

# Coaxial Switch

50Ω SPST Pin Diode 10 to 2500 MHz

## ZMSW-1111

### Maximum Ratings

Operating Temperature	-55°C to 100°C
Storage Temperature	-55°C to 100°C
Power	+20 dBm
Control Current	5mA
Permanent damage may occur if any of these limits are exceeded.	

### Coaxial/Pin Connections

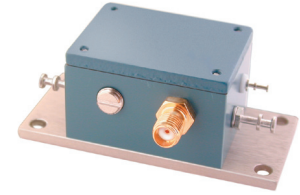
RF IN	COM
RF OUT 2	RF-2
CONTROL 1	1
CONTROL 2	2

### Features

- wideband, 10 to 2500 MHz
- good isolation, 35 dB typ.

### Applications

- UHF/VHF
- satellite communications
- antenna switching
- test set-ups



CASE STYLE: JJ77

Connectors	Model	Price	Qty.
SMA	ZMSW-1111	\$69.95	(1-9)

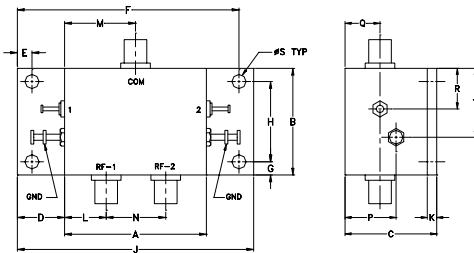
### Switch Electrical Specifications

MODEL NO.	FREQ. (MHz)		INSERTION LOSS (dB)				IN-OUT ISOLATION (dB)					
			Low band		Upper band		Frequency Band					
			Typ.	Max.	Typ.	Max.	L		M		U	
ZMSW-1111	10	2500	1.1	1.9	1.9	2.7	50	45	35	28	28	22

L= low range( $f_L$  to  $10 f_L$ )

M=mid range( $10 f_L$  to  $f_U/2$ )  
U=upper range ( $f_U/2$  to  $f_U$ )

### Outline Drawing



### Outline Dimensions (inch/mm)

A	B	C	D	E	F	G	H	J	
1.50	1.13	.97	.50	.155	2.345	.14	.850	2.50	
38.10	28.70	24.64	12.70	3.94	59.56	3.56	21.59	63.50	
K	L	M	N	P	Q	R	S	T	wt
.10	.44	.75	.63	.54	.37	.43	.150	.73	grams
2.54	11.18	19.05	16.00	13.72	9.40	10.92	3.81	18.54	50.0

### Additional Specifications

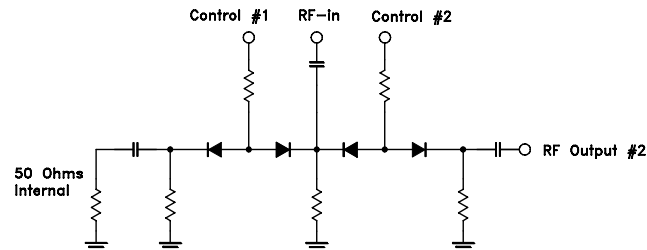
VSWR ("ON" STATE)	1.7 Max.
SWITCHING TIME (μSEC)	4 Max.
RISE TIME (μSEC)	2 Typ.
CONTROL VOLTAGE	ON condition +5V OFF condition 0V
1 dB COMPRESSION	10 to 200 MHz +6 increasing to +19 dBm Above 200 MHz +19 dBm min.

### LOGIC

	CON-TROL 1	CON-TROL 2	RF-2
State 1:	0V	+5V	ON
State 2:	+5V	0V	OFF*

\*Absorptive at RF IN

### Electrical Schematic



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ISO 9001 ISO 14001 AS 9100 CERTIFIED

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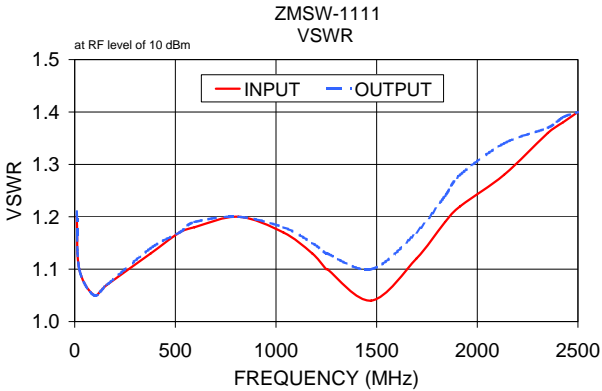
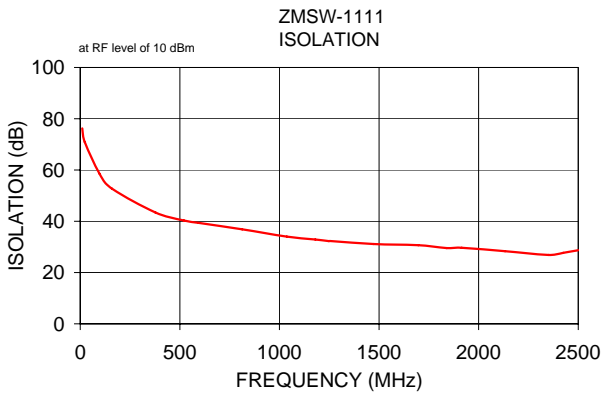
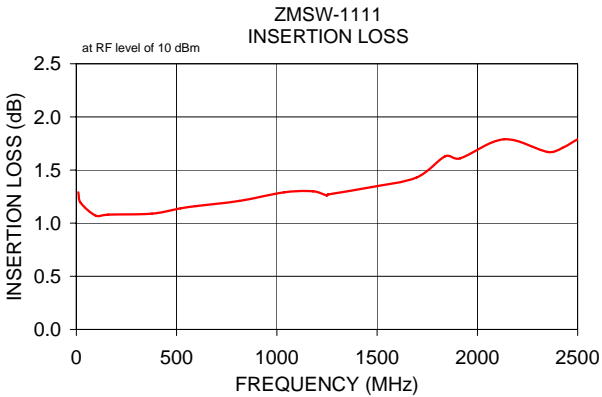
IF/RF MICROWAVE COMPONENTS

For detailed performance specs & shopping online see web site

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## Typical Performance Data

FREQ. (MHz)	ON INSERTION LOSS (dB) (Ctrl1 @ 0V, Ctrl 2 @5V)		OFF ISOLATION (dB) (Ctrl1 @ 5V, Ctrl 2 @0V)		VSWR		
	$\bar{x}$	$\sigma$	$\bar{x}$	$\sigma$	IN	OUT	OFF
10.00	1.29	0.11	76.25	6.59	1.20	1.21	30.07
22.45	1.19	0.10	70.93	4.23	1.10	1.10	30.07
97.15	1.07	0.07	58.52	1.61	1.05	1.05	27.77
159.40	1.08	0.05	52.73	1.00	1.07	1.07	25.87
377.28	1.09	0.06	43.44	0.67	1.13	1.14	19.20
520.45	1.14	0.05	40.30	0.80	1.17	1.17	15.71
595.15	1.16	0.06	39.39	0.70	1.18	1.19	14.22
813.03	1.21	0.06	36.87	0.68	1.20	1.20	11.58
1037.13	1.29	0.06	34.02	0.70	1.17	1.18	10.27
1180.30	1.30	0.06	32.88	0.61	1.13	1.15	10.35
1248.78	1.26	0.06	32.28	0.66	1.10	1.13	10.47
1255.00	1.27	0.06	32.32	0.69	1.10	1.13	10.50
1472.88	1.34	0.05	31.11	0.62	1.04	1.10	12.99
1696.98	1.43	0.07	30.68	0.62	1.12	1.17	23.96
1840.15	1.63	0.09	29.53	0.60	1.19	1.24	76.42
1914.85	1.61	0.08	29.66	0.67	1.22	1.28	429.47
2132.73	1.79	0.09	28.33	0.92	1.28	1.34	42.78
2350.60	1.67	0.07	26.88	1.15	1.36	1.37	205.26
2425.30	1.71	0.07	27.69	1.12	1.38	1.39	152.56
2500.00	1.79	0.09	28.69	1.09	1.40	1.40	62.42



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