Latching - DC

Nominal voltage	Latch coil resistance in Ohms ± 10%	Unlatch coil resistance in Ohms ± 10%	Nominal coil power	Coil voltages	Insulation resistance	Operate voltage (latch/unlatch) at 25°C (77°F) (see note)
5 VDC	14	45	1.2 W	5 to 110 VDC	1,000 MΩ min. @ 500 VDC	75% of nominal
6 VDC	20	64				
12 VDC	80	275				
24 VDC	330	1,070				
48 VDC	1,290	2,850				
110 VDC	5,125	10,750				

Note: 120% of nominal or greater (one second duration single pulse) unlatch voltage - - above this the relay latches again.
Maximum continuous voltage: 120% of nominal (one coil only).

■ Characteristics

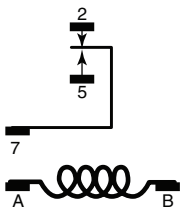
Operate time			15 ms nominal; 20 ms maximum
Release time			6 ms nominal; 10 ms maximum
Latch time			13 ms nominal with a one second pulse of nominal voltage (See note)
Unlatch time			13 ms nominal with a one second pulse of nominal unlatch voltage after latching with a one second pulse of nominal latching voltage (See note)
Operating ambient temperature	**AC: 1 & 2 pole**	**Operating**	-45° to 60°C (-49° to 140°F)
		Storage	-65° to 100°C (-85° to 212°F)
	AC: 3 pole	**Operating**	-45° to 45°C (-49° to 113°F)
		Storage	-65° to 100°C (-85° to 212°F)
	DC: 1, 2 & 3 pole	**Operating**	-45° to 70°C (-49° to 158°F)
		Storage	-65° to 100°C (-85° to 212°F)
Insulation material			High quality phenolic
Duty cycle			Rated for continuous duty operation at 25% overvoltage
Shock			15 g's 11±1 ms (non-operating test, no mechanical damage)
Vibration			0.1" DA or 10 g's, 10 to 55 Hz (operating test, no contact chatter)
Life expectancy		**Electrical at rated load**	100,000 operations
		Mechanical	10,000,000 operations
Dielectric strength			Greater than 750 VAC, RMS 60 Hz across open contacts Greater than 2,500 VAC, RMS 60 Hz all other mutually insulated elements
Terminals			Quick Connect
Weight			64 g (2.3 oz) open relay 54 g (3.0 oz) enclosed relay

Note: A latch pulse of 50 ms minimum at nominal voltage is recommended to insure positive latching.

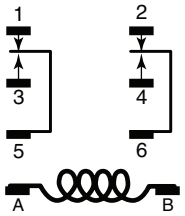
Terminal Arrangement

■ Non-Latching

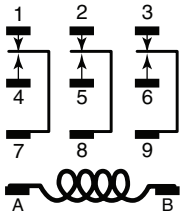
Reference only



1 Form C (SPDT)

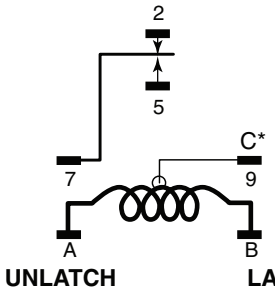


2 Form C (DPDT)

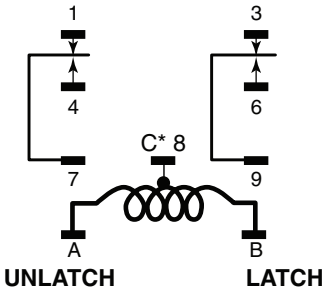


3 Form C (3PDT)

■ Latching / Unlatching



1 Form C (SPDT)



2 Form C (DPDT)

* C denoted common connection. On 3-pole relays the common connection is a wire lead coming off of the coil. It is not terminated to the relay header. Consult your Omron representative for single coil or isolated double coil models.