



■ Product Features

- The product is easy to install, and the input / output has its own terminal (2P 8mm pitch / 6p 4mm pitch), which can be used for welding wire with holes;
- Four corners and fixed mounting hole position to prevent the product from power failure caused by movement and vibration. For details of fixed hole, please refer to the package pin definition diagram;
- Universal input voltage: 85-264VAC or 110-370vdc (input < 170vac, output load halved);
- High efficiency, high power density, low output ripple noise and high voltage output precision (the voltage difference between light load and full load at the product output interface is within 0.1V)
- Output voltage accuracy 2%
- High isolation between input and output;
- High efficiency, high power density, no-load $\leq 0.1W$, efficiency 77%
- Warranty for 3 years;
- The products are suitable for industrial control, fire protection, security and other industries;

Input Features

Item	condition	This series of existing conventional models (can be customized according to customer requirements of any different output voltage and current or other requirements of the product)				
		PKPLC05B-5V				
AC input (VAC)		85-264				
DC input (VDC)		110-370				
Frequency range (Hz)		47-63				
Input current(A)		0.15/115VAC 0.1/230VAC				
Full load efficiency(TYP.) MIN.		77%				
Standby power consumption(mW)		≤100				

Output Features

Output voltage (VDC)		5.0				
Output voltage accuracy 10-100% load		±2%				
Rated current (ADC)		1A				
Rated power (W)		5W				
Ripple and noise (mvp-p)	Rated input voltage, 20MHz bandwidth	≤50				
Linear adjustment rate	the full load	±1%				
Load adjustment rate	10-100% load	±3%				
rise time	the full load	30ms/115VAC/230VAC				
Holding time (ms)	the full load	10ms/115VAC 20ms/230VAC				
overload protection	Rated input voltage	110% - 200% of rated output power				
Short circuit protection	Rated input voltage	Protection mode: burping mode, which can be automatically recovered after removing abnormal load conditions				
Over voltage protection		Short circuit and automatic recovery				
Over current protection		Can reply automatically				
Start delay time (ms)	Vin: 230VAC	≤1500ms				

General Features

Working temperature (°C)	The normal conditions meet the derating shown in the figure below	-25° ~ +70°
Working humidity (RH)	/	20-90%, non condensing
Temperature Coefficient	/	±0.03%/°C
Storage temperature and humidity		-40° ~ +85°C 10-90%RH
Switching frequency(KHz)		65

Insulation voltage (VAC)	Input to output, test for 60s, $\leq 5\text{mA}$	$3\text{KV} \leq 5\text{mA} \text{ 60S}$
Insulation resistance(M Ω)	Input to output, 500VDC	100
Leakage current (mA)	500VDC	Input to output $\leq 0.25\text{ma/rms}$
MTBF	@25 $^{\circ}\text{C}$ (MIL-HDBK-217F)	$>250,000$ Hours
Safety level	/	Adaptation: CLASS B
Vibration resistance	/	10-500hz 2G 10min / cycle. X, y, Z 60min each
electromagnetic compatibility	/	Compliance: EN55022(CISPR22) Class B EN61000-3-2,-3
	/	

Remarks

It is not specified, so the specification parameters are measured under the input of 230VAC, rated load and 25 $^{\circ}\text{C}$ ambient temperature.

Ripple and noise measurement method: a 12 "twisted pair is used, and 0.1 μF and 10 μF capacitors are connected in parallel at the same time. The measurement is carried out at 20MHz bandwidth.

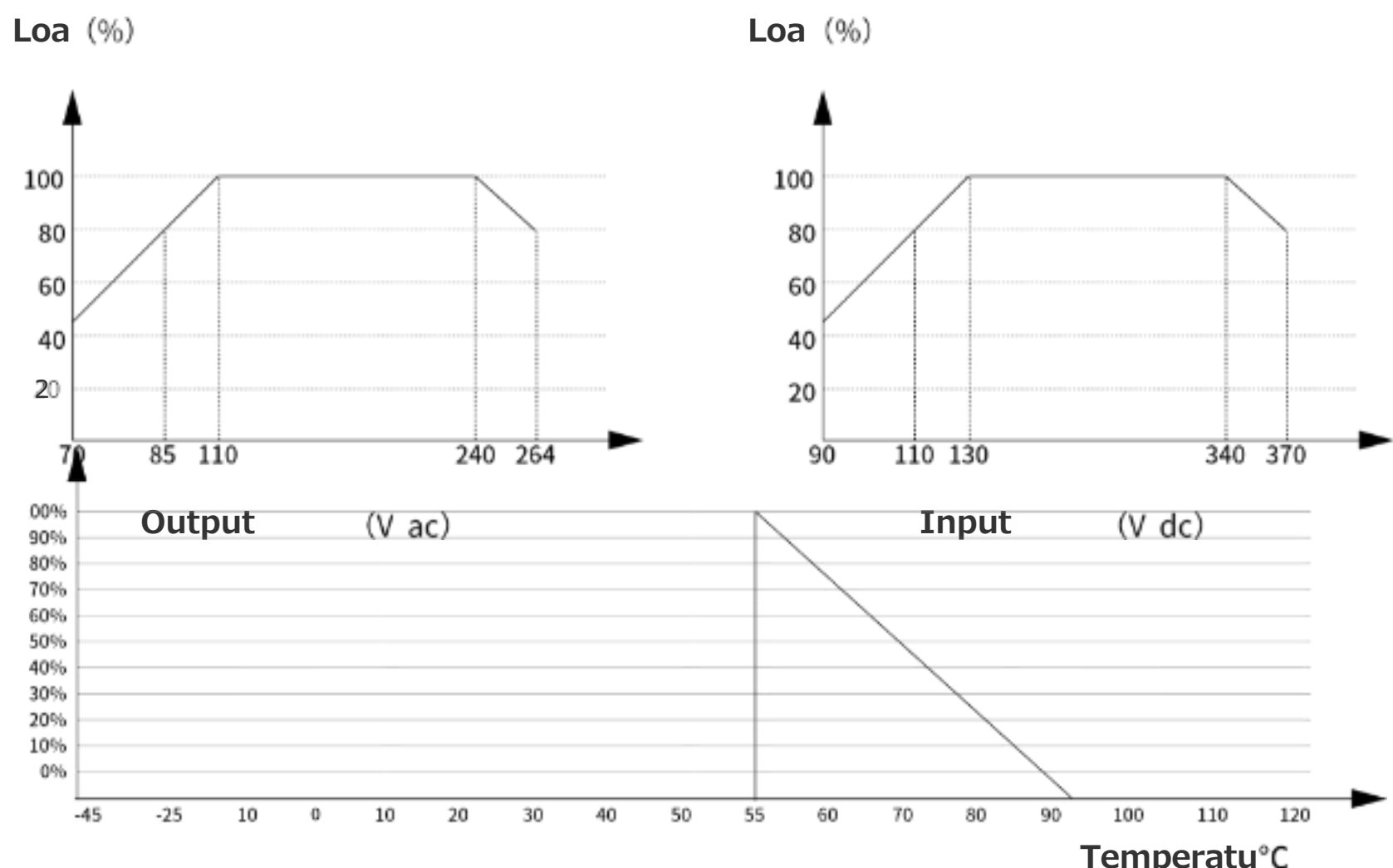
Accuracy: including rounding error, linear adjustment rate and load adjustment rate.

The power supply shall be regarded as a part of the components in the system, which shall be confirmed in combination with the terminal equipment.

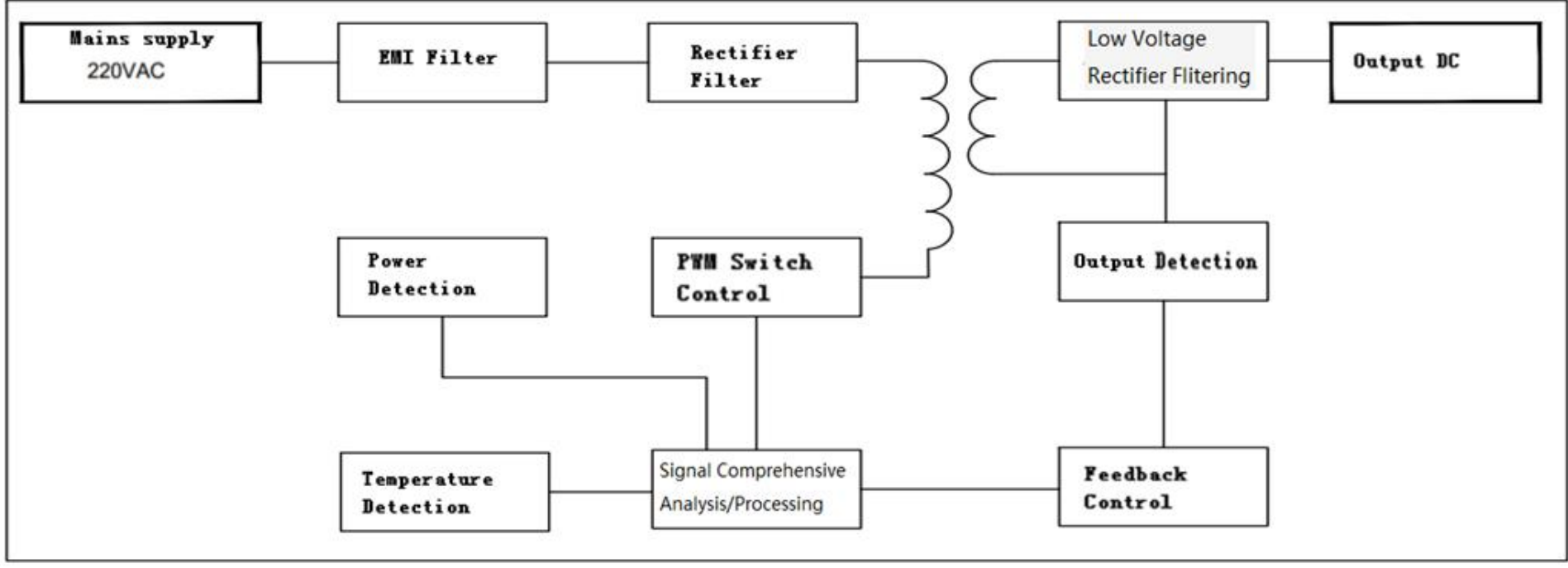
Derating output is required under low input voltage.

- Please refer to derating curve for details.
- The monomer of the product meets the CE standard.

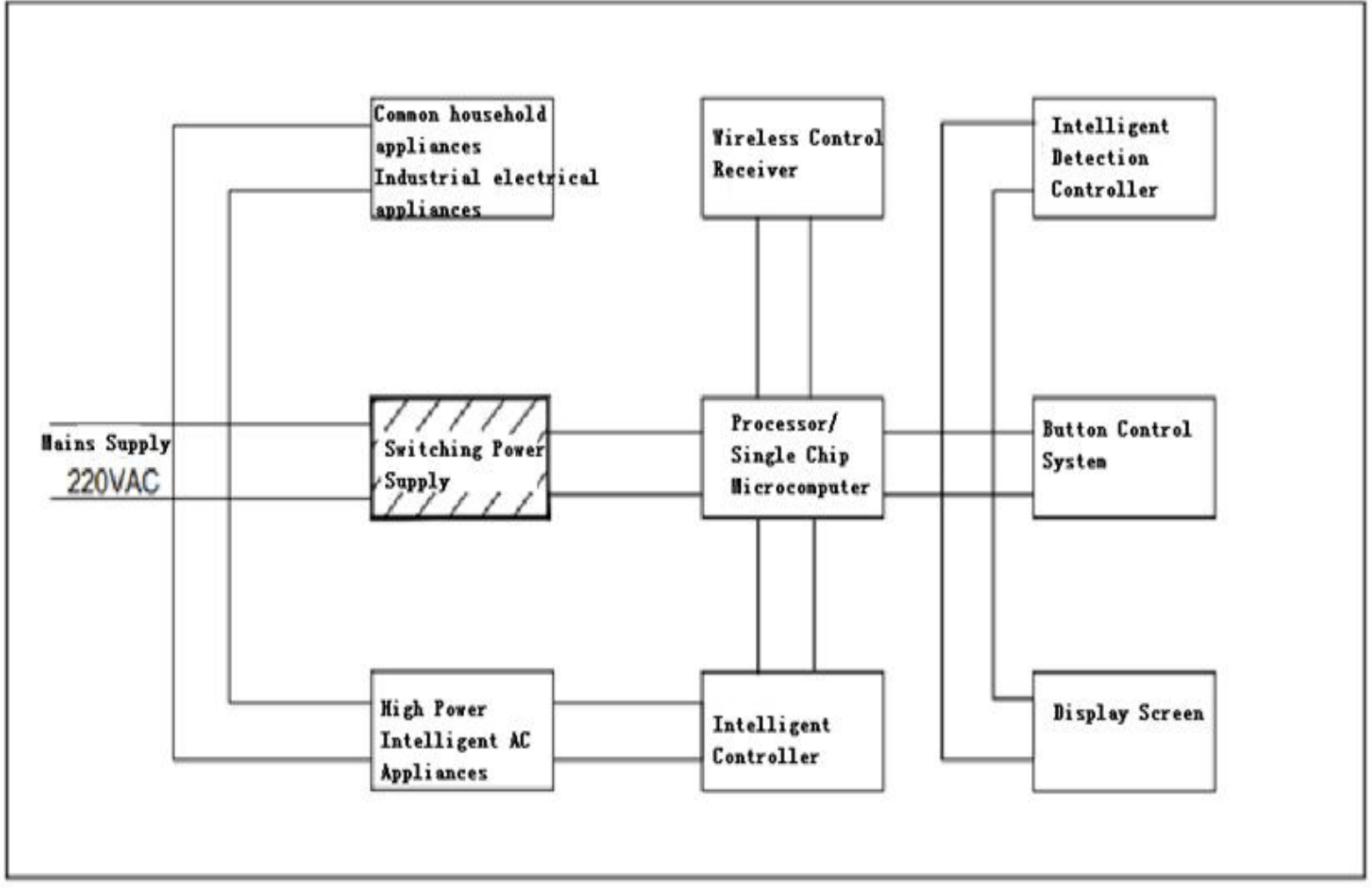
Curves Chart For Product Features



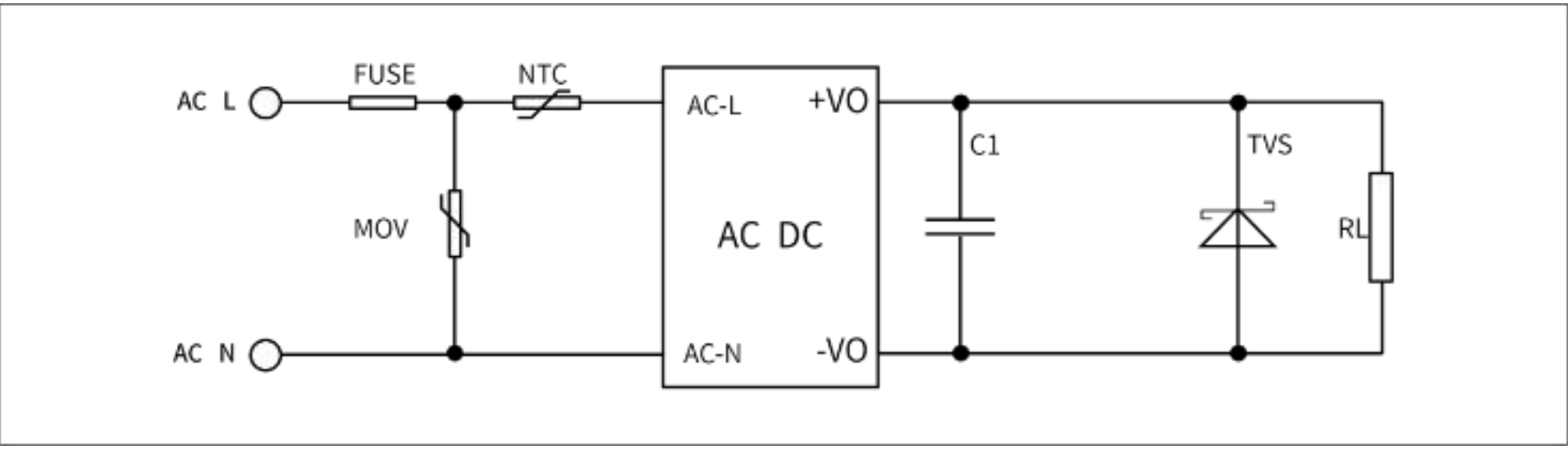
Schematic Diagram Of Power Supply



Application Scheme Block Diagram



Typical Application Circuit



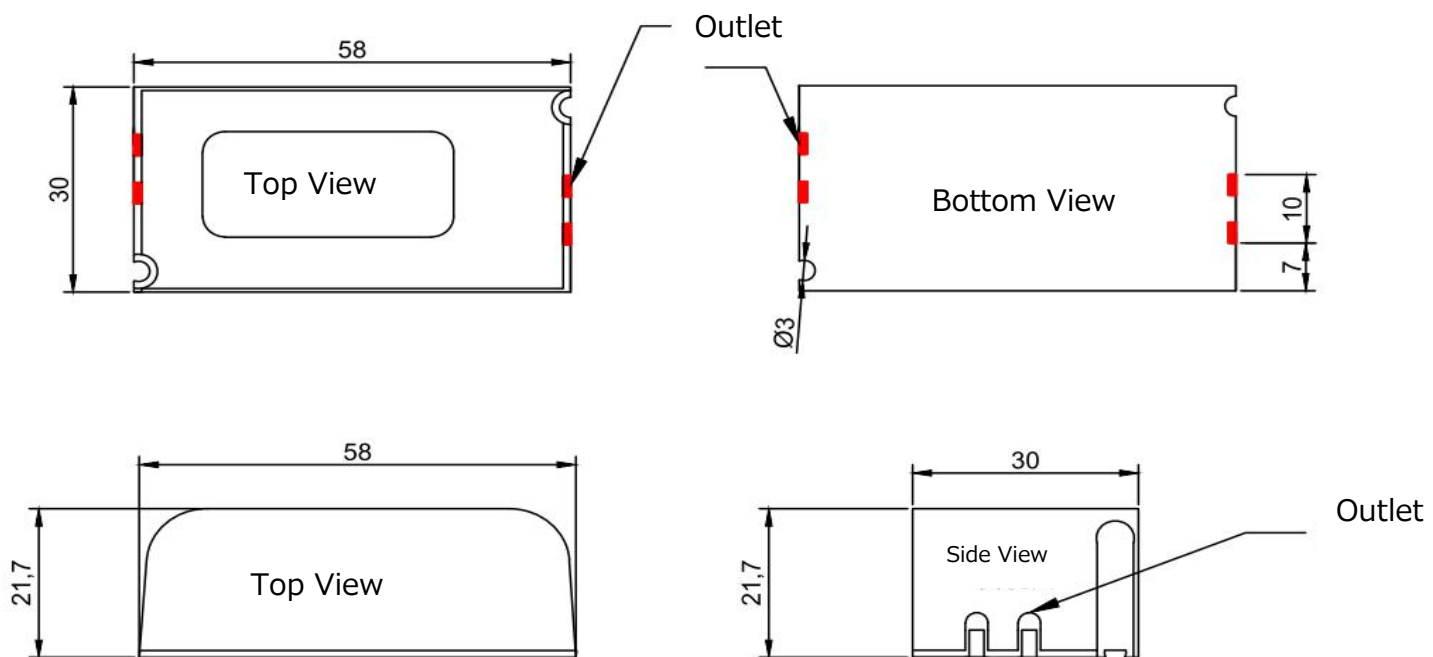
EMC Solution--Recommended Circuit

Bit Number/ Recommended Device	Effect	Recommended value (regular)
FUSE	When the power supply module suffers from abnormal input or the module itself, the whole system is protected from damage	2.0a/250vac, slow fusing (must be connected)
MOV/varistor	The surge voltage is suppressed to protect the module from damage in case of lightning stroke.	14D561K
NTC/thermistor	Restrain surge current and protect module from damage.	20D-7
Remarks	<ul style="list-style-type: none"> ■ ■ ■ ■ 	

Output Section

Original recommended device	Effect	Recommended value (optional)
TVS/transient suppression diode	Restrain the over voltage and protect the system connected with the module from damage	SMBJ15A (optional)
C1/ceramic capacitor	Restrain the high frequency ripple, improve the anti-interference ability of the equipment and the reliability of the system	0.1uF/50V (optional)

Product Pin Definition Diagram



Attention: All Units are mm;
Accuracy:0.00mm;Tolerance: ± 0.5 mm

explanation

■ Product Selection And notes

1. Please refer to the performance parameters of this specification for selection and use, otherwise the reliability of the power supply will not be guaranteed.
2. All parameters in this specification are measured according to our company's internal standards.
3. It is recommended that the load power of the power supply should not exceed 80% of the rated power of the power supply.
4. When using multi output power supply, each output channel must be loaded and used at the same time according to the corresponding ratio.
5. Our company can provide customized products.
6. The copyright and the final interpretation right of the products belong to Guangzhou Sanmin Electronic Technology Co., Ltd. the products are subject to change without prior notice. If the pictures are inconsistent with the real objects, the real objects shall prevail.
7. For more product information, please contact us or visit our official website: [https:// www.sanmim.com](https://www.sanmim.com)

 Tel : 020-29837002

 Web : www.sanmim.com

 mail : sales@sanmim.com

 Add : Building D, micro think tank Industrial Park, No.8, Xianke 1st Road, Xiutang village, Huadong Town, Huadu District, Guangzhou