

CPV8540B

Compact PCI Hot Swap PMC Carrier Card

DATASHEET



KEY FEATURES

Quickly and easily adds functionality to CompactPCI® environments

Supports one double-width or two single-width PMC modules

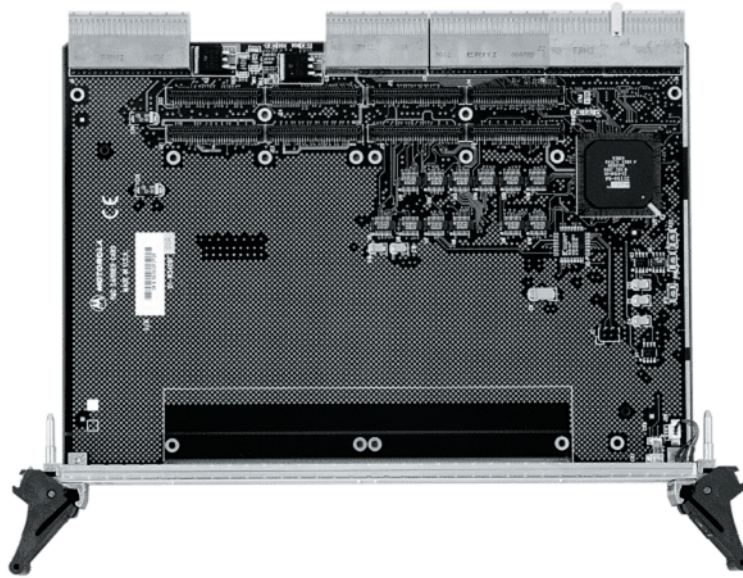
Compliant with PICMG® Hot Swap Specification

Optional transition module support for rear I/O PMC modules

Compatible with Motorola's high availability platforms

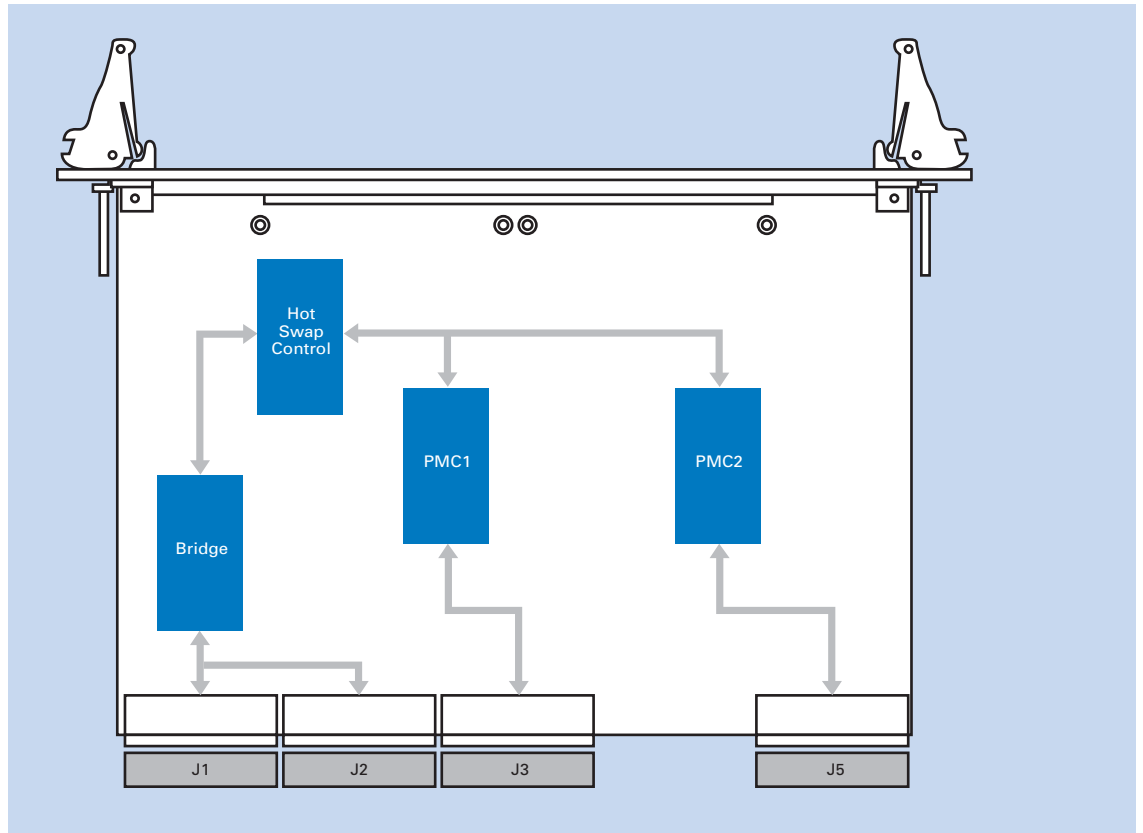
The CPV8540B is a 64-bit, 6U, single-width (4HP) card that provides front access and rear I/O connectivity for up to two PMC modules. Rear I/O connections via J3 and J5 allow its use in both standard CompactPCI backplanes and CompactPCI backplanes with the H.110 telephony bus. The CPV8540B includes an

injector/ejector micro switch, blue LED indicator and status register consistent with the PCI Industrial Computer Manufacturers Group (PICMG) CompactPCI Hot Swap Specification, PICMG 2.1, Revision 1.0, and supports basic, full, and high availability models.



See back page for details

The Motorola CPV8540B provides an efficient and flexible method of adding communication and peripheral interfaces to CompactPCI systems by hosting a variety of IEEE P1386.1 industry-standard PCI Mezzanine Card (PMC) modules.



CPV8540B COMPACTPCI HOT SWAP PMC CARRIER CARD

- Two IEEE P1386.1 PMC sites
- A DEC 21154 PCI-to-PCI bridge
- Hot swap circuitry

COMPLIANCE

- PCI Local Bus Specification, Revision 2.1
- CompactPCI Specification, PICMG 2.0, Revision, 2.1
- CompactPCI Hot Swap Specification, PICMG 2.1, Revision 1.0
- IEEE P1386.1 PMC Specification, Revision 2.3

SPECIFICATIONS

UNIVERSAL COMPACTPCI HOT SWAP INTERFACE

- Connectors: J1, J2, J3 and J5
- Address/Data Lines: 64
- PCI Bus Clock: 33 MHz max.
- Controller: DEC 21154 PCI-to-PCI Interface Bridge Chip
- Signaling: 5V or 3.3V compliant (universal)
- Full Hot Swap Board: Yes
- Note: Custom hardware connection layer does not provide extended capabilities pointer

IEEE P1386.1 PMC INTERFACE

- Address/Data Lines: 64
- PCI Bus Clock: 33 MHz max. (buffered from CompactPCI bus)
- Signaling: 5V with 5V key post (3.3V may be possible as a factory option)

POWER REQUIREMENTS—CARRIER CARD

- (not including PMC modules)
- +5V: +5% -3%, 250 mA max.
- +3.3V: +5% -3%, 300 mA max.
- +12V: +5% -3%, 10 mA max.
- 12V: -5% +3%, 1 mA max.

POWER REQUIREMENTS—PMC MODULES

- (for both PMC modules—shared)
- +5V: ±5%, 3 A max., 5 A protected
- +3.3V: ±5%, 2.3 A max., 7 A protected (+3.3V current can be increased to 4.6 A at 3.0V min.)
- +12V: ±5%, 500 mA max., 800 mA protected
- 12V: ±5%, 200 mA max., 450 mA protected
- Note: Values for current protection are ±15%.
- Over-current protection disconnects all supplies from PMC modules.

INDICATORS

Green LED Power Indicator

Blue LED Hot Swap Indicator

CARRIER CARD DIMENSIONS

9.2" H x 6.3" D x 0.8" W (233.4 mm x 160.0 mm x 20.3 mm)

DEMONSTRATED MTBF

(based on a sample of eight boards in accelerated stress environment)

Mean: 190,509 hours

95% Confidence: 107,681 hours

ENVIRONMENTAL

	Operating	Storage/Transit
Temperature:	+5° C to +50° C	-20° C to +60° C
Humidity (NC):	5% to 90% @ 40° C	5% to 90% @ 40° C
Vibration:	1.0 G @ 10 to 330 Hz	1.2 Gs @ 5 to 330 H

SAFETY

All printed wiring boards (PWBs) are manufactured with a flammability rating of 94V-0 by UL recognized manufacturers.

ELECTROMAGNETIC COMPATIBILITY (EMC)

Intended for use in systems meeting the following regulations:

U.S.: FCC Part 15, Subpart B, Class A (non-residential)

Canada: ICES-003, Class A (non-residential)

This product was tested in a representative system to the following standards:

CE Mark per European EMC Directive 89/336/EEC with Amendments; Emissions: EN55022 Class B; Immunity: EN50082-1

ORDERING INFORMATION

Part Number	Description
CPV8540B	Enhanced CompactPCI dual PMC carrier
Related Products	
TM-PIMC-0101	Dual Ethernet transition module for MCPN765
Related products can be found at http://www.motorola.com .	
Documentation	
CPV8540B/UM	CPV8540B User Manual
Documentation is available for on-line viewing and ordering at www.motorola.com/computer/literature .	



Future RoHS Status

Motorola does not intend to redesign this product for RoHS compliance. This product will only be sold and shipped to customers until the RoHS deadline (June 30th, 2006). After that date, it will no longer be available.

SOLUTION SERVICES

Motorola provides a portfolio of solution services optimized to meet your needs throughout the product lifecycle. Design services help speed time-to-market. Deployment services include global 24x7 technical support. Renewal services enable product longevity and technology refresh. And solution extras include enhanced warranty and repairs.

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