



# SAW Components

Data Sheet B7708, Pb-Free





**SAW Components**

**B7708**

**Low Loss Filter**

**1575,42 MHz**

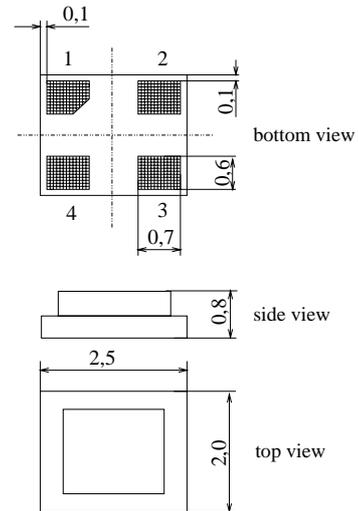
**Data Sheet**



**Features**

- Low loss RF filter for GPS receivers
- Usable passband 2,0 MHz
- Low amplitude ripple
- Package for **Surface Mounted Technology (SMT)**
- Pb-free

**Chip Sized SAW Package DCS4H**



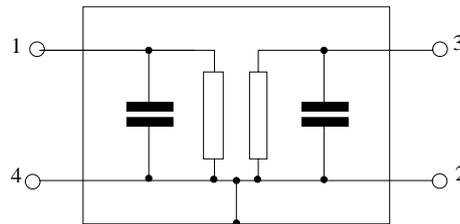
Dimensions in mm, approx. weight 0,01 g

**Terminals**

- Ni, gold-plated

**Pin configuration**

- 1 Input, unbalanced
- 3 Output, unbalanced
- 2, 4 To be grounded, Case Ground



Type	Ordering code	Marking and Package according to	Packing according to
B7708	B39162-B7708-K710	C61157-A7-A136	F61074-V8189-Z000

Electrostatic Sensitive Device (ESD)

**Maximum ratings**

Operable temperature range	$T$	- 40 / + 85	°C	source and load impedance 50 $\Omega$ continuous wave signal
Storage temperature range	$T_{stg}$	- 40 / + 85	°C	
DC voltage	$V_{DC}$	5	V	
ESD voltage	$V_{ESD}^*$	50*	V	
Input power max. 1574,3 ... 1576,7 MHz	$P_{IN}$	3	dBm	
50,0...1535,5 and 1625,5 ... 6000 MHz	$P_{IN}$	15	dBm	

\* - acc. to JESD22-A115A (Machine Model), 10 negative & 10 positive pulses



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**Characteristics**

Operating temperature range:  $T = -40\text{ °C to }+85\text{ °C}$   
 Terminating source impedance:  $Z_S = 50\ \Omega$   
 Terminating load impedance:  $Z_L = 50\ \Omega$

		min.	typ.	max.	
<b>Center frequency</b>	$f_C$	—	1575,42	—	MHz
<b>Maximum insertion attenuation</b>	$\alpha_{max}$	—	2,4	3,5	dB
	1574,22 ... 1576,62 MHz				
<b>Amplitude ripple (p-p)</b>	$\Delta\alpha$	—	0,1	1,0	dB
	1574,22 ... 1576,62 MHz				
<b>Group delay</b>	$\tau$	—	35	50	ns
	1574,22 ... 1576,62 MHz				
<b>Attenuation</b>	$\alpha$				
	50,0 ... 1535,0 MHz	35	42	—	dB
	1625,0 ... 1630,0 MHz	30	44	—	dB
	1630,0 ... 3500,0 MHz	35	40	—	dB
	3500,0 ... 4000,0 MHz	20	35	—	dB
	4000,0 ... 6000,0 MHz	10	20	—	dB
<b>Return loss</b>					
	1574,22 ... 1576,62 MHz	11,0	19,0	—	dB
<b>VSWR</b>					
	1574,22 ... 1576,62 MHz	—	1,25	1,8	



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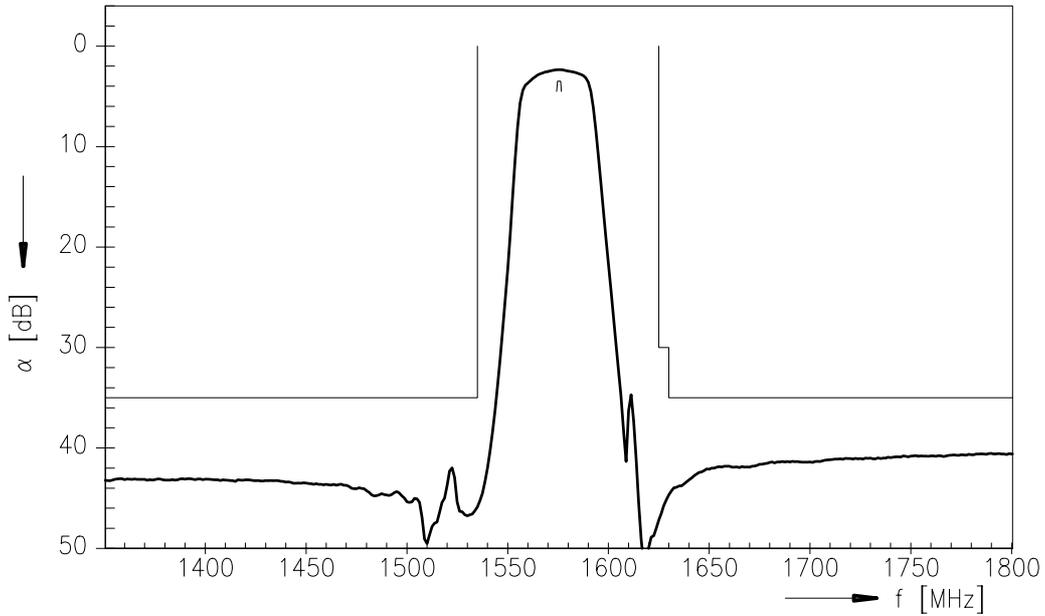
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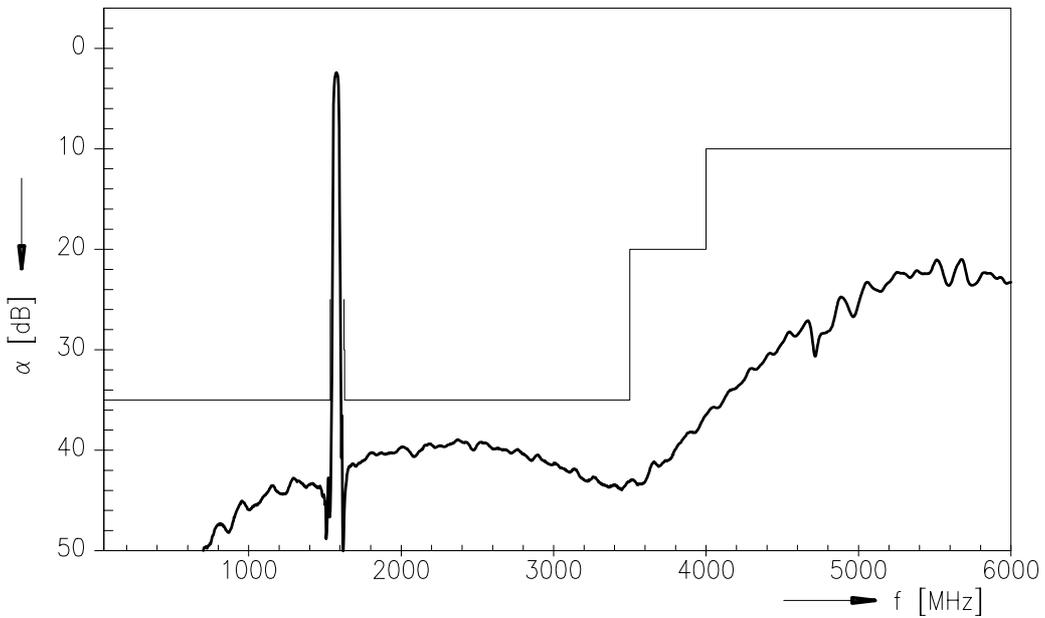
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Transfer function



Transfer function (wide band)





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