

# Power Splitter/Combiner

6 Way-0° 75Ω 1 to 200 MHz

ZFSC-6-1-75+  
ZFSC-6-1-75



BNC version shown  
CASE STYLE: Q28

Connectors	Model	Price	Qty.
BNC	ZFSC-6-1-75(+)	\$102.95	(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.

## Maximum Ratings

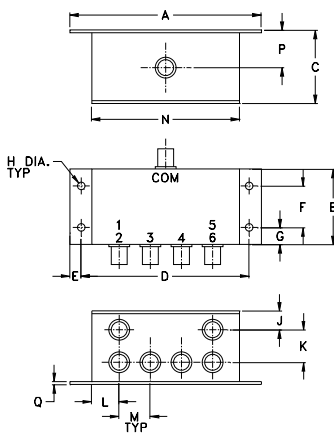
Operating Temperature	-55°C to 100°C
Storage Temperature	-55°C to 100°C
Power Input (as a splitter)	1W max.
Internal Dissipation	0.5W max.

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

## Coaxial Connections

SUM PORT	S
PORT 1,2,3,4,5,6	1,2,3,4,5,6

## Outline Drawing



## Outline Dimensions (inch/mm)

A	B	C	D	E	F	G	H
4.06	1.60	1.50	3.56	.24	.88	.36	.160
103.12	40.64	38.10	90.42	6.10	22.35	9.14	4.06
J	K	L	M	N	P	Q	wt
.4	.69	.58	.66	3.13	.8	.06	grams
10.16	17.53	14.73	16.76	79.50	20.32	1.52	190.0

## Features

- low insertion loss, 0.75 dB typ.
- good isolation, 26 dB typ.
- rugged shielded case

## Applications

- VHF
- receivers and transmitters
- instrumentation

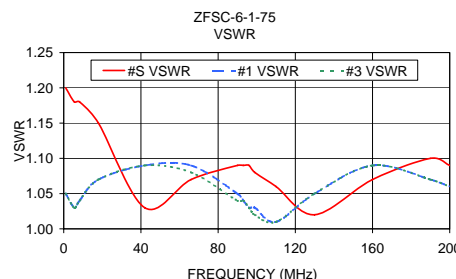
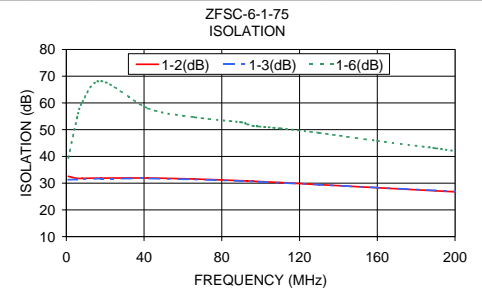
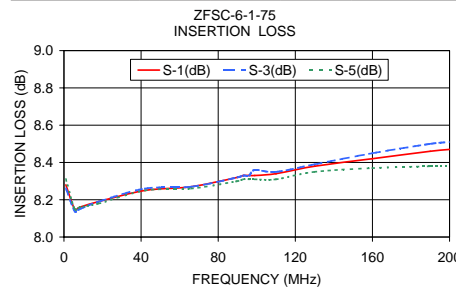
## Electrical Specifications

FREQ. RANGE (MHz)	ISOLATION (dB)			INSERTION LOSS (dB) ABOVE 7.8 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.	Typ.	Max.	Typ.	Max.	Max.	Max.	Max.	Max.	Max.						
1-200	30	25	30	22	20	18	0.75	1.0	0.75	1.0	0.9	1.2	2	6	12	0.2	0.4	0.6

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

Frequency (MHz)	Insertion Loss (dB)			Amplitude Unbalance (dB)	Isolation (dB)			Phase Unbal. (deg.)	VSWR S	VSWR 1	VSWR 3
	S-1	S-3	S-5		1-2	1-3	1-6				
1.00	8.28	8.26	8.31	0.05	32.54	31.31	39.43	0.66	1.20	1.05	1.05
5.50	8.15	8.14	8.15	0.03	31.77	31.40	54.26	0.15	1.18	1.03	1.03
8.20	8.16	8.15	8.16	0.03	31.79	31.50	60.29	0.09	1.18	1.04	1.04
18.00	8.19	8.19	8.18	0.03	31.87	31.73	68.17	0.21	1.15	1.07	1.07
42.00	8.25	8.26	8.25	0.02	31.92	31.77	58.01	0.41	1.03	1.09	1.09
66.00	8.27	8.27	8.26	0.04	31.55	31.39	54.67	0.67	1.07	1.09	1.08
90.00	8.32	8.32	8.30	0.03	30.91	30.81	52.78	0.85	1.09	1.05	1.04
93.00	8.33	8.33	8.31	0.02	30.82	30.74	52.08	0.84	1.09	1.04	1.04
96.00	8.33	8.33	8.31	0.03	30.72	30.63	51.39	0.89	1.09	1.03	1.03
99.00	8.33	8.36	8.31	0.05	30.59	30.50	51.19	0.93	1.08	1.03	1.02
110.00	8.34	8.35	8.31	0.04	30.25	30.13	50.51	1.08	1.06	1.01	1.01
130.00	8.38	8.39	8.35	0.05	29.45	29.45	48.83	1.24	1.02	1.05	1.05
160.00	8.42	8.45	8.37	0.09	28.28	28.36	45.83	1.55	1.07	1.09	1.09
190.00	8.46	8.50	8.38	0.12	27.13	27.29	43.07	1.95	1.10	1.07	1.07
200.00	8.47	8.51	8.38	0.13	26.75	26.94	42.04	2.08	1.09	1.06	1.06



## electrical schematic



**Mini-Circuits®**  
ISO 9001 ISO 14001 AS 9100 CERTIFIED

[minicircuits.com](http://minicircuits.com)

P.O. Box 350166, Brooklyn, New York 11235-0003 (718) 934-4500 Fax (718) 332-4661 For detailed performance specs & shopping online see Mini-Circuits web site



The Design Engineers Search Engine Provides ACTUAL Data Instantly From MINI-CIRCUITS At: [www.minicircuits.com](http://www.minicircuits.com)

REV. A  
M107159  
ZFSC-6-1-75  
HY/TD/CP/AM  
080902

IF/RF MICROWAVE COMPONENTS