

Coaxial Directional Coupler

75Ω

10 to 1000 MHz

ZADC-10-4-75

Maximum Ratings

Operating Temperature	-55°C to 100°C
Storage Temperature	-55°C to 100°C
Permanent damage may occur if any of these limits are exceeded.	

Coaxial Connections

INPUT	1
OUTPUT	2
COUPLED	S

Features

- wideband, 10 to 1000 MHz
- excellent VSWR, 1.17 typ.
- rugged shielded case

Applications

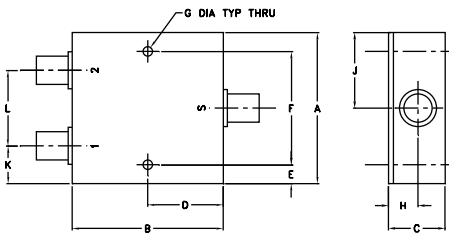
- cable tv
- instrumentation
- cellular



CASE STYLE: F14

Connectors	Model	Price	Qty.
BNC	ZADC-10-4-75	\$54.95 ea.	(1-9)

Outline Drawing



Outline Dimensions (inch)

A	B	C	D	E	F	G
2.00	2.00	0.75	1.00	0.25	1.500	0.125
50.80	50.80	19.05	25.40	6.35	38.10	3.18

H	J	K	L	wt
0.39	1.00	0.50	1.00	grams
9.91	25.40	12.70	25.40	170.0

Directional Coupler Electrical Specifications

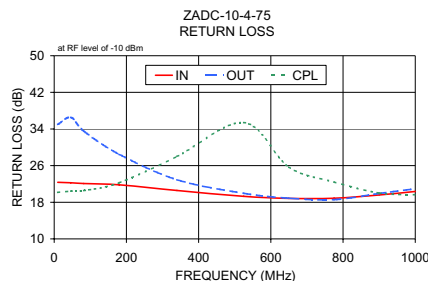
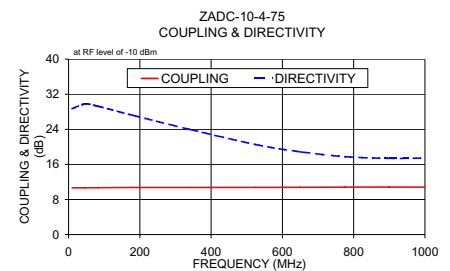
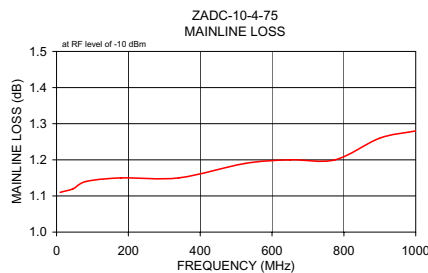
FREQ. RANGE (MHz)	COUPLING (dB)		MAINLINE LOSS ¹ (dB)						DIRECTIVITY (dB)						VSWR (:1)	POWER INPUT (W)	
	Nom.	Flatness	L		M		U		L		M		U			L	MU
f _L -f _U			Typ.	Max.	Typ.	Max.	Typ.	Max.	Typ.	Min.	Typ.	Min.	Typ.	Min.	Typ.	Max.	Max.
10-1000	10.7±0.5	±0.5	1.18	1.9	1.28	1.9	1.32	1.9	27	20	22	15	18	13	1.17	1.0	1.0

L = 10-100 MHz M = 100-500 MHz U = 500-1000 MHz

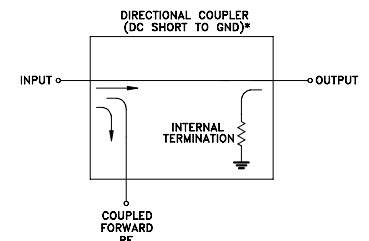
1. Mainline loss includes theoretical power loss at coupled port.

Typical Performance Data

Frequency (MHz)	Mainline Loss (dB) In-Out	Coupling (dB) In-Cpl	Directivity (dB)	Return Loss (dB)		
				In	Out	Cpl
10.00	1.11	10.66	28.71	22.36	35.00	20.15
46.00	1.12	10.68	29.82	22.25	36.55	20.44
82.00	1.14	10.69	29.29	22.09	33.54	20.56
180.00	1.15	10.74	27.22	21.81	28.49	22.26
340.00	1.15	10.74	23.99	20.57	22.92	28.01
525.00	1.19	10.77	20.53	19.29	19.96	35.42
650.00	1.20	10.78	18.88	18.85	18.89	25.69
775.00	1.20	10.81	17.77	18.87	18.57	22.43
900.00	1.26	10.83	17.39	19.59	19.93	20.02
1000.00	1.28	10.81	17.46	20.36	20.95	19.65



Electrical Schematic



* ELECTRICAL SCHEMATIC IS FOR DIRECTIONAL COUPLER WITH INTERNAL TRANSFORMER(S) THAT ROUTES DC FROM RF PORTS TO GROUND.

Notes

- Performance and quality attributes and conditions not expressly stated in this specification document are intended to be excluded and do not form a part of this specification document.
- Electrical specifications and performance data contained in this specification document are based on Mini-Circuit's applicable established test performance criteria and measurement instructions.
- The parts covered by this specification document are subject to Mini-Circuits standard limited warranty and terms and conditions (collectively, "Standard Terms"); Purchasers of this part are entitled to the rights and benefits contained therein. For a full statement of the Standard Terms and the exclusive rights and remedies thereunder, please visit Mini-Circuits' website at www.minicircuits.com/MCLStore/terms.jsp



www.minicircuits.com P.O. Box 350166, Brooklyn, NY 11235-0003 (718) 934-4500 sales@minicircuits.com

REV. B
M119986
ED-6271/2
ZADC-10-4-75
WZ/TD/CP/AM
131017
Page 1 of 1