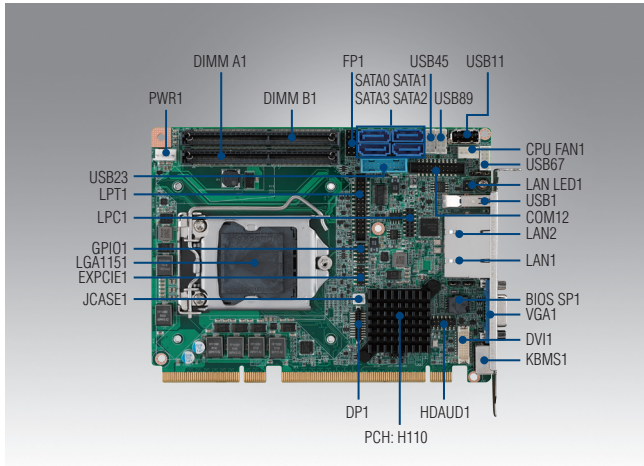


# PCE-3029

**LGA 1151 6th and 7th Gen Intel® Core™ i7/i5/i3 Half-size SHB with PCIe 3.0/ Dual Independent Display/Dual GbE LAN/ SATA III/m-SATA/ USB 3.0**



CE FCC

## Features

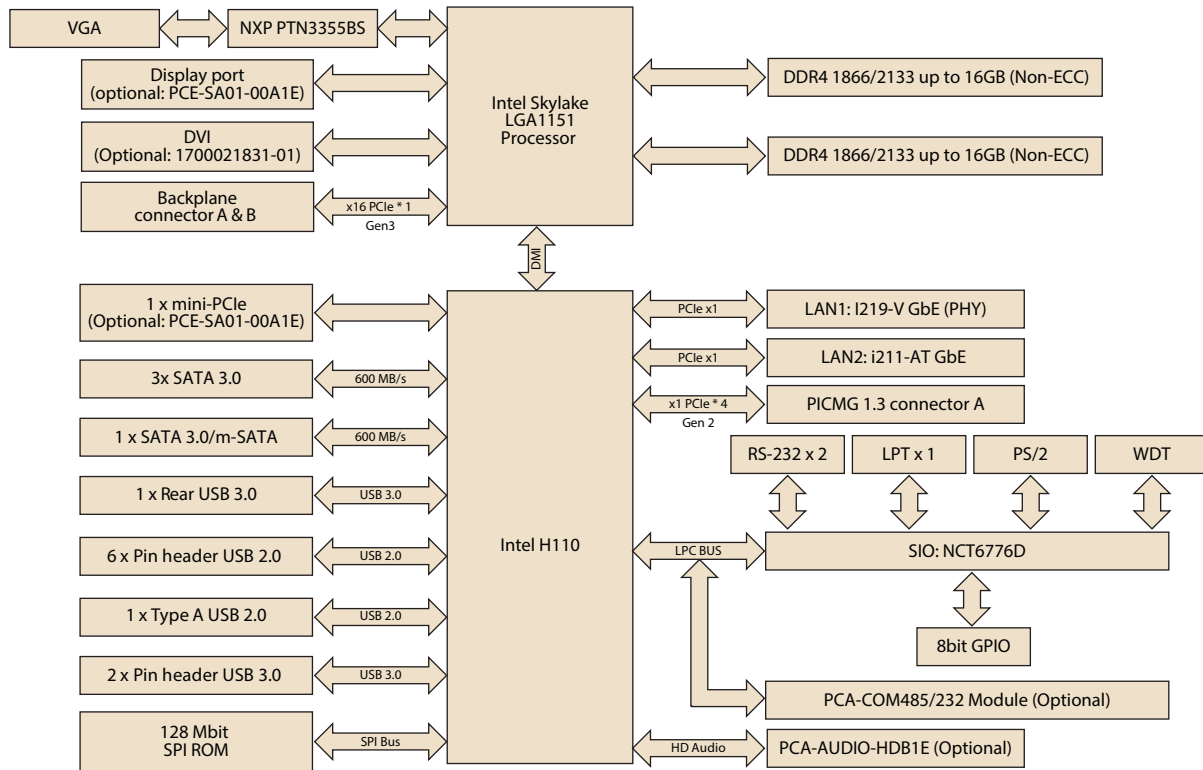
- Complies with PICMG 1.3
- Supports Intel® Core™ i7/i5/i3/Celeron®/Pentium® processor with H110 chipset
- Dual Channel (Non-ECC) DDR4 1866/2133 up to 32 GB
- Supports USB 3.0, SATA III, PCIe 3.0
- Supports CRT and DVI-D/DP (optional) display
- Supports Advantech TPM module (optional)
- Supports SUSIAccess and embedded software APIs

Note: Intel 7th generation processor only support Windows 10 (64-bit)

## Specifications

		i7-7700	i7-7700T	i7-6700	i7-6700TE	i5-7500	i5-7500T	i5-6500	i5-6500TE	i3-7101E	i3-7101TE	i3-6100	i3-6100TE	G4400	G4400TE	G3900	G3900TE	
Processor System	CPU	i7-7700	i7-7700T	i7-6700	i7-6700TE	i5-7500	i5-7500T	i5-6500	i5-6500TE	i3-7101E	i3-7101TE	i3-6100	i3-6100TE	G4400	G4400TE	G3900	G3900TE	
	Base Frequency	3.6 GHz	2.9 GHz	3.4 GHz	2.4 GHz	3.4 GHz	2.7 GHz	3.2 GHz	2.3 GHz	3.9 GHz	3.4 GHz	3.7 GHz	2.7 GHz	3.3 GHz	2.9 GHz	2.8 GHz	2.6 GHz	
	L3 Cache	8 MB	8 MB	8 MB	8 MB	6 MB	6 MB	6 MB	6 MB	3 MB	3MB	4 MB	4 MB	3 MB	3 MB	2 MB	2 MB	
	SKU/Chipset	Intel H110																
	BIOS	AMI 128 Mbit SPI Flash																
Bus	PCI-Express	One x16 (Gen 3) plus four x1 (Gen 3) to backplane																
Memory	Technology	Dual channel (Non-ECC) DDR4 1866/2133 up to 32 GB																
	Max. Cap.	32 GB (16 GB per DIMM)																
	Socket	DDR4 260-pin SO-DIMM x2																
Graphics	Controller	Chipset integrated Intel HD Graphics																
	VRAM	Shared system memory is subject to OS																
	CRT	Supports resolution up to 1920 x 1200 pixel at 60Hz																
	Display Port	Supports resolution up to 4096 x 2304 pixel at 60Hz																
	DVI-D	Supports resolution up to 1920 x 1200 pixel at 60Hz																
	Dual Independent Display	VGA+ DVI-D/DP (Optional)																
Ethernet	Interface	10/100/1000 Mbps																
	Controller	LAN 1: Intel I219V LAN 2: Intel I211AT																
	Connector with LED	RJ-45 x 2																
Rear I/O	USB 3.0	1																
	Ethernet	2																
	VGA	1																
	PS/2	1 (PS/2 Y cable supports 1 x keyboard and 1 x mouse)																
		USB	7 USB 2.0 (Pin-header *6 + USB Type A *1); 2 USB 3.0 (Pin header)															
Internal Connector	SATA/m-SATA	SATA III x4 (600MB/sec) or SATA III x3 (600MB/sec)+m-SATA x1																
	mini-PCIe	(Optional: PCE-SA01-00A1E, PCIe Gen 2.0)																
	DVI-D	1																
	DP	1																
	COM	2 (RS-232)																
	Parallel	1 (SPP/EPP)																
	GPIO	8 bits																
Watchdog Timer	Output	System reset																
	Interval	Programmable 1-255 sec																
Miscellaneous	Audio	Intel High Definition audio interface (required an audio extension module P/N: PCA-AUDIO-HDB1E)																
Power Requirement	Test Environment	Intel Core i7-6700 (3.4GHz), DDR4 2133 8GB *2																
	Voltage	12V	5V	3.3V	5VSB	-12V	-5V											
	Current	4.6	0.01	0.32	0.08	0	0											
Environment	Operating	0 ~ 60 °C (32~140 °F); Depends on CPU frequency and cooler solution											Non-operating					
	Temperature/Humidity	Operating humidity: 40 °C @ 85% RH Non-Condensing											-40 ~ 85 °C and 60 °C @ 95% RH Non-Condensing					
Physical	Dimensions (L x H)	167.64 x 126.39 mm (6.6" x 4.98")																

## Board Diagram



## Ordering Information

Part Number	PCH	Memory	Backplane	LAN	VGA	DVI-D	DP	COM	SATA III/ m-SATA	mini-PCIe	USB 2.0	USB 3.0	S/W RAID	AMT
PCE-3029G2-00A1E	H110	Non-ECC	PCE-3BXX	2	1	1*	1**	2 RS-232 4 RS-422/485 or 4 RS-232 (optional)***	4/0 3/1	1**	7	3	No	No

\* DVI-D cable (1700021831-01) is optional.

\*\* PCE-SA01-00A1E is required. PCE-SA01-00A1E is compatible with IPC-3026/IPC-6806S/ACP-4D00/ACP-4020, but not compatible with IPC-3012.

\*\*\*PCA-COM485-00A1E is required for additional 4 RS422/485; PCA-COM232-00A1E is required for additional 4 RS232.

## Optional Accessories

Part Number	Description
PCA-COM485-00A1E	4 x RS-422/485 module
PCA-COM232-00A1E	4 x RS-232 module
PCA-AUDIO-HDB1E	Audio module with Realtek ACL892
PCA-TPM-00A1E	TPM 1.2 module
PCA-TPM-00B1E	TPM 2.0 module
PCE-SA01-00A1E	IO extension module
1700021831-01	DP to DVI-D cable w/ BKT
1960052651N021	2U cooler for Intel Core i7-6700, i7-6700TE, i5-6500, i5-6500TE, i3-6100, i3-6100TE, G4400, G4400TE, G3900, G3900TE
1960053207N001	1.5U cooler for Intel Core i7-6700, i7-6700TE, i5-6500, i5-6500TE, i3-6100, i3-6100TE, G4400, G4400TE, G3900, G3900TE
1960053065N001	1U cooler for Intel Core i7-6700TE, i5-6500TE, i3-6100TE, G4400TE, G3900TE

## Packing List

Part Number	Description	Quantity
1700003194	Serial ATA HDD data cable	x1
1700022749-11	Serial ATA HDD power cable	x1
1700008762	2-port COM cable	x1
1700002223	1-port LPT cable	x1
1700060202	Keyboard and mouse Y-cable	x1
1700028292-01	2 ports USB 3.0 cable W/BKT	x1
1700014398-11	4-port USB cable kit	x1
1703040100	Power Converter	x1
9689000002	Jumper package	x1
2001302910	Startup manual	x1
2061302900	Utility CD	x1

## Bracket View



PCE-3029G2-00A1E