SWS50 SPECIFICATIONS

CA729-01-01A

	ITEMS / MODEL			SWS50-3	SWS50-5	SWS50-12	SWS50-15	SWS50-24
1	Nominal Output Voltage		V	3.3	5	12	15	24
2	Maximum Output Current		A	10	10	4.3	3.5	2.1
3	Maximum Output Power		W	33	50	51.6	52.5	50.4
4	Efficiency (Typ)	(115/230VAC) (* 1)	%	73 / 70	77 / 75	82 / 79	84 / 80	84 / 80
5	Input Voltage Range	(* 2, 3)	–	85 ~ 265VAC (47-63Hz) or 120 ~ 370VDC				
6	Input Current (Typ)	(115/230VAC) (* 1)	A	0.7 / 0.5	1.2 / 0.6			
7	Inrush Current (Typ)	(* 4)	–	20A at 115VAC, 40A at 230VAC, Ta=25°C, Cold Start				
8	Output Voltage Range		V	2.97~3.63	4.5~5.5	10.8~13.2	13.5~16.5	21.6~26.4
9	Ripple and Noise	(115/230VAC) (* 1, 5)	mV	80	80	80	100	100
10	Line Regulation	(* 5, 6)	mV	20	20	48	60	96
11	Load Regulation	(* 5, 7)	mV	40	50	96	120	144
12	Temperature Coefficient		–	Less than 0.02%/°C				
13	Over Current Protection	(* 8)	A	10.5~	10.5~	4.5~	3.7~	2.2~
14	Over Voltage Protection	(* 9)	V	3.79~4.95	5.75~6.95	13.8~16.2	17.2~20.3	27.6~32.4
15	Hold-Up Time (Typ)	(115/230VAC) (* 1)	–	20ms / 160ms				
16	Leakage current	(* 10)	–	1mA Max, 0.3mA(Typ) at 115VAC / 0.6mA(Typ) at 230VAC				
17	Series Operation		–	Possible				
18	Operating Temperature	(* 11)	–	- 10 ~ + 60 °C (Refer to Output Derating Curve)				
19	Operating Humidity		–	30 ~ 90 %RH (No dewdrop)				
20	Storage Temperature		–	- 30 ~ +85°C				
21	Storage Humidity		–	10 ~ 95%RH (No dewdrop)				
22	Cooling		–	Convection cooling				
23	Withstand Voltage		–	Input - Output : 3.0kVAC (20mA), Input - FG : 2.0kVAC (20mA) Output - FG : 500VAC (100mA) for 1min.				
24	Isolation Resistance		–	More than 100MΩ at Ta=25°C and 70%RH, Output - FG : 500VDC				
25	Vibration		–	At no operating, 10 - 55Hz (sweep for 1min) 19.6m/s^2 Constant, X, Y, Z 1hour each				
26	Safety		–	Approved by UL60950, CSA60950, EN60950, EN50178				
27	EMI	(* 1)	–	Built to meet FCC-Class B, EN55011/EN55022-B				
28	Immunity	(* 1)	–	Built to meet EN61000-4-2,-3,-4,-5,-6,-8,-11				
29	Weight (Typ)		g	400				
30	Dimension		mm	37 x 92 x 159 (Refer to Outline Drawing)				

*** Read instruction manual carefully , before using the power supply unit.**

= NOTES=

* 1 : At maximum output power, nominal input voltage, Ta = 25°C.

* 2 : For cases where conformance to various safety specs (UL, CSA, EN) are required, to be described as 100 - 240VAC, 50 / 60Hz on name plate.

* 3 : Please refer to Output Derating Curve for input voltage less than 100VAC (next page).

* 4 : Not applicable for the in-rush current to Noise Filter for less than 0.2ms.

* 5 : Please refer to Fig A for measurement of line & load regulation, ripple and noise voltage.
Ripple & noise are measured at 20MHz by using a 12" twisted pair terminated with a 0.1uF and 47uF capacitor.

* 6 : 85 - 265VAC, constant load.

* 7 : No load - Full load(Maximum power), constant input voltage.

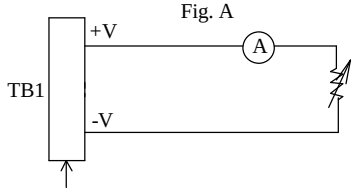
* 8 : Current limiting with automatic recovery.
Avoid to operate at overload or dead short for more than 30seconds.

* 9 : OVP circuit will shutdown output, manual reset (Re power on).

*10: Measured by each measuring method of UL, CSA, EN.

*11: Refer to Output Derating Curve (next page) for details of output derating versus ambient temperature and mounting method .

Fig. A

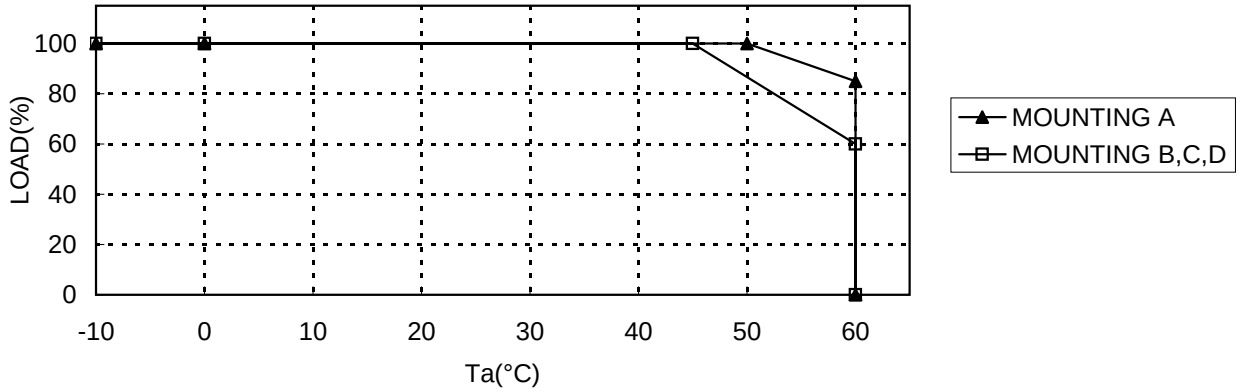


Measurement point for Vo Line/Load Regulation, and ripple and noise.

SWS50 OUTPUT DERATING

CA729-01-02A

SWS50-3,5,12,15,24 OUTPUT DERATING VS Ta CURVE (CONVECTION COOLING)



SWS50-3,5,12,15,24 OUTPUT DERATING VS INPUT VOLTAGE