

Coaxial Frequency Mixer

Level 7 (LO Power +7 dBm) 0.2 to 500 MHz

**ZP-10514+
ZP-10514**



BNC version shown
CASE STYLE: GG60

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	L
RF	R
IF	X

Features

- low conversion loss, 5.18 dB typ.
- high L-R isolation, 50 dB typ.
- rugged shielded case

Applications

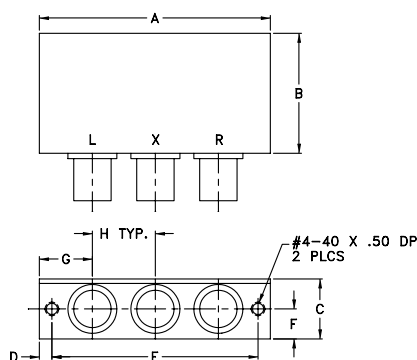
- VHF/UHF
- instrumentation

Connectors	Model	Price	Qty.
BNC	ZP-10514-(+)	\$62.95 ea.	(1-9)
SMB	ZP-10514-SMB(+)	\$62.95 ea.	(1-9)
SMA	ZP-10514-S(+)	\$77.95 ea.	(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.

Outline Drawing



Outline Dimensions (inch)

A	B	C	D	E	F	G	H	wt
2.31	1.20	.60	.125	2.062	.30	.53	.63	grams
58.7	30.5	15.2	3.2	52.4	7.6	13.5	16.0	75.0

Electrical Specifications

FREQUENCY (MHz)		CONVERSION LOSS (dB)				LO-RF ISOLATION (dB)						LO-IF ISOLATION (dB)					
LO/RF f_L - f_U	IF	Mid-Band m		Total Range Max.	Max.	L		M		U		L		M		U	
		\bar{X}	σ			Typ.	Min.	Typ.	Min.	Typ.	Min.	Typ.	Min.	Typ.	Min.	Typ.	Min.
0.2-500	DC-500	5.18	0.10	7.0	8.5	55	45	50	35	35	30	50	40	36	30	30	20

1 dB COMP.: +1 dBm typ.

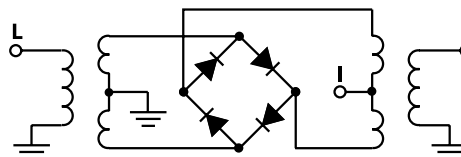
L = low range [f_L to $10 f_L$]
m = mid band [$2f_L$ to $f_U/2$]

M = mid range [$10 f_L$ to $f_U/2$]
U = upper range [$f_U/2$ to f_U]

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
0.20	30.20	8.36	59.54	51.65	1.28	1.46
0.50	30.50	6.85	57.86	50.98	1.26	1.41
2.00	32.00	6.13	56.96	50.94	1.25	1.39
10.00	40.00	5.43	55.15	50.65	1.24	1.48
32.45	62.45	5.43	51.84	49.39	1.21	1.45
64.69	94.69	5.61	48.95	47.53	1.20	1.42
100.00	70.00	5.53	47.52	46.53	1.20	1.39
145.30	115.30	5.74	45.03	44.48	1.19	1.38
177.55	147.55	5.41	42.85	42.69	1.17	1.36
200.00	170.00	5.73	41.70	41.72	1.17	1.37
225.92	195.92	5.49	40.73	40.61	1.16	1.36
258.16	228.16	5.71	39.01	39.00	1.16	1.42
290.41	260.41	5.50	38.47	38.33	1.16	1.43
322.65	292.65	5.79	37.73	37.34	1.19	1.51
354.90	324.90	5.52	36.24	35.86	1.20	1.53
387.14	357.14	5.63	35.26	34.80	1.22	1.58
419.39	389.39	5.74	35.03	34.31	1.24	1.58
435.51	405.51	5.66	35.44	34.71	1.26	1.62
467.75	437.75	6.15	35.03	34.13	1.30	1.67
500.00	470.00	5.98	34.57	33.52	1.32	1.65

Electrical Schematic



Performance Charts

ZP-10514+ ZP-10514

