AC – DC

Features

- Universal input 90~264V DC
- Operating temperature 0~40oC
- Approved to UKCA, CE, TUV-GS, cULus, RCM (C-Tick), CCC, FCC & RoHS<
- IEC/EN 60601-1 Safety Approved
- Single Output 12~24V dc
- OVP, OCP, OTP, SCP

Image for Illustration Purpose
Models may vary

Ideal Power's 15DYS851-xyW-RS 50W AC/DC External Desktop Power Supply (PSU) Series are certified to UKCA, CE, TUV-GS, cULus, RCM (C-Tick), CCC, FCC, RoHS & EN 60601-1/IEC 60601-1 Standards and comply with the relevant Efficiency Regulations. These are primarily used in Medical, ITE, Audio & Video Industries and customised solutions are available upon request.

Models

Model Number	Output Voltage (V dc)	Output Current (A)	Output Power (W)	Efficiency (%)
15DYS851-120416W-RS	12	4.16	49.92	87.7
15DYS851-150366W-RS	15	3.36	50	88

Input Data

	Min	Typical	Max	Units	Notes
Input Voltage	90	--	264	V AC	100-240VAC +/- 10%
Input Frequency	47	--	63	Hz	50-60Hz +/- 5%
Input Current	--	--	1.3	A	@ 100-240Vac input & Full load
Inrush Current	0	--	60	A	@ cold start, 100 / 240V AC
Energy Consumption	--	--	0.21	W	Input 115Vac or 230Vac and no output load

Output Data

	Min	Typical	Max	Units	Notes
Output Current Range	0.0	--	4.16	A	
Ripple & Noise	150	--	200	mVp-p	Model Dependant
Line Regulation	--	±3	--	A	@ 100 Vac to 240 Vac input & Full load
Load Regulation	--	±5	--	%	
Turn-on Delay Time	--	--	3	S	@ 100 Vac to 240 Vac input & Full load
Hold-up Time	5	--	--	S	@ Full load &115Vac at full load

Protection Requirements

	Min	Typical	Max	Units	Notes
Over Current Protection	--	--	5.4	A	Will recover if fault condition is removed
Short Circuit Protection					Will recover if fault condition is removed
Over Voltage Protection					Will recover if fault condition is removed

Environmental Data

	Min	Typical	Max	Units	Notes
Operating Temperature	0	--	+40	ºC	
Storage Temperature	-20	--	+80	ºC	
Operating Humidity	10	--	90	%	non condensing
Relative Humidity	5	--	95	%	non condensing
Vibration	10	--	300	Hz	sweep at a constant acceleration of 1.0G(Breadth: 3.5mm) for 1Hour for each of the perpendicular axes X, Y, Z

Reliability Requirements

	Min	Typical	Max	Units	Notes
Burn-in	2	--	--	Hrs	Under normal input and 80% rated load at 40℃ ± 5℃
MTBF	--	100,000	--	Hrs	@25ºC Full load and nominal input
Dielectric Strength	--	--	5	mA	4242Vdc / 60s (3s for mass production)
Leakage Current	--	--	0.25	mA	@ 264Vac / 50H
Insulation Resistance	50	--	--	mΩ	@primary to secondary add 500Vdc test voltage

EMI/EMS Standards

	Test Level		Test Criteria
EMI	FCC PART 18 Class B		
ESD	IEC 61000-4-2	Air +/-8KV – Contact +/-4KV	B
EFT	IEC 61000-4-4	0.5KV/1KV	A/B
Surge	IEC 61000-4-5	+/-1KV - +/-2KV	A

Safety Approvals

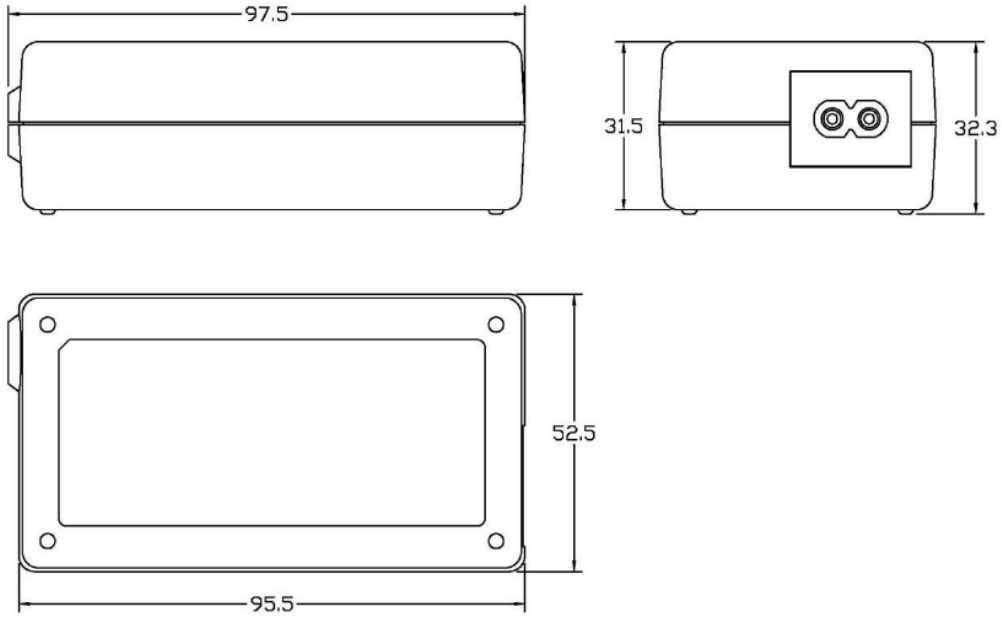
	Safety Standards
Safety Standards	IEC/EN 60601-1, approved
Approvals	UKCA, CE, TUV-GS, cULus, RCM (C-Tick), CCC, FCC, RoHS

Product Information

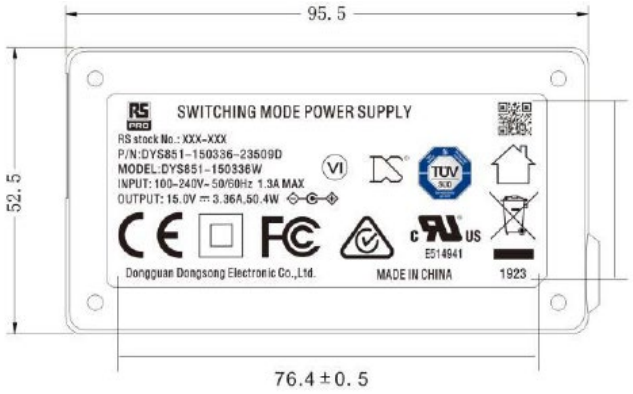
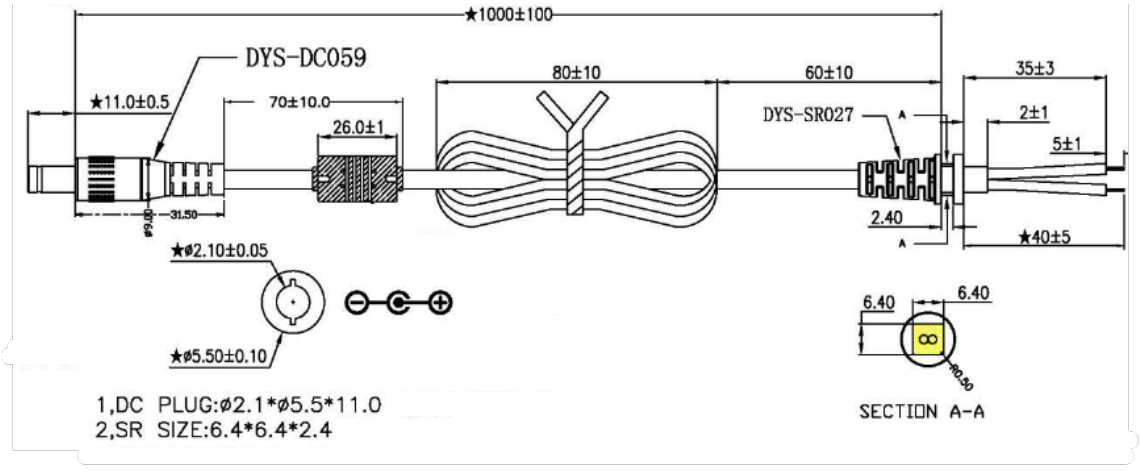
	Notes
Dimensions	97.5 x 32.3 x 52.5mm
Output Cord	1M Black
Output Connector	DC Plug: 2.1 x 5.5 x 11.0mm

AC – DC

Mechanical & Label Drawing



Typical Label



Cable Drawing