# **WLP75** Industrial



#### **Features**

- 3 x 2 x 1 Inches Form factor
- 75 Watts Convection
- Efficiencies upto 93%
- -40 to 70 degree operating temperature
- Thermal Shut-Down feature
- 2.00m Hours, Telcordia-SR332-issue 3
- Standby Power < 0.3W</li>

Electrical Specifications					
Input Voltage	85-264 VAC/390 VDC <sup>4</sup> , Universal (Derate from 75W at 100V AC to 65W at 85V AC)				
Input Frequency	47–63 Hz				
Input Current	115 VAC: 1 A max. 230 VAC: 0.5 A max.				
No Load Power	less than 0.3W typical				
Inrush Current	115 VAC – 25 A, 230 VAC – 45 A, 264 VAC – 75 A				
Efficiency	93%(48V,58V). 91%(24V,30V), 90%(12V,15V)				
Hold-up Time	>16 ms typical				
Power Factor	exceeds 0.95 with Full Load, Active PFC				
Output Power	75W Convection				
Output Voltage Adjustability	+/-3%				
Line Regulation	+/-0.5%				
Load Regulation	+/-1%				
Transient Response	25% step load change, at 0.1A/uS slew rate, 50% duty cycle, 50Hz=4%,				
	recovery time < 5 ms				
Rise Time	55ms typical				
Set Point Tolerance	+/-1%				
Over Current Protection	Тур 110%				
Over Voltage Protection	110 to 140%, Latch type (AC recycling required)				
Short Circuit Protection	Hiccup mode				
Switching Frequency	60 KHz typical				
Operating Temperature*	-40 to +70°C				
Storage Temperature	-40 to +85°C				
Relative Humidity	5% to 95%, noncondensing				
Altitude	Operating: 16,000 ft.; Nonoperating: 40,000 ft.				
MTBF	2.00m Hours, Telcordia-SR332-issue 3				
Isolation Voltage	Input to Output – 3000V AC for ITE application				
	Input to GND - 1500 VAC				
Cooling	75W with natural convection cooling at 100 to 264VAC.				

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Model Number	Description	Voltage	Max. Load (Convection)	Min. Load	Ripple <sup>1</sup>	
LFWLP75-1001	with Screw Terminal	12 V	6.25A	0.0 A	1%	
LFWLP75-1301	with Molex Header	12 V	6.25A	0.0 A	1%	
LFWLP75-1002	with Screw Terminal	15 V	5.00A	0.0 A	1%	
LFWLP75-1302	with Molex Header	15 V	5.00A	0.0 A	1%	
LFWLP75-1003	with Screw Terminal	24 V	3.12A	0.0 A	1%	
LFWLP75-1303	with Molex Header	24 V	3.12A	0.0 A	1%	
LFWLP75-1004	with Screw Terminal	48 V	1.56A	0.0 A	1%	
LFWLP75-1304	with Molex Header	48 V	1.56A	0.0 A	1%	
LFWLP75-1005	with Screw Terminal	30 V	2.50A	0.0 A	1%	
LFWLP75-1305	with Molex Header	30 V	2.50A	0.0 A	1%	
LFWLP75-1006	with Screw Terminal	58 V	1.29A	0.0 A	1%	
LFWLP75-1306	with Molex Header	58 V	1.29A	0.0 A	1%	
LFWLP75-CK metal cover kit accessory						

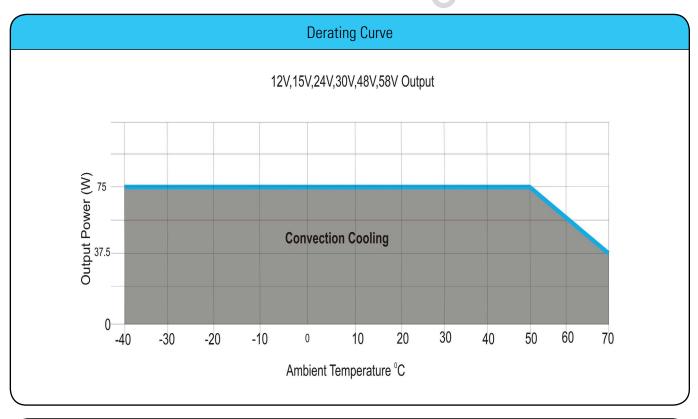
Connectors					
J1	Pin 1	AC LINE			
	Pin 2	NOT FITTED			
	Pin 3	AC NEUTRAL			
J2	Pin 1,2	V1 -VE			
	Pin 3,4	V1 +VE			

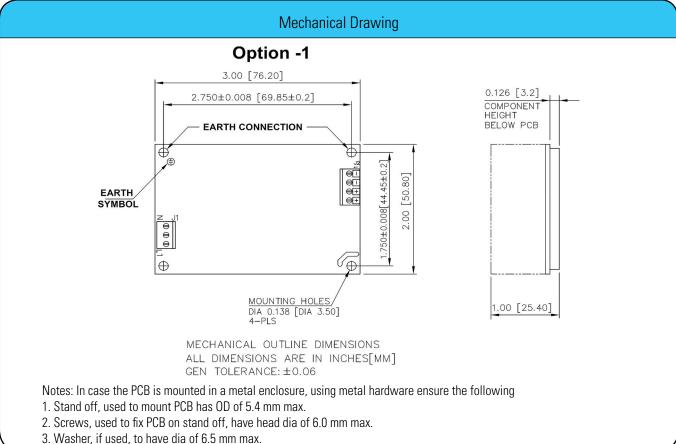
#### Notes

- 1. Ripple is peak to peak with 20 MHz bandwidth and 10  $\mu$ F (Tantalum capacitor) in parallel with a 0.1  $\mu$ F capacitor at rated line voltage and load ranges.
- 2. Specifications are for nominal input voltage, 25°C unless otherwise stated.
- 3. -40 to 0°C startup is guaranteed with spec deviation in output ripple and voltage regulation.
- 4. Functional, not approved.

Mechanical Specifications						
AC Input Connector (J1) Option 1	Molex: 39357-0003	Option 2	Molex: 1722861103			
	Tyco: 2-1776112-3		(Mating conn: Molex 1722561003)			
DC Output Connector (J2) Option 1	Molex: 39357 -0004	Option 2	Molex: 1722861104			
	Tyco: 2-1776112-4		(Mating conn: Molex 1722561004)			
Dimensions	3 x 2 x 1 inches					
	(76.2 x 50.8 x 25.4 mm)					
Weight	180gm Max.					
EMC						
CE Mark	Complies with LVD Directive	)				
Conducted Emissions	EN55022-B, CISPR22-B, FC	EN55022-B, CISPR22-B, FCC PART15-B				
Static Discharge	EN61000-4-2, Level-3	EN61000-4-2, Level-3				
RF Field Susceptibility	EN61000-4-3, Level-3	EN61000-4-3, Level-3				
Fast Transients/Bursts	EN61000-4-4, Level-3	EN61000-4-4, Level-3				
Radiated Emissions	Level A radiated,	Level A radiated,				
	Level B radiated with extern	al core				
	(King core K5B RC 25x12x15	-M in input cable with	n 5 Turns)			
Surge Susceptibility	EN61000-4-5, Level-3					
Harmonic Current	EN61000-3-2, Class D	EN61000-3-2, Class D				
	Safety					
Safety Standard(s)	EN60950-1, IEC 60950-1:2005 (	Ed 2) , UL 60950-1 Ed 2, (	CAN/CSA C22.2 No. 60950-1-07 Ed 2 ,			
,	GB4943. 1-2011 ; GB9254-2008 ; GB17625. 1-2012					
Approval Agency	Nemko, UL, C-UL, CCC					
Safety File Number(s)	CB TEST CERTIFICATE: NO88704					
	Nemko: No. P15220324					
	UL: E150565					
Environmental						
RoHS Version	RoHS Version LFWLP75 series meet RoHS compliance as per european RoHS directive					
	(Directive 2011 / 65 / EU)					

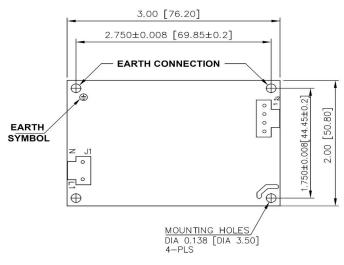
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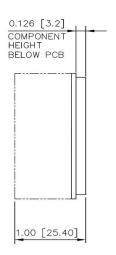




### Mechanical Drawing

## Option -2





MECHANICAL OUTLINE DIMENSIONS ALL DIMENSIONS ARE IN INCHES[MM] GEN TOLERANCE: ±0.06

Notes: In case the PCB is mounted in a metal enclosure, using metal hardware ensure the following

- 1. Stand off, used to mount PCB has OD of 5.4 mm max.
- 2. Screws, used to fix PCB on stand off, have head dia of 6.0 mm max.
- 3. Washer, if used, to have dia of 6.5 mm max.

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