

AC/DC Industrial Type

80 Watts

JPM80 Series

XPiQ inc.

Intelligent Design Quality Product



CE Marked LVD

•
Low Cost

•
High Reliability

•
Power Factor Corrected

•
Low Ripple Noise

•
Adjustable Output

Specification

Input

Input Voltage	• 85-264 VAC
Input Frequency	• 47-63 Hz
DC Input Voltage	• 120-370 VDC
Power Factor	• 0.98 at 115 VAC, 0.96 at 230 VAC
Input Current	• 1.3 A max at 115 VAC
Inrush Current	• 40 A at 230 VAC cold start
Start-Up time	• 600 ms
Rise Time	• 30 ms

Output

Output Voltage	• 3.3 V to 48 V single outputs
Output Power	• 80 Watts, see table
Output Voltage Adjustment	• +10%, -5%
Minimum Load	• 0 minimum load required
Tolerance	• $\pm 2\%$ max
Line Regulation	• $\pm 0.5\%$
Load Regulation	• $\pm 1\%$ max, see table
Ripple & Noise	• 100 mV typical, see table
Transient Response	• 5% max deviation, 500 μ s recovery time for a 50% load change
Temperature Coefficient	• 0.05%/°C
Hold Up Time	• 20 ms minimum at 230 VAC
Overvoltage Protection	• 110-135 %
Overcurrent Protection	• 140-170%, constant current auto restart

General

Efficiency	• See Table
MTBF	• 100,000 hrs min
Leakage Current	• <2 mA at 240 VAC
Isolation Voltage	• 3000 VAC Input to Ground 1500 VAC Input to Output 500 VAC Output to Ground
Size	• 7.05" x 3.90" x 1.77"
Weight	• 600 grams

Environmental

Operating Temperature	• -10 °C to +60 °C (see derating chart)
Cooling	• Convection cooled
Humidity	• 20-90% RH non condensing
Storage Temperature	• -20 °C to +85 °C
Shock & Vibration	• 10-500 Hz 2 G 10 min/cycle for 60 min each axis

Safety and EMC

Safety Approvals	• UL1950, CSA C22.2 No 950 per cUL EN60950, CE Mark LVD
EMI/EMC	• Meets EN61000-3-2, -3 ENV50204 CISPR22 (EN55022) Class B
Immunity & Surge	• EN61000-4-2, -3, -4, -5, -6, -8, -11


OUTPUT VOLTAGE & CURRENT RATINGS						JPM80
Output Voltage	Output Current	Output Power ⁽¹⁾	Ripple & Noise (Pk-Pk)	Load Regulation	Efficiency	Model Number ⁽²⁾
3.3 V	16.0 A	53 W	100 mV	±1.0%	70%	JPM80PS03
5.0 V	16.0 A	80 W	100 mV	±1.0%	76%	JPM80PS05
7.5 V	10.7 A	80 W	100 mV	±1.0%	80%	JPM80PS07
12.0 V	6.8 A	80 W	100 mV	±0.5%	81%	JPM80PS12
13.5 V	6.0 A	80 W	100 mV	±0.5%	82%	JPM80PS13
15.0 V	5.3 A	80 W	100 mV	±0.5%	83%	JPM80PS15
24.0 V	3.4 A	80 W	150 mV	±0.5%	84%	JPM80PS24
27.0 V	3.0 A	80 W	150 mV	±0.5%	85%	JPM80PS27
48.0 V	1.7 A	80 W	250 mV	±0.5%	85%	JPM80PS48

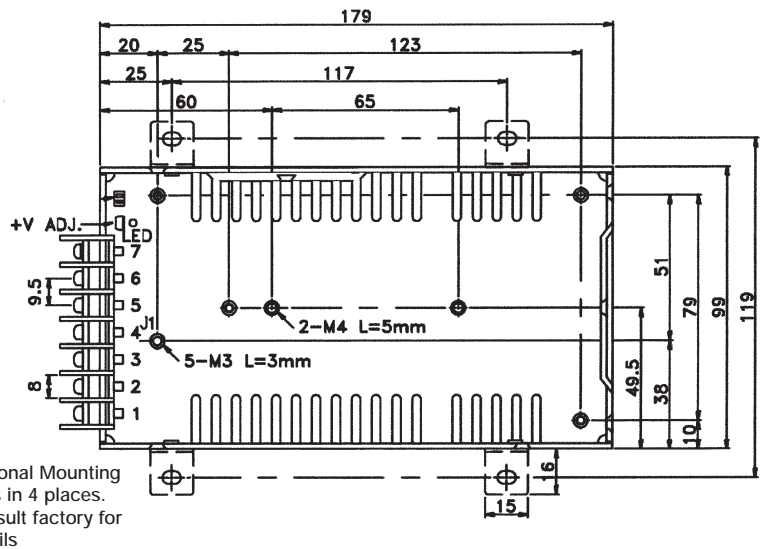
Notes

1. Max output increases to 125% of rated power when input voltage is between 180 VAC to 264 VAC and ambient temperature is less than +40 °C convection cooled or +55 °C with 18 CFM airflow.
2. Part numbers in bold type are standard stock models, all others are build to order.
3. For optional Remote On/Off, add suffix "R" to part number. Example: JPM80PS03R On=3-15 VDC, Off=<3 VDC.

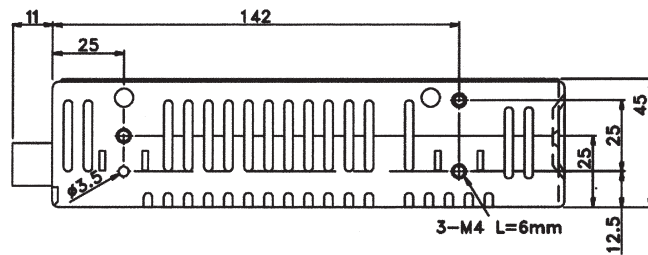
Mechanical Details - 80 Watts

Dimensions in inches (mm).

TERMINAL Pin No. Assignment
 PIN 1,2: AC Input
 Pin 3: FG 
 Pin 4,5: DC Output -V
 Pin 6,7: DC Output +V
 Weight: Approx 600 grams



Optional Mounting
 Tabs in 4 places.
 Consult factory for
 details



Derating Graph - 80 Watts

