

■ Features :

- 2:1 wide input range
- Protections: Short circuit / Overload / Over voltage / Input reverse polarity
- 4000VDC I/O isolation
- Cooling by free air convection
- Built-in constant current limiting circuit
- 1U low profile 36mm
- Compliance to EN50155 railway certificate
- All using 105°C long life electrolytic capacitors
- LED indicator for power on
- 100% full load burn-in test
- 3 years warranty

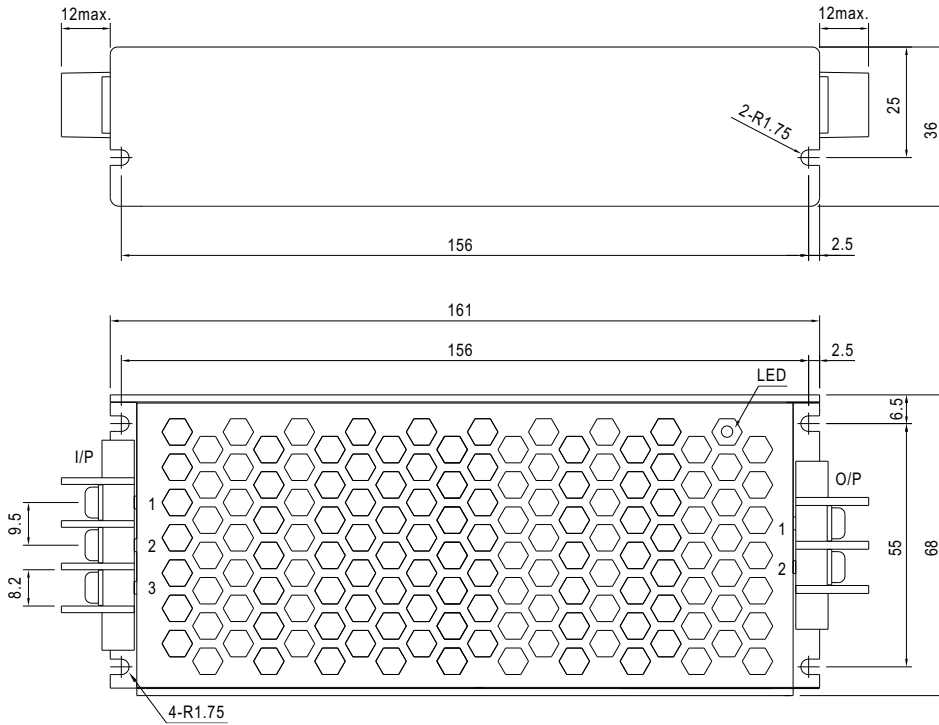


SPECIFICATION

MODEL		RSD-100B-5	RSD-100B-12	RSD-100B-24	RSD-100C-5	RSD-100C-12	RSD-100C-24	RSD-100D-5	RSD-100D-12	RSD-100D-24	
OUTPUT	DC VOLTAGE	5V	12V	24V	5V	12V	24V	5V	12V	24V	
	RATED CURRENT	20A	8.4A	4.2A	20A	8.4A	4.2A	20A	8.4A	4.2A	
	CURRENT RANGE	0 ~ 20A	0 ~ 8.4A	0 ~ 4.2A	0 ~ 20A	0 ~ 8.4A	0 ~ 4.2A	0 ~ 20A	0 ~ 8.4A	0 ~ 4.2A	
	RATED POWER	100W	100.8W	100.8W	100W	100.8W	100.8W	100W	100.8W	100.8W	
	RIPPLE & NOISE (max.) Note.2	100mVp-p	120mVp-p	150mVp-p	100mVp-p	120mVp-p	150mVp-p	100mVp-p	120mVp-p	150mVp-p	
	VOLTAGE TOLERANCE Note.3	±2.0%	±2.0%	±2.0%	±2.0%	±2.0%	±2.0%	±2.0%	±2.0%	±2.0%	
	LINE REGULATION	±0.5%	±0.3%	±0.2%	±0.5%	±0.3%	±0.2%	±0.5%	±0.2%	±0.2%	
	LOAD REGULATION	±1.0%	±1.0%	±1.0%	±1.0%	±1.0%	±1.0%	±1.0%	±1.0%	±1.0%	
	SETUP, RISE TIME	800ms, 50ms at full load									
HOLD UP TIME (Typ.)	3 ~ 30ms @ full load ; B/C- type comply with S1 level ; D-type comply with S2 level										
INPUT	VOLTAGE RANGE	CONTINUOUS	16.8 ~ 31.2VDC			33.6 ~ 62.4VDC			67.2 ~ 143VDC		
		1 SEC.	14.4 ~ 33.6VDC			28.8 ~ 67.2VDC			57.6 ~ 154VDC		
	EFFICIENCY (Typ.)	88%	89%	89%	89%	91%	91%	89.5%	91%	90%	
	DC CURRENT (Typ.)	4.8A/24V	4.8A/24V	4.8A/24V	2.4A/48V	2.4A/48V	2.4A/48V	1.2A/110V	1.2A/110V	1.2A/110V	
INRUSH CURRENT (Typ.)	30A/24VDC			30A/48VDC			30A/110VDC				
PROTECTION	OVERLOAD	105 ~ 135% rated output power Protection type : Constant current limiting, recovers automatically after fault condition is removed									
	OVER VOLTAGE	5.75 ~ 7V	13.8 ~ 16.2V	27.6 ~ 32.4V	5.75 ~ 7V	13.8 ~ 16.2V	27.6 ~ 32.4V	5.75 ~ 7V	13.8 ~ 16.2V	27.6 ~ 32.4V	
ENVIRONMENT	WORKING TEMP.	-40 ~ +55°C (no derating) ; +70°C @ 60% load by free air convection ; +70°C (no derating with external base plate)									
	WORKING HUMIDITY	20 ~ 95% RH non-condensing									
	STORAGE TEMP., HUMIDITY	-40 ~ +85°C, 10 ~ 95% RH									
	TEMP. COEFFICIENT	±0.03%/°C (0 ~ 50°C)									
	VIBRATION	10 ~ 500Hz, 5G 10min./1cycle, 60min. each along X, Y, Z axes ; Mounting : compliance to IEC61373									
SAFETY & EMC (Note 4)	SAFETY STANDARDS	Design refer to IEC60950-1, EN50155 (IEC60571)									
	WITHSTAND VOLTAGE	I/P-O/P:4KVDC		I/P-FG:2.5KVDC		O/P-FG:2.5KVDC					
	ISOLATION RESISTANCE	I/P-O/P, I/P-FG, O/P-FG:100M Ohms / 500VDC / 25°C / 70% RH									
	EMC EMISSION	Compliance to EN55022 (CISPR22) Conduction Emission: Class A, Radiation Emission: Class B ; EN50155(EN50121-3-2)									
OTHERS	EMC IMMUNITY	Compliance to EN61000-4-2,3,4,6,8; ENV50204, EN50155(EN50121-3-2), light industry level, criteria A									
	MTBF	254.1K hrs min. MIL-HDBK-217F (25°C)									
	DIMENSION	161*68*36mm (L*W*H)									
NOTE	PACKING	0.6Kg; 24pcs/15.4Kg/0.98CUFT									
		1. All parameters NOT specially mentioned are measured at 24,48,110VDC input, rated load and 25°C of ambient temperature. 2. Ripple & noise are measured at 20MHz of bandwidth by using a 12" twisted pair-wire terminated with a 0.1uf & 47uf parallel capacitor. 3. Tolerance : includes set up tolerance, line regulation and load regulation. 4. The power supply is considered a component which will be installed into a final equipment. The final equipment must be re-confirmed that it still meets EMC directives.									

Mechanical Specification

Case No.999A Unit:mm



Input Terminal Pin No. Assignment :

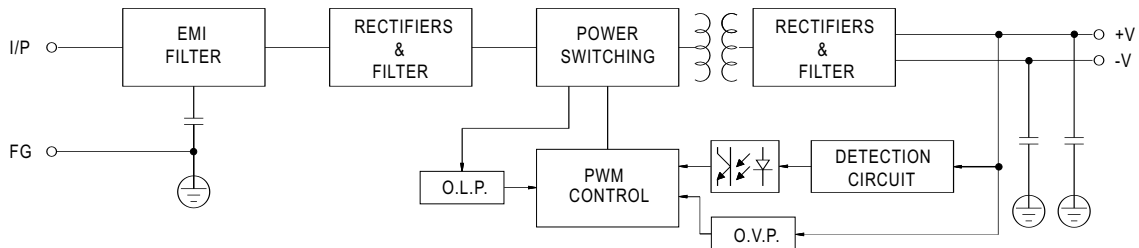
Pin No.	Assignment
1	DC INPUT V+
2	DC INPUT V-
3	FG \perp

Output Terminal Pin No. Assignment :

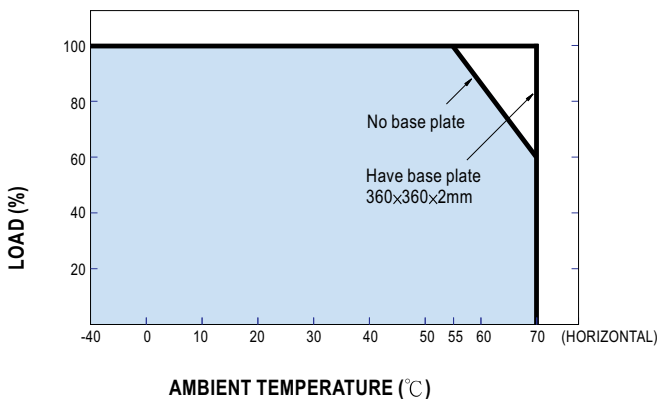
Pin No.	Assignment
1	DC OUTPUT -V
2	DC OUTPUT +V

Block Diagram

fosc : 130KHz



Derating Curve



Static Characteristics(RSD-100D-24)

