Coaxial

Power Splitter/Combiner

ZFSC-3-13

3 Way-0° 50Ω 1 to 200 MHz

BNC version shown

CASE STYLE: J17

Connectors	Model	Price	Qty.
BNC	ZFSC-3-13	$51.95	(1-9)
SMA	ZFSC-3-13-S	$56.95	(1-9)
N-TYPE	ZFSC-3-13-N	$56.95	(1-9)
BRACKET (OPTION "B")		$5.00	(1+)

Maximum Ratings

Operating Temperature	-55°C to 100°C
Storage Temperature	-55°C to 100°C
Power Input (as a splitter)	1W max.
Internal Dissipation	0.375W max.

Permanent damage may occur if any of these limits are exceeded.

Coaxial Connections

SUM PORT	S
PORT 1	1
PORT 2	2
PORT 3	3

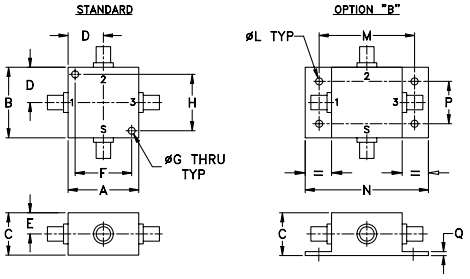
Features

- low insertion, 0.35 dB typ.
- very high isolation, 48 dB typ.
- excellent amplitude unbalance, 0.1 dB typ.
- excellent phase unbalance, 1 deg. typ.
- excellent VSWR, 1.1:1 typ.
- rugged shielded case

Applications

- VHF
- instrumentation
- radio communication system

Outline Drawing



Outline Dimensions (inch / mm)

A	B	C	D	E	F	G	H
1.25	1.25	.75	.63	.38	1.000	.125	1.000
31.75	31.75	19.05	16.00	9.65	25.40	3.18	25.40

J	K	L	M	N	P	Q	wt
--	--	.125	1.688	2.18	.75	.07	grams
--	--	3.18	42.88	55.37	19.05	1.78	75.0

For option B with N-Type connectors, dimension "C" increases to 0.94 inches.

Electrical Specifications

FREQ. RANGE (MHz)	ISOLATION (dB)						INSERTION LOSS (dB) ABOVE 4.8 dB						PHASE UNBALANCE (Degrees)			AMPLITUDE UNBALANCE (dB)		
	L		M		U		L		M		U		L	M	U	L	M	U
f_L-f_U	Typ.	Min.	Typ.	Min.	Typ.	Min.	Typ.	Max.	Typ.	Max.	Typ.	Max.	Max.	Max.	Max.	Max.	Max.	Max.
1-200	45	30	48	35	37	30	0.25	0.5	0.35	0.6	0.35	0.6	1.0	3.0	5.0	0.1	0.2	0.2

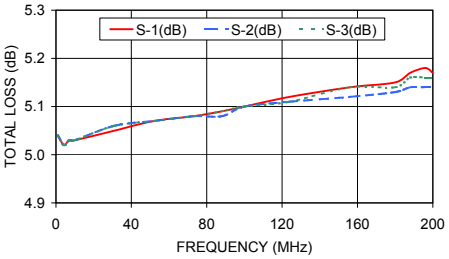
L = low range [f_L to 10 f_L] M = mid range [10 f_L to f_U/2] U= upper range [f_U/2 to f_U]

Typical Performance Data

Freq. (MHz)	Total Loss[1] (dB)			Amp. Unbal. (dB)	Isolation (dB)			Phase Unbal. (deg.)	VSWR S	VSWR 1	VSWR 2	VSWR 3
	S-1	S-2	S-3		1-2	1-3	2-3					
1.00	5.04	5.04	5.04	0.01	38.69	38.54	37.91	0.02	1.13	1.16	1.17	1.17
4.20	5.02	5.02	5.02	0.00	42.98	42.61	42.44	0.03	1.08	1.10	1.10	1.10
7.00	5.03	5.03	5.03	0.00	43.60	42.94	42.77	0.01	1.07	1.08	1.08	1.08
10.00	5.03	5.03	5.03	0.00	43.56	42.80	42.63	0.05	1.07	1.08	1.08	1.08
31.00	5.05	5.06	5.06	0.01	42.06	41.96	41.46	0.07	1.06	1.07	1.07	1.07
52.00	5.07	5.07	5.07	0.00	40.78	41.32	40.62	0.17	1.06	1.07	1.07	1.07
73.00	5.08	5.08	5.08	0.01	39.74	40.65	39.81	0.21	1.06	1.07	1.07	1.07
88.00	5.09	5.08	5.09	0.01	39.19	40.18	39.45	0.25	1.05	1.07	1.07	1.07
100.00	5.10	5.10	5.10	0.00	38.80	39.80	39.18	0.30	1.05	1.07	1.06	1.07
124.00	5.12	5.11	5.11	0.01	38.25	39.02	38.81	0.36	1.05	1.06	1.06	1.07
156.00	5.14	5.12	5.14	0.02	38.04	37.59	38.79	0.42	1.05	1.06	1.05	1.07
180.00	5.15	5.13	5.14	0.02	38.24	36.35	39.05	0.44	1.04	1.06	1.05	1.07
188.00	5.17	5.14	5.16	0.02	38.42	35.88	39.25	0.48	1.04	1.05	1.05	1.06
196.00	5.18	5.14	5.16	0.03	38.59	35.35	39.38	0.51	1.04	1.05	1.05	1.06
200.00	5.17	5.14	5.16	0.03	38.67	35.10	39.44	0.51	1.04	1.05	1.04	1.06

1. Total Loss = Insertion Loss + 4.8dB splitter loss.

ZFSC-3-13
TOTAL LOSS



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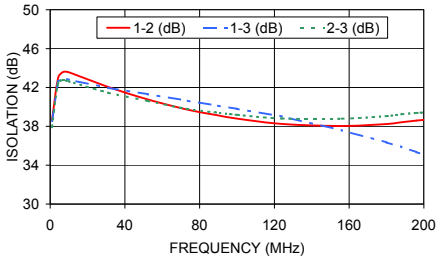
ISOLATION



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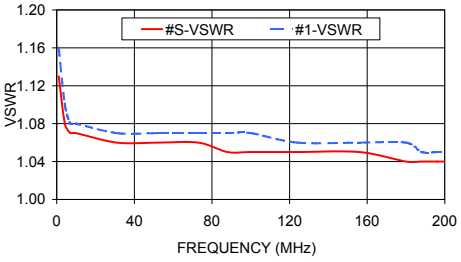
VSWR



electrical schematic