



SAW Components

SAW RF filter

Basestation

Series/type:	B5124
Ordering code:	B39741B5124U410
Date:	November 17, 2009
Version:	2.0



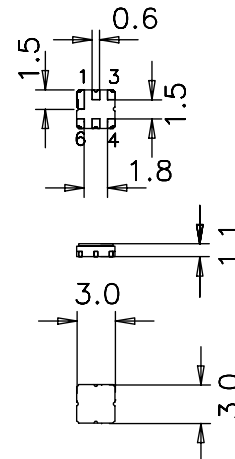
Application

- Low-loss RF filter for Basestation
- Usable band width 20 MHz



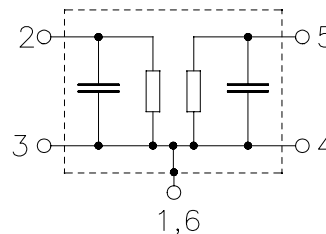
Features

- Package size 3.0 x3.0 x 1.10 mm³
- Package code DCC6C
- RoHS compatible
- Approximate weight 0.037 g
- Ceramic package for **Surface Mount Technology (SMT)**
- Ni, gold-plated terminals
- **Electrostatic Sensitive Device (ESD)**
- Filter surface passivated



Pin configuration

- 2 Input
- 5 Output
- 1, 3, 4, 6 To be grounded





Data Sheet



Characteristics

Temperature range for specification: T = -35 °C to +85 °C
 Terminating source impedance: Z_S = 50 Ω
 Terminating load impedance: Z_L = 50 Ω

		min.	typ. @ 25 °C	max.	
Nominal frequency	f _N	—	737.0	—	MHz
Maximum insertion attenuation	α _{max}				
	f _N ± 10 MHz	—	1.9	3.0	dB
Amplitude ripple (p-p)	Δα				
	f _N ± 10 MHz	—	0.7	1.5	dB
Return loss (input / output)					
	f _N ± 10 MHz	9	11	—	
Absolute attenuation	α				
	0.3 ... 697.0 MHz	35	45	—	dB
	697.0 ... 714.0 MHz	30	37	—	dB
	714.0 ... 717.0 MHz	20	25	—	dB
	757.0 ... 762.0 MHz	10	20	—	dB
	762.0 ... 866.0 MHz	25	28	—	dB
	866.0 ... 967.0 MHz	30	45	—	dB
	967.0 ... 1934.0 MHz	25	35	—	dB
	1934.0 ... 3000.0 MHz	15	30	—	dB
Temperature coefficient of frequency	TC _f	—	-36	—	ppm/°K

Maximum ratings

Operable temperature range	T	-40/+85	°C	
Storage temperature range	T _{stg}	-40/+85	°C	
DC voltage	V _{DC}	0	V	
ESD voltage	V _{ESD}	50 ¹⁾	V	machine model, 1 pulse
Input power	P _{IN}	10	dBm	

1) acc. to JESD22-A115A (machine model), 1 negative & 1 positive pulse.



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B5124

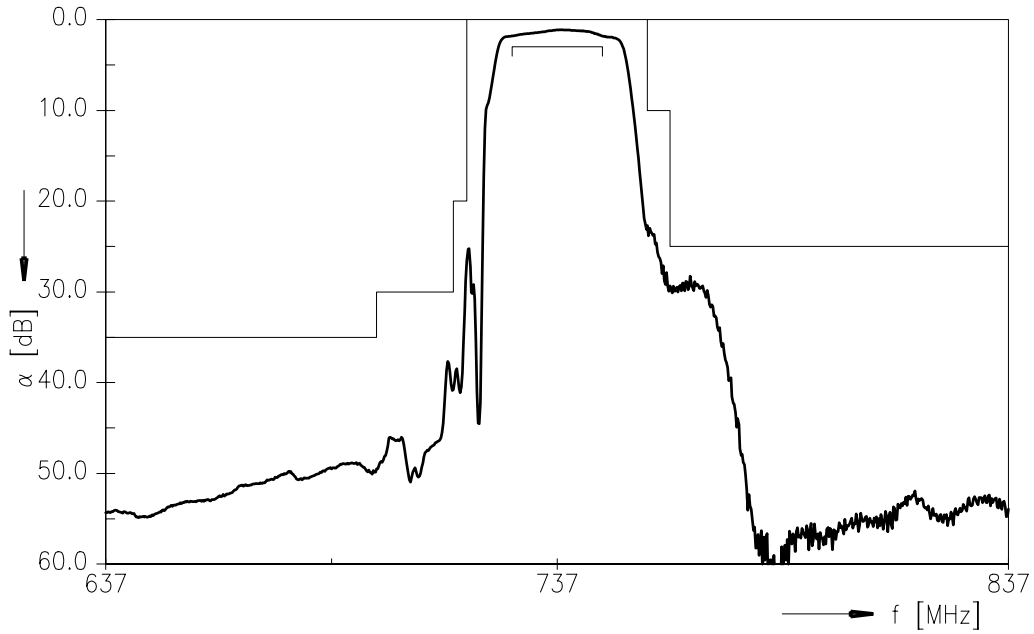
SAW RF filter

737.0 MHz

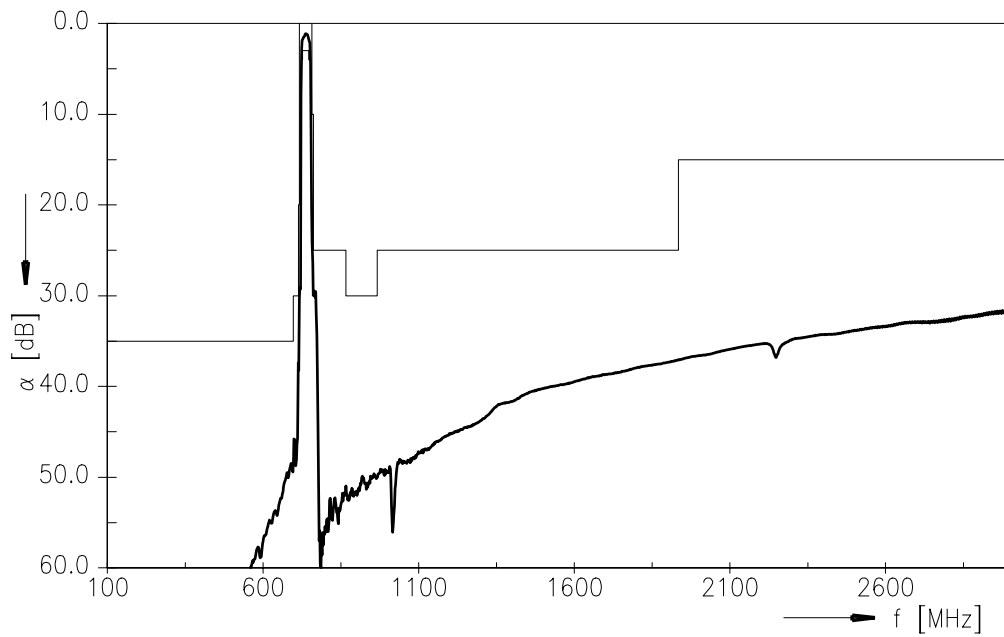
Data Sheet



Transfer function (narrow band)



Transfer function (wide band)



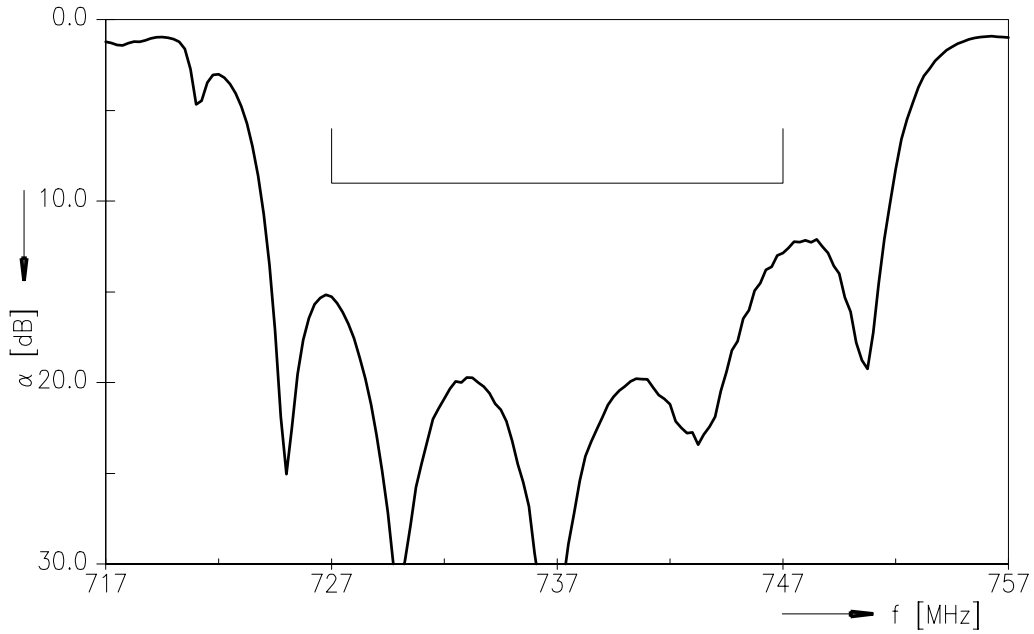
Please read *cautions and warnings* and *important notes* at the end of this document.



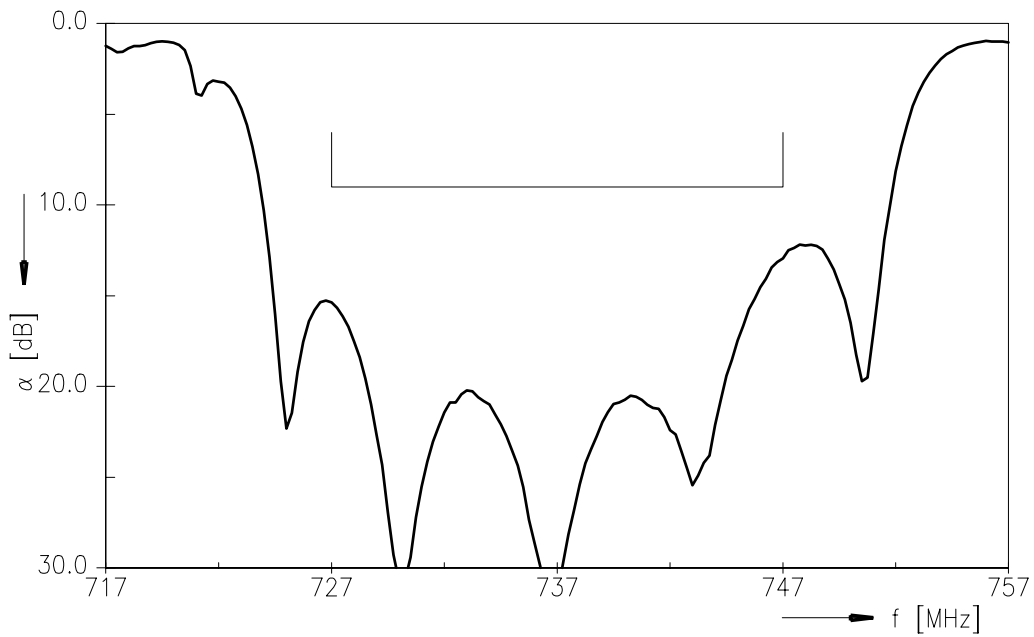
Data Sheet



Input return loss



Output return loss





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B5124

SAW RF filter

737.0 MHz

Data Sheet



References

Type	B5124
Ordering code	B39741B5124U410
Marking and package	C61157-A7-A67
Packaging	F61074-V8168-Z000
Date codes	L_1126
S-parameters	B5124_NB.s2p B5124_WB.s2p See file header for port/pin assignment
Soldering profile	S_6001
RoHS compatible	defined as compatible with the following documents: "DIRECTIVE 2002/95/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 27 January 2003 on the restriction of the use of certain hazardous substances in electrical and electronic equipment. 2005/618/EC from April 18th, 2005, amending Directive 2002/95/EC of the European Parliament and of the Council for the purposes of establishing the maximum concentration values for certain hazardous substances in electrical and electronic equipment."

For further information please contact your local EPCOS sales office or visit our webpage at www.epcos.com.

Published by EPCOS AG
Surface Acoustic Wave Components Division
P.O. Box 80 17 09, 81617 Munich, GERMANY

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