

# LXC50 series

## LED Power Supply

### Constant Current Power Supplies

LED Power  
50W

#### LED POWER

next generation power source

#### FEATURES

- High Efficiency (up to 88%)
- Constant Output Current
- Active PFC (Typical 0.87)
- IP67 Waterproof
- OVP, SCP
- -35 to 60°C deg operation
- Universal Input 90-264VAC
- UL8750 recognised
- EN61347-1, -2-13 compliant

The LXC50 series of constant current LED power supplies from Excelsys Technologies can deliver up to 50W of output power in an extremely compact package size.

The LXC50 series of constant current power supplies provides up to 3000mA of output current and 142V output voltage solutions for specific LED requirements. With industry leading efficiencies, and an extensive protection feature set, the LXC50 series provides high reliability and high performance in a compact package

The LXC50 series carries the CE mark for safety and is also RoHS compliant. For more details contact [sales@excelsys.com](mailto:sales@excelsys.com)

Model Number	Output Voltage	Output Current	Input Voltage	OVP Latching max	Efficiency
LXC50-0350S	71-142V	350mA	90-264VAC	213V	88.0%
LXC50-0450S	56-111V	450mA	90-264VAC	167V	88.0%
LXC50-0700S	36-72V	700mA	90-264VAC	108V	88.0%
LXC50-1050S	24-48V	1050mA	90-264VAC	72V	88.0%
LXC50-1190S	21-42V	1190mA	90-264VAC	63V	87.0%
LXC50-1400S	18-36V	1400mA	90-264VAC	54V	87.0%
LXC50-2100S	13-24V	2100mA	90-264VAC	36V	86.0%
LXC50-2770S	9-18V	2770mA	90-264VAC	27V	85.0%
LXC50-3000S	7-12V	3000mA	90-264VAC	18V	84.0%

#### Input Specifications

Parameter	Conditions/Description	Min	Nom	Max	Units
Input Voltage Range	Universal Input	90		264	VAC
Input Frequency Range		47		63	Hz
Input Current	100VAC in, 50W output			0.7	A
Inrush Current	230VAC in, 25°C, Cold Start			65	A
Power Factor	220VAC, 110VAC	0.84		0.87	

#### Output Specifications

Parameter	Conditions/Description	Min	Nom	Max	Units
Line Regulation				±1	%
Load Regulation				±3	%
Voltage Range	% of Vout	50		100	%
Output Current Range	% of Vout			±5	%
Ripple and Noise	20MHz Bandwidth. See Note 1			2.0	% pk-pk
Overshoot				10	%
Turn-on Delay	Measured at 220VAC and full load			3	s
Short Circuit Protection	Auto Recovery				
Over Voltage Protection	Latching. See individual models OVP levels				

#### General Specifications

Parameter	Conditions/Description	Min	Nom	Max	Units
Isolation Voltage	Input to Output See Note 2	3000			VAC
	Input to Chassis	1500			VAC
Efficiency	See individual models		88		%
Safety Agency Approvals	UL8750, EN61347-1, -2-13				
No load Power Dissipation	Measured at 230 Vac			1.0	W
MTBF	Telecordia SR-33, 25°C		2,000,000		Hours
Lifetime	25°C		80,000		Hours
Weight			460		g
Operating Temperature		-35		+60	°C
Storage Temperature		-40		+85	°C
Relative Humidity	Non-condensing (operating)	10		100	%RH

Note 1. Output connected in parallel with 0.1uF ceramic capacitor and 10uF electrolytic capacitor.  
 Note 2. Primary to Secondary Isolation test not to be carried on power supply.

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EMC				
Parameter	Standard		Level	Units
<b>Emissions</b>				
Conducted	EN55015		Level B	
Radiated	EN55015		Level B	
Harmonic Distortion	EN61000-3-2		Compliant	
Flicker and Fluctuation	EN61000-3-3		Compliant	
<b>Immunity</b>				
ESD	EN61000-4-2		Level 4	
Radiated RFI	EN61000-4-3		Level 3	
Fast Transients - burst	EN61000-4-4		Level 4	
Conducted RFI	EN61000-4-6		Compliant	
Power Freq Magnetic Field	EN61000-4-8		Compliant	
Voltage Dips	EN61000-4-11			

**INPUT / OUTPUT WIRING**

**INPUT CABLE**

SJTW 18AWG 2C  
Black (L) and White(N) 340±20mm

**OUTPUT CABLE**

SJTW 18AWG 2C  
Black (-V) and Red (+V) 340±20mm

**MECHANICAL SPECIFICATIONS**

