

52911



PXI/cPCI PROGRAMMABLE DC POWER SUPPLY Model 52911

Chroma's Model 52911 Programmable power supplies are the industry's first embedded power supplies packaged on standard single-slot 3U PXI card formats. The advantages of using embedded PXI power supplies over conventional rack-and-stack power sources include; significantly faster execution speeds for great ATE throughput, size and weight reductions, and greater modularity thereby reducing spares and maintenance costs and increasing system up-time.

POWER LEVELS

The 52911 provides two independent and isolated 30W channels each programmable from 0-30VDC to a maximum of 2 amps. The instruments include programmable current limit to protect critical UUT's from excessive current as well as built-in isolation and remote sense relays. For greater power or voltage applications channels may be used in series or in parallel using an optional front panel mounted adapter module also available.

INPUT POWER

To avoid excess power draw from the PXI backplane, the 52911 draws input power (+48VDC) via front panel connections. This approach not only minimizes power

required from the backplane but also maintains complete isolation between backplane logic and power conversion circuitry for noise immunity. For applications where +48VDC is not available, Chroma provides an optional AC-DC adapter which allows the instrument to be operated from 115VAC/220VAC mains.

COMPLIANT TO PXI AND cPCI STANDARDS

The 52911 power supply cards comply with the latest PXI Revision 1.0 specifications of the PXI System Alliance (PXISA) as well as the CompactPCI specifications as defined by the PCI Industrial Computer Manufacturing Group (PICMG). Thus, the PXI200 may be used in either PXI or CompactPCI mainframes.

CONCLUSION

If you have selected PXI or cPCI for your next generation of ATE, considering taking full advantage of its benefits by eliminating antiquated rack-and-stack chassis and replacing them with embedded power supplies. The end result will be a more fully integrated system which is fast, elegant and cost effective.

Features :

- 1-Slot, 3U PXI card
- Dual Isolated outputs; 0-30VDC/2A/30W per output
- Programmable current limit
- Includes over voltage, over current, short circuit protection
- On-board isolation and remote sense relays
- 14 Bit read back of output voltage and current
- Outputs may be connected in parallel or series
- 16 bit DLLs provided

Chroma

SPECIFICATIONS	
Dimensions	3U PXI (single slot)
Output Voltage	Channel #1 0-30VDC, 2 Amp, 30W Channel #2 0-30VDC, 2 Amp, 30W
Voltage Accuracy	0.5% of programmed value +/- 50mV
Voltage setting resolution	12 Bits
Fault Protection	<ul style="list-style-type: none"> • Over-voltage • Over-temperature • Short Circuit
PARD (20MHz)	<200mV PK-PK (<50mV PK- PK with noise reduction adapter)
Line Regulation	0.1% (Low line to high line)
Load Regulation	0.1% (10% to 90% load change)
Current Limit Accy	0.5% +/- 50mA (12 Bits Resolution)
Read back Voltage and Current	0.2% of Reading
Input	
DC Input	Isolated +48VDC (dual)
AC Input (w/ Adapter 52911-1)	115V or 220VAC/ 50Hz or 60 Hz
Software API	<ul style="list-style-type: none"> • VISA compatible via National Instrument's VISA 2.5 or above • 20 Windows DLL's API
PCI Data Bus	PCI V2.2 compliant, 33MHz, 32 Bits
Operating Temperature	0-40 deg C (ambient air)
Operating Humidity	10% ~ 90 % relative
Storage Temperature	0 °C ~ 70 °C
ISOLATION	
Channel to Channel	500V
Channel to Chassis	500V
Standards	<ul style="list-style-type: none"> • PXISA PXI 1.0 • PICMG 2.0 R3.0 CompactPCI

All specifications are subject to change without notice.

Order Information

52911: PXI/cPCI Programmable Power Supply

