

MWC100 Class II

100 Watt Medical Desktop Power Supply

- 5-Year Limited Warranty
- High Efficiency: Level VI
- Power Factor Correction
- High Power Density 4.8W/in³
- Lifetime Expectation >5 years
- Hold-up Time >48ms at full load
- EISA, CEC Compliant
- Floating output
- Medical Approval - EN60601-1 Class II

Elpac Part Number	Output Voltage	Output Current	Peak Current ¹	Total Regulation ²	Typical Efficiency ³
MWC100019B-10A	19.0V	5.26A	6.3A	±5%	90%

Notes

1 Maximum peak load (120W) lasting 500ms with a maximum 10% duty cycle.

2 Includes initial setting, line regulation, load regulation, and thermal drift.

3 Typical at 115VAC (including output cable).

Input

Input Voltage	85 - 264VAC; 100 - 240VAC Nominal
Input Frequency	47 - 63Hz
Input Current	<1.5A rms
Inrush Current	<37A at 230VAC cold start
Power Factor	>0.97
Zero Load Power Consumption	<0.04W

Output

Output Voltage	See Table
Total Regulation	+/-5%
Minimum Load	No minimum load required
Start-Up Delay	<1s
Hold-Up Time	>48ms at any input voltage
Ripple & Noise	<1% pk-pk *
Over Voltage Protection	110-135%
Over Temperature Protection	Active - Recoverable; plus Passive - Non Recoverable
Over Current Protection	120 - 180%
Short Circuit Protection	shutdown, auto-restart (hiccup mode)

Notes

* Ripple and noise measured with 20MHz bandwidth; 10µF tantalum capacitor in parallel with a 0.1µF ceramic capacitor.


General

MTBF	min. 200,000 hours demonstrated
Size	7.09" (180.2mm) x 2.27" (57.5mm) x 1.52" (38.6mm)
Weight	1.52 lbs (0.69 kg)
Power Density	4.2W/in3

Environmental

Operating Temperature	0 – 60°C (Full load to 40°C, derate linearly to 50% load at 60°C)
Storage Temperature	-40°C to +85°C
Relative Humidity	5-95%, non-condensing
Cooling	Natural Convection
Vibration	All units production tested to 19.6m/s2

EMC & Safety

Emissions	FCC class B, CISPR11 class B EN61000-3-2, -3
Immunity	EN61000-4-2, -3, -4, -5, -6, -8, -11
Certified by TUV to the following:	cTUVus, CCC, RSM
	EN60601-1
	CAN/CSA-22.2 No.601.1-M90
	CB per IEC60601-1 3rd edition
	CE marked to LVD
EMI Beads	Beads are not required for Level B, but are optionally available

Input Configuration

Standard Input Cable	Not Provided
Connection on Power Supply Body	IEC 320 C8 Receptacle

Output Configuration

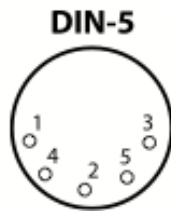
Standard Output Cable	6 ft.
Cord Size	2x16awg
Connector (PSU side)	Switchcraft 760 or equivalent
Mating Connector	Switchcraft 712A or equivalent

Output Pin Assignments



Center	+v1
Outside	Return

Output Pin Assignments



Pin 1 Return

Pin 2 Return

Pin 3 +V1

Pin 4 Return

Pin 5 +V1

