



SAW Components

SAW band–stop filter
ISDB–T

Series/type:	LP66A
Ordering code:	
Date:	January 24, 2006
Version:	1.1



SAW Components

LP66A

SAW band-stop filter

620.00 MHz

Preliminary Data



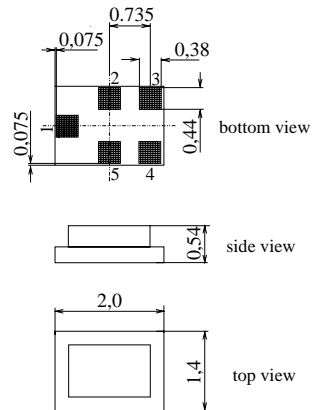
Application

- Low-loss RF band-stop filter for ISDB-T
- Low amplitude ripple
- Low group delay ripple
- Usable passband 300 MHz



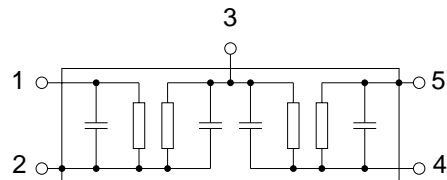
Features

- Package size 2.0 x 1.4 x 0.54 mm³
- Package code QCS5C
- RoHS compatible
- Approximate weight 0.009 g
- Package for **Surface Mount Technology (SMT)**
- Ni, gold-plated terminals
- **Electrostatic Sensitive Device (ESD)**



Pin configuration

- 1 Input unbalanced
- 4 Output unbalanced
- 3 External coupling coil
- 2,5 Case ground



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



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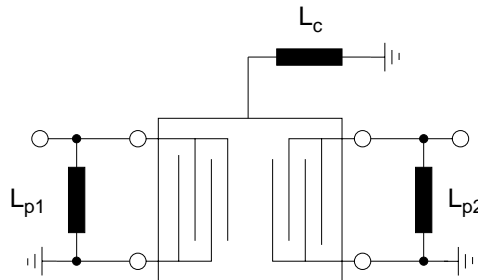
Characteristics

Operating temperature range: $T = -30\text{ °C to }+85\text{ °C}$
 Terminating source impedance: $Z_S = 50\ \Omega$ and matching network
 Terminating load impedance: $Z_L = 50\ \Omega$ and matching network

		LP66A ¹⁾			
		min.	typ. @ 25 °C	max.	
Nominal frequency	f_N	—	620.00	—	MHz
Minimum insertion attenuation (including losses in the matching network)	α_{max}				
470.00 ... 707.00 MHz		—	0.9	1.2	dB
470.00 ... 770.00 MHz		—	0.9	1.2	dB
Maximum insertion attenuation (including losses in the matching network)	α_{max}				
470.00 ... 707.00 MHz		—	1.8	2.0	dB
470.00 ... 770.00 MHz		—	1.8	2.0	dB
Attenuation	α				
200.00 MHz		40.0	45.0		dB
820.00 ... 830.00 MHz		39.0	41.0	—	dB
Group delay ripple (p-p)	$\Delta\tau$				
470.00 ... 707.00 MHz		—	3	—	ns
470.00 ... 770.00 MHz		—	5	—	ns

1) Values in columns min, typ and max indicate the development status of the current version.

Matching network (element values depend on PCB layout)



$L_{p1} = 20\text{ nH}$
 $L_{p2} = 8.7\text{ nH}$
 $L_c = 5.6\text{ nH}$



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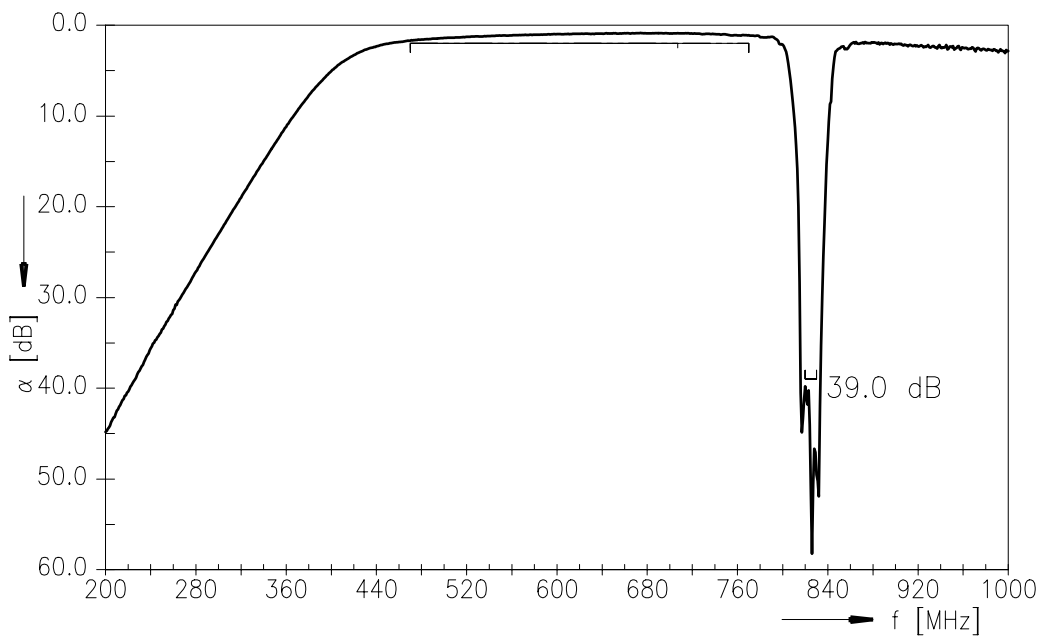
Preliminary Data **SMD**

Maximum ratings

Operable temperature range	T	-30/+85	°C	
Storage temperature range	T _{stg}	-40/+85	°C	
DC voltage	V _{DC}	3	V	
ESD voltage	V _{ESD}	100 ¹⁾	V	machine model, 10 pulses
Source power at 820.0 ... 830.0 MHz	P _S	24	dBm	peak power of W-CDMA signal

¹⁾ according to JESD22-A115A (machine model), 10 negative & 10 positive pulses.

Transfer function





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Preliminary Data	SMD

References

Type	LP66A
Ordering code	
Marking and package	C61157-A7-A111
Packaging	F61074-V8151-Z000
Date codes	L_1126
S-parameters	LP66A_WB_UN.s3p, unmatched
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.

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