

**LDV12**

SPECIFICATIONS

PA588-01-01

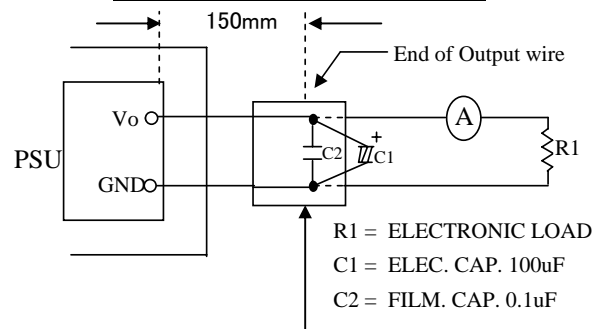
ITEMS		MODEL	LDV12-12-1R0	LDV12-15-R80	LDV12-24-R50
1	NOMINAL OUTPUT VOLTAGE	V	12	15	24
2	MINIMUM OUTPUT CURRENT	A	0.1	0.08	0.05
3	MAXIMUM AVERAGE OUTPUT CURRENT	A	1	0.8	0.5
4	MAXIMUM AVERAGE OUTPUT POWER	W	12		
5	EFFICIENCY (TYP) (*1)	%	82		
6	INPUT VOLTAGE RANGE (*2)	-	90 ~ 277 VAC (47Hz ~ 63 Hz)		
7	INPUT CURRENT (TYP) ; 100VAC/200VAC(*1)	A	0.28/0.18		
8	INRUSH CURRENT (TYP)	A	25 @ 100VAC, 50 @ 200VAC, Ta = 25°C, COLD START		
9	OUTPUT VOLTAGE RANGE (*3)	V	11.40~12.60	14.25~15.75	22.8~25.2
10	MAXIMUM OUTPUT RIPPLE & NOISE (*1, *3)	mV	100	100	150
11	OVER CURRENT PROTECTION (*4, *7)	W	>105% Rated Output Power		
12	OVER VOLTAGE PROTECTION (*5)	-	>110%		
13	TURN ON TIME	mS	<200		
14	HOLD UP TIME (TYP) (*1)	mS	5		
15	OPERATING TEMPERATURE (*9)	°C	-10 ~ +60 (Guarantee start up at -20°C)		
16	IP CLASS		IP66		
17	OPERATING HUMIDITY	%RH	15~90%RH (NO DEWDROP)		
18	STORAGE TEMPERATURE	°C	-30 ~ +85		
19	STORAGE HUMIDITY	%RH	15~90%RH (NO DEWDROP)		
20	COOLING	-	CONVECTION COOLED		
21	WITHSTAND VOLTAGE	-	INPUT-OUTPUT...3KVAC, 1 min (20mA Max)		
22	ISOLATION RESISTANCE	-	>100MΩ AT 25°C AND 70 % RH. INPUT-OUTPUT : 500 VDC		
23	LEAKAGE CURRENT (*6)	mA	< 0.25		
24	VIBRATION	-	10 ~ 55HZ Amplitude less than 1.65mm p-p (max 19.6m/s <sup>2</sup> ), Sweep 1 min X,Y,Z 30mins each		
25	SHOCK (IN PACKAGE)	-	LESS THAN 196.1m/s <sup>2</sup>		
26	EMI (CONDUCTED & RADIATED EMISSION)	-	Built to meet EN55015-B ; EN55022-B ; VCCI-B ; CISPR 22-B ; FCC-B		
27	IMMUNITY	-	Built to meet EN61000-4-2(Level 3), -3(Level 3), -4(Level 3), -5(Level 3), -6(Level 3), -8(Level 4), -11		
28	SAFETY STANDARD	-	UL1310 (CLASS 2) ; IEC61347-1; IEC61347-2-13; CE		
29	WEIGHT (TYP)	g	84		
30	DIMENSION (L × W × H)	mm	90 x 34.5 x 21 (Refer to Outline Drawing)		
31	Warranty	Year	3		

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

NOTES :

- \*1 : AT Vin = 230VAC & MAXIMUM AVERAGE OUPUT POWER , 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 : REFER TO FIG. A FOR MEASUREMENT DETERMINATION OF OUTPUT VOLTAGE REGULATION AND OUTPUT RIPPLE & NOISE VOLTAGE.
- \*4 : CURRENT LIMITING WITH AUTOMATIC RECOVERY.
- \*5 : OVP CIRCUIT WILL SHUTDOWN OUTPUT, MANUAL RESET ( RE-POWER ON).
- \*6 : AT 277VAC, 60Hz , Ta = 25°C.
- \*7 : AVOID OVER LOAD AND SHORT CIRCUIT CONDITION FOR MORE THAN 30 SEC.
- \*8 : ALL PARAMETERS NOT SPECIFICALLY MENTIONED ARE MEASURED @ 230VAC INPUT,RATED LOAD AND Ta = 25°C.
- \*9 : FOR CASES WHERE CONFORMANCE TO UL SAFETY SPECS, OPERATING TEMPERATURE IS -10 ~ +50°C.

**FIGURE A MEASUREMENT SETUP**



R1 = ELECTRONIC LOAD  
C1 = ELEC. CAP. 100uF  
C2 = FILM. CAP. 0.1uF

MEASUREMENT POINT FOR OUTPUT VOLTAGE REGULATION AND RIPPLE & NOISE VOLTAGE (20MHz BANDWIDTH OSCILLOSCOPE)