

# Power Splitter/Combiner

## Features

- low insertion loss, 0.4 dB typ.
- excellent insertion loss flatness, 0.2 dB peak to peak typ.
- excellent amplitude unbalance, 0.05 dB typ.
- very good phase unbalance, 0.1 deg. typ.
- excellent VSWR, 1.1:1 typ. all ports.
- J-leads for excellent solderability and strain relief

## Applications

- UHF/VHF
- instrumentation

## HT-JPS-2-1W+



2 Way-0° 50Ω 3 to 750 MHz

electrical schematic



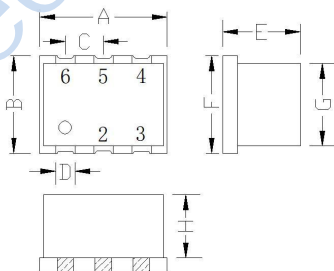
## Transformer Electrical Specifications

Freq. range (MHz)	Isolation(dB)		Insertion Loss (dB) Above 3.0 dB.		Phase Unbalance (Degrees) Max.	Amplitude Unbalance (dB) Max.
	min	max	min	max		
3-750	20	36	0.5	1.0	2.0	0.3

## Typical Performance Data( TEST CONDITIONS: INPUT POWER = 0dBm @Temperature = +25°C)

Frequency. (MHz)	Total Loss (dB)		Amp. Unbal. (dB)	Isolation (dB)	PhaseUnbal. (deg.)	VSWRS		
	S-1	S-2				S	1	2
3	3.57	3.57	0.00	31.30	0.00	1.13	1.35	1.35
5	3.46	3.46	0.00	35.31	0.01	1.11	1.29	1.29
10	3.38	3.38	0.00	37.17	0.02	1.11	1.24	1.24
22	3.36	3.36	0.00	36.06	0.06	1.10	1.23	1.23
40	3.38	3.39	0.01	34.66	0.08	1.11	1.22	1.22
100	3.38	3.38	0.00	30.08	0.27	1.12	1.22	1.22
250	3.53	3.52	0.01	23.73	0.49	1.17	1.22	1.22
375	3.63	3.61	0.03	21.42	0.73	1.20	1.21	1.21
440	3.66	3.63	0.03	2.84	0.85	1.21	1.21	1.21
500	3.73	3.68	0.06	50.52	0.84	1.21	1.20	1.20
560	3.77	3.70	0.07	20.46	0.93	1.21	1.18	1.18
620	3.79	3.70	0.09	20.69	0.88	1.20	1.17	1.17
660	3.86	3.73	0.13	21.04	0.90	1.18	1.16	1.16
700	3.87	3.73	0.14	21.60	0.89	1.17	1.15	1.15
750	3.98	3.77	0.16	22.58	0.83	1.14	1.13	1.13

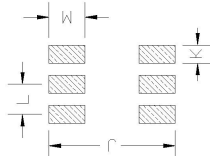
## Outline Drawing



Suggested Layout,  
Tolerance to be within ±0.2

Outline Dimensions: Unit ( mm)			
A	8.70	G	5.50
B	6.50	H	4.30
C	2.54	L	2.54
D	1.30	J	8.00
E	5.40	K	1.50
F	6.54	M	2.00
WT			0.5g

## PCB Land Pattern



### Pin Connections

SUM PORT	1
PORT 1	3
PORT 2	4
GROUND	6
NOT USED Stop welding ground	2,5

### Maximum Ratings

Operating Temperature	-40°C to 85°C
Storage Temperature	-55°C to 100°C
Power Input (as a splitter)	1 W max.
Internal Dissipation	0.125W max.

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

