



## ALF51 – 1.8” Pi Form Factor Motherboard with Intel® E3900 Series SoC

The ALF51 delivers performance and low power consumption in a credit card size form factor. Featuring Intel's® 15-year life cycle supported E3900 series SoC, this board is perfect for applications ranging from robotics to AI.

### SPECIFICATIONS

<b>CPU</b>	Intel® E3900 Series SoC processors
<b>BIOS</b>	Insyde SPI 128Mbit (supports UEFI boot only)
<b>Memory Type</b>	Onboard 2GB or 4GB LPDDR4 2400MHz
<b>Integrated Graphics</b>	Intel® HD Graphics
<b>TPM</b>	2.0
<b>Watchdog Timer</b>	System Reset, Programmable via Software from 1 to 255 Seconds
<b>Storage</b>	1 x 64GB eMMC onboard
<b>Video</b>	1 x mini DP++
<b>LAN Ports</b>	2 x Intel® I211AT GbE
<b>Extended Interface</b>	1 x Mini PCIe (full size)
<b>Internal I/O</b>	1 x RS232/422/485 (1.27 mm pitch), 1 x USB 2.0, 1 x 8-bit DIO, 1 x SMBus
<b>Rear I/O</b>	1 x LAN, 1 x USB 3.1 (Gen 1), 1 x mini DP++
<b>Additional Features</b>	OpenGL 4.2, Direct X 11.1, OpenCL 1.2, OGL ES 3.0; HW Decode: H.264, MPEG2, VC1, VP8, H.265, MPEG4; HW Encode: H.264, MPEG2, MPEG4
<b>Power Management</b>	12V +/- 10% DC via 2-pin Terminal Block
<b>Dimensions</b>	84mm x 55mm
<b>Operating Temperature</b>	32 ~ 140°F (0 ~ 60°C) OR -4 ~ 158°F (-20 ~ 70°C) OR -40 ~ 185°F (-40 ~ 85°C)
<b>Storage Temperature</b>	-40 ~ 185°F (-40 ~ 85°C)
<b>Relative Humidity</b>	10 ~ 90% (non-condensing)
<b>OS Software Supported</b>	Windows 10 IoT 64-bit, Linux
<b>Global P/N / SKU</b>	2809148

## Ordering Options

Standard Temperature, Extended Temperature and Wide Temperature options available. Please contact your sales representative for more information.