

SOM-DB2500

Development Board for SMARC



Features

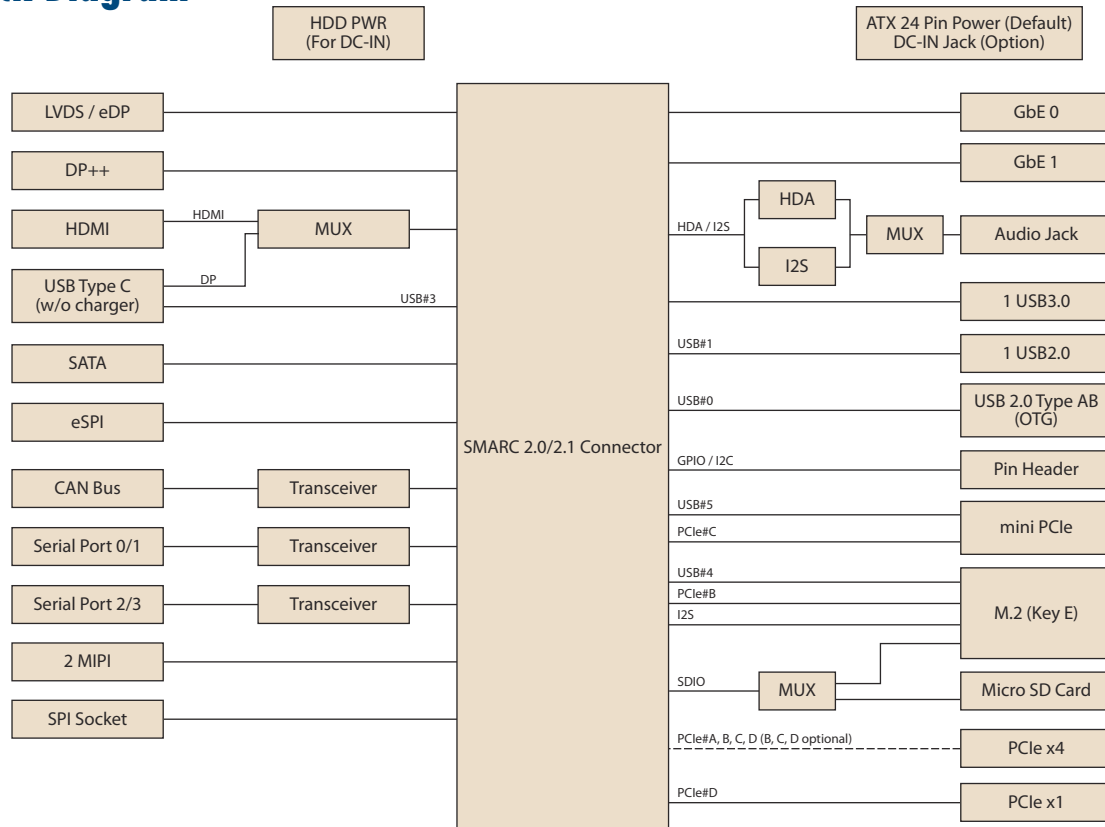
- Support SMARC V2.0/2.1 Module
- Support several type of display: LVDS, eDP, DP++, HDMI
- Support PCIe with SIM card socket, M.2 (E-Key), SATA, USB3, USB Type-C, Micro SD card
- Supports standard ATX power supplier or 12V DC-IN adapter
- Visible Debug Utility: BIOS Port 80 and Power State



Specifications

Compatible Models	Advantech SMARC V2.0 Module Series (82mm x 80mm / 82mm x 50mm)	
Display	LVDS	18/24-bit single or dual channel
	HDMI	1
	Display Port	1
	Display Port via USB Type-C	1
Ethernet	Connector	2 Ports RJ45
	Speed	10/100/1000 Mbps
Expansion	PCI Express x4	1
	PCI Express x1	1
	LPC	Yes
I/O	SATA3.0	1 Ports (10 Gbps)
	USB3.0	1 USB3.0 (Type A) 1 USB3.0 (Type C)
	COM Port	4 Ports (2 Ports with DTS/RTS)
	GPIO	12
	SDIO	1 (micro SD card socket / optional to M.2 slot)
	SPI Bus	1
	LPC	1
	TPM	1 (TPM 2.0)
	Port 80	1
	Fan	2 (1 smart fan from module side, 1 fixed-voltage fan)
Audio	Realtek ALC888 HD Audio (Line-in, Line-out, MIC, SPDIF)	
Serial Bus	I2C Bus	2
	CAN Bus	1
Power	Type	ATX/AT: Vin; DC-IN: Vin
	Supply Voltage	Vin: 12V, RTC Battery: 2.0V ~ 3.3V
Environment	Operating Temperature	Standard: 0 ~ 60 °C (32 ~ 140 °F)
	Storage Temperature	-40 ~ 85 °C (-40 ~ 185 °F)
	Humidity	Operating: 40 °C @ 95% relative humidity, non-condensing Storage: 60 °C @ 95%relative humidity, non-condensing
	Vibration Resistance	3.5 Grms
Mechanical	Dimensions	304.8 x 190.5 mm (12" x 7.5")

Block Diagram



Ordering Information

Part No.	Description
SOM-DB2500-00A1	SMARC V2.0/2.1 Development Board

Packing List

Part No.	Description	Quantity
1700008941	M Cable SATA 7P/SATA 7P 32CM C=R 180/180D W/Lock	1
1701200220	F Cable 2*10P-2.0/D-SUB 9P(M)*2 22CM	3
1960090424T001	IO BRACKET	1
1700018785	A CABLE SATA 15P/1*4P-2.5 35cm	1