

omron

Industrial Automation

Miniature Power Relays

Ratings	
Product classification	Monostable relays Standard type
Coil ratings	12 VDC 72.7 mA
Coil resistance	165 Ω
Operate voltage (Set voltage)	80 % Max.
Release voltage (Reset voltage)	10 % Min.
Max. voltage	110% (of rated voltage)
Operating indicator	Not equipped
Coil surge killer	Not equipped
Contact Type	4PDT
Contact method	Single
Contact material	Contact body: Ag alloy Contact finish: AgAu-clad
Contact rated load	250 VAC 3 A (Resistive load (cos phi = 1)) 250 VAC 0.8 A (Inductive load (cos phi = 0.4)) 30 VDC 3 A (Resistive load) 30 VDC 1.5 A (Inductive load (L/R = 7 ms))
Maximum switching voltage	250 VAC 125 VDC
Maximum switching current	AC: 5 A DC: 5 A
Maximum switching power	AC: 660 VA (Resistive load (cos phi = 1)) AC: 176 VA (Inductive load (cos phi = 0.4)) DC: 72 VA (Resistive load) DC: 36 VA (Inductive load (L/R = 7 ms))
Failure rate	100 uA at 1 VDC (failure level: P Reference value)
Ambient temperature (Operating)	-55 to 60 °C (withnoicingorcondensation)
Ambient humidity (Operating)	5 to 85 %RH (withnoicingorcondensation)
Characteristics	

Contact resistance	Max. 100 mOhm, Measuring the voltage drop across the contacts by applying test voltage/current as 5 VDC 1 A
Operating time (set time)	20ms
Release time (Reset time)	20 ms
Max.operating frequency (Mechanical)	18000 opn./h
Max.operating frequency (Electrical)	1800 opn./h
Insulation resistance	Between coil and contacts: 1000 (at 500 VDC) Between contacts of different polarity: 1000 (at 500 VDC) Between contacts of same polarity: 1000 (at 500 VDC)
Dielectric strength	Between coil and contacts: 2000 (Leakage current 3 mA 50/60 Hz 1 min) Between contacts of different polarity: 2000 (Leakage current 3 mA 50/60 Hz 1 min) Between contacts of same polarity: 1000 (Leakage current 3 mA 50/60 Hz 1 min)
Vibration resistance (Destruction)	10 to 55 to 10 Hz, 0.5-mm single amplitude 2 hours each in X, Y, and Z directions
Vibration resistance (Malfunction)	10 to 55 to 10 Hz, 0.5-mm single amplitude in each direction
Shock resistance (Destruction)	1000 m/s**2, 3 times each in directions
Shock resistance (Malfunction)	200 m/s**2
Endurance (Mechanical)	100000000 operations Min.
Endurance (Electrical)	200000 operations Min.
Protective structure	Closed type (cover)
Applicable standard (UL)	UL508
Applicable standard (CSA)	C22.2 No.0, No.14
Applicable standard (VDE)	112467UG
Terminal structure	Plug-in
Weight (Main)	Approx. 35 g