

CUS150M1

SPECIFICATIONS

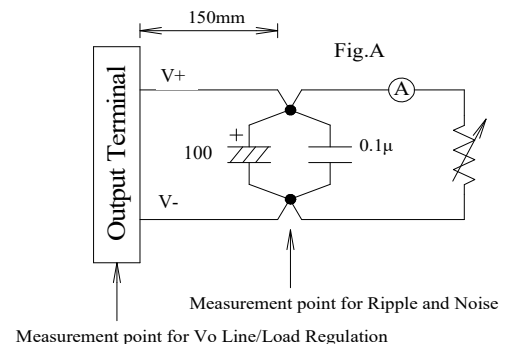
CA848-01-01B

ITEMS		MODEL	CUS150M1-12	CUS150M1-18	CUS150M1-24	CUS150M1-36	CUS150M1-48	
1	Nominal Output Voltage	V	12	18	24	36	48	
2	Maximum Output Current	A	12.5	8.4	6.3	4.2	3.2	
3	Maximum Output Power	W	150.0	151.2	151.2	151.2	153.6	
4	Efficiency (Typ.)	115/230 VAC (*1)	%	92/93	90/91	91/92	92/93	92/93
5	Input Voltage Range	(*2)	85 - 265 VAC (47-63Hz)					
6	Input Current (Typ.)	115/230 VAC (*1)	A	1.8/ 0.9				
7	In-rush Current (Typ.)	115/230 VAC (*1)(*3)	35A / 70A at Cold Start					
8	PFHC		Built to meet IEC61000-3-2,Class A					
9	Power Factor (Typ.)	115/230 VAC (*1)	0.98/0.94					
10	Output Voltage Range	V	11.7 ~ 12.6	17.6 ~ 18.9	23.5 ~ 25.2	35.2 ~ 37.8	47 ~ 50.4	
11	Maximum Ripple & Noise	115/230 VAC (*1)(*4)(*5)	mV	180	180	240	360	480
12	Maximum Line Regulation	(*4)(*6)	mV	60	90	120	180	240
13	Maximum Load Regulation	(*4)(*7)	mV	120	180	240	360	480
14	Temperature Coefficient	(*4)	Less than 0.02% / °C					
15	Over Current Protection	(*8)	A	> 13.2	> 8.9	> 6.7	>4.5	> 3.4
16	Over Voltage Protection	(*9)	V	13.2 - 16.2	19.8 - 24.3	26.4 - 32.4	39.6 ~ 48.6	52.8 - 64.8
17	Hold-up time (Typ.)	(*1)	20ms					
18	Leakage Current	(*10)	0.3mA max @ 265VAC,60Hz					
19	Parallel Operation		-					
20	Series Operation		Possible					
21	Operating Temperature	(*11)	-20°C - +70°C					
22	Operating Humidity		10 - 95%RH (No condensing)					
23	Storage Temperature		-40°C - +85°C					
24	Storage Humidity		10 - 95%RH (No condensing)					
25	Cooling		Convection Cooling					
26	Withstand Voltage		Input-FG : 2kVAC (20mA) 1x MOPP Input-Output : 4kVAC (20mA) 2x MOPPS Output-FG : 1.5kVAC (20mA) 1xMOPP					
27	Isolation Resistance		More than 100MΩ at 25°C,70%RH, Output - FG : 500VDC					
28	Vibration		At no operating, 10-55Hz (Sweep for 1min.) Maximum 19.6m/s ² X,Y,Z 1 hour each					
29	Shock		Less than 196m/s ² and MIL-STD-810F					
30	Safety		Approved by IEC/EN62368-1,UL62368-1,CSA62368-1 Approved by IEC/EN60601-1,ES60601-1,CSA-C22.2 No.60601-1					
31	EMI	(*1)	Designed to meet EN55011-B, EN55032-B, FCC-Class B					
32	Immunity		Designed to meet IEC61000-4-2 (Level 2,3), IEC61000-4-3 (Level 3), IEC61000-4-4 (Level 3), IEC61000-4-5 (Level 3,4), IEC61000-4-6 (Level 3), IEC61000-4-8 (Level 4), IEC61000-4-11					
33	Weight (Typ.)		310					
34	Size (L x W x H)	mm	127 x 76.2 x 34 (Refer to Outline Drawing)					

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

=NOTES=

- *1. Ta=25°C, Nominal output voltage and maximum output power.
- *2. For cases where conformance to various safety specs (UL, CSA, EN) are required, input voltage range will be 100 ~ 240VAC (50-60Hz).
Output derating required when Vin is less than 115VAC, refer to output derating curve for details.
- *3. Not applicable for the in-rush current to Noise Filter for less than 0.2ms.
- *4. Please refer to Fig. A for measurement of Vo, line and load regulation and ripple voltage.
- *5. Ripple & noise are measured at 20MHz by using a 150mm twisted pair of load wires terminated with a 0.1uF and 100uF capacitor.
- *6. 85~265VAC, constant load.
- *7. No load - full load, constant input voltage.
- *8. Hiccup with automatic recovery, however power supply may be latched for protection when output is shorted and manual reset is required (Repower on).
Avoid to operate at over load or short circuit condition for more than 30 seconds.
- *9. OVP circuit shut down the output, manual reset (Repower on) to get output voltage.
- *10. Measured by the each measuring method of UL, CSA, and EN (at 60Hz), Ta=25°C.
- *11. Refer to Output Derating Curve for details of output derating versus input voltage, ambient temperature and mounting method .
- Load (%) is percent of maximum output power or maximum output current.
Do not exceed its derating of Maximum Load.
- maximum load start up at -40°C is possible. However, it may not fulfill all the specifications.



OUTPUT DERATING

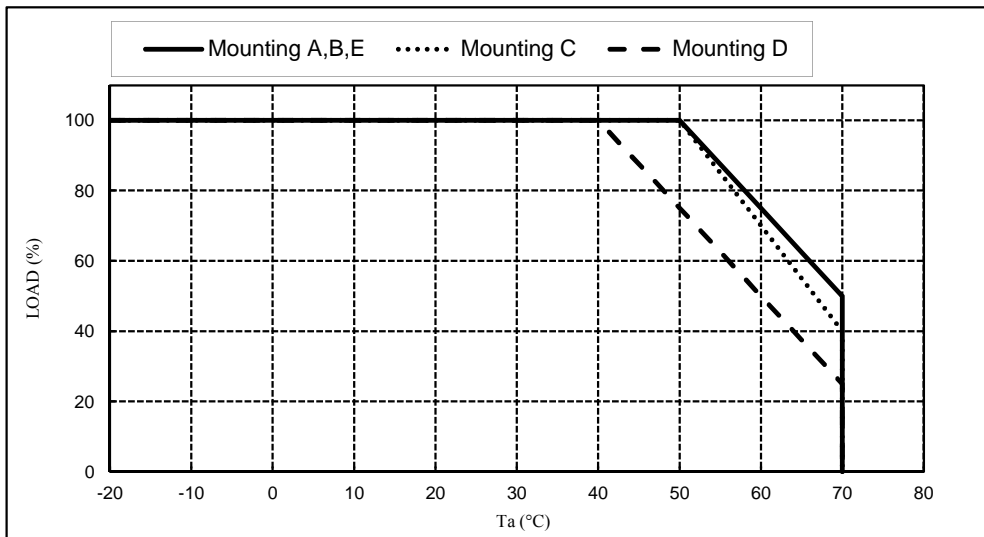
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OUTPUT DERATING VERSUS OPERATING AMBIENT TEMPERATURE (Ta)

*COOLING : CONVECTION COOLING

FOR ALL MODELS

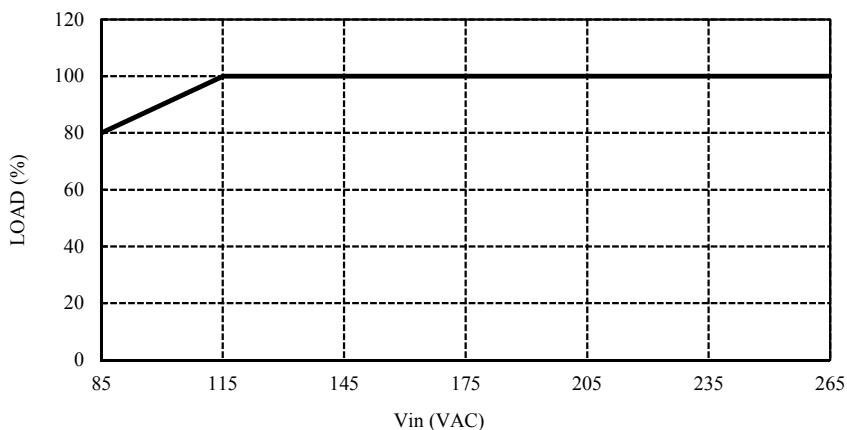
Ta (°C)	MOUNTING A,B,E	MOUNTING C	MOUNTING D
	LOAD (%)	LOAD (%)	LOAD (%)
-20 - +40	100	100	100
50	100	100	75
60	75	70	50
65	63	55	38
70	50	40	25



OUTPUT DERATING VERSUS INPUT VOLTAGE

FOR ALL MOUNTINGS AND ALL MODELS

INPUT VOLTAGE (VAC)	LOAD (%)
85	80
115-265	100



MOUNTING METHOD

