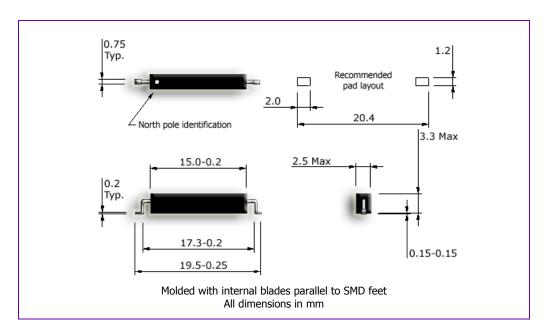
### **R2B-S NC SMD Reed Sensor**

# SMD Package, Form B, Normally closed



- Does not require power for operation
- Normally closed (NC) form B contact
- Polarity sensitive
- Molded with internal blades parallel to SMD feet
- ◆ Packed in tape and reels conforming to IEC-60286-3 norms
- Lead (Pb) free and RoHS compliant

#### Applications

This reed sensor is suitable for use in the following applications and many others: telephone hook switches, fluid tank cap sensing, emergency lamps...

#### **Specification**

opecinication		
Contact Form		В
Contact Rating (max)	W / VA	10
Switching Current (max)	Α	0.5
Carry Current (max)	Α	1.5
Switching Voltage (max)	$V_{DC}$	180
Breakdown Voltage (min)	$V_{DC}$	200
Initial Contact Resistance (max)	mΩ	150
Operating Temperature	°C	-20 to +100
Shock Resistance (1/2Sin wave for 11ms)	g	30
Vibration Resistance (10-2000Hz)	g	20

#### **Ordering Code**

R2B-S-(Release AT Code)

RED & (Release / Red Code)					
RAT Code	*Before	*After	Re-closure (min)		
0	05 – 10	10 – 22	70		
1	10 – 15	20 – 32	100		
2	15 – 20	30 - 42	130		

<sup>\*</sup>Indicate Operate AT band before and after modification of leads

#### **Æ** Example

R2B-S-1 denotes 10-15 release AT.

Due to continual improvement, specifications are subject to change without notice

www.reed-sensor.com

1 February 2008



### **R2B-S NC SMD Reed Sensor**

## **Actuation Distances**

Release, operate and re-closure distances for the R2B-S normally closed SMD reed sensor in the three standard AT bands when actuated (as shown in the sketches) with NdFeB standard magnets is shown below. All distances given are in mm with tolerances of ±0.5mm. Although some of the AT band / magnet combinations will produce similar actuating distances, selecting the right AT band and magnet for an application is important and can be done by going through our AT band FAQ and our magnet selection guide.

**B** R2B-S-0 (05-10 AT)

Actuation Sketch	Magnet	Dimensions	Release Distance	Operate Distance	Re-closure Zone
	NDR-T	4.0 x 1.5 x 1.5	3.5 – 7.0	4.0 – 7.5	< 0.5
	NDC-T	Ø2.0 x 4.0	4.0 – 7.5	5.0 - 8.0	< 1.0
	NDR-S	6.0 x 2.5 x 2.5	8.0 – 12.5	10.0 - 14.0	< 3.5
5N	NDC-S	Ø3.0 x 7.0	10.0 - 15.0	11.0 - 16.0	< 4.5
do o	NDR-M	8.0 x 3.0 x 3.0	11.5 – 17.5	13.0 - 19.0	< 5.5
	NDC-M	Ø4.0 x 10.0	15.0 – 22.0	17.0 – 23.0	< 7.0
	NDR-L	19.0 x 4.0 x 4.0	21.0 – 31.5	23.5 – 34.0	< 8.0
	NDC-L	Ø8.0 x 15.0	30.0 – 45.0	34.0 – 48.0	< 15.0

**E** R2B-S-1 (10-15 AT)

A		B: :	D. I. D. I	0 1 5:1	D 1 7
Actuation Sketch	Magnet	Dimensions	Release Distance	Operate Distance	Re-closure Zone
	NDR-T	4.0 x 1.5 x 1.5	2.0 – 4.0	2.5 – 4.5	< 0.5
	NDC-T	Ø2.0 x 4.0	2.5 – 5.0	3.0 – 5.5	< 1.0
	NDR-S	6.0 x 2.5 x 2.5	6.5 – 9.0	7.0 – 10.0	< 3.0
5 N	NDC-S	Ø3.0 x 7.0	8.0 - 10.5	9.0 – 11.0	< 3.5
do D	NDR-M	8.0 x 3.0 x 3.0	9.5 – 12.5	10.0 - 13.5	< 4.5
	NDC-M	Ø4.0 x 10.0	12.0 - 16.0	13.0 – 17.0	< 5.0
	NDR-L	19.0 x 4.0 x 4.0	17.0 – 21.5	18.0 - 23.0	< 7.0
	NDC-L	Ø8.0 x 15.0	26.0 - 32.0	27.0 – 33.0	< 12.0

**R2B-S-2 (15-20 AT)** 

Actuation Sketch	Magnet	Dimensions	Release Distance	Operate Distance	Re-closure Zone
	NDR-T	4.0 x 1.5 x 1.5	1.5 – 2.5	2.0 – 3.0	< 0.5
	NDC-T	Ø2.0 x 4.0	2.0 - 3.0	2.5 – 3.5	< 1.0
	NDR-S	6.0 x 2.5 x 2.5	5.0 – 7.0	5.5 – 8.0	< 2.5
5 <u> </u>	NDC-S	Ø3.0 x 7.0	6.5 – 8.5	7.0 – 9.5	< 3.0
do h	NDR-M	8.0 x 3.0 x 3.0	8.0 - 10.0	8.5 – 11.0	< 4.0
	NDC-M	Ø4.0 x 10.0	10.0 – 12.5	10.5 – 14.0	< 5.0
	NDR-L	19.0 x 4.0 x 4.0	14.5 – 18.0	15.0 – 19.0	< 6.0
	NDC-L	Ø8.0 x 15.0	22.0 – 26.5	22.5 – 28.5	< 10.0

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20 January 2009

