





#### >>> Features

- ☐ Optional for open frame, dust cover, sealed type and with/without quick terminal on top.
- $\hfill\Box$  High rating 20A 240VAC.
- ☐ Ideal for home appliances application, specially for heating control use.
- ☐ Complies with RoHS-Directive 2011/65/EU.

## >>> Type List

Terminal	Contact	Insulation		Designation	Designation		
style	form	system	Flux tight	Sealed type	Sealed type washable		
	1A		805-1AC-C	805-1AC-V	805-1AC-S		
	(SPNO)		805-1AH-C	805-1AH-V	805-1AH-S		
	1C		805-1CC-C	805-1CC-V	805-1CC-S		
PCB terminal	(SPDT)		805-1CH-C	805-1CH-V	805-1CH-S		
FOD terminal	1A	F	805-1AC-F-C	805-1AC-F-V	805-1AC-F-S		
	(SPNO)	F	805-1AH-F-C	805-1AH-F-V	805-1AH-F-S		
	1C (SPDT)	F	805-1CC-F-C	805-1CC-F-V	805-1CC-F-S		
			805-1CH-F-C	805-1CH-F-V	805-1CH-F-S		
	1A (SPNO)		805WP-1AC-C	805WP-1AC-V	805WP-1AC-S		
		(SPNO)		805WP-1AH-C	805WP-1AH-V	805WP-1AH-S	
	1C		805WP-1CC-C	805WP-1CC-V	805WP-1CC-S		
WP (PCB terminal & Quick terminal)	(SPDT)		805WP-1CH-C	805WP-1CH-V	805WP-1CH-S		
	1A (SPNO)	F	805WP-1AC-F-C	805WP-1AC-F-V	805WP-1AC-F-S		
			805WP-1AH-F-C	805WP-1AH-F-V	805WP-1AH-F-S		
	1C	F	805WP-1CC-F-C	805WP-1CC-F-V	805WP-1CC-F-S		
	(SPDT)		805WP-1CH-F-C	805WP-1CH-F-V	805WP-1CH-F-S		

Terminal	Contact	Insulation	Desig	nation
style	form	system	Flux tight (with shroud)	Sealed type washable (with shroud)
	1A		805WP-1AC-CF	805WP-1AC-SF
	(SPNO)		805WP-1AH-CF	805WP-1AH-SF
WP (PCB terminal & Quick terminal)	1C (SPDT)		805WP-1CC-CF	805WP-1CC-SF
			805WP-1CH-CF	805WP-1CH-SF
	1A	F	805WP-1AC-F-CF	805WP-1AC-F-SF
	(SPNO)	r	805WP-1AH-F-CF	805WP-1AH-F-SF
	1C (SPDT)	F	805WP-1CC-F-CF	805WP-1CC-F-SF
		r	805WP-1CH-F-CF	805WP-1CH-F-SF

### >>> Ordering Information

805		-	1A	С	-		- [		-		
1	2		3	4		5		6		7	8

- 1. 805 -- Basic series designation
- 3. 1A -- Single pole normally open
  - 1C -- Single pole double throw

- 2. Blank -- PCB terminal
  - W -- Quick terminal (only for C1 cover)
- 4. C -- Contact material AgNi
- WP -- PCB terminal & Quick terminal
- H -- Contact material AgSnO



5. Blank -- Standard type

F -- Class F

6. Blank -- Open type

C -- Flux tight

V -- Sealed type

S -- Sealed type washable

CF -- Flux tight with shroud

SF -- Sealed type washable with shroud

C1 -- With flanged cover

S1 -- Sealed type washable with flanged cover

7. Blank -- Standard type

B -- With insulation barrier

8. — -- Coil voltage (please refer to the coil rating data for the availability)

### >>> Contact Rating

Resistive load	20A 240VAC
Max. switching current	30A
Max. switching voltage	277VAC
Max. switching capacity	4800VA

## >>> Coil Rating (DC)

Rated	Rated current	Coil resistance	Max. continuous	Pick up	Drop out	Power consumption
voltage	±10 % at 23°C	±10 % at 23°C	voltage	voltage(Max.)	voltage(Min.)	at rated
(V)	(mA)	$(\Omega)$	at 85°C	at 23°C	at 23°C	voltage
5	139	36				
6	118	51				
9	78	116				
12	58	206	130 % of	75 % of	10 % of	
18	39	463	rated	rated	rated	approx. 0.7W
24	29	823	voltage	voltage	voltage	
36	19	1,851				
48	15	3,291				
110	6	17,286				

## >>> Specification

Contact material	AgNi / AgSnO alloy			
Contact resistance (1)	50mΩ Max. (at 1A/6VDC by 4-wire resistance measurement)			
Operate time (1)	15 ms Max.			
Release time (1)	10 ms Max.			
Vibration resistance	Operating extremes	$10\sim 55 Hz$ , amplitude 1.5 mm		
VIDIATION resistance	Damage limits	$10\sim55$ Hz , amplitude 1.5 mm		
Shock resistance	Operating extremes	10G		
SHOCK resistance	Damage limits	100G		
Life expectancy	Mechanical	10,000,000 ops. (frequency 18,000 ops./hr)		
спе ехрестансу	Electrical 100,000 ops. (for NO contact) (frequency 900 ops./hr)			
Operating ambient temperature	-40~ +85°C (no freezing) (2)			
Weight	Approx. 22 g (open type), 27g (with cover), 36g (WP), 38g (W)			

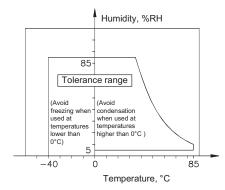
805

Note: (1) Initial value. Operate and release time excluding contact bounce.

- (2) Special version of high temperature 105°C can be selected.
- (3) Unless otherwise specified, all tests are under room temperature and humidity.
- (4) Consider the heat of PCB is necessary, please check the actual condition of PCB.
- (5) Applying no diode to this relay. The life expectancy will be lower when a diode is used. To use a varistor (ZNR) could absorb the coil surge of relay that is recommended.
- (6) Do not use the relay exceeding the coil rating, contact rating and life expectancy, or this may cause the risk of overheating.
- (7) To assure optimum performance, avoid the relay from dropping, hitting, or other unnecessary shocks.
- (8) Do not switch the contacts without any load as the contact resistance may become increased rapidly.
- (9) Flux tight version is recommended. If there is cleaning process and sealed type is selected, the vent-hole should be removed after the process.
- (10) Use suitable harnesses and bus bars according to the current as below:

20A type: Min. 3.0 mm

- (11) Usage, transport and storage conditions
  - 1. Temperature: -40~+85°C
  - 2. Humidity: 5 to 85% R.H.
  - 3. Pressure: 86 to 106 kPa
  - Furthermore, the humidity range varies with the temperature. So, use relays within the range indicated in the graph below.



(12) Please contact Song Chuan for the detailed information.

#### >>> Insulation Data

Insulation resistance (1)	100 M $\Omega$ Min. (DC 500V)	
Surge voltage withstand	Between contact and coil	: 6KV 1.2X50 μ S
Dielectric strength (1)	Between open contact	: AC 1000V , 50/60Hz 1min.
Dielectric strength	Between contact and coil	: AC 2500V , 50/60Hz 1min
Insulation of IEC 61810-1		
Clasranas / araanaga distances	Between coil to contact	: Basic, ≧ 1.5mm / ≧ 2.5mm
Clearance / creepage distances	Between open contact	: Functional
Rated insulation voltage	250V	
Rated impulse withstand voltage	2500V	
Pollution degree	2	
Rated voltage	230 / 400V	
Overvoltage category	II	

Note; (1) Initial value.

#### >>> Safety Approval

Certified	UL / CUL
File No.	E88991

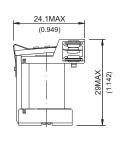
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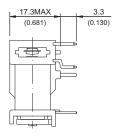
# >>> Safety Approval Rating

UL / CUL	
30A 277VAC	

#### >>> Outline Dimensions

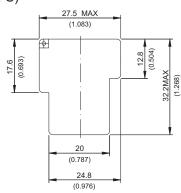
#### ◆805 (OPEN)

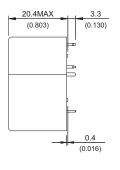


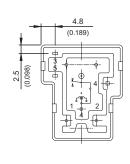




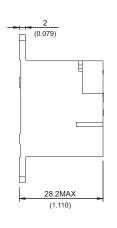
## ◆805 (-C,-V,-S)

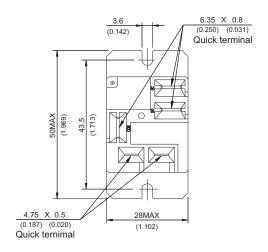




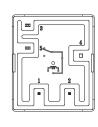


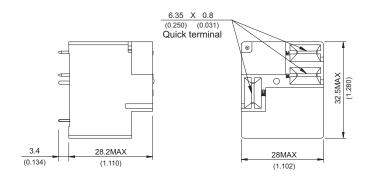
#### **♦**805W





#### ◆805WP (Cover with shroud)

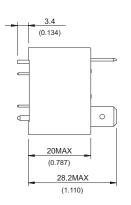


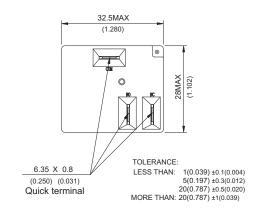




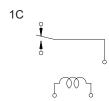
#### **♦**805WP

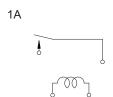






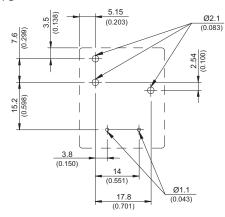
# >>> Wiring Diagram BOTTOM VIEW

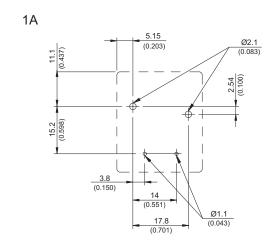




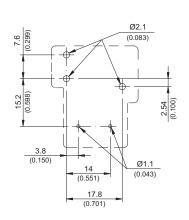
# >>> PC Board Layout

# ♦805WP/805WP(Cover with shroud)

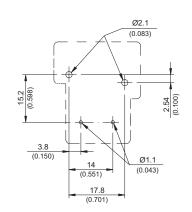




#### ◆805 1C







## >>> Engineering Data

