

Migration of P/N 4933 PMC Carrier to PCI Express PMC Carriers

Technobox P/N	PCI Type Host	PCI on Carrier	Rear I/O	Front Panel I/O	Fan	Board Type
4933	32 Bit 33 MHz 3.3V or 5V	32 Bit 33 MHz 3.3V/5V VIO	VME P2- JN4 Standard Pinout	PC Chassis Bracket	None	Passive PMC Carrier
5243	1 Lane PCIe, Gen1	32 Bit 33/66 MHz 3.3V/5V VIO	VME P2- JN4 Standard Pinout	PC Chassis Bracket	Optional Fan P/N4936	Bridged PMC Carrier
4733*	4 Lane PCIe, Gen1	32/64 Bit 33/66/100/13 3 MHz 3.3V VIO	VME P2- JN4 Standard Pinout	PC Chassis Bracket	Optional Fan P/N4936	Bridged PMC Carrier
4749*	1 Lane PCIe, Gen1	32/64 Bit 33/66/100/13 3 MHz 3.3V VIO	VME P2- JN4 Standard Pinout	PC Chassis Bracket	Optional Fan P/N4936	Bridged PMC Carrier
6778*	4 Lane PCIe, Gen1	32/64 Bit 33/66/100/13 3 MHz 3.3V VIO	SCSI II 68 Pin Connector Differential Pairs	Into the Interior of the PC Chassis	Blower Style Fan	Bridged PMC Carrier, reverse mounted PMC

Table 1 Comparison Between P/N 4933 and PCIe Functionally Equivalent Part Numbers

Generally P/N 5243 is the most compatible alternative with P/N 4933, since it accommodates +5V or +3.3V VIO PMC while also providing a VME P2 connector for rear I/O like P/N 4933.

The other alternatives provide useful features which may be better in some applications.

4733* and 4749* are the same, except P/N 4749 has a cut down 1 lane PCI express connector.

6778* is offered in another version P/N 6777 with a different rear I/O differential pairs.

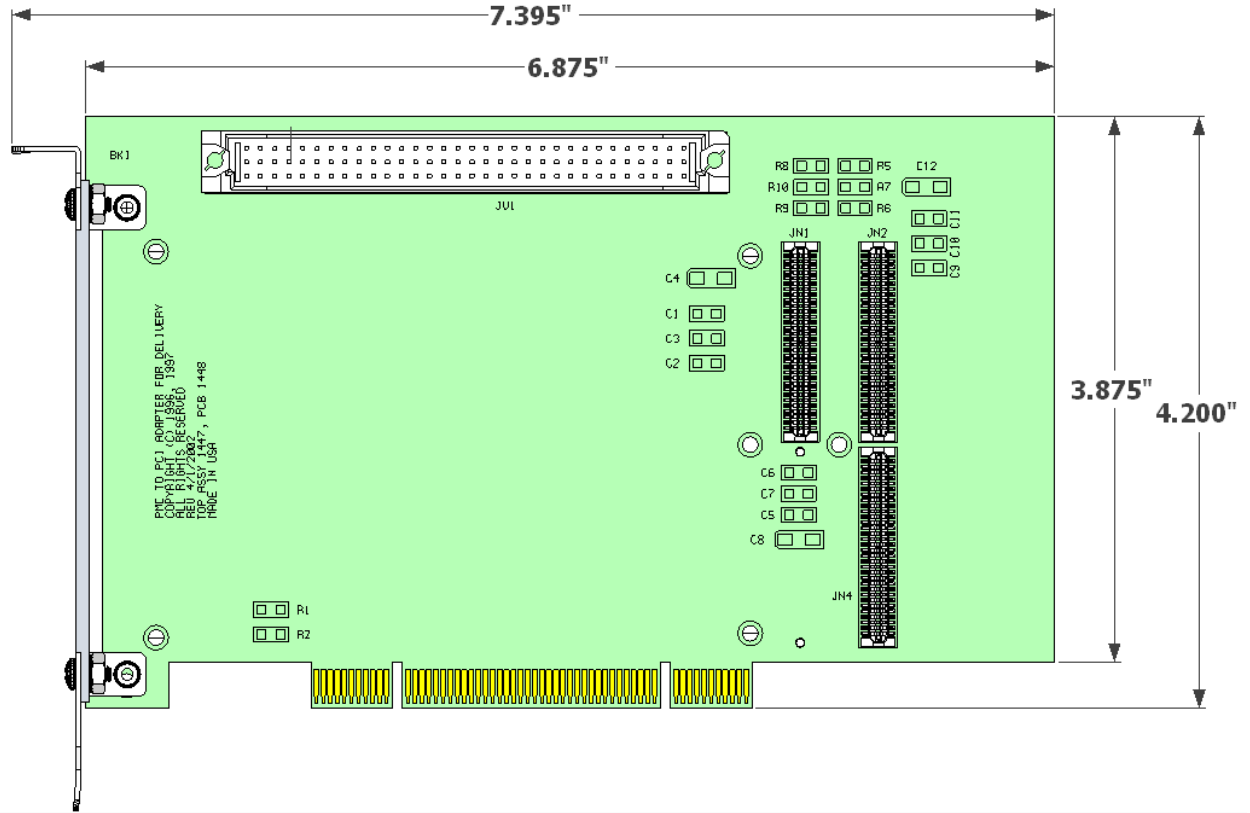


Figure 1 P/N 4933 Dimensions

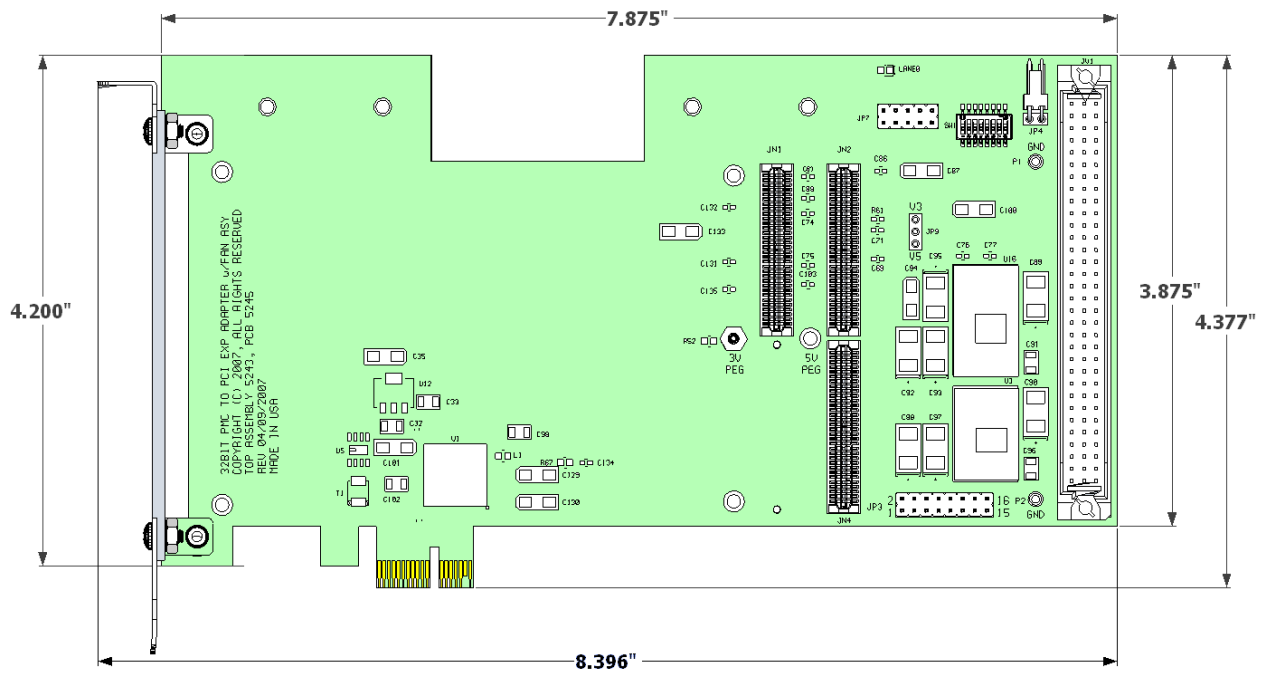


Figure 2 P/N 5243 Dimensions

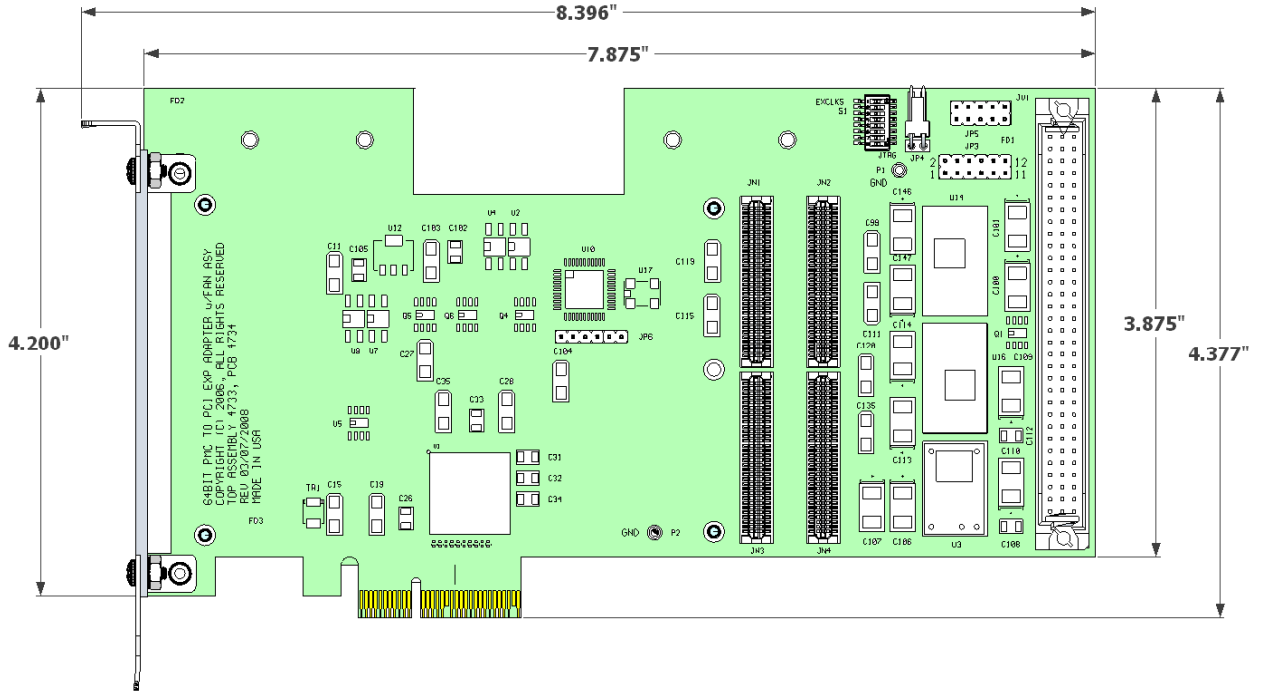


Figure 3 P/N 4733 Dimensions

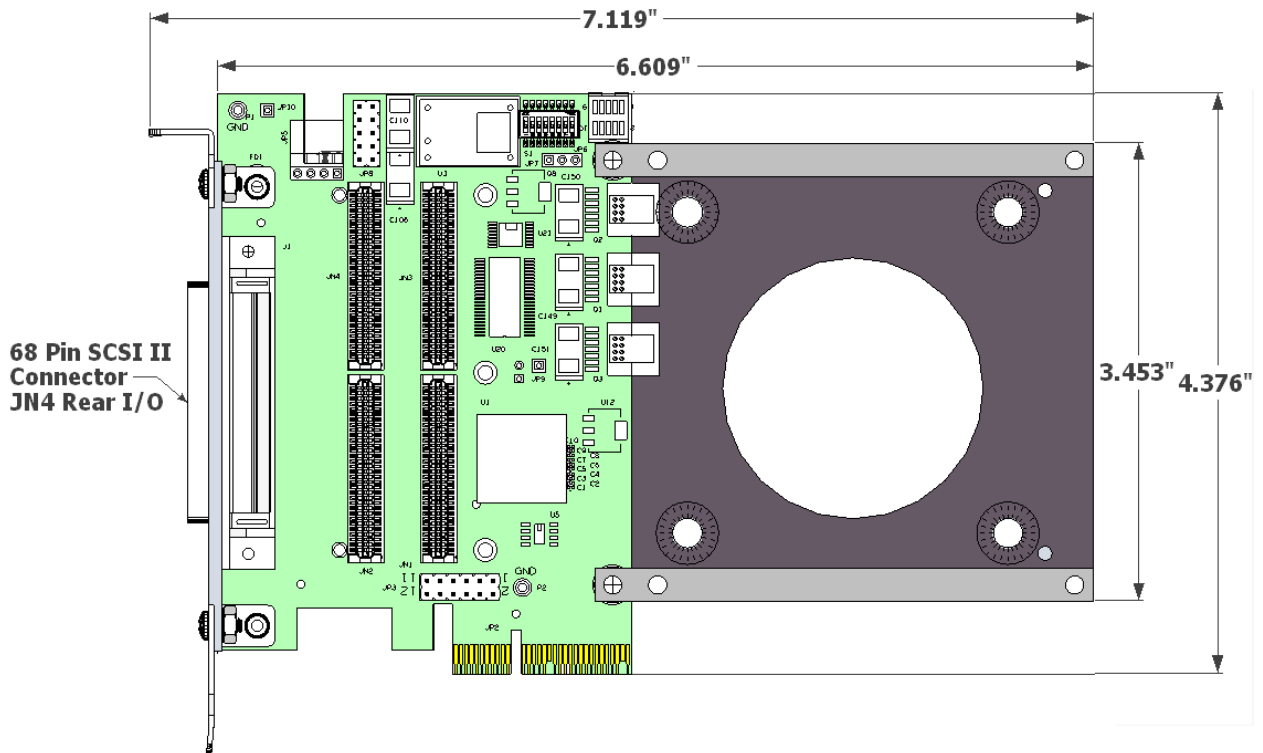


Figure 4 P/N 6778 & P/N 6777 Dimensions

Rear I/O VITA 35

P/N 4933, 4733, & 5243 all have the same rear I/O pinout which conforms to VITA 35.

Vita 35 - “ANSI standard for PMC-P4 pinout mapping to VME-P0 and VME64x-2” Defines rear I/O connection to 96-pin DIN connector (see VITA 35 at www.vita.com)

VME P2 column C pins connect to Odd numbered JN4 pins.

VME P2 column A pins connect to Even numbered JN4 pins.

VME P2 column B carries +5V and Ground only all other contacts on row B are no connects.

VME P2 ROW C	Carrier JN4	VME P2 ROW B	VOLTAGE	Carrier JN4	VME P2 ROW A
C1	JN4.1	B1	+5v	JN4.2	A1
C2	JN4.3	B2	GND	JN4.4	A2
C3	JN4.5	B3		JN4.6	A3
C4	JN4.7	B4		JN4.8	A4
C5	JN4.9	B5		JN4.10	A5
C6	JN4.11	B6		JN4.12	A6
C7	JN4.13	B7		JN4.14	A7
C8	JN4.15	B8		JN4.16	A8
C9	JN4.17	B9		JN4.18	A9
C10	JN4.19	B10		JN4.20	A10
C11	JN4.21	B11		JN4.22	A11
C12	JN4.23	B12	GND	JN4.24	A12
C13	JN4.25	B13	+5v	JN4.26	A13
C14	JN4.27	B14		JN4.28	A14
C15	JN4.29	B15		JN4.30	A15
C16	JN4.31	B16		JN4.32	A16
C17	JN4.33	B17		JN4.34	A17
C18	JN4.35	B18		JN4.36	A18
C19	JN4.37	B19		JN4.38	A19
C20	JN4.39	B20		JN4.40	A20
C21	JN4.41	B21		JN4.42	A21
C22	JN4.43	B22	GND	JN4.44	A22
C23	JN4.45	B23		JN4.46	A23
C24	JN4.47	B24		JN4.48	A24
C25	JN4.49	B25		JN4.50	A25
C26	JN4.51	B26		JN4.52	A26
C27	JN4.53	B27		JN4.54	A27
C28	JN4.55	B28		JN4.56	A28
C29	JN4.57	B29		JN4.58	A29
C30	JN4.59	B30		JN4.60	A30
C31	JN4.61	B31	GND	JN4.62	A31
C32	JN4.63	B32	+5v	JN4.64	A32

Table 2 JN4 to JV1 VITA 35 pin mappings

Rear I/O 68 Pin SCSI

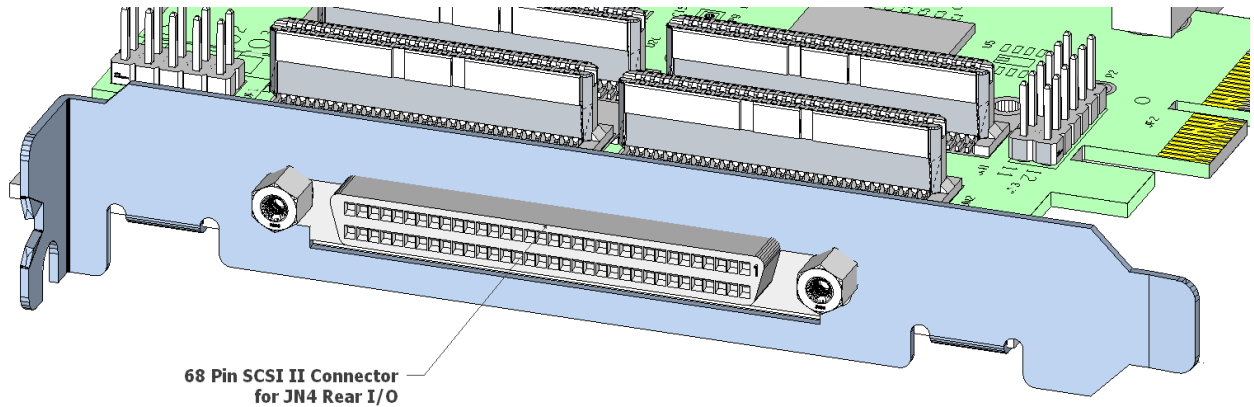


Figure 5 SCSI Connector Rear I/O

P/N 6778 & P/N 6777 and other similar boards have differential pair rear I/O.

The differential pair on the JN4 connector are offered in two pinouts Standard and VITA46.

ANSI/Vita 46.9-2010 “ANSI standard for VPX: PMC/XMC Rear I/O Fabric Signal Mapping on 3U and 6U VPX Modules” Defines rear I/O connection to P2, P3 and P5 VPX connectors (see www.vita.com)

The pairing on the SCSI connector remains the same for both pinouts.