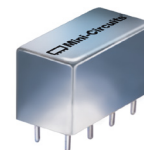


Plug-In Power Splitter/Combiner

PSC-3-1W+ PSC-3-1W

3 Way-0° 50Ω 5 to 500 MHz



CASE STYLE: A01

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.

Pin Connections

SUM PORT	1
PORT 1	5
PORT 2	7
PORT 3	8
GROUND	2,3,4,6
CASE GROUND	2,3,4,6

Features

- wideband, 5 to 500 MHz
- low insertion loss, 0.4 dB typ.
- good isolation, 31 dB typ.
- rugged welded construction

Applications

- VHF/UHF
- communication systems

+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 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.
5-500	25	20	31	15	25	15	0.4	0.8	0.4	1.4	0.8	1.4	2	3	5	0.1	0.3	0.6

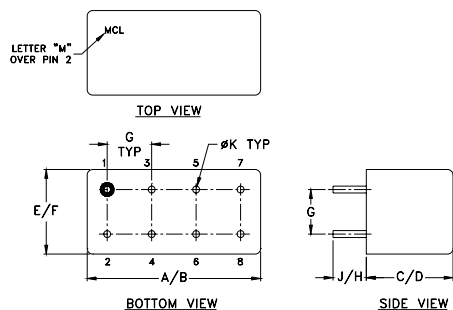
L = low range [f_L to $10 f_L$] M = mid range [$10 f_L$ to $f_U/2$] U = upper range [$f_U/2$ to f_U]

Typical Performance Data

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					
5.00	5.04	5.04	5.03	0.01	33.54	33.69	33.71	0.04	1.11	1.05	1.05	1.05
15.00	5.05	5.04	5.05	0.01	32.96	33.10	33.16	0.09	1.11	1.04	1.04	1.04
25.00	5.07	5.07	5.06	0.01	32.27	32.48	32.49	0.14	1.11	1.03	1.03	1.03
40.00	5.08	5.09	5.08	0.01	31.09	31.45	31.26	0.26	1.12	1.03	1.03	1.03
55.00	5.10	5.11	5.11	0.01	30.01	30.47	30.15	0.27	1.13	1.03	1.03	1.03
70.00	5.13	5.14	5.13	0.01	29.01	29.58	29.14	0.40	1.14	1.03	1.03	1.03
85.00	5.16	5.16	5.15	0.01	28.01	28.66	28.14	0.54	1.16	1.03	1.03	1.03
100.00	5.17	5.18	5.16	0.01	27.15	27.83	27.31	0.50	1.17	1.03	1.02	1.02
130.00	5.20	5.22	5.20	0.02	25.71	26.47	25.85	0.65	1.20	1.03	1.02	1.02
160.00	5.26	5.28	5.26	0.02	24.61	25.45	24.77	0.87	1.23	1.03	1.02	1.02
200.00	5.33	5.35	5.31	0.03	23.50	24.43	23.72	0.88	1.27	1.03	1.02	1.02
300.00	5.42	5.37	5.34	0.08	22.32	23.39	22.61	1.41	1.30	1.05	1.05	1.06
375.00	5.52	5.45	5.41	0.11	22.95	24.29	23.40	1.69	1.24	1.07	1.08	1.09
425.00	5.57	5.49	5.44	0.12	24.12	26.01	24.77	1.87	1.17	1.08	1.11	1.11
500.00	5.69	5.57	5.53	0.16	26.04	30.58	26.69	2.05	1.05	1.11	1.14	1.14

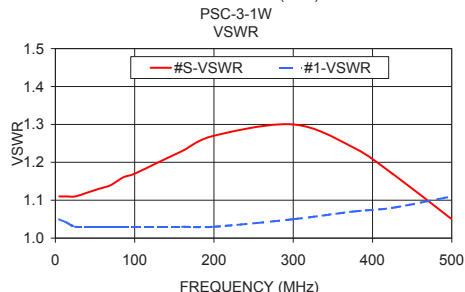
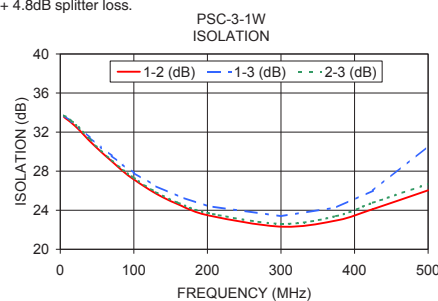
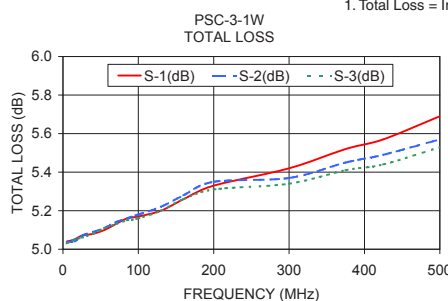
1. Total Loss = Insertion Loss + 4.8dB splitter loss.

Outline Drawing



Outline Dimensions (inch/mm)

A	B	C	D	E	F
.770	.800	.385	.400	.370	.400
19.56	20.32	9.78	10.16	9.40	10.16
G	H	J	K	wt	
.200	.20	.14	.031	grams	
5.08	5.08	3.56	0.79	5.2	



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

