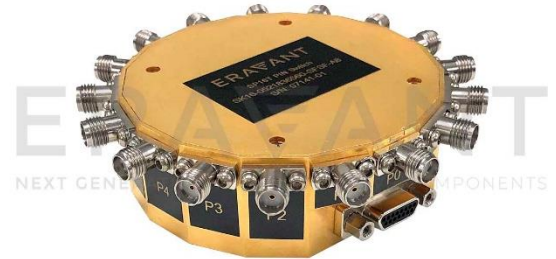


SK16-05240310055-2F2F-A8

SP16T PIN Switch with TTL Driver, Absorptive, 0.5 to 40 GHz

SK16-05240310055-2F2F-A8 is an absorptive PIN diode based, single pole, sixteen throw switch with a TTL driver that operates between 0.5 and 40 GHz. The switch requires a separate -5 V and +5 V biasing in addition to the 4-Bit TTL control. This model offers in-line 16 output ports, typical 10 dB insertion loss, and 45 dB minimum isolation with a typical switching speed of 50 nanoseconds. The switch has female 2.4 mm connectors for all RF ports and Micro-D15 female connector for bias and TTL control.



Electrical Specifications:

Parameter	Minimum	Typical	Maximum
Frequency Range	0.5 GHz		40 GHz
Insertion Loss		10 dB	14 dB
Isolation	45 dB	55 dB	
Return Loss	7 dB	8.5 dB	
Input RF Power			+23 dBm
Bias Current ($V_{cc} = \pm 5\text{ V}$)	600/50 mA		
Control	TTL		
Switching Speed		50 ns	
Switch Type	Absorptive		
Specification Temperature		+25°C	
Operating Temperature	0°C		+50°C

Mechanical Specifications:

Item	Specification
RF Ports	2.4 mm (F)
Bias and Control Port	Micro D-15 Female Connector
Case Material	Aluminum
Finish	Gold Plated
Weight	7.1 Oz
Outline	K16-AC-Z3

ECCN

EAR99

FEATURES

- 4-bit TTL Control
- High Isolation
- Absorptive

APPLICATIONS

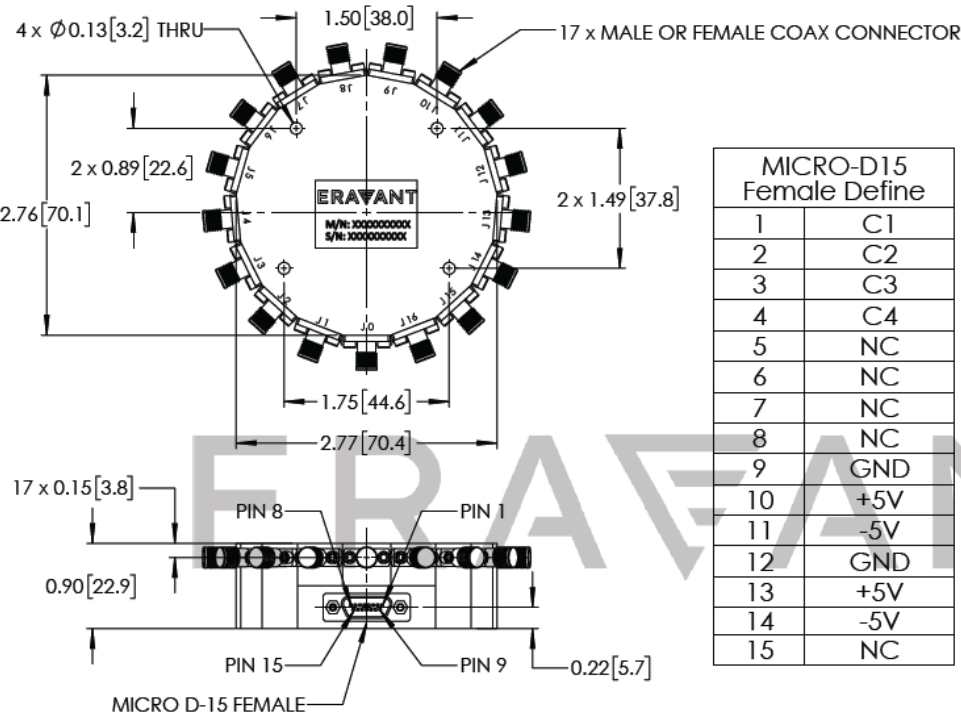
- Automatic Test Equipment
- Switching Network

SUPPLEMENTAL DETAILS



SK16-05240310055-2F2F-A8

Mechanical Outline: (Unless otherwise specified, all dimensions are in inches [millimeters])



MICRO-D15 Female Define	
1	C1
2	C2
3	C3
4	C4
5	NC
6	NC
7	NC
8	NC
9	GND
10	+5V
11	-5V
12	GND
13	+5V
14	-5V
15	NC

Truth Table				
Control Input TTL				Signal Path State
C4	C3	C2	C1	
0	0	0	0	J0-J1
0	0	0	1	J0-J2
0	0	1	0	J0-J3
0	0	1	1	J0-J4
0	1	0	0	J0-J5
0	1	0	1	J0-J6
0	1	1	0	J0-J7
0	1	1	1	J0-J8
1	0	0	0	J0-J9
1	0	0	1	J0-J10
1	0	1	0	J0-J11
1	0	1	1	J0-J12
1	1	0	0	J0-J13
1	1	0	1	J0-J14
1	1	1	0	J0-J15
1	1	1	1	J0-J16

NOTE:

- On condition that test data is provided it is collected from a sample lot. Actual data may vary slightly from unit to unit. All testing is performed under +25 °C room temperature.
- Eravant reserves the right to change the information presented without notice.

CAUTION:

- Exceeding absolute maximum ratings shown will damage the device.
- The device is static sensitive. Always follow ESD rules when working with the device.
- Reversing polarity will destroy the device.
- For 1.35 mm, 1.85 mm, 2.4 mm, 2.92 mm, and SMA connectors proper torque should be applied: 8.0 ± 0.15 inch-pounds (0.90 ± 0.02 Nm). Torque wrench model [SCH-08008-S1](#) is highly recommended.