TPS-YSU50SL Series

Single Output Open Frame Power Supply

Features

- Wide input voltage range
- Overload, and Short-Circuit Protection
- Low Power, Compact Size, High Efficiency
- Compliant with CE Certification Requirements
- Full Load Burn-In Test

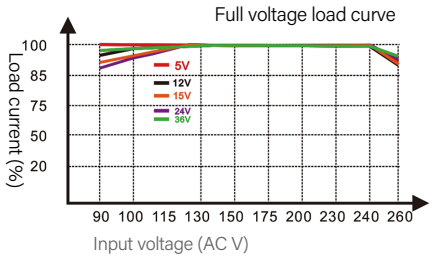
Specifications

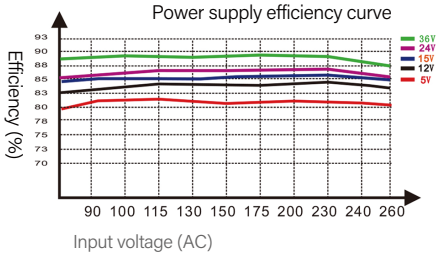
Model		TPS-YSU50SL-5V	TPS-YSU50SL-12V	TPS-YSU50SL-24V
Output	Output Voltage	5V	12V	24V
	Rated Current	8A	4.5A	2.3A
	Current Range	0-8A	0-4.5A	0-2.3A
	Ripple (Max)	100mVp-p	100mVp-p	100mVp-p
	Output Accuracy	±1%	±1%	±1%
	Voltage Regulation Rate	±1%	±1%	±1%
	Load Regulation Rate	±1.1%	±1.1%	±1.1%
	Rated Power	33W	54W	55W
	Efficiency	79%	84.0%	87.0%
	Start-up、Rise、Hold-up Time	100ms/50ms/50ms@24VAC		
Input	Input Voltage Range	100~240VAC		
	Input Current	<1.2A(Average Current 0.35-0.75A)		
	Input Frequency	47-63Hz		
	Inrush Current	Cold Start: <50A@230VAC		
	Leakage Current	<5mA@230VAC		
Protection	Overpower Protection	135-170% of rated power(13-15A), with automatic recovery after fault removal.		
	Overvoltage Protection	VH1: >35%		
	Short Circuit Protection	Hiccup mode: Automatically recovers after short circuit removal.		
	Overtemperature Protection	Power Supply Temperature Rise: >115°C, output shuts down.		
	Cooling Method	Forced convection cooling with a fan is required to operate at nominal rated power."		
Environmental	Operating Temperature/Humidity	"-25～+50°C @100% Load,+60°C@60% Load. 20～90%RH"		
	Storage Temperature/Humidity	"-20～85°C, 10～95%RH"		
Safety and EMC	Safety/EMC	EN61000-3-2-3/EN 61000-4-4/EN55022 CLASSB		
	Withstand Voltage	I/P-O/P:3.0KVAC I/P-FG:1.5KVAC O/P-FG: 0.5KVAC 1min.		
	Insulation Resistance	I/P-O/P, I/P-FG, O/P-FG: 500VDC/100M Ohms		
Other	Dimensions(L*W*H)	76×46×25mm		
	Weight	about 120g		

Notes	1. All parameters are measured under the following conditions: rated input voltage of 220V AC, rated load, ambient temperature of 25°C, and humidity of 70%. 2. Accuracy: Includes setting error, voltage regulation, and load regulation. 3. Ripple testing: Connect the power supply and load with a 30CM twisted pair. The load is connected with a 0.1μF ceramic capacitor and a 47μF capacitor, and measured at the load end using a 20MHz oscilloscope. 4. Voltage regulation: Measured with the input voltage varying from low to high under rated load conditions. 5. Load regulation: Measured with the output varying from 0% load to 100% load. 6. Each channel can output the maximum current, but the total load across all channels must not exceed the maximum output power.

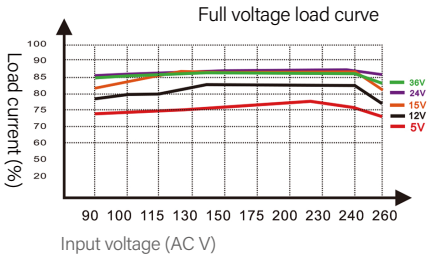
Characteristic Curve

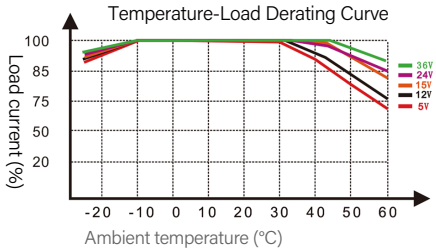
- Fan Cooling

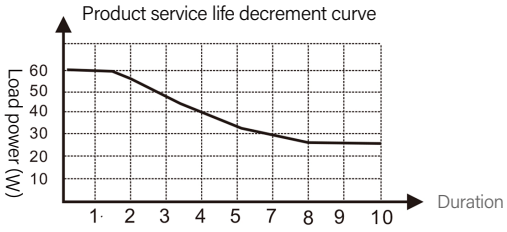




- Natural Cooling

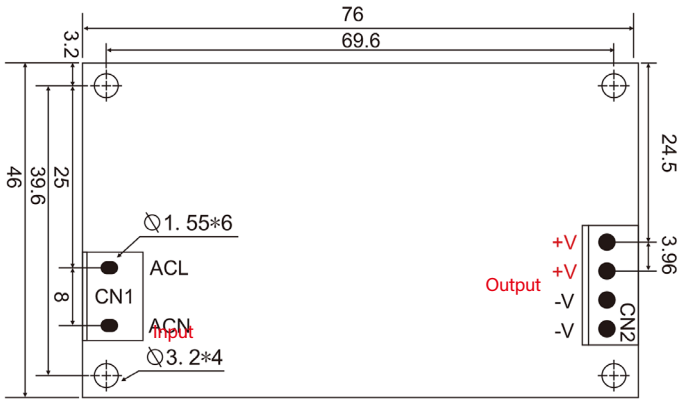


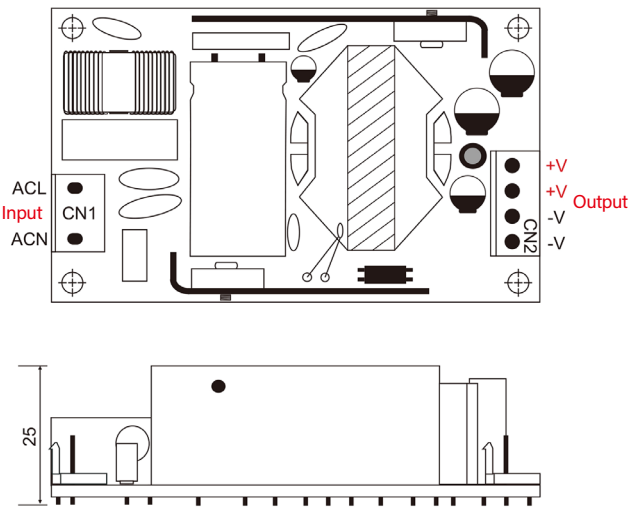




Mechanical Dimensions

mm





This electronic device must not be disposed of in the household waste at the end of its service life. For your return, there are free collection points for electrical appliances and, if necessary, additional points of acceptance for the reuse of the devices in your area.The addresses an be obtained from your city or cummunal administration. If the old electrical or electronic device contains personal data, you are esponsible for deleting it before you return it. Further information: www.elektrogesetz.de