DESCRIPTION

A high insulation resistance of up to 1000 Gigaohm with low dielectric constant is achieved by using a high insulation plastic for the coil form. The HI series' space requirements is only 34 x 7.5 x 7.9 mm.

APPLICATIONS

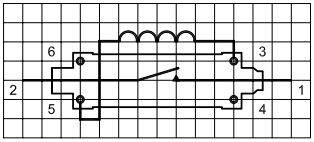
- Measurement equipment
- Test systems
- Control systems
- Medical equipment

FEATURES

- Rated power up to 50 Watts
- Switching up to 1000 VDC
- Breakdown up to 1500 VDC

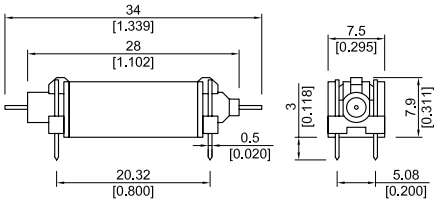
PIN OUT

View from top of component
2.54mm [0.10"] pitch grid



DIMENSIONS

All dimensions in mm [inches]



ORDER INFORMATION

Part Number Example

HI12 - 1A66

12 is the nominal voltage
66 is the switch model

SERIES	NOMINAL VOLTAGE	CONTACT FORM	SWITCH MODEL
HI	XX -	1A	XX
OPTIONS	05, 12, 24		31, 66, 75

High Insulation
Reed Relays

RELAY DATA

All data at 20 °C	Switch Model –> Contact Form –>	Switch 31 Form A			Switch 66 Form A			Switch 75 Form A			
Contact Ratings	**Conditions**	**Min.**	**Typ.**	**Max.**	**Min.**	**Typ.**	**Max.**	**Min.**	**Typ.**	**Max.**	**Units**
Switching Power	Any DC combination of V & A not to exceed their individual max.'s			50			10			10	W
Switching Voltage	DC or peak AC			1000			200			1000	V
Switching Current	DC or peak AC			2.0			0.5			0.5	A
Carry Current	DC or peak AC			3.0			1.25			1.0	A
Static Contact Resistance	w/ 0.5V & 50mA			60			150			200	mΩ
Dynamic Contact Resistance	Measured w/ 0.5V & 50mA 1.5 ms after closure			150			200			200	mΩ
Insulation Resistance (100 Volts applied)	Across contacts Contact to coil	10^{10} 10^{12}			10^{10} 10^{12}			10^{10} 10^{12}			Ω
Breakdown Voltage	Across contacts Contact to coil	1500 2.5 1.0			225 2.5 1.0			1000* 2.5 1.0			VDC kVDC kVRMS
Operate Time, incl. Bounce	Measured w/ 100% overdrive			1.2			0.5			0.5	ms
Release Time	Measured w/ no coil suppression			1.0			0.1			0.1	ms
Capacitance	Across contacts Contact to coil		0.4 3.0			0.2 3.0			0.4 3.0		pF
Life Expectancies											
Switching 5 Volts@ 10mA	DC only & <10 pF stray cap.		500			1000			500		10^6 Cycles
For other load requirements please see our life test section located on page 151.											
Environmental Data											
Shock Resistance	1/2 sine wave duration 11ms			50			50			50	g
Vibration Resistance	From 10 - 2000 Hz			20			20			20	g
Ambient Temperature	10 °C/ minute max. allowable	-20		70	-20		70	-20		70	°C
Storage Temperature	10 °C/ minute max. allowable	-25		85	-25		85	-25		85	°C
Soldering Temperature	5 sec. dwell			260			260			260	°C

* For higher voltage requirements please consult factory.

COIL DATA

CONTACT FORM	SWITCH MODEL	COIL VOLTAGE		COIL RESISTANCE			PULL-IN VOLTAGE		DROP-OUT VOLTAGE		NOMINAL COIL POWER
All data at 20 °C		VDC		Ω			VDC		VDC		mW
		Nom.	Max.	Min.	Typ.	Max.	Min.	Max.	Min.	Max.	Typ.
1A	66 75	5	7.5	440	600	660	0.85	3.5	0.75	3.4	40
		12	16	2700	3000	3300	1.9	8.4	1.8	8.3	50
		24	30	5400	6000	6600	3.7	16.8	3.6	16.7	95
	31	5	7.5	144	160	176	0.85	3.5	0.75	3.4	155
		12	16	990	1100	1210	1.9	8.4	1.8	8.3	130
		24	30	3240	3600	3960	3.7	16.8	3.6	16.7	160

* The pull-in / drop-out voltages and coil resistance will change at the rate of 0.4% per °C.