

**SPECIFICATIONS**

A157-01-01B

ITEMS		MODEL	JWS50 -3	JWS50 -5	JWS50 -12	JWS50 -15	JWS50 -24	JWS50 -48	
1	Nominal Output Voltage	V	3.3	5	12	15	24	48	
2	Maximum Output Current	A	10	10	4.3	3.5	2.2	1.1	
3	Maximum Output Power	W	33	50	51.6	52.5	52.8	52.8	
4	Efficiency (Typ) (*1)	%	65	74	76	77	79	79	
5	Input Voltage Range (*2)	-	85 - 265VAC (47-63Hz) or 120 - 330VDC						
6	Input Current (100/200VAC)(Typ) (*1)	A	0.6/0.3	0.8/0.4					
7	Inrush Current(Typ)	-	14A at 100VAC, 28A at 200VAC, Ta=25°C, Cold Start						
8	PFHC	-	Designed to meet EN61000-3-2						
9	Power Factor (100/200VAC)(Typ) (*1)	-	0.99/0.95						
10	Output Voltage Range	V	2.85-3.63	4.5-5.5	10.8-13.2	13.5-16.5	21.6-26.4	43.2-52.8	
11	Maximum Ripple & Noise (*3)	0 - +60°C	mV	120	120	150	150	150	200
		-10 - 0°C	mV	160	160	180	180	180	240
12	Maximum Line Regulation (*4)	mV	20	20	48	60	96	192	
13	Maximum Load Regulation (*5)	mV	40	40	96	120	150	240	
14	Temperature Coefficient		Less than 0.02%/°C						
15	Over Current Protection (*6)	A	10.5 -	10.5 -	4.5 -	3.6 -	2.3 -	1.15 -	
16	Over Voltage Protection (*7)	-	3.79-4.95	5.75-6.75	13.8-16.2	17.3-20.3	27.6-32.4	55.2-64.8	
17	Hold-up Time (Typ) (*8)	-	20ms						
18	Leakage Current (*9)	-	0.75mA MAX, 0.2mA(Typ) at 100VAC / 0.44mA(Typ) at 230VAC						
19	Remote Sensing	-	-						
20	Parallel Operation	-	-						
21	Series Operation	-	Possible						
22	Operating Temperature (*10)	-	-10 - +60°C ( -10 - +50°C:100%,+60°C:60%)						
23	Operating Humidity	-	30 - 90%RH (No dewdrop)						
24	Storage Temperature	-	-30 - +85°C						
25	Storage Humidity	-	10 - 95%RH (No dewdrop)						
26	Cooling	-	Convection Cooling						
27	Withstand Voltage	-	Input - FG : 2KVAC (20mA), Input - Output : 3KVAC (20mA) Output - FG : 500VAC (100mA) for 1min						
28	Isolation Resistance	-	More than 100Mohm at 25°C and 70%RH Output - FG... 500VDC						
29	Vibration	-	At no operating, 10-55Hz (Sweep for 1min) 19.6m/s <sup>2</sup> Constant, X,Y,Z 1h each.						
30	Shock (In package)	-	Less than 196.1m/s <sup>2</sup>						
31	Safety (*11)	-	Approved by UL60950-1, CSA C22.2 No.60950 & EN60950-1. Designed to meet DENAN.						
32	Conducted Emission	-	Designed to meet EN55011/EN55022-B, FCC-ClassB, VCCI-B.						
33	Radiated Emission	-	Designed to meet EN55011/EN55022-B, FCC-ClassB, VCCI-B.						
34	Weight(Typ.)	-	350g						
35	Size (WxHxD)	mm	37 x 85 x 159 ( Refer to Outline Drawing )						

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

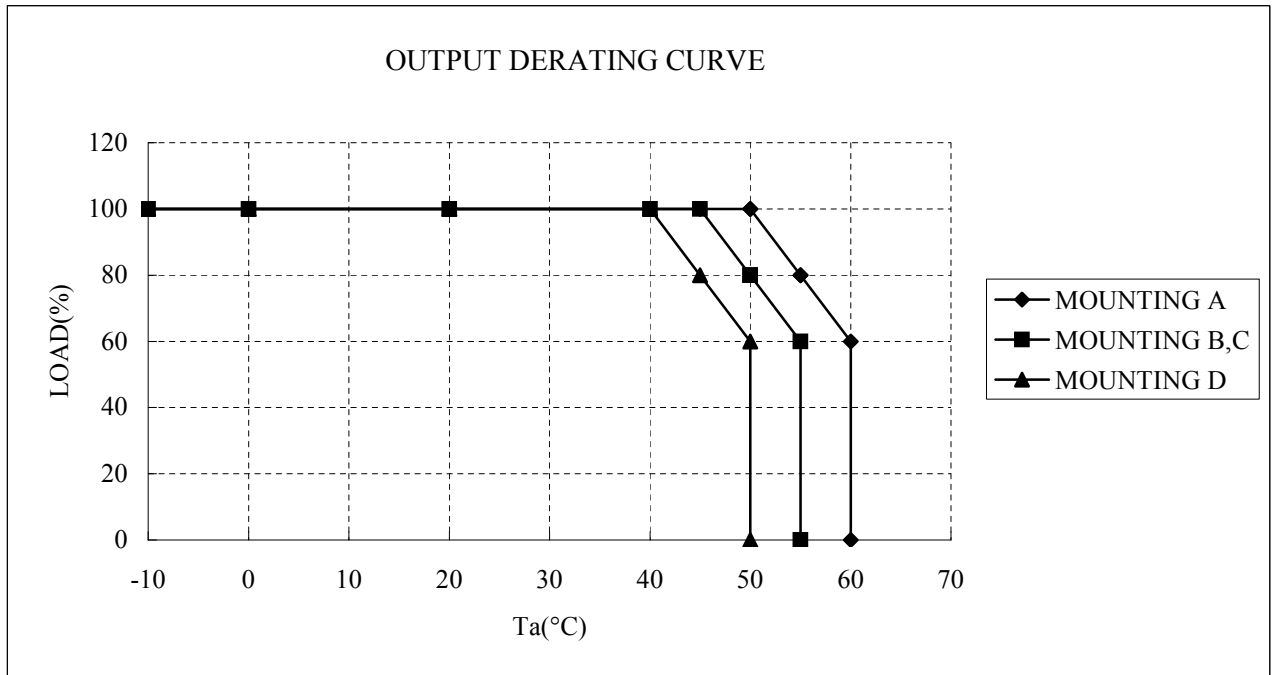
=NOTES=

- \*1. At 100/200VAC, Ta=25°C 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).
- \*3. Measure with JEITA RC-9131 probe, Bandwise of scope :100MHz.
- \*4. 85 - 265VAC , constant load.
- \*5. No load-Full load, constant input voltage.
- \*6. Constant current limit with automatic recovery.
- \*7. OVP circuit will shut down output, manual reset (Line recycle).
- \*8. At 100/200VAC nominal output voltage and maximum output current.
- \*9. Measured by the each measuring method of UL,CSA,EN and DENAN(at 60Hz).
- \*10. Ratings - Derating at standard mounting.
  - Load (%) is percent of maximum output power or maximum output current, whichever is greater.
  - As for other mountings, refer to derating curve (A157-01-02\_).
- \*11. As for DENAN, designed to meet at 100VAC.

OUTPUT DERATING

A157-01-02

Ta(°C)	LOAD(%)			
	MOUNTING A	MOUNTING B	MOUNTING C	MOUNTING D
-10 ~+40	100	100	100	100
45	100	100	100	80
50	100	80	80	60
55	80	60	60	-
60	60	-	-	-



MOUNTING A

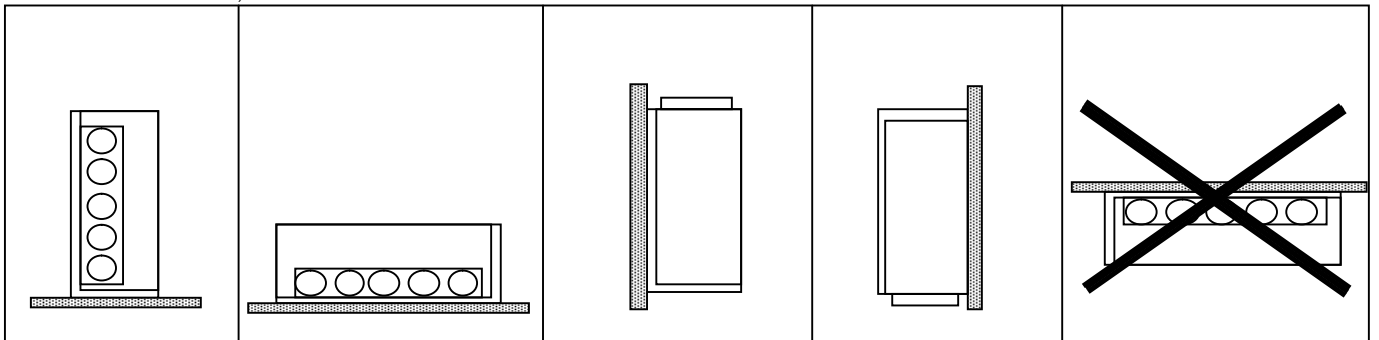
MOUNTING B

MOUNTING C

MOUNTING D

DON'T USE

(STANDARD MOUNTING)



**SPECIFICATIONS**

A157-01-03C

ITEMS		MODEL	JWS50 -9	JWS50 -28
1	Nominal Output Voltage	V	9	28
2	Maximum Output Current	A	5.6	2.0
3	Maximum Output Power	W	50.4	56.0
4	Efficiency (Typ) (*1)	%	74	79
5	Input Voltage Range (*2)	-	85 - 265VAC (47-63Hz) or 120 - 330VDC	
6	Input Current (100/200VAC)(Typ) (*1)	A	0.8/0.4	
7	Inrush Current(Typ)	-	14A at 100VAC, 28A at 200VAC, Ta=25°C, Cold Start	
8	PFHC	-	Designed to meet EN61000-3-2	
9	Power Factor (100/200VAC)(Typ) (*1)	-	0.99/0.95	
10	Output Voltage Range	V	8.1-9.9	25.2-30.8
11	Maximum Ripple & Noise (*3)	0 - +60°C	mV	150
		-10 - 0°C	mV	180
12	Maximum Line Regulation (*4)	mV	36	112
13	Maximum Load Regulation (*5)	mV	76	160
14	Temperature Coefficient		Less than 0.02%/°C	
15	Over Current Protection (*6)	A	5.88 -	2.10 -
16	Over Voltage Protection (*7)	-	10.4-12.2	32.2-37.8
17	Hold-up Time (Typ) (*8)	-	20ms	
18	Leakage Current (*9)	-	0.75mA MAX, 0.2mA(Typ) at 100VAC / 0.44mA(Typ) at 230VAC	
19	Remote Sensing	-	-	
20	Parallel Operation	-	-	
21	Series Operation	-	Possible	
22	Operating Temperature (*10)	-	-10 - +60°C (-10 - +50°C:100%,+60°C:60%)	
23	Operating Humidity	-	30 - 90%RH (No dewdrop)	
24	Storage Temperature	-	-30 - +85°C	
25	Storage Humidity	-	10 - 95%RH (No dewdrop)	
26	Cooling	-	Convection Cooling	
27	Withstand Voltage	-	Input - FG : 2kVAC (20mA), Input - Output : 3kVAC (20mA) Output - FG : 500VAC (100mA) for 1min	
28	Isolation Resistance	-	More than 100Mohm at 25°Cand 70%RH Output - FG...500VDC	
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32	Conducted Emission	-	Designed to meet EN55011/EN55022-B, FCC-ClassB, VCCI-B.	
33	Radiated Emission	-	Designed to meet EN55011/EN55022-B, FCC-ClassB, VCCI-B.	
34	Weight(Typ.)	-	350g	
35	Size (WxHxD)	mm	37 x 85 x 159 ( Refer to Outline Drawing )	

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