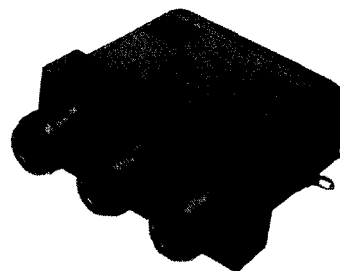


# Standard Coaxial Switches



This RLC Electronics Standard Size Coaxial Switch is a single pole, two position type. The switch provides extremely high reliability, long life and excellent electrical performance characteristics over the frequency range of DC-12.4 GHz. The package utilizes high density packaging techniques, hence the overall

volume of the switch is less than 6 cubic inches. The switch is available in the following configurations-manual or remote, inboard or outboard mounting holes, type N, SMA, BNC or TNC connector, 12 Vdc, 28 Vdc or 115 Vac operation, with or without indicator terminals, failsafe or latching cutthroat.

## Specifications

S<sup>1</sup>-2-2-3-4-5-6-7

Switch Type:	Single Pole, two position	
Frequency Range:	DC-12.4 GHz	
Frequency	DC-7GHz	7-12.4 GHz
Insertion Loss: (max)	0.3 dB	0.6 dB
VSWR:(max)	1.25	1.6
Isolation:(min)	60 dB	55 dB

**Power Rating, RF, Cold Switching:** See page 2.

**Impedance:** 50 ohms.

**Operating Power 25 °C:**

(Failsafe): 12 Vdc at 575 ma nom..

28 Vdc at 200 ma nom,

115 Vac at 76 ma nom.

(Latching): 12 Vdc at 1 amp nom.

28 Vdc at 430 ma nom.

115 Vac at 30 ma nom.

Current applied 10 ms min.; cutthroat

standard, recovery time 100 ms nom.

**Connectors, RF:** N,SMA,TNC,BNC\* Female.

**Connectors, Power:** Feed through solder lugs.

**Life:** 1,000,000 operations.

**Switching Time:** 20 milliseconds max.

**Weight:** 9 oz.

**Environmental Conditions:** MIL-S-3928

**Operating Mode :** Manual, failsafe or latching.

**Switching Sequence:** Break before make.

\*BNC not recommended for use above 1 GHz.

\*TNC not recommended for use above 12.4 GHz.

**To designate the switch desired use:**

(1) "M" for Manual or "R" for Remote.

(2) "in" for inboard mountings, if desired.

(3) "B" for BNC, "T" for TNC, N or "R" for SMA Connectors.

(4) "A" for 115 Vac, "D" for 28 Vdc. or "H" for 12 Vdc.

(5) "I" for indicators if desired.

(6) "L" for latching cut throat if desired.

(7) "TL" for TTL Driver if desired.

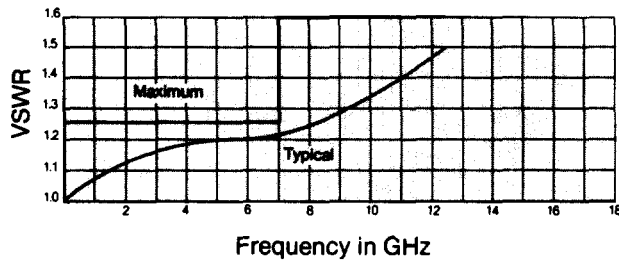
**Example:** SR-2-R-D-I is a remote operation, outboard mountings, SMA connectors, 28 Vdc with indicators, failsafe operation switch.

Specials requiring closer tolerances, different frequency ranges, special connectors, different materials, finishes, etc., can be furnished upon request. Specifications subject to change without notice.

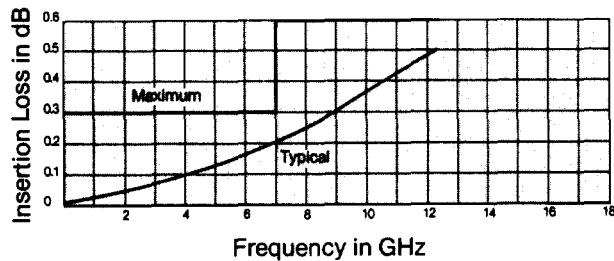


## Typical Operating Curves

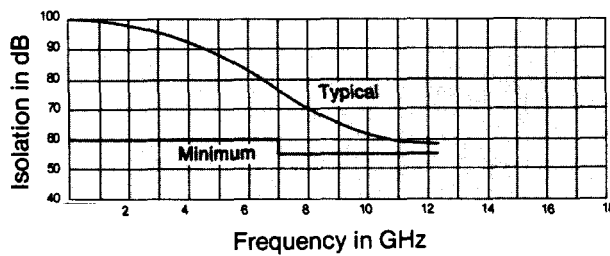
VSWR Vs. Frequency



Insertion Loss Vs. Frequency

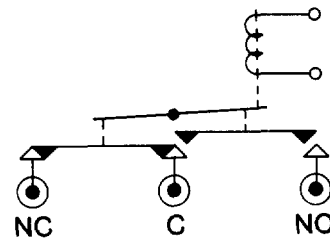


Isolation Vs. Frequency

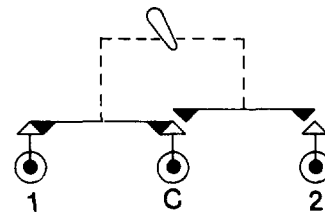


## Schematics

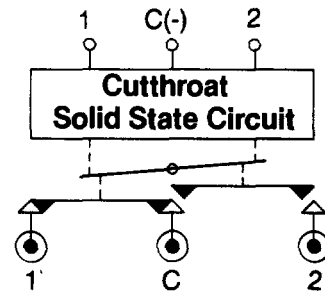
Failsafe



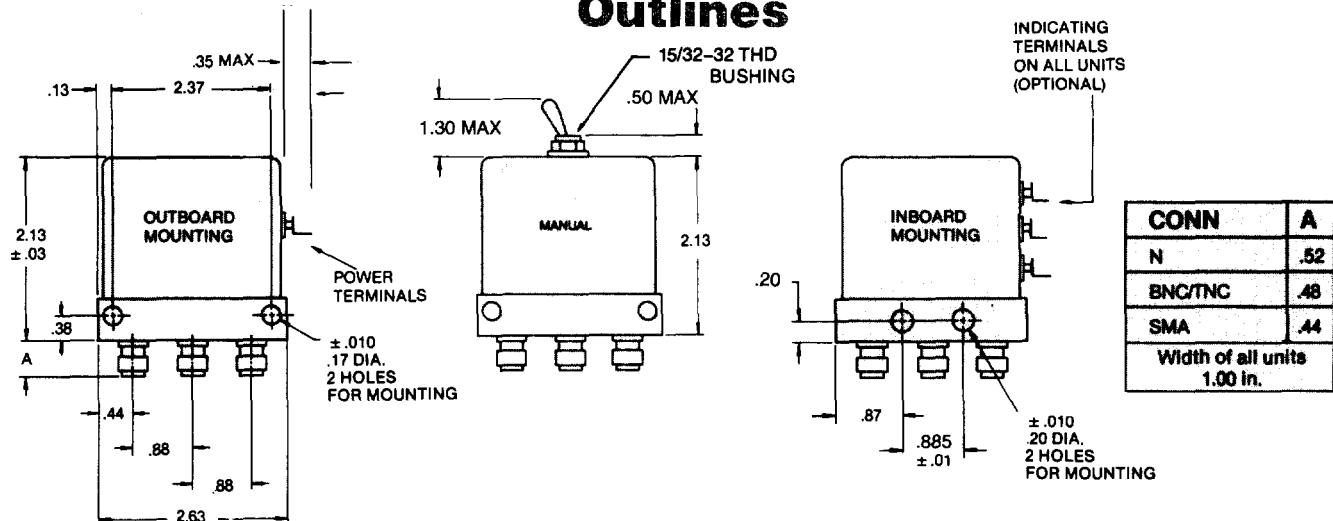
Manual



Latching



## Outlines



Contact factory for terminal location.

Tolerances unless otherwise specified are: .xx, ± .02; .xxx, ± .005.

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