These RS-R4 ultra-miniature SMD reed sensors are designed for signal switching applications and have a size advantage over the standard size SMD reed sensor. As they are molded with flattened leads, no shock is transferred into the device when SMD formation takes place. Various activating distances are available depending on the magnet and the AT band used. The sensors are tested 100% for Operate AT, Release AT, Static Contact Resistance and Variable Contact Resistance before packing. The RS-R4 Ultra-miniature reed sensor, Being an omni-polar device, this sensor can be actuated with either a north pole or a south pole or both. Choosing the right AT band, magnet strength, and operating axis, will restrict the number of operates and releases to one. All dimensions are in mm.

FEATURES

- Normally Open contact.
- Two sensitivity bands.
- Molded with internal blades parallel to SMD feet.
- Packed in Tapes for automatic assembly.

APPLICATIONS

- Reed sensors for detecting Ignition Key
- Reed switches in Lightsabers
- Magnet sensors in Musical Greeting Cards
- Reed sensors in Radio-controlled Gliders
- Reed sensors in Accurate level sensing of fluids
- Reed switches in Washing machine vibration
- · Reed sensors in electric toothbrushes
- Reed switches and Reed sensors in Spirometers
- Miniature Reed sensors in activating Dentist's Drill

ELECTRICAL

Contact Form		А
Contact Rating (max)	W/VA	10.0
Switching Current (max)	А	0.5
Carry Current (max)	А	0.5
DC Switching Voltage (max)	V _{DC}	100
Breakdown Voltage (min)	V _{DC}	150
Contact Resistance (max)	mΩ	200
Insulation Resistance (min)	Ω	10 ⁹
Capacitance (typ)	pF	0.2

MISCELLANEOUS

Operate Time (max)	ms	0.35
Bounce Time (max)	ms	0.30
Release Time (max)	ms	0.10
Resonance Frequency (typ)	Hz	<2000
Operating Frequency (max)	Hz	500
Operating Temperature	°C	-40 to +120
Shock Resistance (½Sin wave for 11ms)	G	30
Vibration Resistance (10-2000Hz)	G	20

ORDERING CODE

RS-R4-(Formation Code)-(Operate Band)

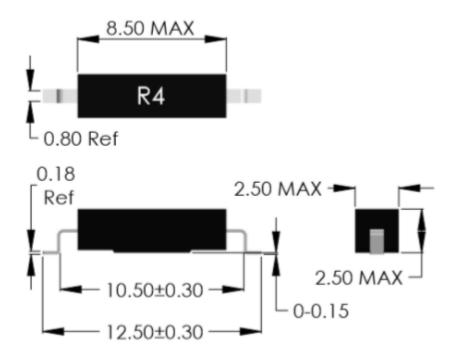
Formation Code	Lead Type	
S	Gull-wing SMD	
F	Low Profile SMD	

Operate Band Code		
1	AT	10-15
2	AT	15-20

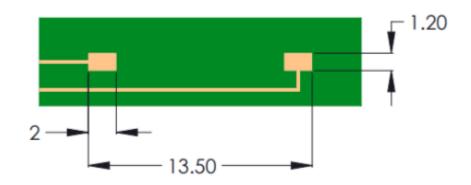
Examples: RS-R4-S-1 denotes R4 Reed Sensor with Gull-wing SMD formed leads in 10-15 Operate band (AT). RS-R4-F-2 denotes R4 Reed Sensor with Low Profile SMD formed leads, in 15-20 Operate Band (AT).

Other Special Configurations: Lower Static Contact Resistance, Dynamic Contact Resistance Limit, Higher Insulation Resistance, Special Release Limits, Gold plated leads

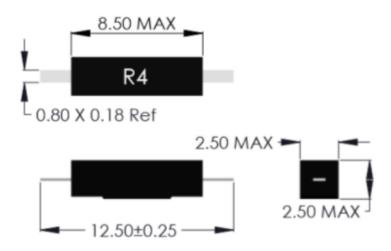
RS-R4-S SMD Reed Sensor



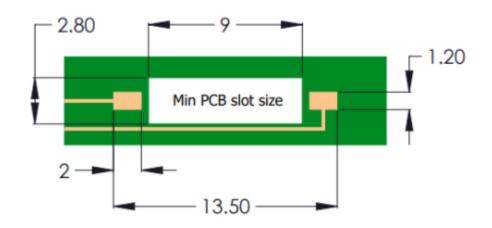
RS-R4-S Reed Sensor PCB Layout drawing



RS-R4-F SMD Reed Sensor



RS-R4-F Reed Sensor PCB Layout drawing



RS-R4 Reed Sensor Packing Tape

