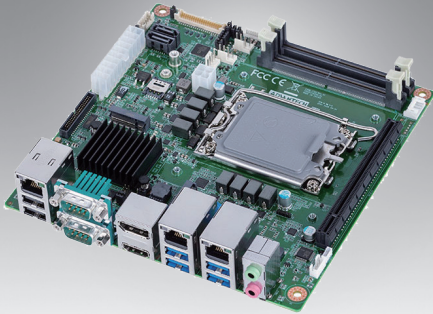


# M/B offering for PPC-600

## PPC-MB-620

NEW



### Features

- Supports Intel® 12th Gen Core™ i processor (LGA1700) with Intel Q670E/H610E chipset
- Two 262-pin SO-DIMM up to 64GB DDR5 4800 MHz SDRAM
- Supports triple display of DP/HDMI/LVDS
- Supports PCIe x16 (Gen 5), 1 x M.2 M key & 1 M.2 E key, 6 USB 3.2
- Supports 2 x SATA 3.0 (Raid 0, 1) (only for PCH Q670E)
- Supports TPM 2.0
- Supports 4 RS-232, 1 RS-232/422/485
- Supports 1 GPIO(8 channels)

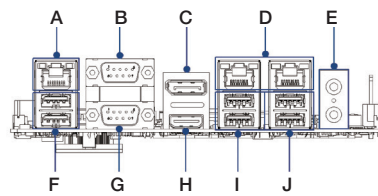
### Specifications

<b>Processor System</b>	<b>CPU</b>	i9-12900E/i9-12900TE	i7-12700E/i7-12700TE	i5-12500E/i5-12500TE	i3-12100E/i3-12100TE	G7400E/G7400TE	G6900E/G6900TE	
	<b>Core Number</b>	16/16	12/12	6/6	4/4	2/2	2/2	
	<b>Max Speed</b>	2.3GHz (Up to 5.0GHz)/ 1.1GHz (Up to 4.8GHz)	2.1GHz (Up to 4.8GHz)/ 1.4GHz (Up to 4.6GHz)	2.9GHz (Up to 4.5GHz)/ 1.9GHz (Up to 4.3GHz)	3.2GHz (Up to 4.2GHz)/ 2.1GHz (Up to 4.0GHz)	3.6GHz/ 3.0GHz	3.0GHz/ 2.4GHz	2.4GHz
	<b>SmartCache</b>	30/30MB	25/25MB	18/18MB	12/12MB	6/6MB	4/4MB	4/4MB
	<b>TDP</b>	65W/35W	65W/35W	65W/35W	60W/35W	46W/35W	46W/35W	46W/35W
<b>Memory</b>	2 x 262-pin SODIMM DDR5 , 4800 MHz , up to 64 GB ( non-ECC )							
<b>Chipset</b>	Q670E				H610E			
<b>Ethernet</b>	<b>Controller</b>	LAN1: 1Gb Intel i219LM (support AMT 16.0 only for i7 & i5) LAN2: 2.5Gb Intel i226-LM			LAN1: 1Gb Intel i219LM LAN2: 2.5Gb Intel i226-LM LAN3: 2.5Gb Intel i226-LM			
	<b>Connector</b>	RJ45 x2			RJ45 x3			
<b>Rear I/O</b>	<b>USB</b>	6 (USB 3.2 Gen 2)			6 (2 x USB 3.2 Gen 2, 2 x USB 3.2 Gen 1, 2 x USB 2.0)			
	<b>Ethernet</b>	2			3			
	<b>Display Port</b>	1						
	<b>HDMI</b>	1						
	<b>Audio</b>	2 (Mic-in, Line-out)						
<b>Internal Connector</b>	<b>Serial</b>	2 (1 x RS-232/422/485, 1 x RS-232)						
	<b>USB</b>	3 x USB 2.0			1 x USB 2.0			
	<b>SATA</b>	2 x SATA 3.0 ( support RAID 0,1)			2 x SATA 3.0			
	<b>Serial</b>	3 x RS-232						
	<b>TPM</b>	1						
<b>Expansion Slot</b>	<b>GPIO</b>	8-bit						
	<b>M.2</b>	1 x slot (2280 M key) for storage(SATA & PCIe*4); 1 x slot (2230 E key) for wireless (PCIe & USB2.0)						
	<b>PCIe x16 (Gen5)</b>	1 x slot (3042 & 3052 B key) support PCIe&USB3.1&USB2.0				1 x slot (3042 & 3052 B key) support PCIe & USB2.0		
<b>Watchdog Timer</b>	255 timer intervals , configurable using software							
<b>Dimensions</b>	170 mm x 170 mm (6.69 x 6.69)							
<b>OS Support</b>	Microsoft® Win 10 IOT LTSC(64-bit)/Win 11, Linux							

### Ordering Information

Part Number	Description
PPC-MB-620A	12th Core i M/B, H610E, 3 x LAN
PPC-MB-620B	12th Core i M/B, Q670E, 2 x LAN

### I/O view



- A. Gigabit Ethernet\*
- B. RS232
- C. Display Port
- D. 2 x Gigabit Ethernet
- E. Line-out/Mic-in
- F. 2 x USB
- G. RS232/422/485
- H. HDMI
- I. 2 x USB 3.2
- J. 2 x USB 3.2\*\*

Note: \* Gigabit Ethernet only for PPC-MB-620A (H610E)  
 \*\* 2 x USB3.2 Gen1 for PPC-MB-620A (H610E)  
 2 x USB3.2 Gen2 for PPC-MB-620B (Q670E)