

# PW-3090 Series

Isolated power module



### Functional Description

The PW-3090 series is an efficient (83%) DC-to-DC power module with 1000 Vdc isolated protection. It can have non-regular DC input (18~36V) but still can provide a stable DC output (5V, 12V, 24V, ±5V, ±15V). It can provide your devices with a stable power source against harmful effects in the operating environment.

### Applications

- Isolated power supply for signal conditioning modules

### Specifications

- Input Voltage Range: 18~36VDC
- Temperature Coefficient: ±0.03%/°C
- Ripple & Noise: 100mVp-p max
- Line Regulation: ±0.2% max
- Load Regulation: ±0.2% max
- Short Circuit Protection
- Isolation Resistance: 10<sup>9</sup> ohms min
- Switch Frequency: 200KHz

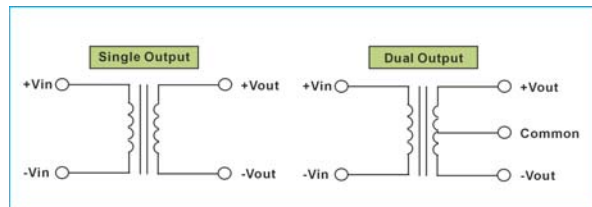
### General Specifications

- Isolation Voltage: 1000Vdc
- Operating temperature: -25 ~ 70°C
- Storage temperature: -30 ~ 85°C
- Operation bandwidth: 3KHz
- Weight: 110 grams
- Dimensions: 113 mm x 70.5 mm x 24.5 mm

### Features

- 1000Vdc isolation (three-way)
- Wide input range(18~36V)
- Stable DC output
- Easy to configure output voltage
- Flexible DIN-rail mounting

### Simplified Schematic Diagram



### Pin Assignment



Pin	Name	
1	-Vout	OUT
2	-Vout	
3	Common	
4	+Vout	
5	+Vout	
6	Common	
7	+18~36VDC	IN
8	+18~36VDC	
9	+18~36VDC	
10	GND	
11	Frame GND	
12	GND	

### Ordering Information

#### Standard

- PW-3090-24S:** Output power voltage +24V @ 400mA (max.) Accuracy: ±2%
- PW-3090-12S:** Output power voltage +12V @ 800mA (max) Accuracy: ±2%
- PW-3090-5S:** Output power voltage +5V @ 2000mA (max) Accuracy: ±2%
- PW-3090-15D:** Output power voltage ±15V @ 300mA (max) Accuracy: ±2%
- PW-3090-5D:** Output power voltage ±5V @ 1000mA (max) Accuracy: ±2%