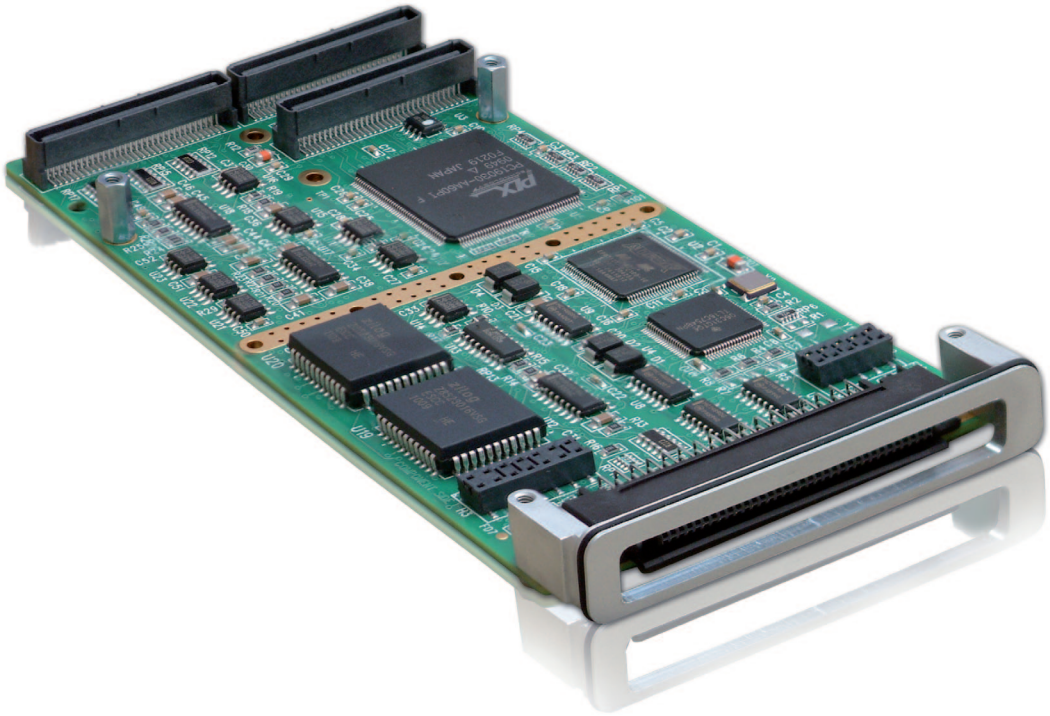
» PMC-SIO «



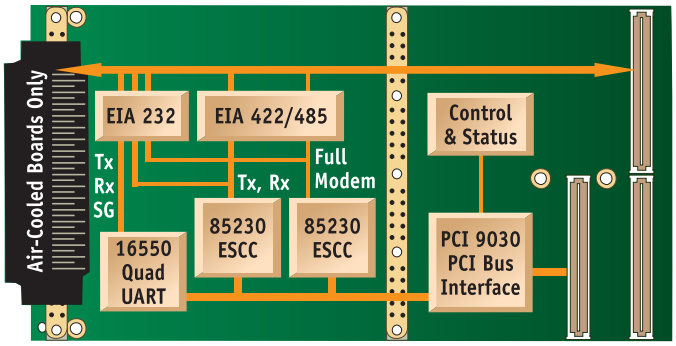
Octal Serial I/O Adapter PCI Mezzanine Card (PMC)

» Two "Full-Featured" ESCC Ports
» Two "Multi-PHY" ESCC Ports
» Four Asynchronous Ports
» 3.3V Signaling, 5V Tolerant PCI bus
» Support for VxWorks and LynxOS
» Air- or Conduction-Cooled Versions

The PMC-SIO complements Kontron's extensive choice of COTS and standard PMCs for VME, VPX or CompactPCI single board computers for use in commercial or harsh environments by offering eight serial I/O ports on a single PMC module. The air-cooled versions of the PMC-SIO comply with IEEE P1386.1 PCI Mezzanine standard while the conduction-cooled version conforms to the VITA 20 recommendation.

The two "full-featured" 85230 ESCC ports on the PMC-SIO are each equipped with an EIA-422/485 interface that supports synchronous, isochronous and asynchronous protocols TXD/RXD, RTS/CTS, DCD, RXC, TXC, and TC [TXC-out] at up to 3.6864 Mb/s; synchronous modems; and multidrop full and half duplex with RTS flow control. Each of the two "multi- PHY" 85230 ESCC ports on the PMC-SIO provides an EIA-422/485 interface that supports synchronous and asynchronous protocols (TXD/RXD) at up to 3.6864 Mb/s; and multidrop full and half duplex with RTS flow control.

All the ESCC ports also support asynchronous protocol using 3-wire EIA-232.



The quad 16550-type UART ports support asynchronous protocols (TXD/RXD and SG) using EIA-232 interface.

Front panel I/O on the air-cooled versions of the PMC-SIO are available on a 68-pin connector.

For quick development purposes, a connector board is available that routes the four EIA-422/SA ports to 25-pin D-shell connectors and the eight EIA-232 ports to 9-pin D-shell connectors.

Technical Information

Overall Dimensions	Single PMC 149 x 74 mm - One slot (FP version)	**PCI bus Interface**	32-bit - 33 MHz Revision 2.2 compliant PCI9030 Target PCI controller from PLX 3.3V signaling, 5V tolerant
Power Requirements	+5V, ±5% +12V, ±5% -12V, ±5%	**Usable Throughput**	Depends on the host SBC card and operating system. Please contact Kontron for further details.
Power Dissipation	Typical: 4.8 Watts		

Environmental Specifications

	SA - Standard Commercial	RA - Rugged Air-Cooled	RC - Rugged Conduction-Cooled
Conformal Coating	Optional	Standard	Standard
Airflow	1.2 m/s	1.8 m/s	Not Applicable
Temperature	**VITA 47-Class AC1**	**VITA 47-Class AC3**	**VITA 47-Class CC4**
Cooling Method	Convection	Convection	Conduction
Operating	0° to +55°C	-40° to +75°C	-40° to +85°C
Storage	-45° to +85°C	-45° to +100°C	-45° to +100°C
Vibration Sine (Operating)	5/200 Hz: 2g	5/2,000 Hz: 2.5g	5/2,000 Hz: 5g
Random	**VITA 47-Class V1**	**VITA 47-Class V2**	**VITA 47-Class V3**
Shock (Operating)	10g/16 ms Half Sine	40g/20 ms Half Sine	40g/20 ms Half Sine
Altitude (Operating)	-1,000 to 15,000 ft	-1,000 to 33,000 ft	-1,000 to 50,000 ft
Relative Humidity	90% without condensation	95% without condensation	95% without condensation

Ordering Information

Article	Part-No.	Description
PMC-SIO	PMC-SIO-SA000	PMC-SIO Octal Serial I/O Adapter Standard Commercial Build
PMC-SIO	PMC-SIO-RA000	PMC-SIO Octal Serial I/O Adapter Rugged Air-cooled Build
PMC-SIO	PMC-SIO-RC000	PMC-SIO Octal Serial I/O Adapter Rugged Conduction-cooled Build

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