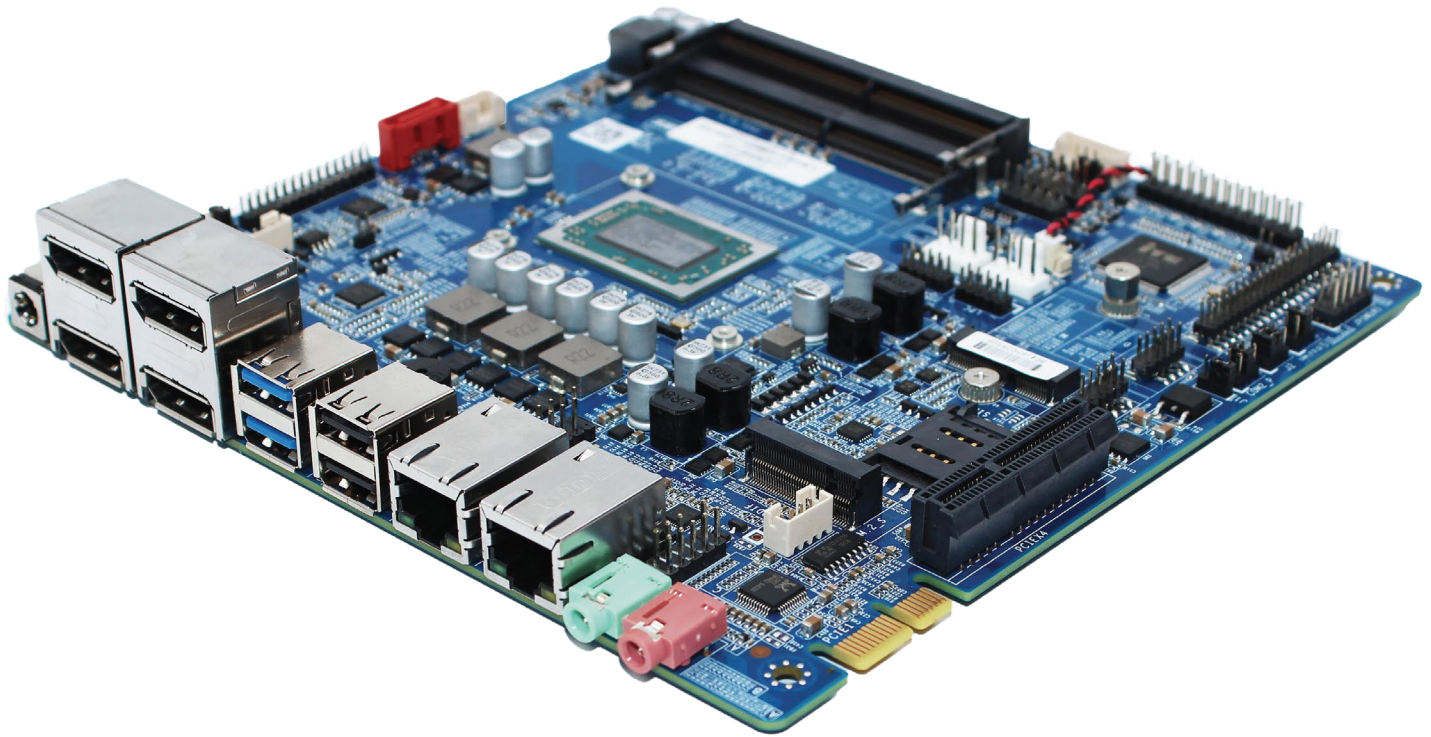


FP-10

AMD® Ryzen™ Quad Core Processor based Mini ITX Motherboard with 4 DisplayPort



Features

- CPU: Ryzen™ 5 2500U and Ryzen™ Embedded V1605B
- Memory: Dual channel SO-DIMM DDR4 up to 32 GB
- Display: Up to 4 DP displays (LVDS/eDP optional)
- Ethernet: 10/100/1000Mbps
- Storage: SATA3.0, M.2
- Expansion: PCIe 4X, PCIe1X, M.2 for WiFi
- Power: 12V DC input



Introduction

The FP10 mini-ITX embedded motherboard is based on the AMD Ryzen™ 2500U (quad-core) and V1605B (quad-core) and provides a complete PC platform with high performance.

Coming from the embedded V1000 processor family and mobile processor family, these CPUs combine the incredible performance of the pioneering “Zen” architecture and “Vega” GPU in a single chip with thermal design power (TDP) as low as 12W/15W. It supports four independent 4K display, in addition to dual-channel SO-DIMM DDR4 memory.

Features dual 1-Gigabit Ethernet controllers, and M.2 expansion for Wi-Fi and SSD modules, optional TPM for added security. Rich interfaces as 6 x USB2.0, 2 x USB3.2, 1 x Mic-in, 1 x Line-out and 2 x LAN, catering to most requirements in the market. The FP10 is an ideal solution for applications requiring a high-speed communication front-end like a mini-server or high-resolution display products like electronic gaming machines, medical imaging, interactive digital signage, thin clients, or PDS terminals.



H/W Monitor



Watchdog

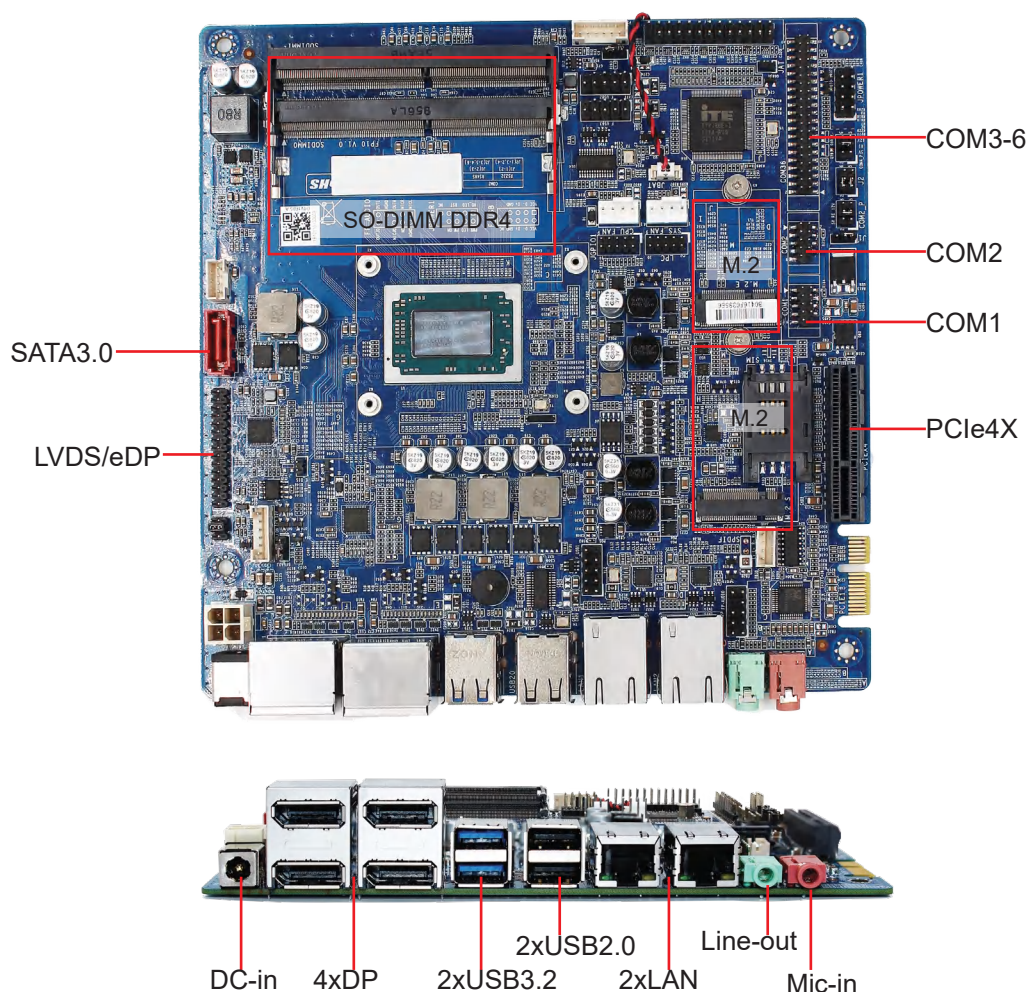


GPIO



Brightness

I/O Interfaces

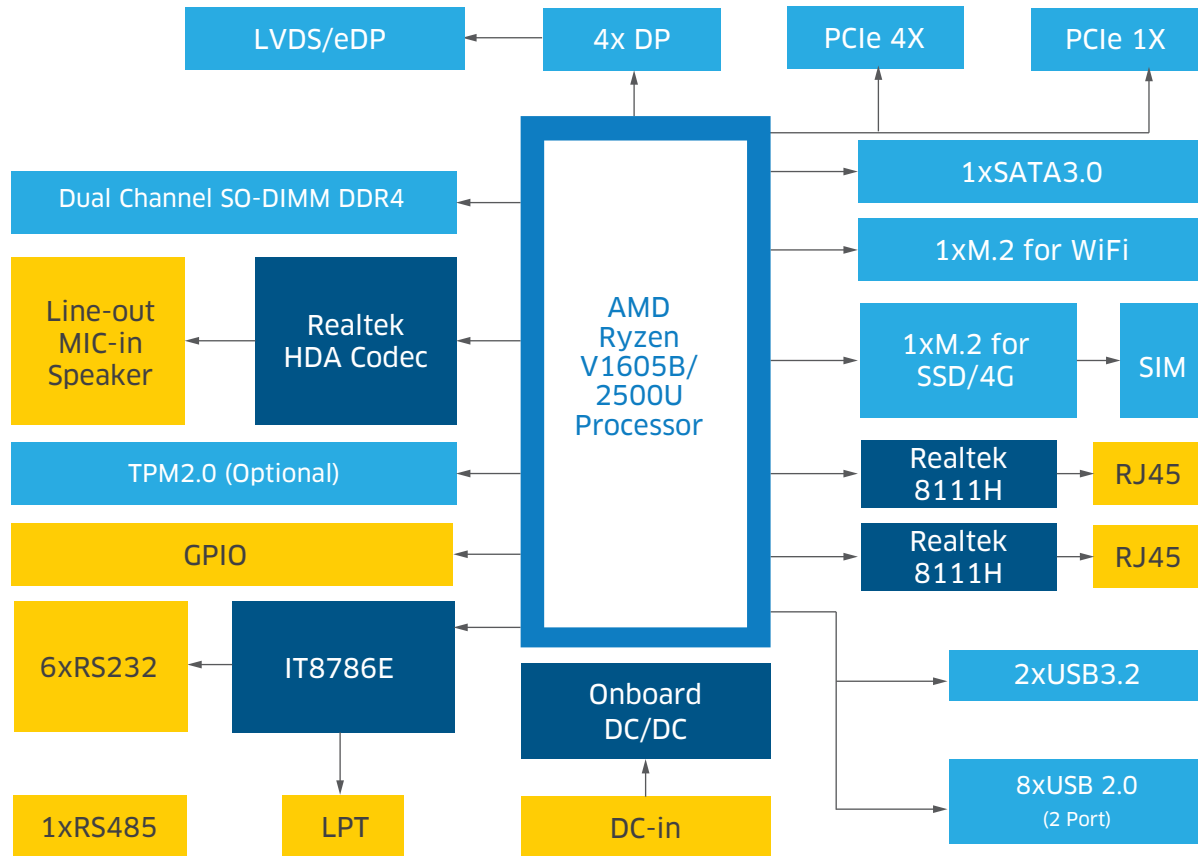


Technical Specifications

Processor	CPU	V1605B (Quad-Core)	2500U (Quad-Core)
	Max Frequency	3.6 GHz	3.6 GHz
	Base Frequency	2.0 GHz	2.0 GHz
	Cache	2MB L2	2MB L2
	BIOS	AMI SPI BIOS	
Memory	Type	Dual Channel SO-DIMM DDR4	
	Max. Capacity	32GB	
Display	GPU	AMD Radeon Vega 8 Graphics	
	Display via	4 x DP1.4 (DP1/LVDS/eDP Optional)	
	Max Resolution	Resolution up to 3840x2160 for single display	
Ethernet	Speed	10/100/1000 Mbps	
	Controller	RTL8111H	
	Interface	2xRJ 45	
Audio	Audio codec	Realtek HD (Line-out, Mic-in)	
	Interface	Line-out, Mic-in, support audio header, amplifier header	
Hardware		CPU system temperature, onboard voltage, watchdog	
Wireless connectivity	M.2	1xM.2 for Wi-Fi	
Storage	M.2	1xM.2 for 4G/2280 SSD	
	SATA3.0	1	
Expansion	PCIe 1X	1	
	PCIe 4X	1	
I/O Interface	LAN	2	
	COM	6×RS232 (COM2 can be set as RS485 by jumper)	
	USB3.2	2	
	USB2.0	8 (2*Port + 6*header)	
	Audio	1 x Line-out + 1 x Mic-in	
	GPIO	8 (One Group)	
	LPT	1	
	PS/2	1	
	TPM2.0	Onboard, Optional	
Dimension	Board Type	Mini ITX	
	Size	170 mm x 170 mm	
Power	Standard Port	12V DC-in	
Temperature	Operating Temp.	-20°C ~60°C	
	Storage Temp.	-20°C ~80°C	
Operating System		Windows 10 64bit, Linux 64bit	

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

Functional Block Diagram



Order Information

Model Name	Description
DTV1605-A	DT AMD V1605B FP10V15 2LAN 4DP 6COM
DTV1605-E	DT AMD V1605B FP10V15 2LAN 3DP 6COM EDP

*For customized options, please consult regional sales. And please confirm the model name and description before purchasing. *The model name and description might vary due to inventory changes.