

Features

- 90A switching capability
- Double contact structure, good contact reliability
- It only requires pulse excitation voltage to work, which is energy-saving and environmentally friendly
- Environment-friendly product(RoHS compliant)
- Outline Dimensions:(30×16×25)mm



■ CHARACTERISTICS

Specifications	Item		
Contact Data	Contact arrangement		1A/1B
	Contact resistance		≤1mΩ(6VDC 20A)
	Contact material		AgSnO ₂
Rated value	Rated load(Resistance load)		Main contact: 90A 250VAC/48VDC Auxiliary contact: 1A 250VAC/48VDC
	Max.switching voltage		Main contact: 250VAC/48VDC
	Max.switching current		Main contact: 90A
	Max.switching capacity		Main contact: 22500VA/4320W
	Min.allowing load		Main contact: 1VDC 100mA Auxiliary contact: 3VDC 1mA
Electrical performance	Insulation resistance(initial)		100MΩ(500VDC)
	Dielectric strength (initial))	Between open contacts	1000VAC,1 min
		Between coil&contacts	1000VAC,1 min
	Set time(Rated driving voltage)		≤20ms
	Reset time(Rated driving voltage)		≤20ms
Mechanical performance	Shock resistance		98m/s ² (10g) 980m/s ² (100g)
	Vibration resistance		1×10 ⁵ ops
Endurance	Mechanical		90A 250VAC/48VDC 6×10 ³ ops(ON/OFF=1s/9s)
	Electrical(Room temperature)		-40℃～90℃
Operate condition	Ambient temperature		5% to 85%
	Humidity		PCB
Termination			Approx.28g
Unit weight			Plastic sealed, Flux proofed

■ COIL DATA(23℃)

■ Single coil latching

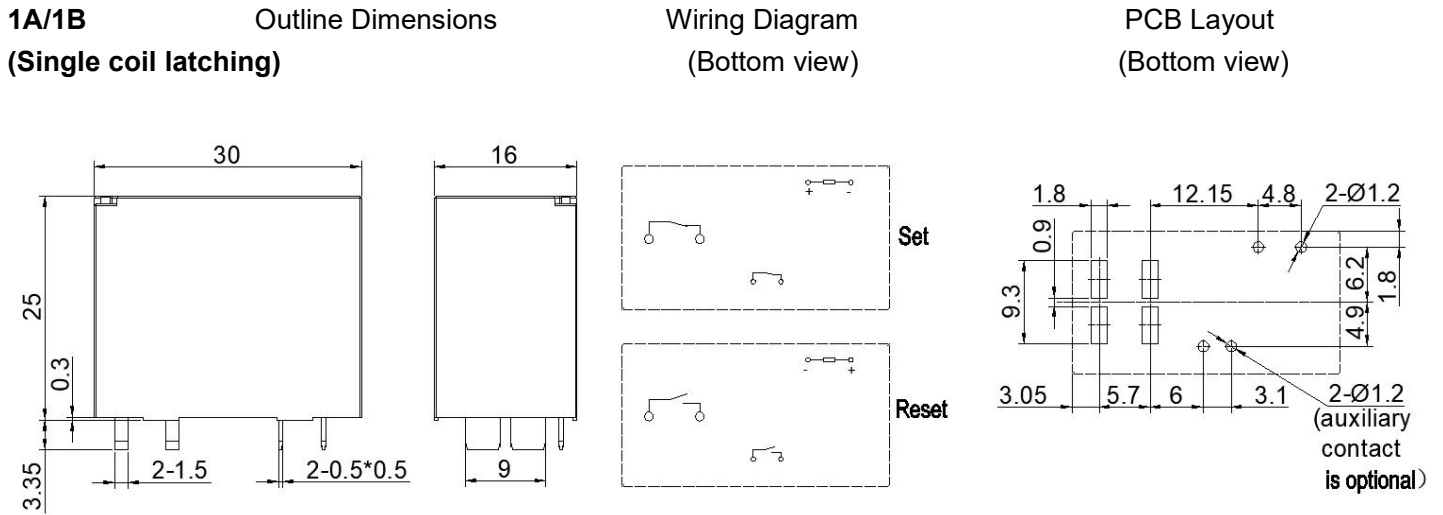
Nominal Voltage	Set Voltage VDC	Reset Voltage VDC	Rated Current (±10%)	Coil Resistance (±10%)	Nominal Power	Max Voltage
DC 5V	≤3.75	≤3.75	600mA	8.3Ω	3W	DC 6.5V
DC 12V	≤9	≤9	250mA	48Ω		DC 15.6V
DC 24V	≤18	≤18	125mA	192Ω		DC 31.2V
DC 48V	≤36	≤36	62.5mA	768Ω		DC 62.4V
DC 60V	≤45	≤45	50mA	1200Ω		DC 78.0V

■ ORDERING INFORMATION

	FH57L	-1A	S	T	F	A	-L1	R	-AC	DC12V
① Type:										
② Contact arrangement: 1A=1 Form A 1B=1 Form B										
③ Construction(1): Nil=Flux proofed, S=Plastic sealed										
④ Contact material: T=AgSnO ₂										
⑤ Insulation standard: F=Class F										
⑥ Arc extinguishing system: A=With magnetic blowing arc extinguishing、B=without magnetic blowing arc extinguishing										
⑦ Sort: L1=1 coil latching										
⑧ Operation polarity: Nil=standard polarity R=reversed polarity										
⑨ Auxiliary contact(2): None=No auxiliary contact、AC=with auxiliary contact										
⑩ Coil specification: DC5/12/24/48/60V										

- (1) When used in clean environment(excluding H₂S,SO₂,NO₂,dust and other pollutants), it is recommended to choose the Flux proofed type;When used in unclean environment(contain H₂S,SO₂,NO₂,dust and other pollutants), it is recommended to choose the Plastic sealed.
- (2) The auxiliary contacts and the main contacts are of the same form.

■ OUTLINE DIMENSIONS, WIRING DIAGRAM AND PC BOARD LAYOUT (Unit:mm)



Remark: (1) In case of no tolerance shown in outline dimension: outline dimension $\leq 1\text{mm}$, tolerance should be $\pm 0.2\text{mm}$; outline dimension $> 1\text{mm}$ and $< 5\text{mm}$, tolerance should be $\pm 0.3\text{mm}$; outline dimension $\geq 5\text{mm}$, tolerance should be $\pm 0.5\text{mm}$.

(2) The tolerance without indicating for PCB layout is always $\pm 0.1\text{mm}$.

■ NOTICE

- ① With the consideration of shock risen from transit and relay mounting, relay's initial state might be changed, please impose pulse voltage to reset the relay before using (rated coil voltage, impulse width ≥ 5 times operation time).
- ② In order to maintain the initial performance parameters of the relay, please be careful not to drop the product;
- ③ In order to maintain the "set" or "reset" status, energized voltage to coil should reach the rated voltage, impulse width should be 5 times more than "set" or "reset" time. Do not energize the voltage to "set" coil and "reset" coil simultaneously.
- ④ The specification is for reference only. Specifications subject to change without notice.