OpenVPX™	VITA 62	HARTMANN ELECTRONIC A Phoenix Mecano Company

CompactPCI® Serial

Power Backplane 3U

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Impressum:
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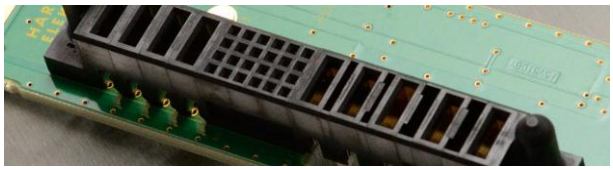
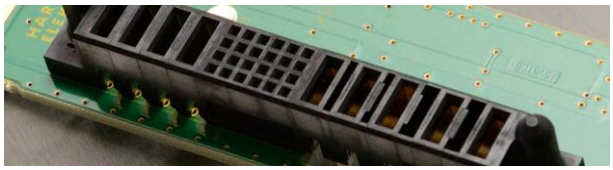


Hartmann Electronic is an established leader in the design and manufacturing of backplanes and electronic packaging for micro-computer systems. With over 30 years of experience in high-speed backplane design and manufacturing, Hartmann offers an extensive range of standard backplanes and system platform products supporting architectures including VME/64x, CompactPCI/2.16, AdvancedTCA, VPX, VXS, VXI, CompactPCIe, and others.



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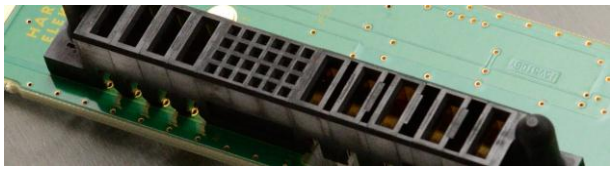


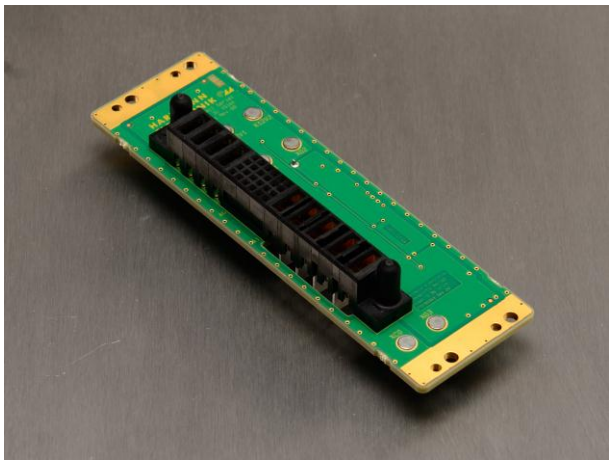
1 CPCI Serial Power Backplane 3U 1Slot

1.1 Key Features

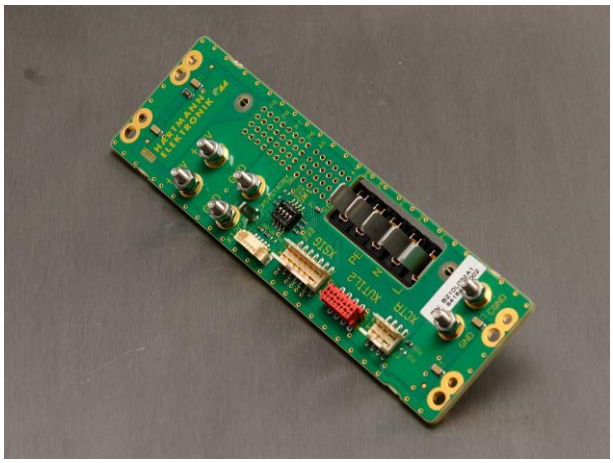
- Universal Input Voltage for VDC and VAC
- Max. Input Voltage (265V AC)
- limited by P(Out = 480W)
- Output (max.): 10732W (90% eff.)
- Output nominal:
  - 40A (12V, 480W)
  - 2A (5V STDBY,10W)
- M3 studs for output 12V, and 5VSTADBY
- PCB size 128.5 mm x 39,19 mm x 4.3 mm
- Operating temperature: -40° - +85°C
- Storage temperature: -55°C - +85°C
- Flammability rating: UL94-V0

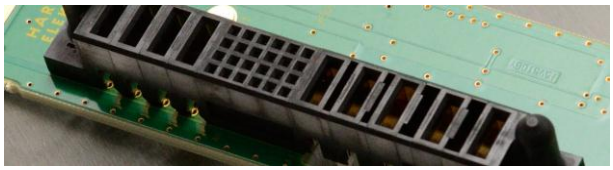
Part number: **B210L001A1**

Front side

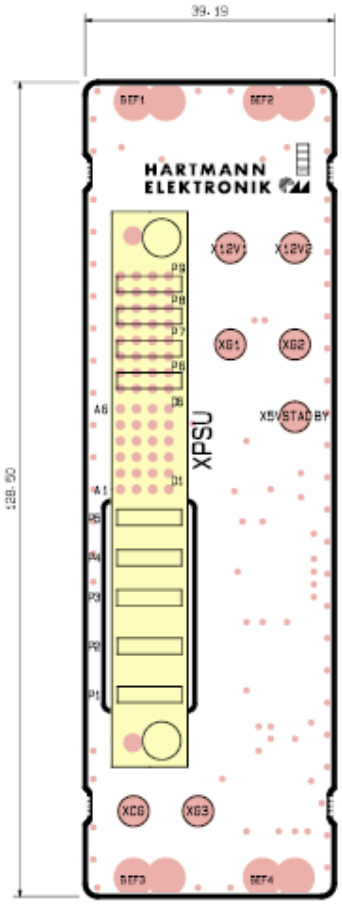


Rear side

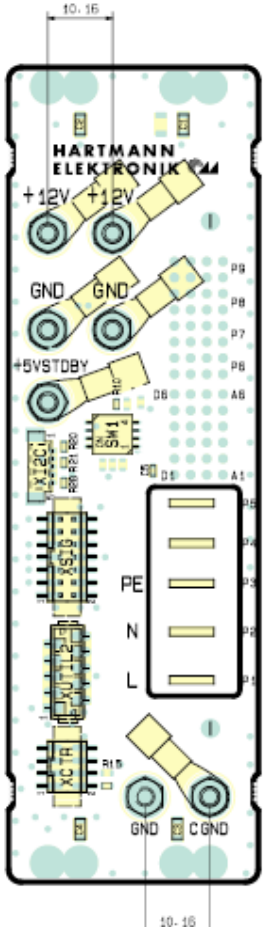




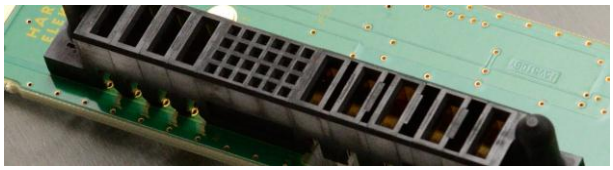
1.2 Layout



Front

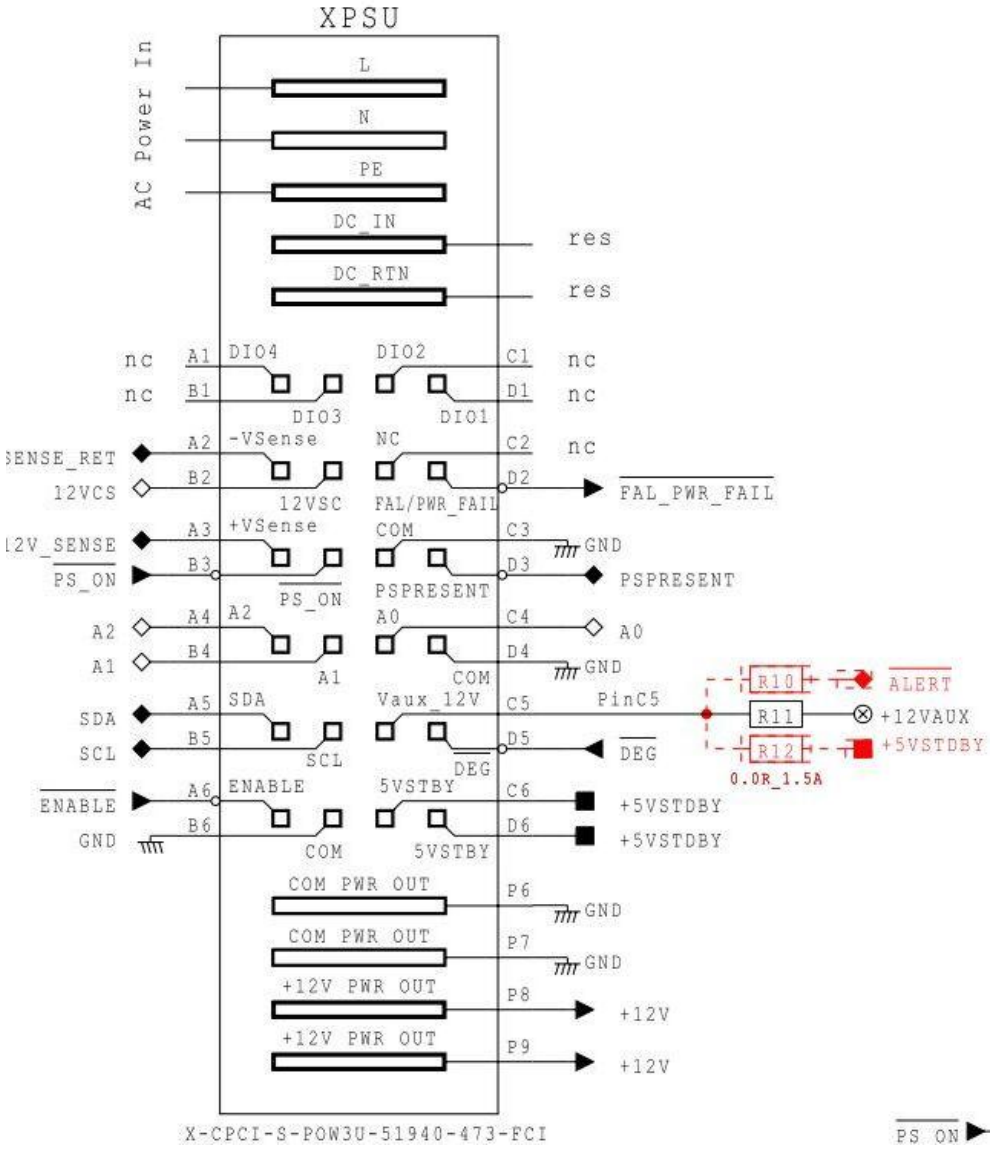


Rear

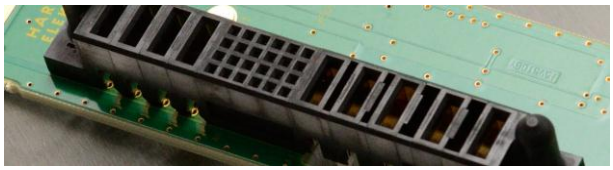


1.3 Connectors

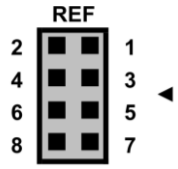
1.3.1 Connector XPSU



(R10, R12 are optional)



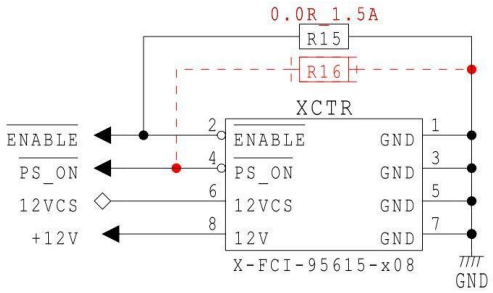
1.3.2 Connector for control of CPCI Serial Power Backplanes (XCTR)



1	GND
2	ENABLE
3	GND
4	PS_ON

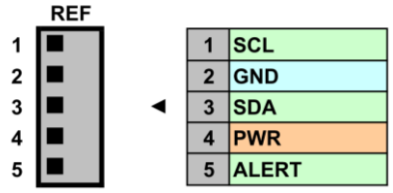
5	GND
6	12VCS
7	GND
8	12V

1,3: Return path for signals, grounded on VPX-Backplane
2: Enable PSU (in, L)
4: Turn on 12V and 12VAUX (in, L)
6: 12V current share



(R16 is optional)

1.3.3 IPMB Connector for CPCI Serial Power Backplanes (XI2C)

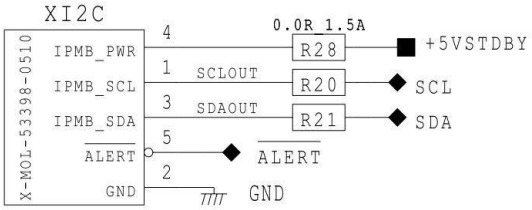


1	SCL
2	GND
3	SDA
4	PWR
5	ALERT

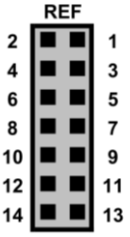
1,3: Serial clock and data, IPMB of CPCI-Serial

4: IPMB-Power is connected at CPCI-Serial-Backplane, optional connected to 5VSTDBY

5: Available at some PSUs



1.3.4 CPCI Serial - Signal Connector from Power Backplane to Backplane (XSIG)



1	Sense Return
2	+12V Sense
3	GND
4	PWR_FAIL
5	+5V STANDBY
6	ENABLE
7	+5V STANDBY

8	PS Present
9	GND
10	PS_ON
11	+12V
12	DEG
13	GND
14	+12V Auxiliary

1, 2: 12V Sense for voltage adjustment

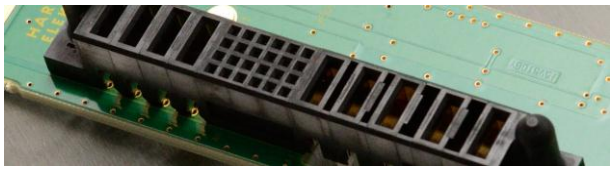
4: Failure in PSU (out, L)

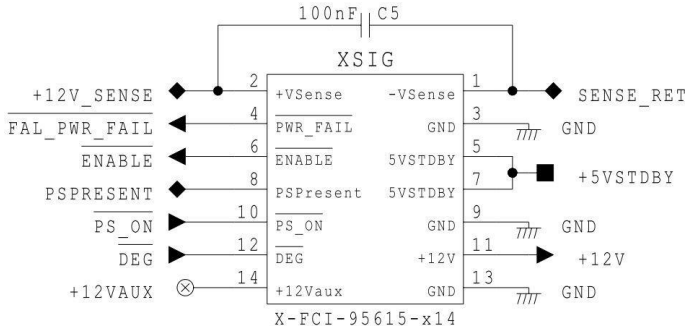
6: Enable PSU (in, L)

8: PSU present (out,H)

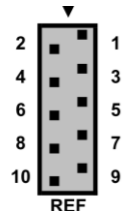
10: Turn on 12V and 12VAUX (in, L)

12: Voltage is degrading (out, L)





1.3.5 Utility Connector for CPCI Serial Power Backplane

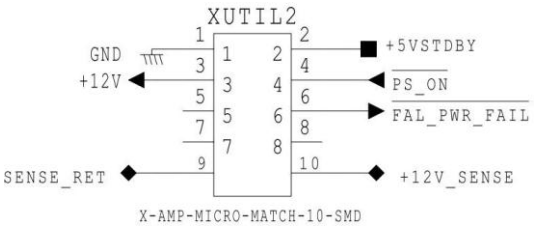


1	GND	6	PWR_FAIL
2	+5V STANDBY	7	NC
3	+12V	8	NC
4	PS_ON	9	Sense Return
5	NC	10	+12V Sense

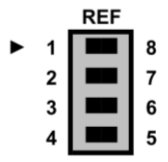
4: Turn on 12V and 12VAUX (in, L) according ATX-Spec.

6: Failure in PSU (out, L)

9,10: 12V sense for voltage adjustment



1.3.6 SW1 switch



	OPEN	CLOSED
1-8	PSU OFF	PSU ON
2-7	GA Bit 0 = 0	GA Bit 0 = 1
3-6	GA Bit 1 = 0	GA Bit 1 = 1
4-5	GA Bit 2 = 0	GA Bit 2 = 1

(RA0, RA1 RA2 resistors are optional for….)