

# Coaxial Frequency Mixer

Level 7 (LO Power +7 dBm) 5 to 1500 MHz

ZLW-5



## Maximum Ratings

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

## Coaxial Connections

LO	1
RF	3
IF	2

## Features

- low conversion loss, 5.81 dB typ.
- good L-R isolation, 35 dB typ., L-I, 35 dB typ.
- wideband, 5 to 1500 MHz
- rugged shielded case

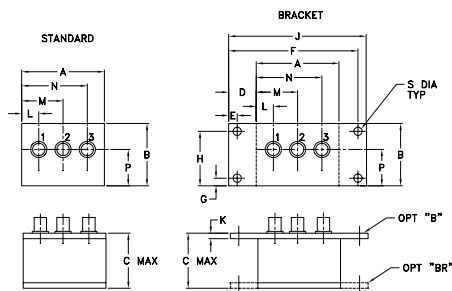
## Applications

- VHF/UHF
- cellular
- GPS
- instrumentation
- satellite distribution

CASE STYLE: M21

Connectors	Model	Price	Qty.
BNC	ZLW-5	\$61.95 ea.	(1-9)
BRACKET (OPTION "B")		\$5.00	(1+)
BRACKET (OPTION "BR")		\$2.50	(1+)

## Outline Drawing



## Outline Dimensions (inch/mm)

A	B	C	D	E	F	G	H
1.50	1.13	1.00	.50	.155	2.345	.138	.987
38.10	28.70	25.40	12.70	3.94	59.56	3.51	25.07

J	K	L	M	N	P	S	wt
2.50	.10	.31	.75	1.19	.66	.150	grams
63.50	2.54	7.87	19.05	30.23	16.76	3.81	40.0

## Electrical Specifications

FREQUENCY (MHz)		CONVERSION LOSS (dB)				LO-RF ISOLATION (dB)						LO-IF ISOLATION (dB)					
LO/RF	IF	Mid-Band		Total		L		M		U		L		M		U	
$f_L$ - $f_U$		$\bar{X}$	$\sigma$	Max.	Max.	Typ.	Min.	Typ.	Min.	Typ.	Min.	Typ.	Min.	Typ.	Min.	Typ.	Min.
5-1500	10-600	5.81	0.08	7.5	8.5	55	40	35	25	30	20	50	40	35	25	30	20

1 dB COMP.: +1 dBm typ.

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  $f_U$ ]  
m = mid band [ $2f_L$  to  $f_U/2$ ]

## 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	5.58	61.45	>67.00	1.61	2.93
20.00	50.00	5.81	58.66	>67.00	1.62	2.80
100.00	70.00	5.73	50.13	51.69	1.62	2.89
145.16	115.16	5.90	47.16	48.88	1.67	2.68
238.60	208.60	5.39	42.72	44.36	1.83	2.50
332.03	302.03	5.93	40.12	41.77	2.05	2.48
425.47	395.47	6.14	37.03	40.50	2.25	2.37
500.00	470.00	6.14	36.19	39.52	2.39	2.39
565.63	535.63	6.18	34.87	38.30	2.40	2.39
612.35	582.35	6.39	33.19	37.13	2.39	2.37
705.79	675.79	6.14	31.05	37.14	2.20	2.39
799.22	769.22	5.71	29.41	37.01	2.16	2.33
892.66	862.66	5.64	27.93	35.99	1.99	2.47
986.10	956.10	5.72	26.32	35.42	1.86	2.60
1032.80	1002.80	5.68	25.45	34.44	1.77	2.65
1126.30	1096.30	5.72	24.03	32.06	1.67	2.59
1219.70	1189.70	5.83	23.54	34.42	1.48	2.59
1313.10	1283.10	6.22	23.61	36.18	1.30	2.57
1406.60	1376.60	6.67	24.24	36.02	1.33	2.69
1500.00	1470.00	7.43	24.41	35.83	2.05	3.14

## Electrical Schematic

