

Surface Mount Frequency Mixer

JMS-2W+ JMS-2W

Level 7 (LO Power +7 dBm) 5 to 1200 MHz



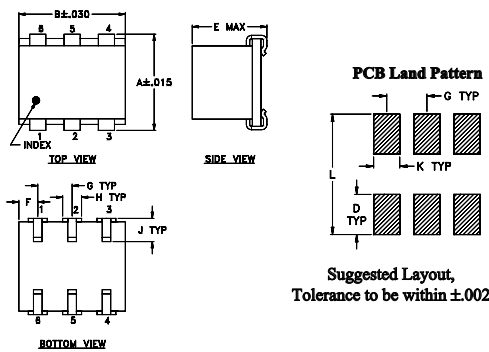
Maximum Ratings

Operating Temperature	-40°C to 85°C
Storage Temperature	-55°C to 100°C
RF Power	50mW
IF Current	40mA

Pin Connections

LO	6
RF	3
IF	2
GROUND	1,4,5

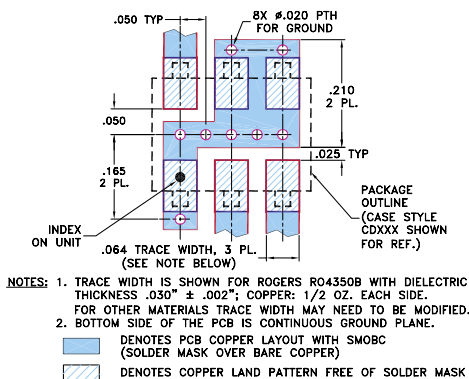
Outline Drawing



Outline Dimensions (inch)

A	B	C	D	E	F	G	H	J	K	L	wt
.280	.310	--	.100	.225	.055	.100	.047	.065	.065	.300	grams
7.11	7.87	--	2.54	5.72	1.40	2.54	1.19	1.65	1.65	7.62	0.45

Demo Board MCL P/N: TB-03 Suggested PCB Layout (PL-052)



Features

- excellent L-R isolation and L-I isolation, up to 60 dB typ.
- miniature surface mount
- J-leads for strain relief and excellent solderability

Applications

- up & down converters for receivers & transmitters
- UHF TV
- cellular/ISM/GSM

CASE STYLE: BH292
PRICE: \$7.95 ea. QTY (1-9)

+ RoHS compliant in accordance with EU Directive (2002/95/EC)

The +Suffix identifies RoHS Compliance. See our web site for RoHS Compliance methodologies and qualifications.

Electrical Specifications

FREQUENCY (MHz)	CONVERSION LOSS (dB)	LO-RF ISOLATION (dB)			LO-IF ISOLATION (dB)			IP3 at center band (dBm)										
		L	M	U	L	M	U											
5-1200	DC-500	6.8	.10	8.0	9.0	60	40	60	30	37	20	60	40	48	20	31	15	17

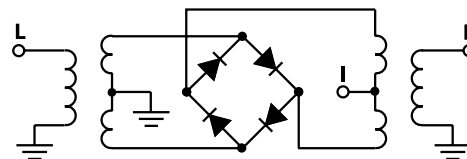
1 dB COMP.: +1 dBm typ.
Phase detection, positive polarity

L = low range [f_1 to $10 f_1$]
M = mid band [$2 f_1$ to $f_1/2$]
U = upper range [$f_1/2$ to f_1]

Typical Performance Data

Frequency (MHz)		Conversion Loss (dB)	Isolation L-R (dB)	Isolation L-I (dB)	VSWR RF Port (:1)	VSWR LO Port (:1)
RF	LO	LO +7dBm	LO +7dBm	LO +7dBm	LO +7dBm	LO +7dBm
5.00	35.00	6.50	62.55	59.95	1.46	1.69
10.00	40.00	6.43	62.08	59.28	1.44	1.67
15.30	45.30	6.43	62.44	58.34	1.43	1.69
29.94	59.94	6.49	62.14	56.11	1.40	1.68
50.00	80.00	6.45	62.11	53.65	1.39	1.67
81.92	111.92	6.52	62.44	50.79	1.44	1.64
102.45	132.45	6.47	62.71	49.36	1.45	1.63
160.26	130.26	6.44	65.46	46.82	1.44	1.64
200.43	170.43	6.34	65.54	45.89	1.46	1.69
350.63	320.63	6.30	53.86	42.07	1.46	1.79
438.53	408.53	6.29	49.13	40.13	1.45	1.90
548.47	518.47	6.28	44.85	37.77	1.42	2.05
600.00	570.00	6.34	43.57	36.59	1.40	2.15
613.38	583.38	6.32	43.25	36.40	1.38	2.16
685.97	655.97	6.45	41.28	34.97	1.33	2.29
767.15	737.15	6.66	40.04	33.20	1.24	2.44
959.47	929.47	7.03	37.35	31.24	1.04	2.85
1073.01	1043.01	7.10	36.16	30.62	1.32	3.17
1120.00	1090.00	7.17	36.10	30.60	1.47	3.18
1200.00	1170.00	7.25	35.69	30.56	1.62	3.41

Electrical Schematic



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RF/IF MICROWAVE COMPONENTS

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JMS-2W
ED-2834/10
DJ/CP/AM
061228
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Performance Charts

