

Ceramic

# High Pass Filter

**NEW!**

**HFTC-39**

4500 to 5500 MHz

### Maximum Ratings

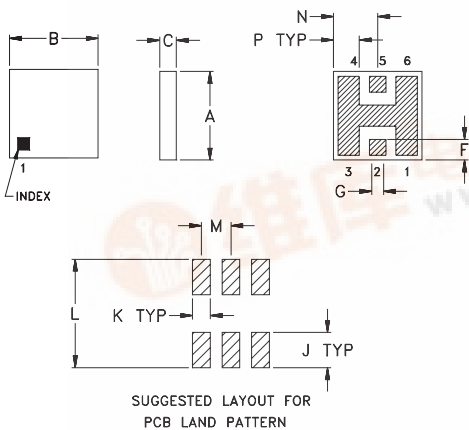
Operating Temperature	-55°C to 100°C
Storage Temperature	-55°C to 125°C

### Pin Connections

RF IN	2**
RF OUT	5**
GROUND	1,3,4,6

\*\* RF IN & RF OUT can be interchanged

### Outline Drawing

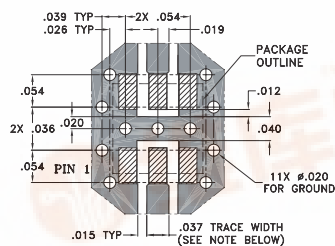


TOLERANCE UNLESS OTHERWISE STATED  
 2 PLACES DECIMAL: ±.01  
 3 PLACES DECIMAL: ±.005

### Outline Dimensions (inch)

A	B	C	D	E	F	G	
.150	.150	.028	0	0	.035	.028	
3.81	3.81	0.71	-	-	0.89	0.71	
H	J	K	L	M	N	P	wt.
0	.060	.030	.184	.050	.075	.044	grams
-	1.52	0.76	4.67	1.27	1.91	1.12	0.15

**Demo Board MCL P/N: TB-233**  
**Suggested PCB Layout (PL-112)**

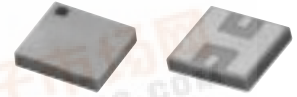


NOTE: TRACE WIDTH IS SHOWN FOR ROGERS RO4350 WITH DIELECTRIC THICKNESS .020" ± .0015". COPPER: 1/2 OZ. EACH SIDE. FOR OTHER MATERIALS TRACE WIDTH MAY NEED TO BE MODIFIED.

□ DENOTES PCB COPPER LAYOUT  
 ▨ DENOTES COPPER LAND PATTERN FREE OF SOLDERMASK

### Features

- miniature size, 0.15"X0.15"X.028"
- low profile, .028" height
- low pass band insertion loss, 1.0 dB typ.
- high power handling, 10W



**BLUE CELL™**

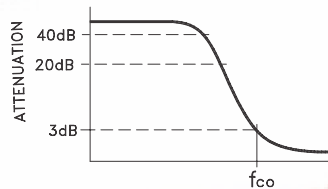
CASE STYLE: FR933  
 PRICE: \$3.75 ea. QTY (10-49)

### High Pass Filter Electrical Specifications (T<sub>AMB</sub>=25°C)

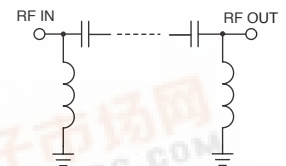
MODEL NO.	STOP BAND (MHz)		f <sub>co</sub> , MHz Nom. (loss 3 dB) Typ.	PASSBAND (MHz) (loss < 1.3 dB)	VSWR (:1)		POWER INPUT* (W)	MARKING	NO. OF SECTIONS
	(loss > 40 dB)	(loss > 20 dB)			Stopband Typ.	Passband Typ.			
HFTC-39	DC-1900	3050	3900	4600-5500	18	1.4	10	HF12	7

\* Derate linearly to 4W at 100°C ambient

### typical frequency response



### schematic



### Typical Performance Data at 25°C

Frequency (MHz)	Insertion Loss (dB)	VSWR (:1)
1.00	102.75	810.23
600.00	64.59	136.92
1000.00	55.35	109.48
1500.00	48.85	92.42
1900.00	43.70	81.79
2500.00	34.87	62.84
3050.00	24.00	40.15
3500.00	12.11	14.49
4500.00	0.97	1.10
5500.00	0.98	1.47

