COM Express Type 6

/**V N E T**[°] **EMBEDDED**

MSC C6-MB-EVA

COM Express[™] Type 6 Carrier Board



Description

COM Express[™], an open specification of the PICMG (PCI Industrial Computer Manufacturer Group), is a module concept to bring PCI Express and other high speed serial technologies like SATA, USB and digital display interfaces on a COM (Computer On Module).

The MSC C6-MB-EVA is a versatile carrier board designed to evaluate and prototype system electronics before a customer specific baseboard is available. It provides the interface infrastructure for the COM Express Type 6 modules and offers various PC type connectors for external access. It can also help develop software in parallel with the hardware to speed up the integration process.

This universal platform allows you to quickly test and choose the right product from out COM Express portfolio.

Highlights

- Socket for COM Express[™] Type 6 modules in Basic or Compact form factor
- One PCI Express x4 slot
- Four PCI Express x1 slots
- One PCI Express x16 PEG slot
- Four SATA connectors
- SD card socket
- Four USB 3.0, four USB 2.0 interfaces
- Two DisplayPort/HDMI connectors
- VGA/DVI connector
- LVDS interface
- Embedded DisplayPort connector
- HD audio codec; six audio jacks and SPDIF
- LAN interface
- mSATA and Mini PCI Express sockets
- Various additional COM Express[™] specific interfaces

- ATX-style power connector / 12V-only jacks
- POST code LED display
- Size 305 mm x 244 mm (ATX form factor)

COM Express Type 6

/**V N E T**[°]**EMBEDDED**

Technical Data - MSC C6-MB-EVA

Technology	Carrier
Formfactor	ATX
Storage Interfaces	4x SATA connector; 1x mSATA socket
USB	4x USB 3.0 on I/O shield; 4x USB 2.0 on pin headers
Serial Interfaces	2x serial port on pin header
Bus Interfaces	3x PCI Express x1 slots; 2x PCI Express x4 slots; 1x PCI Express x16 (PEG) slot
Display Interfaces	VGA connector; DVI connector; 2x DisplayPort; 2x HDMI; LVDS 30-pin connector; Embedded DisplayPort connector; separate SDVO/ADD2 slot
Network Interface	1 x GbE from COM Express module
Audio Interface	HD audio codec routed to 6x audio jacks and SPDIF on a 5 pin header; 10 pin header for additional HD audio codec
Miscellaneous	POST code display GPIO on pin header 4-pin fan connector PWM controlled LPC bus on pin header Feature connector
Feature Highlights	Versatile carrier board for evaluation and prototyping
OS Support	BSP (for onboard devices) for Windows and Linux
Power Requirement	Standard 24 pin ATX power and additional ATX 12V connector
Environment	Ambient Temperature 0° +60°C (operating), -25° 85°C (storage) Humidity 20 80% (operating, non-condensing), 5 95% (storage, non-condensing)
Dimensions	305 x 244
Certificates	UL/CE



INVNET[°]EMBEDDED

Order Reference - MSC C6-MB-EVA

Order Number	Description	Reference	Cat
41857	COM Express Type 6 Evaluation Carrier Board with various PCI Express x1, x4 and x16 slots, USB 3.0/2.0, GbE, SATA, DisplayPort, HDMI, LVDS, eDP, VGA, HD audio interfaces; mSATA and Mini PCI Express sockets, POST code display, ATX power connector. Dimensions: 305 x 244 mm (ATX form factor)	MSC C6-MB-EVA PCBFTX	PV

COM Express Type 6

/**V N E T**[°]**EMBEDDED**

Accessories

Order Number	Description	Reference	
	10.1" Displaykit		
78879	Displaykit suitable for all COM Carrier Boards and all COM Starterkits. Comprises 10.1" WXGA LCD with PCAP Touch Sensor and Touch Controller. Includes all cables required to connect to COM Carrier Boards (LVDS, B/L & Touch).	MSC DIS-AM1280800-101-KIT SETPAC	
	12.1" Displaykit		
78880	Displaykit suitable for all COM Carrier Boards and all COM Starterkits. Comprises 12.1" WXGA LCD with PCAP Touch Sensor and Touch Controller Includes all cables required to connect to COM Carrier Boards (LVDS, B/L & Touch)	MSC DIS-AM1280800-121-KIT SETPAC	
	5.0" Displaykit		
81871	Displaykit suitable for all COM Carrier Boards and all COM Starterkits. Comprises 5.0" WVGA LCD with PCAP Touch Sensor and Touch Controller Includes all cables required to connect to COM Carrier Boards (LVDS, B/L & Touch)	MSC DIS-AM800480-050-KIT SETPAC	
	7" Displaykit		
78911	Displaykit suitable for all COM Carrier Boards and all COM Starterkits. Comprises 7.0" WVGA LCD with PCAP Touch Sensor and Touch Controller Includes all cables required to connect to COM Carrier Boards (LVDS, B/L & Touch)	MSC DIS-AM800480-070-KIT SETPAC	

Avnet Embedded MSC Technologies GmbH Industriestr. 16 76297 Stutensee

AvnetEmbedded@avnet.com avnet.com/embedded

Copyright © 2021 Avnet. All data is for information purposes only and is subject to change without notice. No guarantee for legal purposes is implied. Information in this document has been carefully checked, however, no responsibility for inaccuracies has to be assumed. All brand or product names may be trademarks and property of their respective owners.