



SAW Components

SAW RF filter

Short range devices

Series/type:	B3516
Ordering code:	B39192-B3516-U410
Date:	April 08, 2009
Version:	2.0



SAW Components

B3516

SAW RF filter

1880.00 MHz

Data sheet



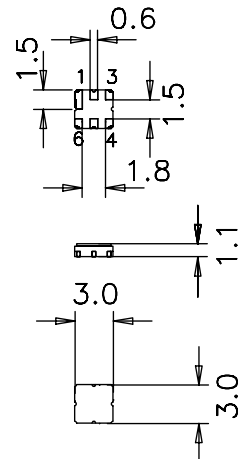
Application

- Low-loss RF filter for mobile telephone PCS systems, transmit path
- Usable passband 60 MHz
- No matching network required for operation at 50 Ω



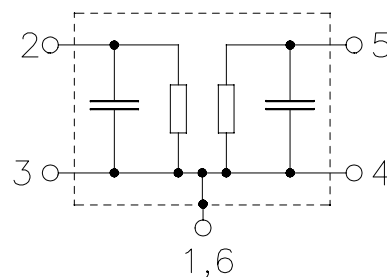
Features

- Package size 3.0 x 3.0 x 1.1 mm³
- Package code DCC6C
- RoHS compatible
- Approximate weight 0.037 g
- Package for **Surface Mount Technology (SMT)**
- Ni, gold-plated terminals
- Lead free soldering compatible with J - STD20C
- AEC-Q200 qualified component family
- **Electrostatic Sensitive Device (ESD)**



Pin configuration

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





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Characteristics

Reference temperature: $T_A = +25\text{ °C}$
 Terminating source impedance: $Z_S = 50\ \Omega$
 Terminating load impedance: $Z_L = 50\ \Omega$

		min.	typ.	max.	
Center frequency	f_C	—	1880.00	—	MHz
Maximum insertion attenuation	$\alpha_{\max}$	—	2.9	3.4	dB
1850.00 ... 1910.00 MHz					
Amplitude ripple (p-p)	$\Delta\alpha$	—	1.3	1.8	dB
1850.00 ... 1910.00 MHz					
Input VSWR		—	2.0	2.2	
1850.00 ... 1910.00 MHz					
Output VSWR		—	2.0	2.2	
1850.00 ... 1910.00 MHz					
Attenuation	α				
10.00 ... 1570.00 MHz		25.0	29.0	—	dB
1570.00 ... 1720.00 MHz		26.0	31.0	—	dB
1935.00 ... 2200.00 MHz		32.0	36.0	—	dB
2200.00 ... 2700.00 MHz		24.0	27.0	—	dB
2700.00 ... 3820.00 MHz		12.0	15.0	—	dB



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Characteristics

Temperature range for specification: $T_A = -40\text{ °C to }+85\text{ °C}$
 Terminating source impedance: $Z_S = 50\ \Omega$
 Terminating load impedance: $Z_L = 50\ \Omega$

		min.	typ. @ 25 °C	max.	
Center frequency	f_C	—	1880.00	—	MHz
Maximum insertion attenuation	$\alpha_{\max}$	—	2.9	4.1	dB
1850.00 ... 1910.00 MHz					
Amplitude ripple (p-p)	$\Delta\alpha$	—	1.3	2.7	dB
1850.00 ... 1910.00 MHz					
Input VSWR		—	2.0	2.3	
1850.00 ... 1910.00 MHz					
Output VSWR		—	2.0	2.3	
1850.00 ... 1910.00 MHz					
Attenuation	α				
10.00 ... 1570.00 MHz		25.0	29.0	—	dB
1570.00 ... 1720.00 MHz		26.0	31.0	—	dB
1935.00 ... 2200.00 MHz		20.0	36.0	—	dB
2200.00 ... 2700.00 MHz		24.0	27.0	—	dB
2700.00 ... 3820.00 MHz		12.0	15.0	—	dB

Maximum ratings

Operable temperature range	T_A	−45/+125	°C	
Storage temperature range	T_{stg}	−45/+125	°C	
DC voltage	V_{DC}	6	V	
Input power max.				
1850...1910 MHz	P_{IN}	13	dBm	source and load impedance 50 Ω peak power of TDMA signal, duty cycle 1 : 3
		12	dBm	continuous wave



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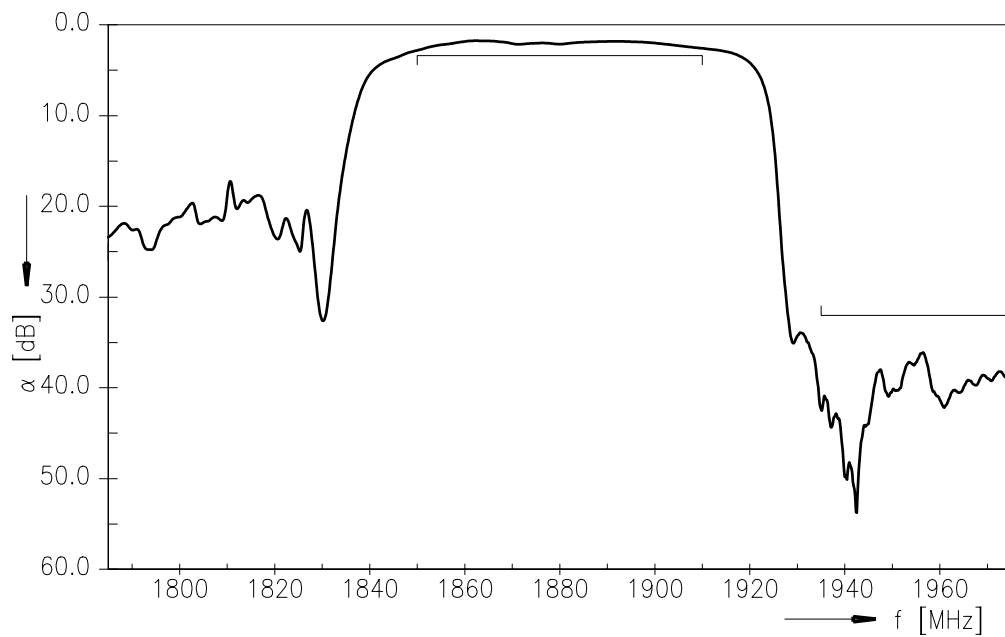
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1880.00 MHz

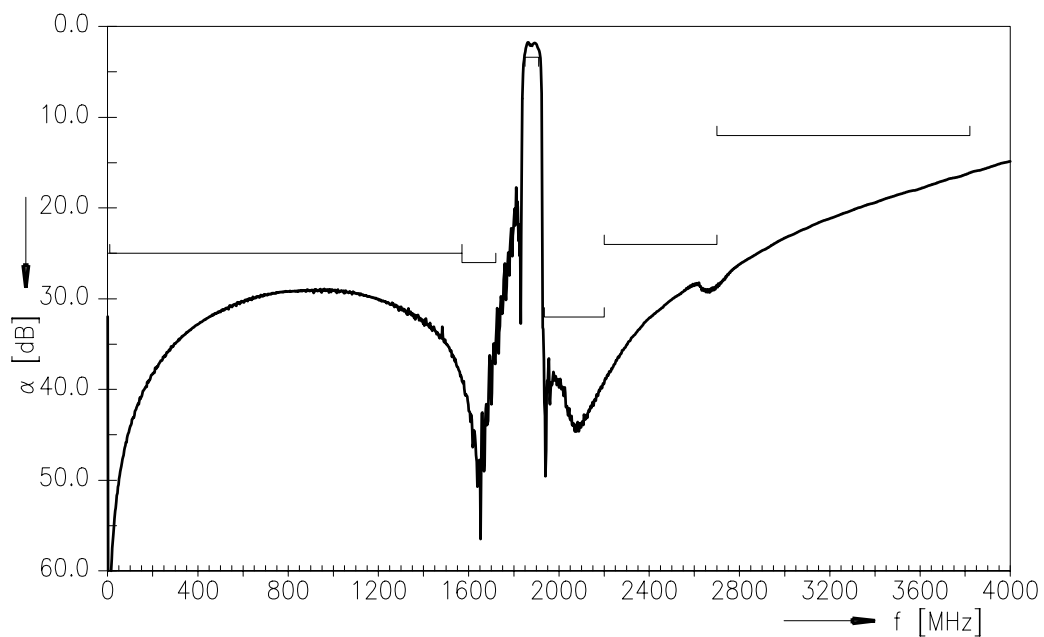
Data sheet



Transfer function (25° C spec)



Transfer function (wiedeband)



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

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Data sheet

**References**

Type	B3516
Ordering code	B39192-B3516-U410
Marking and package	C61157-A7-A67
Packaging	F61074-V8168-Z000
Date codes	L_1126
S-parameters	B3516_NB.s2p, B3516_WB.s2p See file header for port/pin assignment table
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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Please read *cautions and warnings and important notes* at the end of this document.

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