b>Watchdog Timer</b>	H/W Reset: 1sec. ~ 65535sec./min. and 1sec. or 1min./step
<b>H/W Status Monitor</b>	Monitoring System Temperature and Voltage with Auto Throttling Control
<b>TPM</b>	1 x onboard TPM2.0 & TPM1.2 (optional)
Expansion	
<b>Expansion</b>	1 x M.2 Key B 3042/2242/2260/2280 (with 2 x PCIe x 1 (default) or 1 x PCIe x 2 (By OEM BIOS ME SET), USB 2.0, SATA Signal) with 1 x SIM card slot, support WWAN+GNSS or SSD, 1 x M.2 Key A 2230 support WiFi module, 1 x PCIe x 1, USB 2.0 Signal) 1 x PCIe x 1
I/O	
<b>USB</b>	4 x USB 2.0 4 x USB 3.0
<b>SATA</b>	2 x SATA Power 2 x SATA III
<b>COM Port</b>	4 x RS232 2 x RS232/422/485
<b>DIO</b>	1 x 16-bit GPIO
<b>Other</b>	1 x S/PDIF
Display	
<b>Chipset</b>	Intel® Processor Graphics
<b>Resolution</b>	1 x HDMI 1.4b: 3840 x 2160 @ 30 Hz, 2560 x 1600 @ 30 Hz 2 x DP; DisplayPort 1.2a : 4096x2160 @ 60Hz (1 x HDMI/DP, 1 x DP++) 2CH 18/24bits LVDS 1920 x 1080 (Chrontel. CH7511B eDP to LVDS Converter) Co-lay eDP 1.3: 4096x2160 BOM optional
<b>LVDS</b>	2CH 18/24bits LVDS 1920 x 1080 Chrontel. CH7511B eDP to LVDS Converter
<b>Multiple Display</b>	Triple Display
Audio	
<b>Chipset</b>	Realtek ALC892 supports 2-CH
<b>Audio Interface</b>	Mic-in, Line-out
<b>Audio Amplifier</b>	2 x Stereo Class-D 6W Audio Amplifier
Ethernet	
<b>Chipset</b>	1 x Intel® I219LM Gigabit Ethernet PHY 1 x Intel® I211AT PCIe Gigabit Ethernet
<b>Ethernet Interface</b>	10/100/1000 Base-Tx GbE compatible
<b>LAN Port</b>	2 x RJ45
Mechanical & Environmental	
<b>Power Requirement</b>	+12V~24V
<b>Power Type</b>	AT/ATX
<b>Operating Temperature</b>	-20~ 70°C (-68 ~ 158°F), with heatsink, under 0.5 m/s air flow speed testing
<b>Storage Temperature</b>	-40 ~ 75°C (-40 ~ 167°F)
<b>Operating Humidity</b>	0 ~ 90% Relative Humidity, Non-condensing
<b>Dimension (L x W)</b>	6.69" x 6.69" (170mm x 170mm)
<b>Weight</b>	0.88lbs (0.4Kgs)

### Ordering

6th/7th Gen Intel® Core™ SoC i7/i5/i3 & Celeron®  
BGA Onboard Processor Thin Mini ITX Motherboard  
EMX-KBLU2P-395-A1R  
EMX-KBLU2P-610-A1R  
EMX-KBLU2P-630-A1R  
EMX-KBLU2P-660-A1R  
EMX-KBLU2P-730-A1R  
EMX-KBLU2P-760-A1R



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### US

[sales@assured-systems.com](mailto:sales@assured-systems.com)

Sales: +1 347 719 4508  
Support: +1 347 719 4508

1309 Coffeen Ave  
Ste 1200  
Sheridan  
WY 82801  
USA

### EMEA

[sales@assured-systems.com](mailto:sales@assured-systems.com)

Sales: +44 (0)1785 879 050  
Support: +44 (0)1785 879 050

Unit A5 Douglas Park  
Stone Business Park  
Stone  
ST15 0YJ  
United Kingdom

VAT Number: 120 9546 28  
Business Registration Number: 07699660