

Surface Mount Bandpass Filter



ECO RBPF-246+

50Ω 236 to 256 MHz

Features

- Better passband insertion loss and return loss
- High rejection
- Miniature shielded case

Applications

- Military-aircraft
- Marine communication

Pad Connections

INPUT	2
OUTPUT	10
NOT CONNECTED	14
GROUND	1,3,4,5,6,7,8,9,11,12,13,15,16

Outline Dimensions (inch)

A	B	C	D	E	F	G	H	J
.500	.500	.180	.100	.080	.115	.060	.040	.540
12.7	12.7	4.57	2.54	2.03	2.92	1.52	1.02	13.72

K	L	M	N	P	Q	R	S	T	wt.
.060	.100	.135	.135	.115	.140	.070	.150	.070	grams
1.52	2.54	3.43	3.43	2.92	3.56	1.78	3.81	1.78	1.0

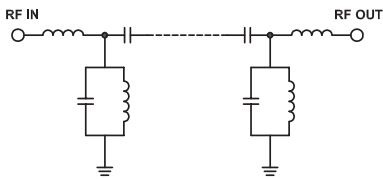
Note: Please refer to case style drawing for details

Maximum Ratings

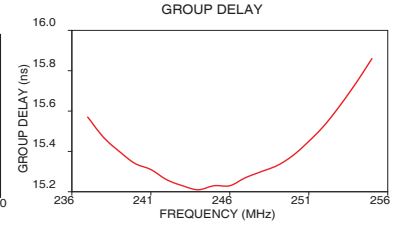
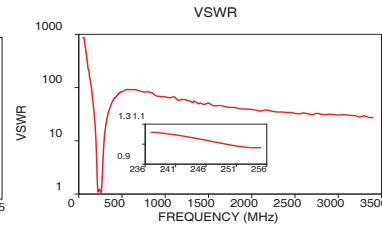
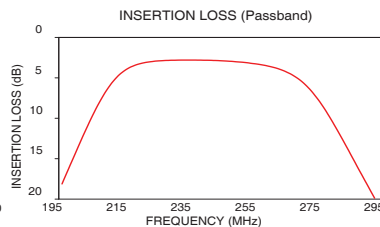
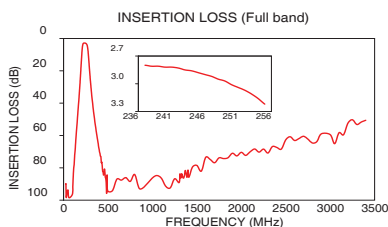
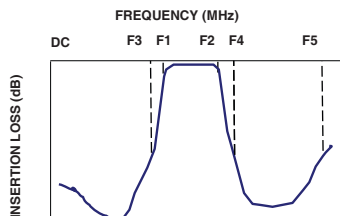
Operating Temperature	-40°C to 85°C
Storage Temperature	-55°C to 100°C
RF Power Input	0.15 W

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

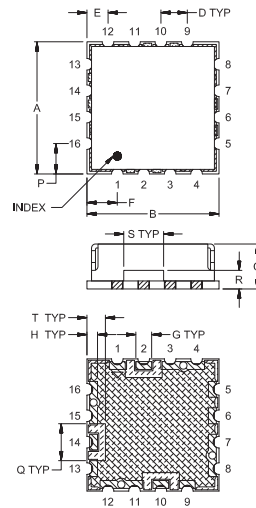
Functional Schematic



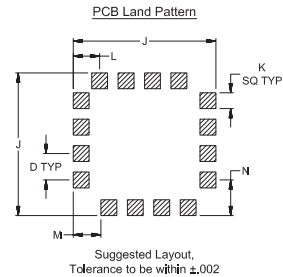
Typical Frequency Response



Outline Drawing



METALLIZATION
SOLDER RESIST



Electrical Specifications at 25°C

Parameter	F#	Frequency (MHz)	Min.	Typ.	Max.	Unit
Center Frequency	—	—	—	246	—	Hz
Pass Band	F1-F2F1	236-256	—	2.7	4	dB
Insertion Loss	-F2DC-	236-256	—	1.3	1.67	:1
Stop Band, Lower	F3DC-	DC-180	20	31	—	dB
VSWR	F3F4-	DC-180	—	20	—	:1
Stop Band, Upper	F5F4-F5	315-3400	20	33	—	dB
VSWR	—	315-3400	—	13	—	:1

Typical Performance Data at 25°C

Frequency (MHz)	Insertion Loss (dB)	VSWR (:1)	Frequency (MHz)	Group Delay (nsec)
1	105.36	1737.18	236	15.66
150	53.97	86.86	237	15.57
180	31.90	29.96	238	15.47
182	30.29	27.16	239	15.40
193	20.83	15.39	240	15.34
198	16.28	10.62	241	15.31
207	8.47	4.26	242	15.26
228	2.85	1.18	243	15.23
236	2.80	1.22	244	15.21
246	2.90	1.14	245	15.23
256	3.26	1.07	246	15.23
272	6.04	2.11	247	15.27
288	16.26	7.73	248	15.30
294	20.59	10.56	249	15.33
310	30.88	18.11	250	15.38
315	33.72	20.49	251	15.45
390	64.98	54.29	252	15.53
15002	78.50	51.10	253	15.63
50034	62.67	32.79	254	15.74
00	50.60	27.16	256	15.98