# High-Speed Switch SP2T Reflective



The Mercury Systems PIN diode SP2T 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

nercur systems

Specifications are subject to change without notice

## **SP2T Specifications**

Band	Frequency GHz	Reflective			Absorptive			Switching Speed
		Insertion Loss (dB MAX)	VSWR (MAX)	Isolation (dB MIN)	Insertion Loss (dB MAX)	VSWR (MAX)	Isolation (dB MIN)	(nS MAX)
1	0.5 - 2	1.4	1.6	80	1.5	1.6	80	100
2	2 - 6	1.4	1.7	70	1.5	1.7	75	100
3	6 - 18	2.8	2.0	60	3.0	2.0	65	100
4	2 - 18	2.9	2.0	60	3.1	2.0	65	100
5	0.5 - 18	3.0	2.0	60	3.2	2.0	65	100

#### **Power Supply Option**

Code ± 5%	Α	В	С	Current (mA MAX)
+V	+5V	+5V	+12 to +15V	60
-V	-5V	-12 to -15V	-12 to -15V	50

#### **Control Logic Option**

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

## Specifications

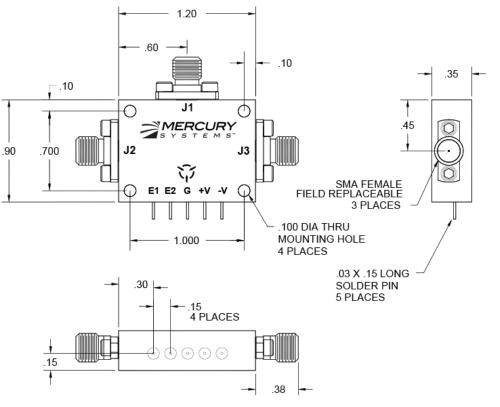
Switching Speed measured from 50% control to 10/90% RF				
Max. RF Power (Operational/Survival)		0.5W / 1W		
Storage Temperature		-65° to +150°C		
Finish	Gray Epoxy Paint	per MIL-C-22750		
Weight		1 oz. Max		
Control	E	1 Controls J1-J2		
	E	2 Controls J1-J3		

## 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@mrcy.com or visit www.mrcy.com/rf for a detailed listing of RF and Microwave products.



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