

Coaxial

High Power Combiner

3 Way-0° 50Ω

2 to 400 MHz

ZA3CS-400-3W

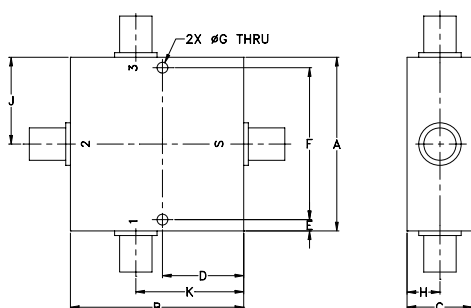
Maximum Ratings

Operating Temperature	-55°C to 90°C
Storage Temperature	-55°C to 100°C

Coaxial Connections

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

Outline Drawing



Outline Dimensions (inch/mm)

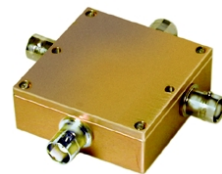
A	B	C	D	E	F
2.00	2.00	.75	.938	.13	1.750
50.80	50.80	19.05	23.83	3.30	44.45
G	H	J	K	wt	
.125	.38	1.00	1.25	grams	
3.18	9.65	25.40	31.75	200.0	

Features

- wideband, 2 to 400 MHz
- low insertion loss, 0.5 dB typ.
- good isolation, 25 dB typ.
- very low amplitude, 0.15 dB typ and phase unbalance, 0.2 deg. typ.

Applications

- VHF/UHF
- communication receivers & transmitters



BNC version shown

CASE STYLE: CC51

Connectors	Model	Price	Qty.
BNC	ZA3CS-400-3W	\$59.95	(1-9)
N-TYPE	ZA3CS-400-3W-N	\$69.95	(1-9)
SMA	ZA3CS-400-3W-S	\$69.95	(1-9)

High Power Combiner Electrical Specifications

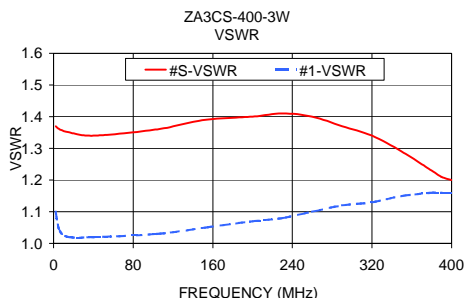
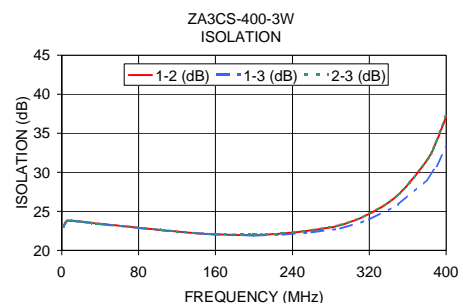
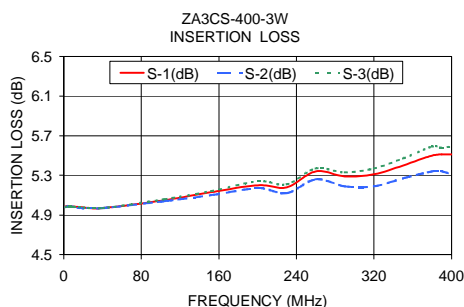
FREQ. RANGE (MHz)	ISOLATION (dB)		INSERTION LOSS (dB) ABOVE 4.8 dB		PHASE UNBALANCE (Degrees)		AMPLITUDE UNBALANCE (dB)		POWER INPUT ¹ (W)	
f_L - f_U	Typ.	Min.	Typ.	Max.	Typ.	Max.	Typ.	Max.	as combiner ² Max.	as splitter Max.
2-400	25	17	0.5	1.2	0.2	3.0	0.15	0.5	3	10

1. Over -55°C to +55°C. Derate linearly to 20% of rating at 90°C

2. As a combiner of non-coherent signals, max. power per port is power rating divided by number of ports.

Typical Performance Data

Freq. (MHz)	Insertion Loss (dB)			Amp. Unbal. (dB)	Isolation (dB)			Phase Unbal. (deg.)	VSWR			
	S-1	S-2	S-3		1-2	1-3	2-3		S	1	2	3
2.00	4.99	4.98	4.98	0.01	23.18	23.18	23.02	0.06	1.37	1.10	1.10	1.11
6.00	4.99	4.99	4.99	0.00	23.80	23.77	23.77	0.11	1.36	1.04	1.04	1.04
16.00	4.98	4.97	4.98	0.01	23.75	23.73	23.74	0.05	1.35	1.02	1.02	1.02
40.00	4.97	4.97	4.97	0.01	23.42	23.38	23.41	0.19	1.34	1.02	1.01	1.01
104.00	5.05	5.04	5.06	0.02	22.61	22.61	22.63	0.50	1.36	1.03	1.03	1.03
152.00	5.13	5.10	5.14	0.05	22.10	22.09	22.13	0.72	1.39	1.05	1.05	1.05
200.00	5.20	5.17	5.24	0.07	21.99	21.91	22.04	0.85	1.40	1.07	1.08	1.08
230.00	5.18	5.12	5.21	0.09	22.19	22.03	22.22	0.98	1.41	1.08	1.10	1.10
260.00	5.34	5.26	5.37	0.11	22.61	22.32	22.62	1.18	1.40	1.10	1.12	1.12
290.00	5.29	5.19	5.33	0.14	23.24	22.81	23.29	1.13	1.37	1.12	1.14	1.14
320.00	5.31	5.19	5.37	0.18	24.69	23.95	24.71	1.21	1.34	1.13	1.17	1.16
350.00	5.40	5.27	5.47	0.20	27.12	25.85	27.11	1.31	1.29	1.15	1.19	1.17
380.00	5.50	5.34	5.59	0.25	31.55	29.07	31.52	1.52	1.23	1.16	1.21	1.19
390.00	5.51	5.34	5.58	0.24	34.00	30.80	34.05	1.50	1.21	1.16	1.22	1.19
400.00	5.51	5.31	5.59	0.28	37.10	33.25	37.43	1.53	1.20	1.16	1.23	1.20



electrical schematic



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 060804