VPX-800-DC-270
800 Watts
Conduction Cooled
OpenVPX VITA 62 Compliant

800 Watts in a 6U x 5 HP (1") x 160mm Modular Design
270Vdc Input per MIL-STD-704 Versions E & F
VITA 62 Outputs; +12V/37A, +5V/40A, Aux_+3.3V/40A, Aux_+12V/1A, Aux_-12V/1A
No Minimum Load Required
Custom Input/Output Configurations Available
N+1 Redundant with Internal Oring FET’s/Diodes
VITA 62 Card Guide Style Conduction Cooled
1 Inch Pitch Form Factor with Wedge Lock Retainers
Side Covers Support Two-Level Military Maintenance Requirements
Ruggedized Mechanical Design
One Year Warranty
Greater than 150,000 Hrs MTBF
Proudly Made in U.S.A.
Nominal Input Voltage: 270 Vdc, 3.5A.
Operational Input Voltage Range: 240-290 Vdc, with input transient protection to 200 & 370 Vdc for 50 ms exceeding limits per MIL-STD-704E/F.
Inrush Current: Less than 4 msec, 80 amperes @ 270 Vdc.
Reverse Input Voltage: Reverse input protection to rated DC voltage.
Fusing: 6.3 Ampere, 400 Vdc, Internal ceramic body fuse.
Hold up time: 10msec minimum after loss of DC input at full load and nominal input.
Efficiency: 87% typical
Turn on time: 1 sec max. from power up.
Line and Load Regulation: ±2% over DC input range and 0 to 100% load change.
Minimum Load: No minimum load required.
Ripple & Noise: Through 20MHz, 1% max. or 50mv whichever is greater for all outputs, peak to peak, with coaxial probe and 0.1uF/10uF capacitors at the connector.
Transient Response: Output maximum excursion of ±5% for 25% load step. Recovery less than 500 µsec.
Overshoot: Less than 5%.
Output Isolation: Isolated from chassis ground, 100 Vdc.
Input/Output Isolation: 1500Vdc from input to both chassis/outputs.
Reverse Voltage: Protected against reverse voltage to supply current rating.
Overvoltage Protection: Shutdown at 130% of nominal Vout. Recycle input power to reset.
Overtemperature Protection: Unit shuts down if overheated. Recycle input.
Current Limiting: All outputs protected with current limit. Automatic recovery when overload or short is removed.
Paralleling: Two or more supplies can be operated in parallel and will share +12V and +5V current to within ±10% of each other.
Redundant: Full power N+1 redundant with integral Oring FET’s/Diodes.
Remote Sense: Compensates for up to 0.5V total distribution voltage drop on the +12V and +5V outputs.
Enable*: VITA 62 compliant. Reference SPI’s VPX Signal data sheet for more details.
INHIBIT*: VITA 62 compliant. Reference SPI’s VPX Signal data sheet for more details.
SYSRESET*: VITA 62 compliant. Reference SPI’s VPX Signal data sheet for more details.
FAIL*: VITA 62 compliant. Reference SPI’s VPX Signal data sheet for more details.
Indicators: Green LED indicating Input OK, Red LED indicating a power supply fault.
Cooling: Conduction cooled via wedge lock retainers.
Operating Temperature: -40°C to 71°C (at wedge lock edge) 800W Up to 85°C at 750W.
Stability: All outputs 0.1% for 8 hrs. after 30 minute warm-up.
Humidity: Up to 95% non-condensing.
Storage Temperature: -55°C to 105°C.
Connectors: VITA 62 compliant
Size: 6U x 5HP (1") x 160mm Weight: 3.5 lbs.
EMC: Designed to meet Mil-Std-461F with SPI’s external filter, Top Assembly 25860, or equivalent.
Common Options: Conformal coating with Paylene & special output configurations. Consult factory for more details on a tailored solution which meets your requirements.