TOTAL POWER INT'L

1500W Single Output with PFC Function

PSP-1500 series



■ Features :

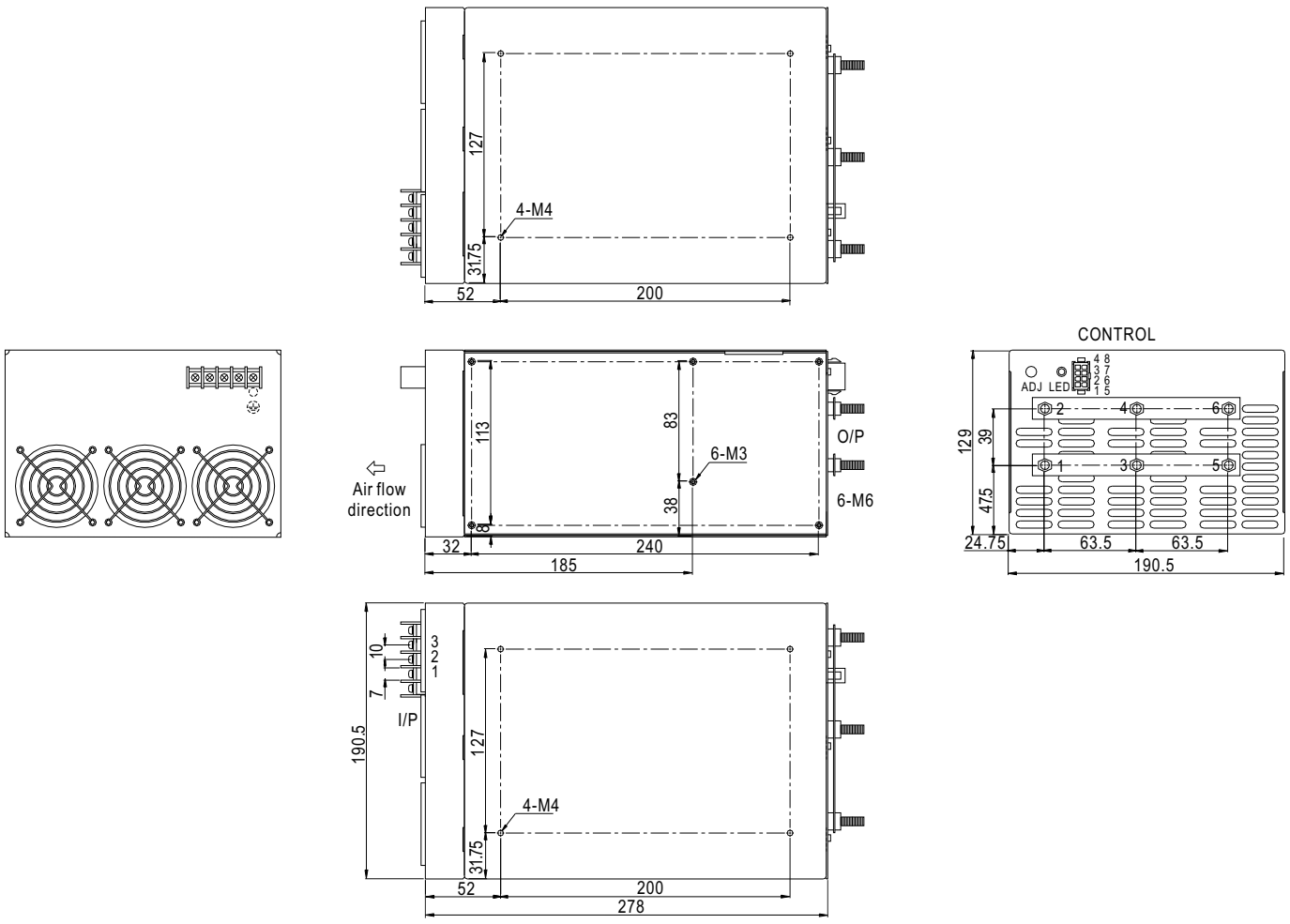
- AC input active surge current limiting
- Built-in active PFC function
- Protections:Short circuit/Over load/Over voltage/Over temperature
- Built-in constant current limiting circuit
- Built-in remote ON-OFF control
- Built-in remote sense function
- 3 years warranty

SPECIFICATION

MODEL		PSP-1500-5	PSP-1500-12	PSP-1500-13.5	PSP-1500-15	PSP-1500-24	PSP-1500-27	PSP-1500-48
OUTPUT	DC VOLTAGE	5V	12V	13.5V	15V	24V	27V	48V
	RATED CURRENT	217.5A	112.5A	100.5A	90A	56.4A	50.4A	28.5A
	CURRENT RANGE	0 ~ 217.5A	0 ~ 112.5A	0 ~ 100.5A	0 ~ 90A	0 ~ 56.4A	0 ~ 50.4A	0 ~ 28.5A
	RATED POWER	1087.5W	1350W	1356.75W	1350W	1353.6W	1360.8W	1368W
	PEAK LOAD Note.4	1200W	1500W	1500W	1500W	1500W	1500W	1500W
	RIPPLE & NOISE (max.) Note.2	100mVp-p	150mVp-p	150mVp-p	150mVp-p	150mVp-p	150mVp-p	200mVp-p
	VOLTAGE ADJ. RANGE	4.75 ~ 5.5V	10 ~ 13.2V	12 ~ 15V	13.5 ~ 18V	20 ~ 26.4V	24 ~ 30V	41 ~ 56V
	VOLTAGE TOLERANCE Note.3	±6.0%	±3.0%	±2.0%	±2.0%	±1.0%	±1.0%	±1.0%
	LINE REGULATION	±0.5%	±0.3%	±0.3%	±0.3%	±0.2%	±0.2%	±0.2%
	LOAD REGULATION	±2.0%	±0.5%	±0.5%	±0.5%	±0.5%	±0.5%	±0.5%
	SETUP, RISE TIME	1500ms, 50ms/230VAC at full load						
	HOLD TIME (Typ.)	24ms/230VAC at full load						
INPUT	VOLTAGE RANGE	176 ~ 264VAC 248 ~ 370VDC						
	FREQUENCY RANGE	47 ~ 63Hz						
	POWER FACTOR (Typ.)	0.96/230VAC at full load						
	EFFICIENCY (Typ.)	77%	84%	84%	84%	85%	85%	86%
	AC CURRENT (Typ.)	8.4A/230VAC						
	INRUSH CURRENT (Typ.)	80A/230VAC						
	LEAKAGE CURRENT	<3.5mA / 240VAC						
PROTECTION	OVER LOAD	115 ~ 140% rated output power						
		Protection type : Constant current limiting, recovers automatically after fault condition is removed						
	OVER VOLTAGE	5.75 ~ 6.75V	13.8 ~ 16.2V	15.5 ~ 18.2V	18 ~ 21V	27.6 ~ 32.4V	31 ~ 36.5V	57.6 ~ 67.2V
		Protection type : Shut down o/p voltage, re-power on to recover						
	OVER TEMPERATURE	95℃(TSW1) Detect on the heatsink of PFC MOSFET 90℃(TSW2) Detect the winding of output choke						
		Protection type : Shut down o/p voltage, recovers automatically after temperature goes down						
FUNCTION	REMOTE CONTROL	RC+/RC-: 0 ~ 0.8V=power on ; 4 ~ 10V=power off sink current <30mA						
ENVIRONMENT	WORKING TEMP.	-10 ~ +60℃ (Refer to output load derating curve)						
	WORKING HUMIDITY	20 ~ 90% RH non-condensing						
	STORAGE TEMP., HUMIDITY	-20 ~ +85℃, 10 ~ 95% RH						
	TEMP. COEFFICIENT	±0.03%/℃ (0 ~ 50℃)						
	VIBRATION	10 ~ 500Hz, 2G 10min./1cycle, 60min. each along X, Y, Z axes						
SAFETY & EMC (Note 5)	SAFETY STANDARDS	UL60950-1, TUV EN60950-1 Approved						
	WITHSTAND VOLTAGE	I/P-O/P:3KVAC I/P-FG:1.5KVAC O/P-FG:0.5KVAC						
	ISOLATION RESISTANCE	I/P-O/P, I/P-FG, O/P-FG:100M Ohms/500VDC						
	EMI CONDUCTION & RADIATION	Compliance to EN55022 (CISPR22) Class B						
	HARMONIC CURRENT	Compliance to EN61000-3-2,-3						
	EMS IMMUNITY	Compliance to EN61000-4-2,3,4,5,6,8,11; ENV50204, EN55024, Light industry level, criteria A						
OTHERS	MTBF	43.4K hrs min. MIL-HDBK-217F (25℃)						
	DIMENSION	278*129*190.5mm (L*W*H)						
	PACKING	7.4Kg; 2pcs/15.5Kg/1.28CUFT						
NOTE	1. All parameters NOT specially mentioned are measured at 230VAC input, rated load and 25℃ 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. 10% Duty cycle maximum within every 30 seconds(max.). Average output power should not exceed the rated power. 5. 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. 925A Unit:mm



AC Input Terminal Pin. No Assignment

Pin No.	Assignment
1	AC/L
2	AC/N
3	FG ⏚

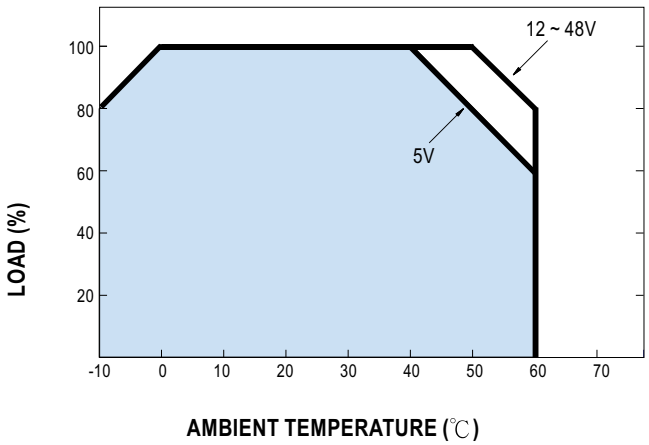
DC Output Terminal Pin. No Assignment

Pin No.	Assignment
1,3,5	DC OUTPUT +V
2,4,6	DC OUTPUT -V

Control Pin. No Assignment : MOLEX 5559-NP uses 5558male crimp terminal

Pin No.	Assignment	Pin No.	Assignment	Mating connector	Terminal
1	NC	5	NC	MOLEX 5557-NR	MOLEX 5556 Female crimp Terminal receptacle
2	-S	6	NC		
3	G	7	+S		
4	RC-	8	RC+		

■ Derating Curve



■ Output Derating VS Input Voltage

