



LAND



SEA

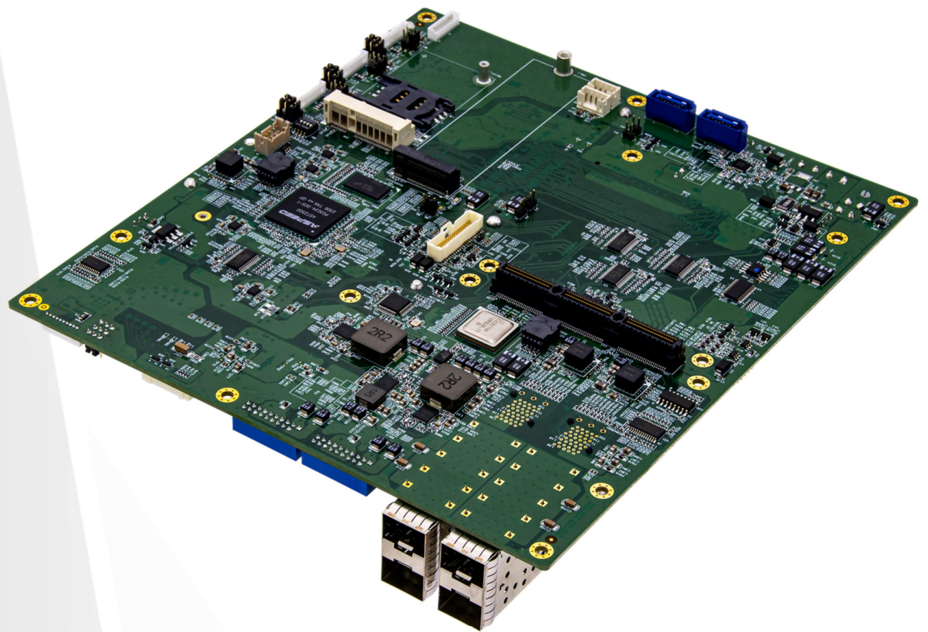


AIR



SK517

COM Express Type 7 Carrier



Key Features

- COM Express Type7 R3.1 support Ice Lake-D LCC family processor
- MXM Type 3.1 Type B(PCIe Gen4 x16)
- PCIe/104 Type 2 Expansion slot (2x PCIe Gen3 x4 + 4x PCIe Gen3 x1)
- 1x M.2 2280 M-Key slot (PCIe Gen3 x4, NVMe)
- 4x 10GbE SFP+ + 2x GbE RJ45
- 4x USB3.0, 1x VGA, 6x RS232
- 2X DP
- 2x SATA3.0
- 8 Bits DIO, I2C
- 2x Full-size mini PCIe (PCIe)
- 9V~36V DC-IN (AT/ATX mode support)

Specifications

COM Express, a computer-on-module (COM) form factor, is a highly integrated and compact PC that can be used in a design application much like an integrated circuit component. The COM Express Module integrates core CPU and memory functionality, the common I/O of a PC/AT, USB, Audio, Graphics (PEG), and Ethernet.

SK517 feature a range of Intel processors, up to the latest Intel Xeon-D 1700 series, Atom® C3000-series. SK517 are built to operate in harsh environmental conditions, the operating temperatures as low as -40°C to as hot as 85°C. From low power consumption to high performance processing power, SK517 are built to suit a wide range of computing applications from signal processing to unmanned vehicles and more.

Specifications

PROCESSOR & SYSTEM

COM Express CPU (Type 7)	Intel® Xeon® D-1700 processor (Ice Lake-D LCC)
COM Express CPU Options (Type 7)	Intel® Xeon® D-1700 processor (Ice Lake-D LCC) <ul style="list-style-type: none">• Xeon® D-1746TER 2.0/3.1GHz 15MB, 67W, 10C• Xeon® D-1735TR 2.2/3.4GHz 15MB, 59W, 8C• Xeon® D-1732TE 1.9/3.0GHz 15MB, 52W, 8C
GPU Module Options	NVIDIA® GeForce™ GTX 1050Ti, 60W, 4GB GDDR5, 768 CUDA Cores NVIDIA® GeForce™ RTX 2060S, 175W, 8GB GDDR6, 2176 CUDA Cores NVIDIA® Quadro™ MXM A2000, 60W, 8GB GDDR6, 2560 CUDA Cores NVIDIA® Quadro™ MXM A4500, 80/115W, 16GB GDDR6, 5888 CUDA Cores
Memory type	Base On CPU module
Chipset	Base On CPU module
Watchdog	Base On CPU module

DISPLAY

Internal Display Port	2x Display Port outputs from MXM GPU
VGA	1x VGA(Through BMC to convert VGA signal)/VGA: resolution up to 1920 x 1200 x 32bpp (share with SOC 16MB memory)

ETHERNET

RJ45 GbE LAN	2x GbE (one from module; another from BMC for remote management)
10GbE SFP+	4x (Intel C827 10G Retimer)

EXPANSION

MXM	1x (MXM3.1 Type B)
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PCIe/104	1x (Type 2, 2x PCIe Gen3 x4 + 4x PCIe Gen3 x1)
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mPCIe	2x Full-size mini PCIe Expansion Slot
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M.2	1x M.2 2280 M-Key Slot (PCIe x4 GEN3, NVMe)
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SIM Slot	2
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FRONT I/O

10GbE SFP+	4
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Terminal Block DIP 1x4P	1x (Vin: 2PIN; GND: 2PIN)
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INTERNAL I/O

Display Port Header	2x (1x20Pin)
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SATA Port (Standard 7Pin)	2x (up to 6Gb/s)
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SATA Power	2
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COM (RS232)	6x (2 TX/RX form COMe module)
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USB 3.0 (2x10Pin)	4
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Front Panel (2x5Pin)	1
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Smart Fan	2x (1x CPU Fan, 1x System Fan)
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I2C(1x 4pin)	1
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DIO (1x10pin)	8 Bits (4DI/4DO)
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Battery Header	1
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eSPI/LPC Header	1x (1x 10Pin)
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POWER MANAGEMENT

Sleep State	S0, S1, S4, S5
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ACPI	ACPI3.0
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Power Type	Wide Voltage DC-IN 9V~36V (Support AT/ATX mode)
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MECHANICAL AND ENVIRONMENTAL

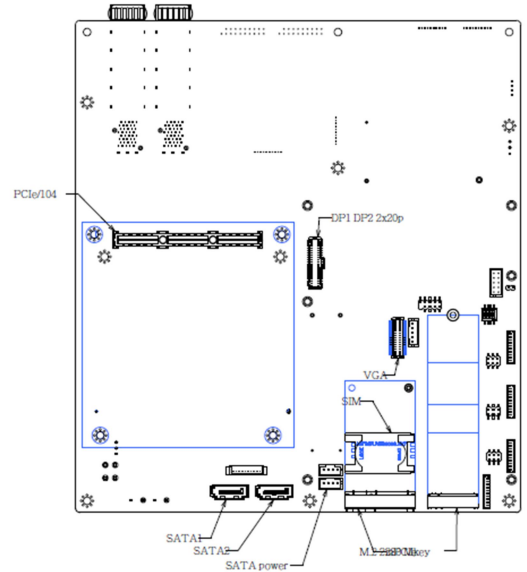
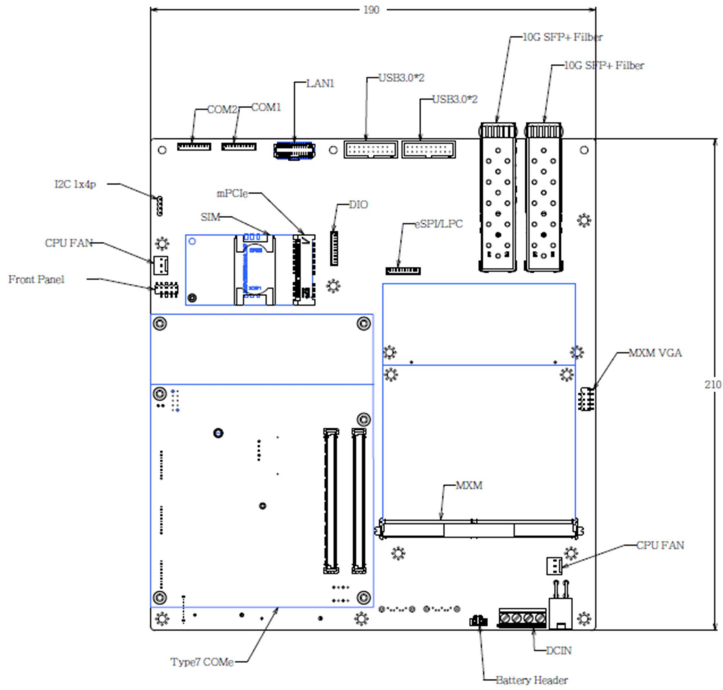
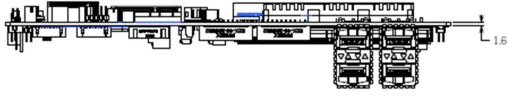
Dimension	190 x 210 mm
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Operating Temp.	- 40°C~ 85°C
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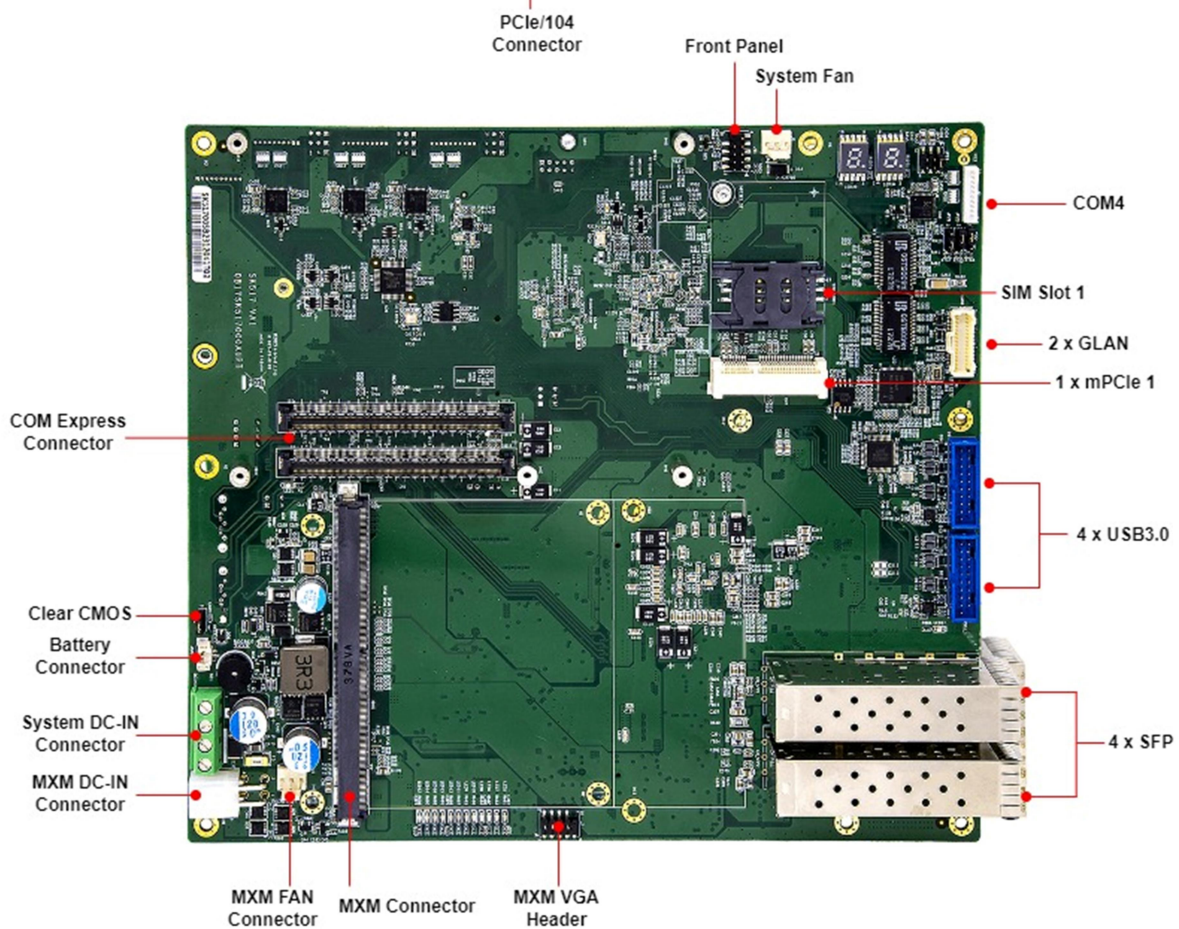
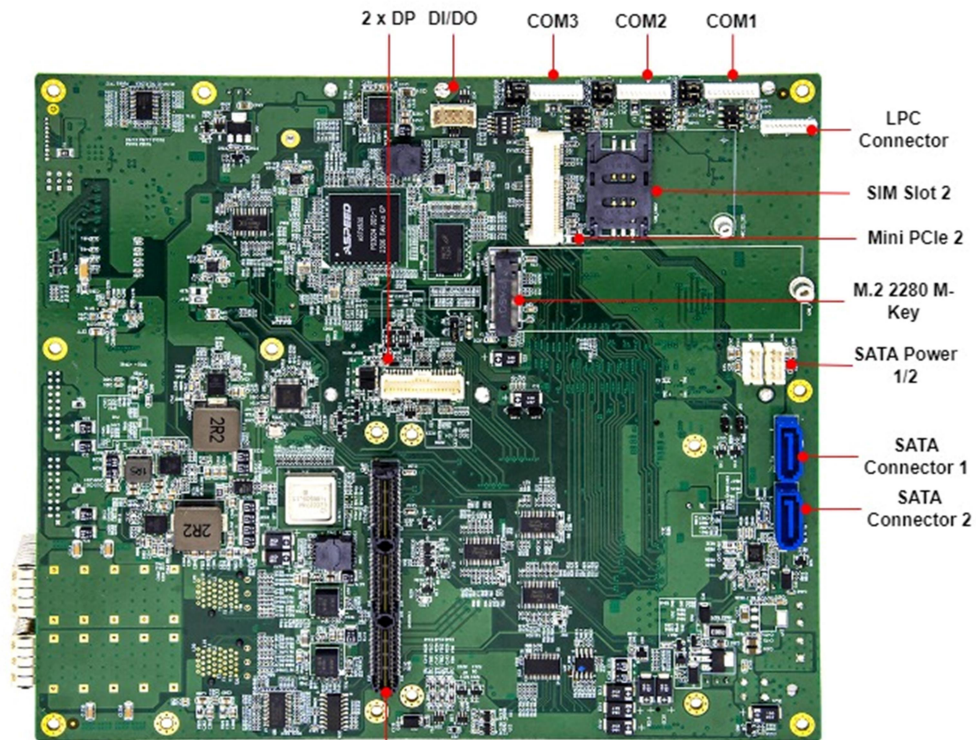
Storage Temp.	-40°C ~ 85°C
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Relative Humidity	5% to 95%, non-condensing
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Dimension

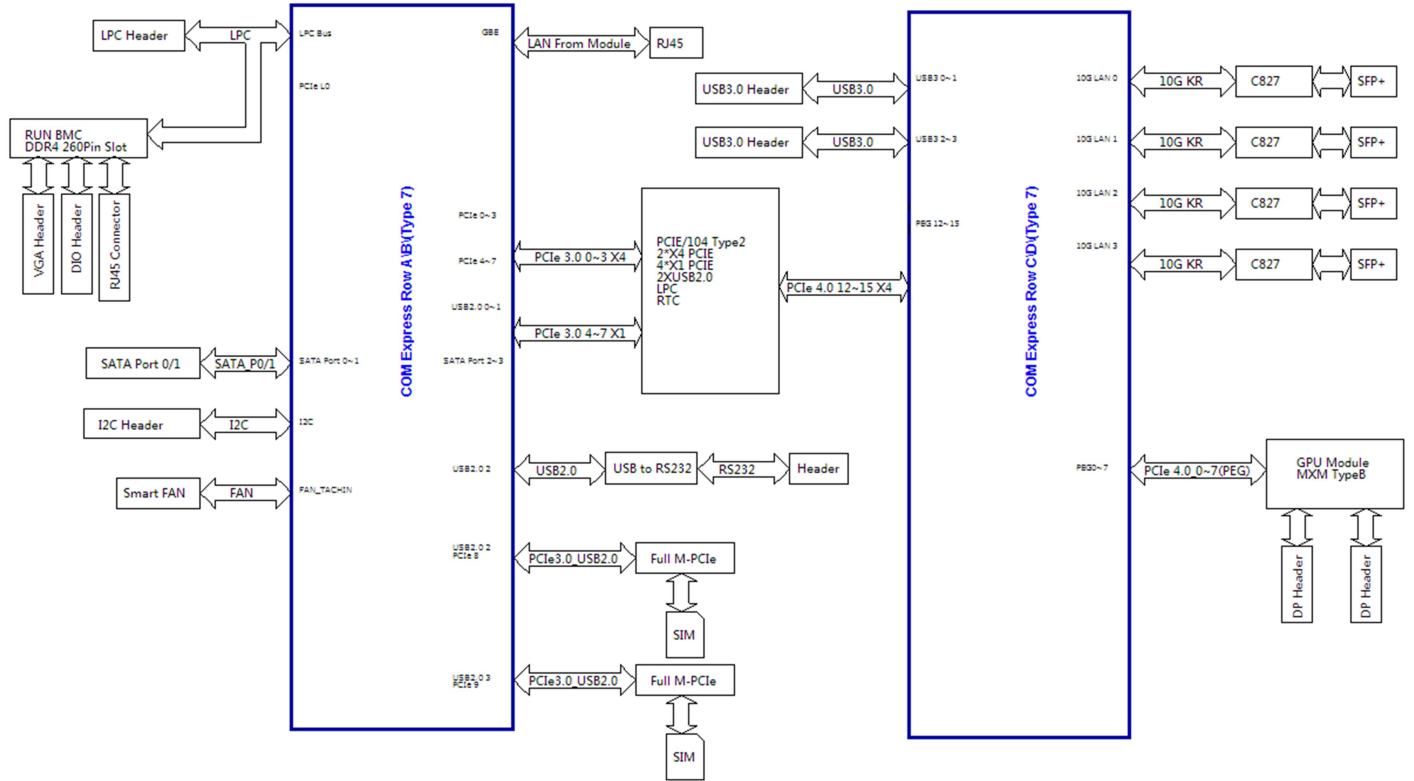


Placement



Diagram

SK517 BLOCK DIAGRAM



Ordering Information

COMe Type	Model Name	Configuration
Type7	SK517-D1746-A45	CPU Board : D-1746TER / MXM GPU : Quadro A4500
	SK517-D1746-A20	CPU Board : D-1746TER / MXM GPU : Quadro A2000
	SK517-D1735-A45	CPU Board : D-1735TR / MXM GPU : Quadro A4500
	SK517-D1735-A20	CPU Board : D-1735TR / MXM GPU : Quadro A2000
	SK517-D1732-A45	CPU Board : D-1732TE / MXM GPU : Quadro A4500
	SK517-D1732-A20	CPU Board : D-1732TE / MXM GPU : Quadro A2000