

High-Speed Switch SP4T Absorptive



Specifications are subject to change without notice



The Mercury Systems PIN diode SP4T switch family spans the frequency range of 0.5 – 18 GHz. It offers high performance and an integrated high speed driver controlled by TTL or CMOS signals. This switch will maintain high performance as a drop in device for system or subsystem requirements. The Mercury Systems family of high performance switches is available in military or non military versions, hermetic and non-hermetic.

Applications

- EW systems
- Communications systems
- Antenna/Filter Selectors

Features

- Broadband units
- Environmentally sealed
- 55° C to +95° C operation
- Shock/vibration/acceleration capable

SP4T Specifications

Band	Frequency GHz	Reflective			Absorptive			Switching Speed (nS MAX)
		Insertion Loss (dB MAX)	VSWR (MAX)	Isolation (dB MIN)	Insertion Loss (dB MAX)	VSWR (MAX)	Isolation (dB MIN)	
1	0.5 - 2	1.6	1.6	80	1.7	1.6	80	100
2	2 - 6	1.6	1.7	70	1.7	1.7	75	100
3	6 - 18	3.2	2.0	60	3.4	2.0	65	100
4	2 - 18	3.3	2.0	60	3.5	2.0	65	100
5	0.5 - 18	3.4	2.0	60	3.6	2.0	65	100

Power Supply Option

Code ± 5%	A	B	C	Current (mA MAX)
+V	+5V	+5V	+12 to +15V	100
-V	-5V	-12 to -15V	-12 to -15V	50

Control Logic Option

Control Logic	Switch State	
	Normal N	Inverting I
TTL 0	Ins. Loss	Isolation
TTL 1	Isolation	Ins. Loss

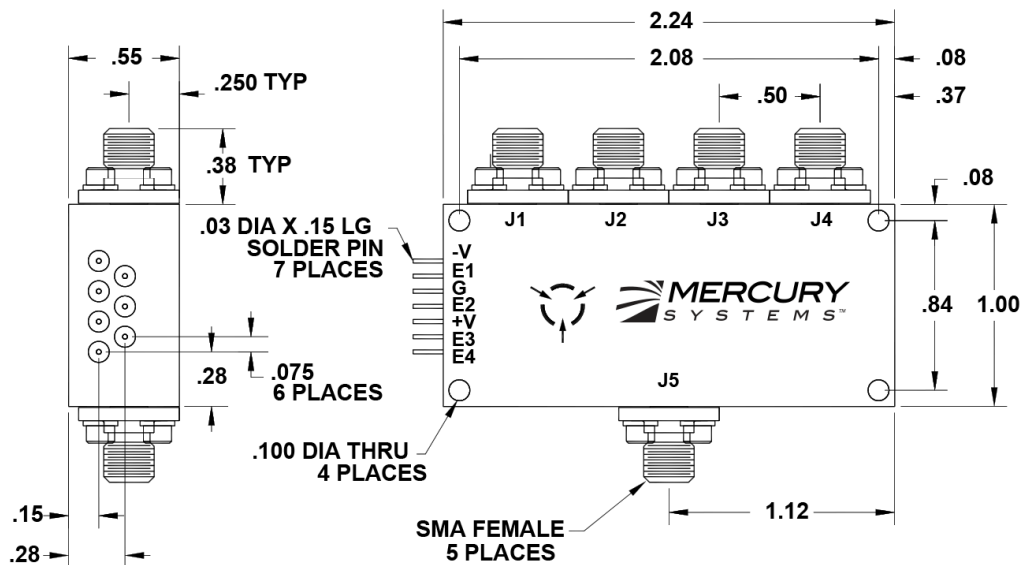
Specifications

- Switching Speed measured from 50% control to 10/90% RF
- Max. RF Power (Operational/Survival) 0.5W / 1W
- Storage Temperature -65° to +150°C
- Finish Gray Epoxy Paint per MIL-C-22750
- Weight 2.5 oz. Max
- Control E1 Controls J1-J5
E2 Controls J2-J5
E3 Controls J3-J5
E3 Controls J4-J5

Ordering Information



Outline Drawing



All dimensions are in inches

Need More Help? Need a Variant of This Product?

Contact Mercury's RF & Microwave engineering team at rf.microwave@rcy.com or visit www.rcy.com/rf for a detailed listing of RF and Microwave products.



Corporate Headquarters

50 Minuteman Road • Andover, MA 01810 USA • (978) 967-1401 • (866) 627-6951 • Fax (978) 256-3599 • www.rcy.com