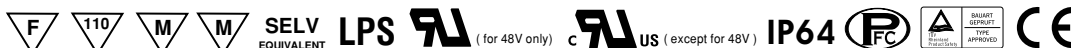




## ■ Features :

- Universal AC input / Full range
- Protections: Short circuit / Overload / Over voltage / Over temperature
- Built-in active PFC function
- IP64 design for indoor or outdoor installations
- UL1310 Class 2 power unit
- Cooling by free air convection
- 100% full load burn-in test
- High reliability
- Suitable for LED lighting and moving sign applications
- 2 years warranty

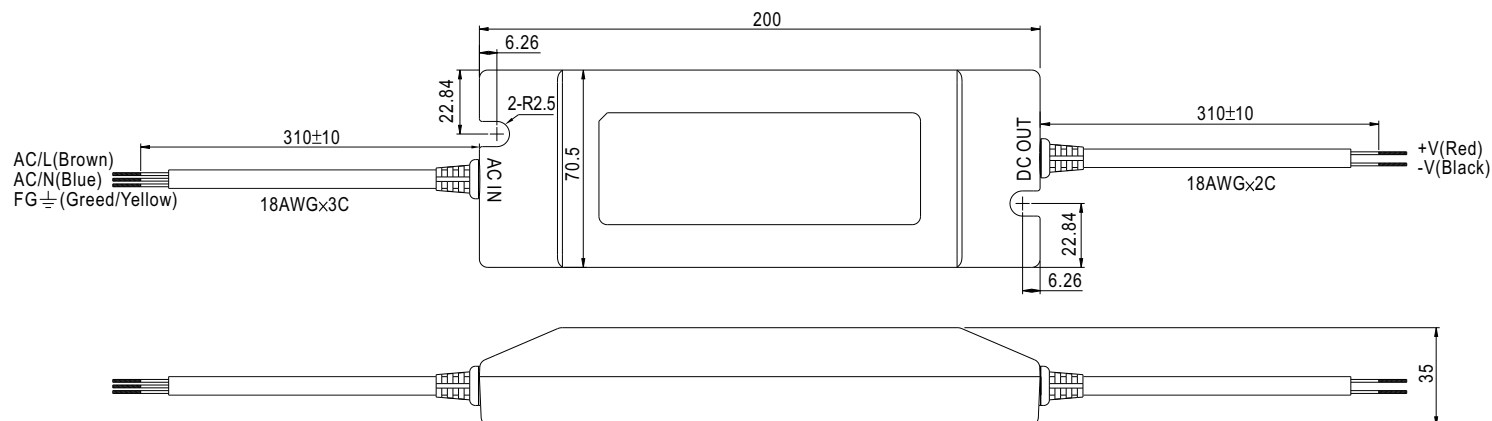
## SPECIFICATION



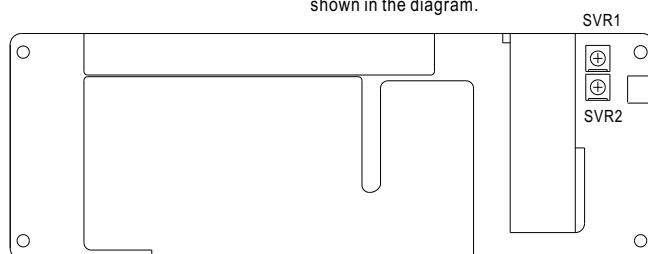
MODEL		PLN-100-12	PLN-100-15	PLN-100-20	PLN-100-24	PLN-100-27	PLN-100-36	PLN-100-48
OUTPUT	DC VOLTAGE	12V	15V	20V	24V	27V	36V	48V
	CONSTANT CURRENT REGION <small>Note.7</small>	6 ~ 12V	7.5 ~ 15V	10 ~ 20V	12 ~ 24V	13.5 ~ 27V	18 ~ 36V	24 ~ 48V
	RATED CURRENT <small>Note.6</small>	5A	5A	4.8A	4A	3.55A	2.65A	2A
	CURRENT RANGE <small>Note.6</small>	0 ~ 5A	0 ~ 5A	0 ~ 4.8A	0 ~ 4A	0 ~ 3.55A	0 ~ 2.65A	0 ~ 2A
	RATED POWER <small>Note.6</small>	60W	75W	96W	96W	95.85W	95.4W	96W
	RIPPLE & NOISE (max.) <small>Note.2</small>	150mVp-p	150mVp-p	150mVp-p	150mVp-p	150mVp-p	150mVp-p	200mVp-p
	VOLTAGE ADJ. RANGE	0% ~ -15%. Can be adjusted by internal potential meter SVR1						
	CURRENT ADJ. RANGE	3% ~ -25%. Can be adjusted by internal potential meter SVR2						
	VOLTAGE TOLERANCE <small>Note.3</small>	±3.0%	±3.0%	±3.0%	±3.0%	±3.0%	±2.0%	±2.0%
	LINE REGULATION	±1.0%						
INPUT	LOAD REGULATION	±2.0%						
	SETUP, RISE TIME	1200ms, 80ms/230VAC 1200ms, 80ms/115VAC at full load						
	HOLD UP TIME (Typ.)	60ms/230VAC 30ms/115VAC at full load						
	VOLTAGE RANGE <small>Note.5</small>	90 ~ 264VAC 127 ~ 370VDC						
	FREQUENCY RANGE	47 ~ 63Hz						
	POWER FACTOR (Typ.)	PF>0.95/230VAC PF>0.95/115VAC at full load						
	EFFICIENCY (Typ.)	83%	85%	87%	87%	87%	87%	87%
PROTECTION	AC CURRENT (Typ.)	12V:0.8A/115VAC 0.4A/230VAC 15V:0.9A/115VAC 0.45A/230VAC 20V ~ 48V:1.1A/115VAC 0.55A/230VAC						
	INRUSH CURRENT (Typ.)	COLD START 40A/230VAC						
	LEAKAGE CURRENT	0.5mA / 240VAC						
ENVIRONMENT	OVER CURRENT <small>Note.4</small>	95 ~ 100% Protection type : Constant current limiting, recovers automatically after fault condition is removed						
	OVER VOLTAGE	13 ~ 16V 16.5 ~ 20V 22 ~ 27V 27 ~ 34V 29 ~ 36V 39 ~ 48V 52 ~ 64V Protection type : Shut down and latch off o/p voltage, re-power on to recover						
	OVER TEMPERATURE	90°C ±10°C (RTH2) Protection type : Shut down o/p voltage, re-power on to recover						
SAFETY & EMC	WORKING TEMP.	-30 ~ +50°C (Refer to output load derating curve)						
	WORKING HUMIDITY	20 ~ 90% RH non-condensing						
	STORAGE TEMP., HUMIDITY	-40 ~ +80°C, 10 ~ 95% RH						
	TEMP. COEFFICIENT	±0.03%/°C (0 ~ 50°C)						
	VIBRATION	10 ~ 500Hz, 2G 10min./1cycle, period for 60min. each along X, Y, Z axes						
OTHERS	SAFETY STANDARDS	UL1310 Class 2, UL879 ( listed in UL Sign Components Manual (SAM) ), TUV EN60950-1, EN61347-1, EN61347-2-13 CAN/CSA C22.2 No. 223-M91(except for 48V), IP64 approved						
	WITHSTAND VOLTAGE	I/P-O/P:4.25KVDC						
	ISOLATION RESISTANCE	I/P-O/P:100M Ohms / 500VDC / 25°C / 70% RH						
	EMI CONDUCTION & RADIATION	Compliance to EN55015, EN55022 (CISPR22) Class B						
	HARMONIC CURRENT	Compliance to EN61000-3-2 Class C (>50% load) ; EN61000-3-3						
NOTE	EMS IMMUNITY	Compliance to EN61000-4-2,3,4,5,6,8,11; ENV50204, EN61547, EN55024, light industry level, criteria A						
	MTBF	303.1Khrs min. MIL-HDBK-217F (25°C)						
	DIMENSION	200*70.5*35mm (L*W*H)						
PACKING		0.52Kg; 20pcs/11.4Kg/0.76CUFT						

## Mechanical Specification

Case No.955A Unit:mm



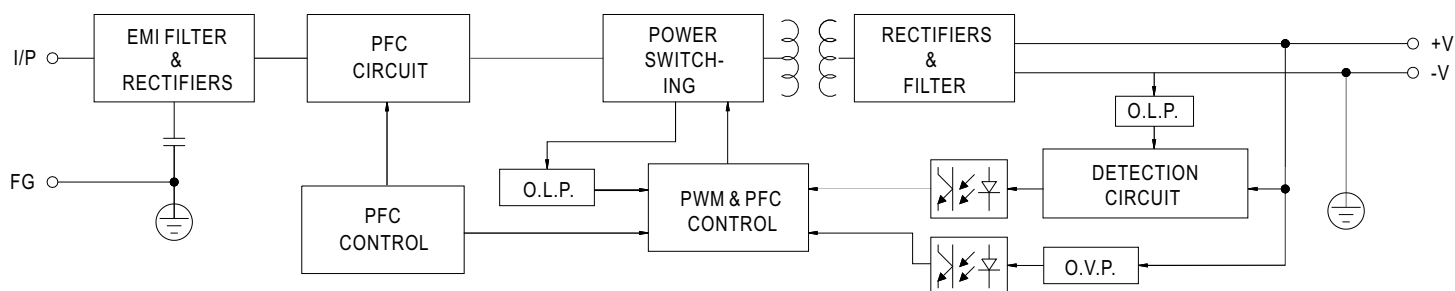
Output voltage and current adjustment : remove the upper case and adjust through SVR1 & SVR2 shown in the diagram.



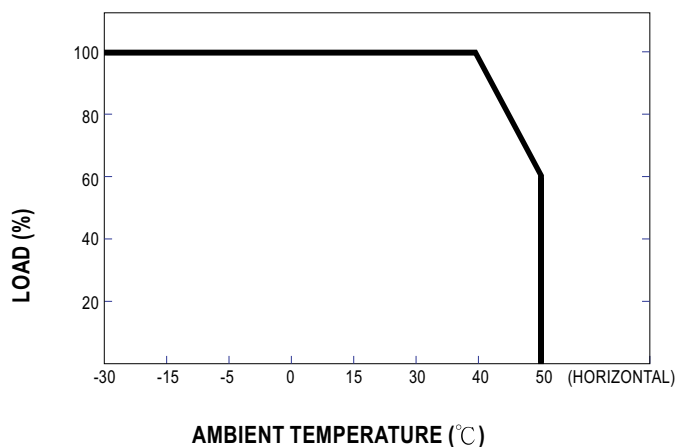
SVR1	Output voltage adjustment
SVR2	Output current adjustment

## Block Diagram

Fosc : 100KHz



## Derating Curve



## Static Characteristics

