

APIX-TGL1

Intel® Tiger Lake-UP3 Series based Pico-ITX Embedded Board Supports Intel® 11th Gen Core™ i3/Celeron® Processors with Dual HDMI, LVDS, SATAIII, 2COM, 4USB, Intel® GbE LAN



Key Features

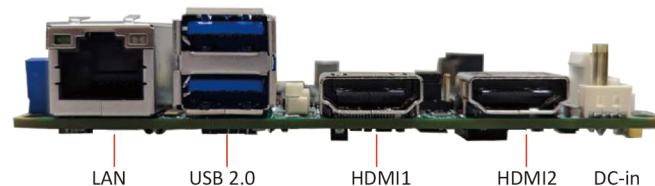
- Intel® Tiger Lake® Core-i®/Celeron series SoC on board
- One 260-pin SO-DIMM DDR4 up to 32G 4267MT/s SDRAM
- Multi-Display: Dual HDMI/LVDS
- One Intel® Gigabit Ethernet port
- 2 M.2 PCIe (1 M.2 B+M Key, 1 M.2 E Key) expansion slots
- 1 SATA III, 2 COM, 2 USB 3.2 and 2 USB 2.0
- Supports 4K/2K Resolution Display
- DC-in 12V, EuP/ErP 2013 Ready

Product Specification

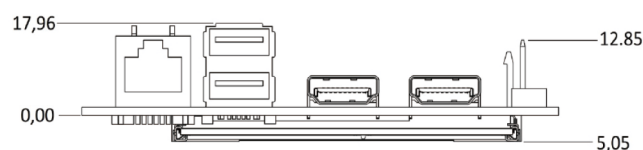
System Processor/Chipset	
Processor	Intel® 11th Generation Core™ i3/ Celeron® series processor on board Intel® Core™ i3-1115G4E 3.9GHz DC, 28W Intel® Celeron® 6305E 1.8GHz DC, 15W
Chipset	Intel® Tiger Lake-UP3 Processor integrated
BIOS	AMI UEFI Flash ROM
Memory	
Technology	DDR4 SDRAM up to 4267 MT/s
Max. capacity	Up to 32GB
Socket	1 x 260-pin SO-DIMM
Display	
Graphics	Intel® HD Gen.12-H/LP-HD Graphics
Display interface	2 x HDMI v1.4b 4K60Hz 1 x LVDS 2K60Hz (Dual channel 18/24-bit)
Multi-display	Up to three independent displays
Resolution	HDMI: 3840 x 2160 @ 60Hz (max) LVDS: 1920 x 1200 @ 60Hz (max)
Ethernet	
Interface	10/100/1000 Mbps
Controller	LAN: Intel® I219LM PCIe GbE LAN
Connector	1 x RJ45 LAN (rear I/O)
Audio	
Interface	Line-in, Line-out, Mic-in
CODEC	Realtek ALC888S HD Audio Codec
Expansion Slot	
AMIO	N/A
M.2 Expansion	1 x M.2 B+M Key 3042/2242 Slot (SATA, PCIe) 1 x M.2 E Key 2230 Slot
SATA	
Max. data transfer rate	6.0GB/s (SATAIII)
Port	1 x SATA III Port
I/O	
Audio	1 x 10Pin 1.0mm box-header
USB	2 x USB 3.2 (rear I/O) 2 x USB 2.0 (with 1.0mm box-header)
COM	COM1: RS-232/422/486 (box-header) COM2: RS-232 (combo 8bit GPIO, box-header)
HDMI/VGA/DVI/DP	2 x HDMI (rear I/O), 1 x LVDS (box-header)
DIO	1 x 8-bit (box-header combo with COM2)
SMBus	1 x SMBus (1 x4 pin box-header)
Power Requirement	
Power connector	AT/ATX 1x2-pin
Power type	DC-in 12V
Power mode	AT/ATX (by jumper selection)
Watchdog Timer	
Interval	Programmable 1~255 sec/min
Output	System reset

Environment	
Operating temperature	0°C ~ 60°C (32°F ~ 140°F) standard -20°C ~ 70°C (-4°F ~ 158°F) -40°C ~ 70°C (-40°F ~ 158°F) optional
Storage temperature	-40°C ~ 80°C (-4°F ~ 176°F)
Relative humidity	0% ~ 95% (non-condensing)
Form Factor	
Dimensions (L x W)	Pico-ITX (2.5") Embedded board 100mm x 72mm (3.94" x 2.84")

Rear I/O



Dimensions



Ordering Information

Part Number	Description
APIX-TGL1-1115	Pico-ITX, Intel i3-1115G4E 28W, 2HDMI/LVDS,SATA/2COM/4USB/ LAN,DC(12V)WF1X2P
APIX-TGL1-6305	Pico-ITX, Intel Celeron 6305E 15W, 2HDMI/LVDS, SATA/2COM/4USB/ LAN,DC(12V)WF1X2P

Optional Accessories

Part Number	Description
801302204501	SATA, Power cable
TBD	Heatsink w/o FAN
TBD	Heat Spreader

*All specifications and photos are subject to change without prior notice