



## **FWA150 Series**

### 150 Watt ITE Desktop Power Supply

- High Efficiency: Level V
- High Power Density 5.4W/in<sup>3</sup>
- Lifetime Expectation >5 years
- Hold-up Time >25ms at full load
- Power Factor Correction
- EISA, CEC Compliant
- Safety Approval - EN6050-1
- Class I

## **Overview**

Over the later part of 2015, we will be changing the way we sell ITE power supplies thru distribution to no longer include AC cords with the units. During this time of transition you find both versions available for sale. They can be distinguished by the part number, parts ending in -11B or -12B will include a cord in the box, parts ending in -11A or -12A will not include a cord. If your distributor has not already made a recommendation on a cord, please do not hesitate to ask us for assistance.

Elpac Part Number	Output Voltage	Output Current	Peak Current <sup>1</sup>	Total Regulation <sup>2</sup>	Typical Efficiency <sup>3</sup>
FWA150012A-12A	12.0V	12.5A	15.0A	±5%	89%
FWA150012A-12B	12.0V	12.5A	15.0A	±5%	89%
FWA150015A-12B	15.0V	10.0A	12.0A	±5%	90%
FWA150015A-12A	15.0V	10.0A	12.0A	±5%	90%
FWA150018A-12B	18.0V	8.3A	10.0A	±5%	90%
FWA150018A-12A	18.0V	8.3A	10.0A	±5%	90%
FWA150024A-12A	24.0V	6.3A	7.5A	±5%	91%
FWA150024A-12B	24.0V	6.3A	7.5A	±5%	91%
FWA150048A-11B	48.0V	3.2A	3.75A	±5%	92%
FWA150048A-11A	48.0V	3.2A	3.75A	±5%	92%

**Notes**

1 Maximum peak load (180W) 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	<2A rms
Inrush Current	<37A at 230VAC cold start
Power Factor	>0.97
Zero Load Power Consumption	<0.5W
Touch Leakage Current	<150µA @ 132VAC @ 60Hz <250µA @ 264VAC @ 60Hz

## Output

Output Voltage	See Table
Total Regulation	+/-5%
Minimum Load	No minimum load required
Start-Up Delay	<1.5s
Hold-Up Time	>25ms 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; 10 $\mu$ F tantalum capacitor in parallel with a 0.1 $\mu$ F ceramic capacitor.


## General

Efficiency	Avg Efficiency 90.8% @ 115VAC; 92.8% @ 230VAC
MTBF	min. 200,000 hours demonstrated
Size	7.56" (192mm) x 2.45" (62.2mm) x 1.52" (38.7mm)
Weight	1.55 lbs (0.70 kg)
Power Density	5.4W/in <sup>3</sup>

## 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/s <sup>2</sup>

## EMC & Safety

Emissions	FCC class B, CISPR22 class B Conducted and Radiated
Immunity	EN61000-3-2, -3; EN61000-4-2, -3, -4, -5, -6, -8, -11
Certified by TUV to the following:	cTUVus
	UL 60950-1
	CAN/CSA-22.2 No.60950-1
	CB per IEC60950-1
	CE marked to LVD & EMC Directive

## Input Configuration

Standard Input Cable	Not Provided
Connection on Power Supply Body	IEC 320 C14 Receptacle

## Output Configuration (12V, 15V)

Standard Output Cable	4 ft.
Cord Size	4x16awg
Connector (PSU side)	Switchcraft DIN-8,P/N 15BL8M (male pins)
Mating Connector	Switchcraft 62GB8FX (8 pin) or equivalent

## Output Configuration (18V)

Standard Output Cable	6 ft.
Cord Size	4x16awg
Connector (PSU side)	Switchcraft DIN-8, P/N 15BL8M (male pins)
Mating Connector	Switchcraft 62GB8FX (8 pin) or equivalent

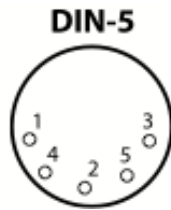
### Output Configuration (24V)

Standard Output Cable	6 ft.
Cord Size	4x18awg with EMI bead
Connector (PSU side)	Switchcraft DIN-8, P/N 15BL8M (male pins)
Mating Connector	Switchcraft 62GB8FX (8 pin) or equivalent

### Output Configuration (30V, 48V)

Standard Output Cable	6 ft.
Cord Size	4x18awg
Connector (PSU side)	Switchcraft DIN-5, P/N 05GM5M (male pins)
Mating Connector	Switchcraft 57GB5FX (5 pin) or equivalent

### Output Pin Assignments



Pin 1	Return
Pin 2	Return
Pin 3	+V1
Pin 4	Return
Pin 5	+V1

## Output Pin Assignments



Pin 1	+V1
Pin 2	+V1
Pin 3	Return
Pin 4	+V1
Pin 5	Return
Pin 6	+V1
Pin 7	Return
Pin 8	Return

