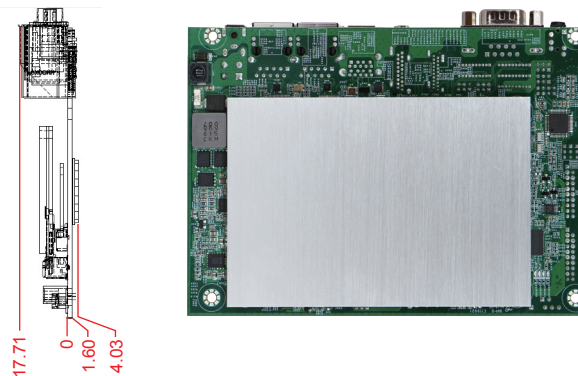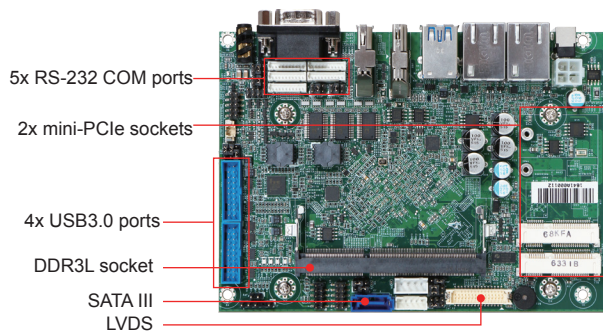# PEB-2773

Apollo Lake Atom® Processor based 3.5' embedded Board with DDR3L SDRAM, Gigabit Ethernet, 2x mini-PCIe sockets, 6x COM ports and 12~24V DC input
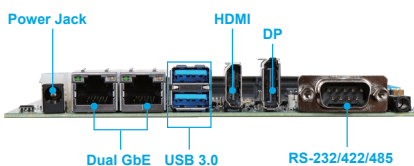
- 5x RS-232 COM ports
- 2x mini-PCIe sockets
- 4x USB3.0 ports
- DDR3L socket
- SATA III
- LVDS

17.71   0   1.60   4.03

PEB-2773 build with Intel® Atom® processor E3900 series. Not only does it operates with TDP under 12W for fan-less applications, but it also supports industrial temperature range from -40°C to 85°C and wide voltage of power input from 12V to 24V.

FEATURES

- Supports Intel® Apollo Lake series processor
- Supports DD3L-1866/1600 MT/s non-ECC SDRAM on one SO-DIMM slot, up to 8GB
- Supports Triple displays including DP, HDMI, and Dual channel 24bit LVDS
- Supports mini-PCIe / mSATA (2x mini-PCIe slots)
- Supports 6x COM ports(REAR IO support RS-232/422/485)

REAR/IO

Power Jack   HDMI   DP

Dual GbE   USB 3.0   RS-232/422/485

ORDERING GUIDE

AB1-3E83	(R).PEB-2773. Intel® Apollo Lake SoC on Board.EBC. w/DDR3L/DP/HDMI/GbE/COM/Audio/USB

PACKING LIST

One PEB-2773 Main board
One Installation CD
One SATA cable

GENERAL

Processor	Intel® Atom® Dual/Quad Core E3900 series Processor (up to 12W)
Chipset	N/A
BIOS	AMI UEFI BIOS
Memory	Support up to 8GB DDR3L 1333/1600/1866 MT/s SDRAM on one 204 pin SO-DIMM socket
Storage Devices	- 1x SATA III port - 1x mSATA socket(mini-PCIe)
Watchdog Timer	Programmable watchdog timer, time out period from 1 sec to 255 secs.
Hardware Monitoring	Temperature (CPU & System)
Expansion Interface	2x mini-PCIe sockets (Full size support mSATA / Half size support WiFi/BT)

I/O INTERFACE

Super I/O	N/A
Audio	- High Definition Audio integrated in Intel® SoC - Realtek ALC892 HDA codec - Audio jack on rear I/O with Line-in, Line-out, and Mic-in on board pin header
Ethernet	- Dual Intel® I210IT GbE controller - 2x RJ45 connectors on rear I/O
Serial Port	1x RS-232/422/485 with DP9 connector on REAR I/O(selected by bios)
USB	- 2x USB 3.0 ports on rear I/O - 4x USB 3.0 ports on board with pitch 3.0 header
GPIO	8-bit configurable controlled by embedded controller

DISPLAY

Graphic Controller	- Intel® Gen 9 Graphics supports DirectX 12, OpenGL® 4.2 / OpenCL® 2.0 - Video decode HW acceleration support for H.264, H.265, MPEG2, VC-1/WMV9, JPEG, VP8, and VP9
Display Interface	- LVDS: dual channel 24bit LVDS on board connector, up to 1920x1200 - HDMI: on board connector, up to 3840 x2160 - DP: on board connector, up to 4096x2160

Mechanical & Environment

Dimension	146mm(L) x 102(W) mm; 5.75"(L) x 4.02"(W)
Power Supply	DC 12-24V input
Environment	- Operation Temperature: -40°C~80°C - Storage Temperature: -40°C~80°C - Relative Humidity: 5%~95%, non-condensing
MTBF	Over 120,000 hours at 40°C

EC   SATA 3.0   AMI BIOS   LVDS   USB 3.0   HDMI   DP   USB 3.0   Watch DOG   Fanless   DDR 3   FC   CE   Microsoft® Windows® Embedded Partner   RoHS