

ZWS150B/FV

SPECIFICATIONS

A246-01-01/FV-B

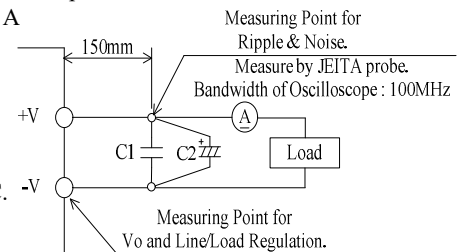
ITEMS		MODEL	ZWS150B-12/FV	ZWS150B-24/FV	ZWS150B-48/FV
1	Nominal Output Voltage	V	12	24	48
2	Maximum Output Current	A	12.5	6.3	3.2
3	Maximum Output Power	W	150.0	151.2	153.6
4	Efficiency (Typ) (*1)	100VAC %	86	89	90
		200VAC %	87	90	91
5	Input Voltage Range (*2)	-	85- 132VAC / 170- 264VAC (Auto Selectable) / 47-63Hz		
6	Input Current (Typ) (*1)	A	3.5/1.9		
7	Inrush Current (Typ) (*1)(*3)	-	28A at Cold Start		
8	Output Voltage Range	-	Fixed		
9	Output Voltage Accuracy	V	11.5 - 12.5	23.0 - 25.0	46.0 - 50.0
10	Maximum Ripple & Noise (*4)(*5)	0≤Ta≤70°C mV	150	150	200
		-10≤Ta<0°C mV	180	180	240
11	Maximum Line Regulation (*4)(*6)	mV	48	96	192
12	Maximum Load Regulation (*4)(*7)	mV	96	150	240
13	Temperature Coefficient (*4)	-	Less than 0.02% / °C		
14	Over Current Protection (*8)	A	13.13 -	6.62 -	3.36 -
15	Over Voltage Protection (*9)	V	13.8 - 16.2	27.6 - 32.4	55.2 - 64.8
16	Hold-up Time (Typ) (*1)	-	20ms		
17	Leakage Current (*10)	-	Less than 0.5mA. 0.2mA(Typ) at 100VAC / 0.4mA(Typ) at 230VAC		
18	Parallel Operation	-	-		
19	Series Operation	-	Possible		
20	Operating Temperature (*11)	-	Convection : -10 to +70°C (-10 to +50°C:100%, +60°C:70%, +70°C:20%)		
21	Operating Humidity	-	30 to 90%RH (No Condensing)		
22	Storage Temperature	-	-30 to +75°C		
23	Storage Humidity	-	10 to 90%RH (No Condensing)		
24	Cooling	-	Convection Cooling		
25	Withstand Voltage	-	Input - FG : 2kVAC (10mA), Input - Output : 3kVAC (10mA) Output - FG : 500VAC (20mA) for 1min		
26	Isolation Resistance	-	More than 100MΩ at 25°C and 70%RH Output - FG : 500VDC		
27	Vibration	-	At no operating, 10 - 55Hz (Sweep for 1min) 19.6m/s ² Constant, X,Y,Z 1hour each.		
28	Shock	-	Less than 196.1m/s ²		
29	Safety	-	Approved by UL62368-1, CSA62368-1, EN62368-1, UL60950-1, CSA60950-1, EN60950-1 (Expire date of 60950-1 : 20/12/2020), EN50178(OV II) Designed to meet DENAN at 100VAC Only.		
30	Conducted Emission	-	Designed to meet EN55011/EN55032-B, FCC-B, VCCI-B		
31	Radiated Emission	-	Designed to meet EN55011/EN55032-B, FCC-B, VCCI-B		
32	Immunity	-	Designed to meet IEC61000-6-2 IEC61000-4-2, -3, -4, -5, -6, -8, -11		
33	Weight (Typ)	g	340		
34	Size (W x H x D)	mm	75 x 37 x 160 (Refer to Outline Drawing)		

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

=NOTES=

- *1. At 100VAC/200VAC, Ta=25°C, nominal output voltage and maximum output power.
- *2. For cases where conformance to various safety specs (UL, CSA, EN) are required, to be described as 100 - 120VAC/200 - 240VAC (50/60Hz).
- *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 & load regulation and ripple voltage.
- *5. For start up at low ambient temperature and low input voltage, output ripple noise might not meet specification. However, specification can be met after one second.
- *6. 85 - 132VAC/170 - 264VAC, constant load.
- *7. No load-Full load, constant input voltage.
- *8. Constant current limit with automatic recovery. Avoid to operate at over load or short circuit condition for more than 30seconds.
- *9. OVP circuit will shut down output, manual reset (Re power on).
- *10. Measured by the each measuring method of UL, CSA, EN and DENAN (at 60Hz), Ta=25°C.
- *11. Output Deratings
 - Derating at standard mounting. Refer to output derating curve (A246-01-02).
 - When forced air cooling, refer to output derating curve (A246-01-03).
 - Load (%) is percent of maximum output power or maximum output current, whichever is greater.

Fig. A



C1 : Film Cap. 0.1 μF
C2 : Elect. Cap. 100 μF