

Power Splitter/Combiner

ZAPD-50+

2 Way-0° 50Ω 4400 to 5000 MHz

Maximum Ratings

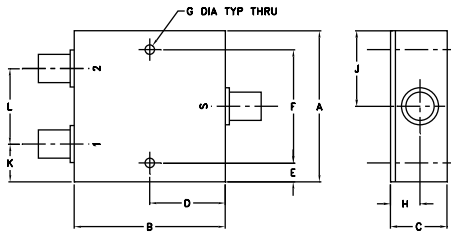
Operating Temperature	-55°C to 100°C
Storage Temperature	-55°C to 100°C
Power Input (as a splitter)	10W max.
Internal Dissipation	0.125W max.
DC Current	500 mA (250mA for each port)

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

Coaxial Connections

SUM PORT	S
PORT 1	1
PORT 2	3

Outline Drawing



Outline Dimensions (inch/mm)

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		

Features

- low insertion loss, 0.3 dB typ.
- good isolation, 26 dB typ.
- up to 10W power input as splitter
- excellent amplitude unbalance, 0.1 dB typ.
- excellent VSWR, 1.15:1 typ.
- rugged shield case

Applications

- wireless
- defense & federal communications



Generic photo used for illustration purposes only

CASE STYLE: F14

Connectors	Model
N-TYPE	ZAPD-50-N+

+RoHS Compliant

The +Suffix identifies RoHS Compliance. See our web site for RoHS Compliance methodologies and qualifications

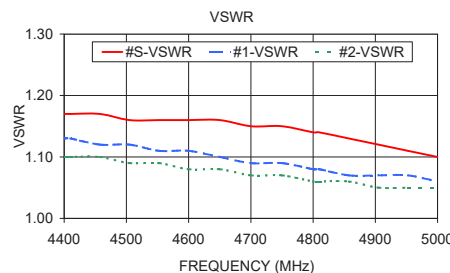
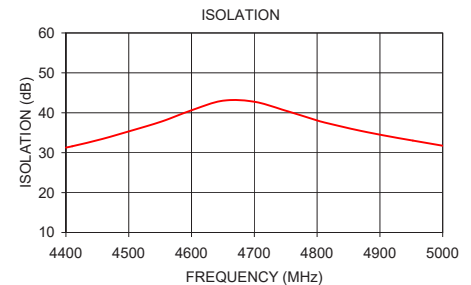
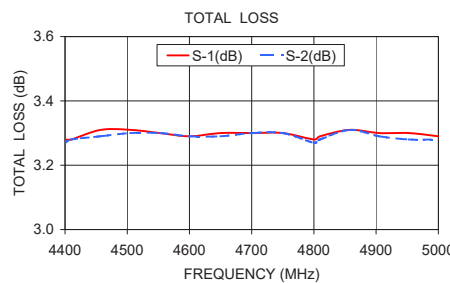
Electrical Specifications

FREQ. RANGE (MHz)	ISOLATION (dB)		INSERTION LOSS (dB) ABOVE 3.0 dB		PHASE UNBALANCE (Degrees)	AMPLITUDE UNBALANCE (dB)
	Typ.	Min.	Typ.	Max.		
$f_c - f_u$					Max.	Max.
4400-5000	26	20	0.3	0.8	5	0.5

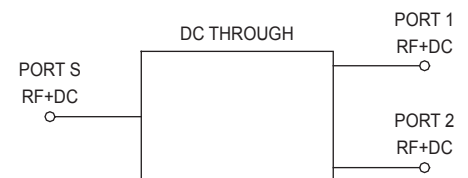
Typical Performance Data

Frequency (MHz)	Total Loss ¹ (dB)		Amplitude Unbalance (dB)	Isolation (dB)	VSWR S	VSWR 1	VSWR 2
	S-1	S-2					
4400.00	3.28	3.27	0.01	31.27	1.17	1.13	1.10
4410.00	3.28	3.28	0.00	31.59	1.17	1.13	1.10
4457.50	3.31	3.29	0.01	33.42	1.17	1.12	1.10
4505.00	3.31	3.30	0.01	35.55	1.16	1.12	1.09
4552.50	3.30	3.30	0.00	37.82	1.16	1.11	1.09
4600.00	3.29	3.29	0.00	40.63	1.16	1.11	1.08
4650.00	3.30	3.29	0.00	43.02	1.16	1.10	1.08
4700.00	3.30	3.30	0.00	42.77	1.15	1.09	1.07
4750.00	3.30	3.30	0.00	40.53	1.15	1.09	1.07
4800.00	3.28	3.27	0.01	38.07	1.14	1.08	1.06
4810.00	3.29	3.28	0.01	37.64	1.14	1.08	1.06
4857.50	3.31	3.31	0.01	35.87	1.13	1.07	1.06
4905.00	3.30	3.29	0.01	34.37	1.12	1.07	1.05
4952.50	3.30	3.28	0.02	33.03	1.11	1.07	1.05
5000.00	3.29	3.28	0.01	31.75	1.10	1.06	1.05

1. Total Loss = Insertion Loss + 3dB splitter loss.



electrical schematic



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

