

## Accessories (Order Separately)

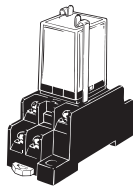
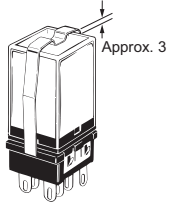
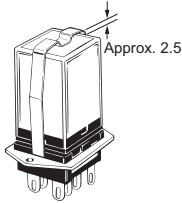
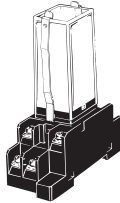

### Connection Sockets

Connecting method	Mounting method	Number of poles	Model
Front-mounting Sockets (PTF□-□-PU, PTF□A)	Track or screw mounting	1 or 2	PTF-08-PU
			PTF-08-PU-L
			PTF08A
		3	PTF08A-E *1
			PTF11A
			PTF-14-PU-L
4	PTF14A		
	PTF14A-E *1		
	Back-mounting Sockets (PT□)	Solder terminals	1 or 2
3			PT11 *2
4			PT14 *2
Wrapping terminals		1 or 2	PT08QN
		3	PT11QN
		4	PT14QN
Relays with PCB Terminals		1 or 2	PT08-0
		3	PT11-0
		4	PT14-0

\*1. The PTF□A-E Relays have finger protection. Round terminals cannot be used. Use forked terminals.

\*2. When ordering PT08, PT11, or PT14 sockets, please note that the minimum order quantity is 10 and orders are accepted in multiples of the minimum order.

### Relay Hold-down Clips

Application Item	Used with Socket		Used with Socket mounting plate	For models with built-in CR circuits	
Appearance		 Approx. 3	 Approx. 2.5		
Model	PYC-A1	PYC-P	PYC-S	Y92H-3	PYC-1
Minimum order (quantity) *	100	100	10	10	10

\* Orders are accepted in multiples of the minimum order.

### Socket Mounting Plates

Applicable sockets	Number of sockets	Model
PT08 PT08QN	1	PYP-1 *1
	18	PYP-18 *2
	36	PYP-36 *2
PT11 PT11QN	1	PTP-1-3
	12	PTP-12
PT14 PT14QN	1	PTP-1
	10	PTP-10

\*1. When ordering PYP-1, please note that the minimum order quantity is 10 and orders are accepted in multiples of the minimum order.

\*2. PYP-18 and PYP-36 can be cut to any required length.

## Ratings and Specifications

### Ratings

#### Standard Models with Built-in Operation Indicators

#### Operating Coil, Single-pole and Double-pole Models

Item	Rated voltage (V)	Rated current (mA)		Coil resistance (Ω)	Coil inductance (H)		Must-operate voltage (V)	Must-release voltage (V)	Maximum voltage (V)	Power consumption (VA, W)
		50 Hz	60Hz		Armature OFF	Armature ON				
AC	12	106.5	91	46	0.17	0.33	80% max.*1	30% min.*2	110% of rated voltage	Approx. 1.0 to 1.2 (at 60 Hz)
	24	53.8	46	180	0.69	1.3				
	50	25.7	22	788	3.22	5.66				
	100/110	11.7/12.9	10/11	3,750	14.54	24.6				Approx. 0.9 to 1.1 (at 60 Hz)
	110/120	9.9/10.8	8.4/9.2	4,430	19.2	32.1				
	200/220	6.2/6.8	5.3/5.8	12,950	54.75	94.07				
	220/240	4.8/5.3	4.2/4.6	18,790	83.5	136.4				
DC	6	150		40	0.16	0.33	80% max.*1	10% min.*2	110% of rated voltage	Approx. 0.9
	12	75		160	0.73	1.37				
	24	36.9		650	3.2	5.72				
	48	18.5		2,600	10.6	21.0				
	100/110	9.1/10		11,000	45.6	86.2				

#### 3 poles

Item	Rated voltage (V)	Rated current (mA)		Coil resistance (Ω)	Coil inductance (H)		Must-operate voltage (V)	Must-release voltage (V)	Maximum voltage (V)	Power consumption (VA, W)
		50 Hz	60Hz		Armature OFF	Armature ON				
AC	12	159	134	24	0.12	0.21	80% max.*1	30% min.*2	110% of rated voltage	Approx. 1.6 to 2.0 (at 60 Hz)
	24	80	67	100	0.44	0.79				
	100/110	14.1/16	12.4/13.7	2,300	10.5	18.5				
	200/220	9.0/10.0	7.7/8.5	8,650	34.8	59.5				
DC	12	112		107	0.45	0.98	80% max.*1	10% min.*2	110% of rated voltage	Approx. 1.4
	24	58.6		410	1.89	3.87				
	48	28.2		1,700	8.53	13.9				
	100/110	12.7/13		8,500	29.6	54.3				

#### 4 poles

Item	Rated voltage (V)	Rated current (mA)		Coil resistance (Ω)	Coil inductance (H)		Must-operate voltage (V)	Must-release voltage (V)	Maximum voltage (V)	Power consumption (VA, W)
		50 Hz	60Hz		Armature OFF	Armature ON				
AC	12	199	170	20	0.1	0.17	80% max.*1	30% min.*2	110% of rated voltage	Approx. 1.95 to 2.5 (at 60 Hz)
	24	93.6	80	78	0.38	0.67				
	100/110	22.5/25.5	19/21.8	1,800	10.5	17.3				
	200/220	11.5/13.1	9.8/11.2	6,700	33.1	57.9				
DC	12	120		100	0.39	0.84	80% max.*1	10% min.*2	110% of rated voltage	Approx. 1.5
	24	69		350	1.41	2.91				
	48	30		1,600	6.39	13.6				
	100/110	15/15.9		6,900	32.0	63.7				

**Note:** 1. The rated current and coil resistance are measured at a coil temperature of 23°C with tolerances of +15%/–20% for the AC rated current and ±15% for the DC coil resistance.

2. The AC coil resistance and inductance values are reference values only. (at 60 Hz).

3. Operating characteristics were measured at a coil temperature of 23°C.

4. The maximum voltage capacity was measured at an ambient temperature of 23°C.

\*1. There is variation between products, but actual values are 80% max.

To ensure operation, apply at least 80% of the rated value (at a coil temperature of +23° C).

\*2. The actual values are 30% min. for AC and 10% min. for DC. To ensure release, use a value that is lower than the specified value.