

Plug-In

# Power Splitter/Combiner

## MSC-2-1+

2 Way-0° 50Ω 0.1 to 450 MHz

### Maximum Ratings

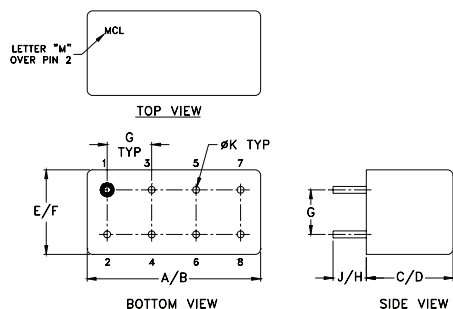
Operating Temperature	-55°C to 100°C
Storage Temperature	-55°C to 100°C
Power Input (as a splitter)	1W max.
Internal Dissipation	0.125W max.

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

### Pin Connections

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

### Outline Drawing



### Outline Dimensions (inch/mm)

A	B	C	D	E	F
.480	.500	.390	.405	.210	.230
12.19	12.70	9.91	10.29	5.33	5.84

G	H	J	K	wt
.100	.20	.14	.020	grams
2.54	5.08	3.56	0.51	2.3

### Features

- wideband, 0.1 to 450 MHz
- low insertion loss, 0.4 dB typ.
- rugged shielded case

### Applications

- VHF/UHF
- amateur radio
- communication receivers & transmitters



CASE STYLE: A03  
PRICE: \$23.20 ea. QTY. (1-9)

**+RoHS Compliant**

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

### Electrical Specifications

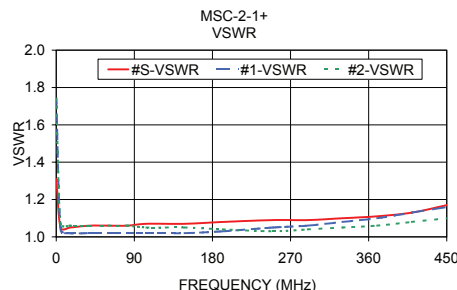
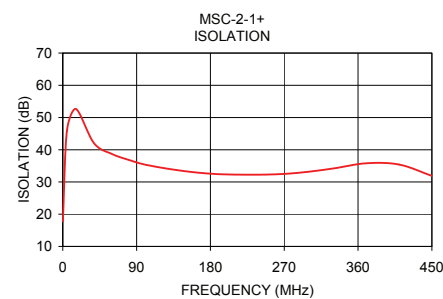
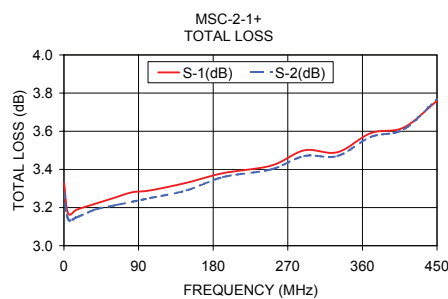
FREQ. RANGE (MHz)	ISOLATION (dB)						INSERTION LOSS (dB) ABOVE 3.0 dB						PHASE UNBALANCE (Degrees)			AMPLITUDE UNBALANCE (dB)		
	L		M		U		L		M		U		L	M	U	L	M	U
	Typ.	Min	Typ.	Min	Typ.	Min	Typ.	Max.	Typ.	Max.	Typ.	Max.	Max.	Max.	Max.	Max.	Max.	Max.
$f_L$ - $f_U$	20	15	30	20	30	20	0.3	0.5	0.4	0.75	0.6	1.0	2.0	3.0	4.0	0.15	0.2	0.3

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)	Total Loss <sup>1</sup> (dB)		Amplitude Unbalance (dB)	Isolation (dB)	Phase Unbalance (deg.)	VSWR S	VSWR 1	VSWR 2
	S-1	S-2						
0.10	3.33	3.28	0.05	17.78	0.15	1.31	1.74	1.74
5.00	3.17	3.14	0.04	45.83	0.06	1.05	1.04	1.07
16.00	3.19	3.15	0.04	52.65	0.18	1.05	1.02	1.06
38.00	3.22	3.19	0.03	42.07	0.35	1.06	1.02	1.06
60.00	3.25	3.21	0.04	38.68	0.44	1.06	1.02	1.06
82.00	3.28	3.23	0.05	36.72	0.55	1.06	1.02	1.06
104.00	3.29	3.25	0.04	35.20	0.61	1.07	1.02	1.05
148.00	3.33	3.29	0.04	33.38	0.93	1.07	1.02	1.05
192.00	3.38	3.36	0.03	32.40	0.86	1.08	1.03	1.04
250.00	3.42	3.40	0.02	32.30	1.31	1.09	1.05	1.03
290.00	3.50	3.47	0.03	32.91	1.48	1.09	1.06	1.04
330.00	3.49	3.47	0.02	34.21	1.76	1.10	1.08	1.05
370.00	3.59	3.57	0.02	35.79	1.65	1.11	1.10	1.06
410.00	3.62	3.61	0.00	35.41	2.07	1.13	1.13	1.08
450.00	3.76	3.77	0.00	31.89	2.03	1.17	1.16	1.10

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.
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