



## Features

- 100A contact switching capability.
- Low coil power consumption and Pulse-driven.
- Dielectric Strength of 4KV between coil and contacts.
- Excellent anti-shock ability and high reliability .
- Both single and dual coil relay available.
- Environmental friendly product (RoHS Compliant)

## Contact Capacity

Model	SY32
Nominal switching capacity (res. load)	100A 250VAC
Max. switching current	100A
Max. switching voltage	250VAC
Max. switching power	25,000 VA

## Characteristic Data

Contact material	Silver alloy	
Initial contact resistance (at 6VDC 1A)	2mΩ Max.	
Operate time (at nominal volt.)	30msec. Max.	
Release time (at nominal volt.)	30msec. Max.	
Initial insulation resistance	1,000MΩ Min.(DC500V)	
Initial dielectric strength	Between open contacts : AC1,000V , 50/60Hz 1Min.	
	Between coil and contact : AC5,000V , 50/60Hz 1Min.	
Vibration resistance	Functional	10 ~ 55Hz at double amplitude of 1.5 mm
	Destructive	10 ~ 55Hz at double amplitude of 1.5 mm
Shock resistance	Functional	10G Min
	Destructive	100G Min.
Endurance (operations)	Mechanical (at 3,600 ops./h)	200,000 cycles
	Electrical (at 600 ops./h)	1,000 cycles
Ambient temperature	-40°C ~ +70°C (no condensation)	

## Coil Data (at 20°C)

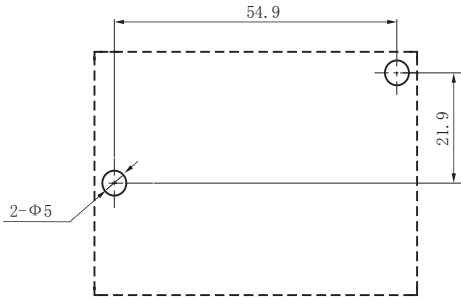
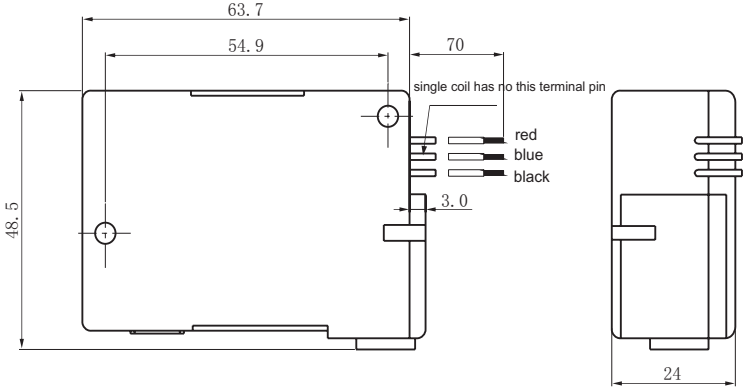
Standard

Nominal voltage (VDC)	Single coil resistance 10% (Ω)	Dual coil resistance 10% (Ω)		Operate voltage (Max.)	Release voltage (Max.)	Pulse duration (ms)	Nominal operating power
		set	reset				
5	8.4	4.2	4.2	80 % of nominal voltage	80 % of nominal voltage	80 Min.	Single/Dual: 2.88W /5.76W
6	12.5	6.25	6.25				
9	27	13.5	13.5				
12	50	25	25				
18	108	54	54				
24	200	100	100				
48	800	400	400				

Ordering Information

Nomenclature						
SY32	-1	12	D	M	1	-XX
				Special Parameter:Nil-Standard Type, Letter or number-Special Requirement		
				Coil Specification : 1-Single coil, 2-Dual coils		
				Contact Form : M-Form A		
				Coil Power : Single coil-2.88W , Dual coil-5.76W		
				Coil Voltage(VDC) : 05 , 06 , 09 , 12 , 18 , 24 , 48		
				Number of Poles : 1-1Pole		
				Type designation : SY32		

Outline Dimensions, Wiring Diagram, Mounting Holes (unit : mm)



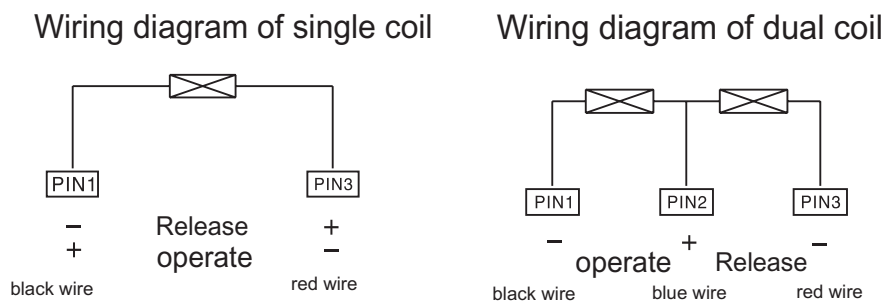
Mounting Hole

Unless otherwise specified :  
 If dimension < 1mm, tolerance : 0.2 mm;  
 If dimension 1~5mm, tolerance : 0.3 mm;  
 If dimension > 5mm, tolerance : 0.4 mm.  
 Note : 1. Extended terminal dimension is dimension before soldering.  
 2. Tolerance of mounting holes : 0.5 mm.

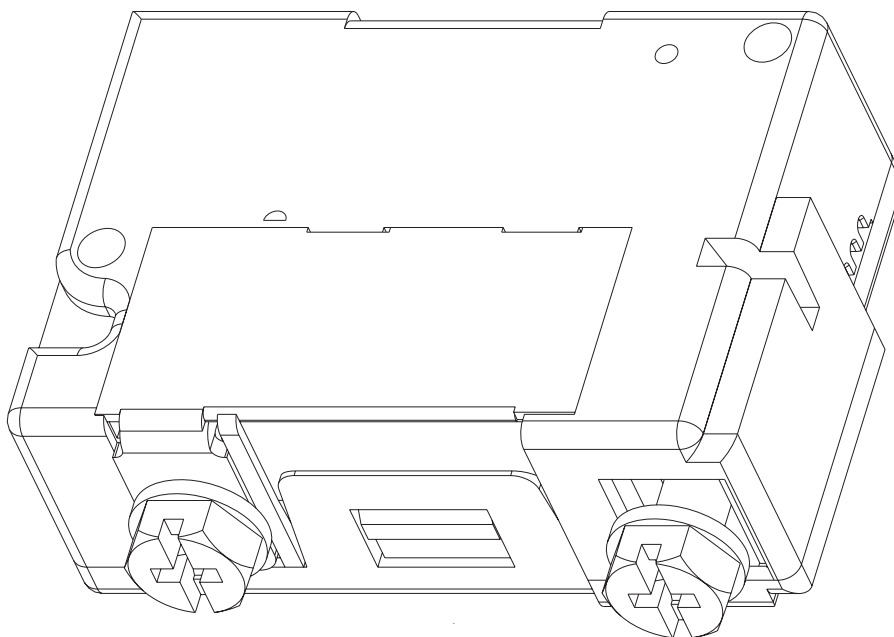
Typical Applications

- Industrial machinery
- Electrical device
- Air conditioner and home appliances

## Wiring diagram



## Typical drawing



### Note:

Typical drawing is just for reference, customized terminals with metering components are acceptable. Please contact us for any special requirements.

### Announcements :

- 1 The magnetic latching relay is to be supplied with contacts close(Operate) or contacts open(Release), but the contact status may got changed due to unexpected shock or vibration during delivering or mounting. You can reset the contact status according to your requirement.
- 2 In order to make sure the contacts are completely closed or opened, energized voltage to Operate or Release coil should be the nominal operate/release voltage, impulse width should be 5 times more than specified operate/release time in the specification but less than 1 minute. Do not apply power to Operate and Release coils at the same time.

### Disclaimer:

This datasheet is just for customers' reference. The newest specification you can get from the website of sanyorelays. We could not evaluate all the performances and parameters for all possible applications, so the user should choose the suitable relay for their own application or require us to provide necessary help. If there is any query, please contact Sanyou for the technical service, however, it is the user's responsibility to determine which relay should be used.