



SAW Components

Data Sheet B4059





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Low Loss Filter for Automotive Telematics

1575,42 MHz

Data Sheet



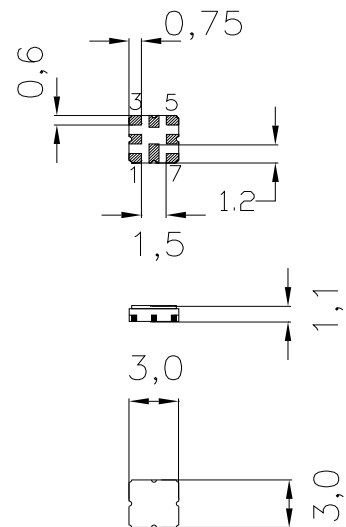
Features

- RF low-loss filter for GPS application
- Unbalanced to unbalanced operation
- High stop-band rejection
- Package for **Surface Mounted Technology (SMT)**
- Hermetically sealed ceramic package
- No matching network required for operation at 50 Ω
- Extended temperature range for automotive application

Terminals

- Ni, gold-plated

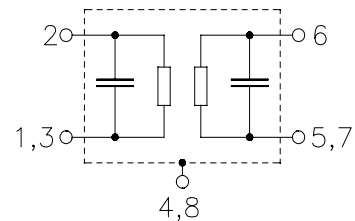
Ceramic package QCC8D



Dimensions in mm, approx. weight 0,037 g

Pin configuration

- | | |
|------------------|--------------------|
| 2 | Input, unbalanced |
| 6 | Output, unbalanced |
| 1, 3, 4, 5, 7, 8 | To be grounded |
| 4, 8 | Case ground |



Type	Ordering code	Marking and Package according to	Packing according to
B4059	B39162-B4059-U810	C61157-A7-A68	F61074-V8089-Z000

Electrostatic Sensitive Device (ESD)

Maximum ratings

Operable temperature range	T	- 40 / +105	$^{\circ}\text{C}$	source impedance 50 Ω
Storage temperature range	T_{stg}	- 40 / +105	$^{\circ}\text{C}$	
DC voltage	V_{DC}	0	V	
Source power	P_{S}	0	dBm	



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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.	
Center frequency	f_C	—	1575,42	—	MHz
Maximum insertion attenuation	α_{\max}				
	1574,22 ... 1576,62 MHz	—	2,8	3,5	dB
Amplitude ripple (p-p)	$\Delta\alpha$				
	1574,22 ... 1576,62 MHz	—	0,9	1,5	dB
Attenuation	α				
	0,00 ... 1425,00 MHz	50	55	—	dB
	1425,00 ... 1525,00 MHz	33	36	—	dB
	1525,00 ... 1535,42 MHz	45	48	—	dB
	1615,00 ... 1625,00 MHz	30	37	—	dB
	1625,00 ... 2200,00 MHz	40	45	—	dB
	2200,00 ... 4000,00 MHz	30	38	—	dB



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Characteristics

Operating temperature range: $T = -40\text{ °C to }+105\text{ °C}$

Terminating source impedance: $Z_S = 50\ \Omega$

Terminating load impedance: $Z_L = 50\ \Omega$

		min.	typ.	max.	
Center frequency	f_C	—	1575,42	—	MHz
Maximum insertion attenuation	α_{\max}				
	1574,22 ... 1576,62 MHz	—	2,8	3,7	dB
Amplitude ripple (p-p)	$\Delta\alpha$				
	1574,22 ... 1576,62 MHz	—	0,9	1,5	dB
Attenuation	α				
	0,00 ... 1425,00 MHz	50	55	—	dB
	1425,00 ... 1525,00 MHz	33	36	—	dB
	1525,00 ... 1535,42 MHz	45	48	—	dB
	1615,00 ... 1625,00 MHz	30	37	—	dB
	1625,00 ... 2200,00 MHz	40	45	—	dB
	2200,00 ... 4000,00 MHz	30	38	—	dB



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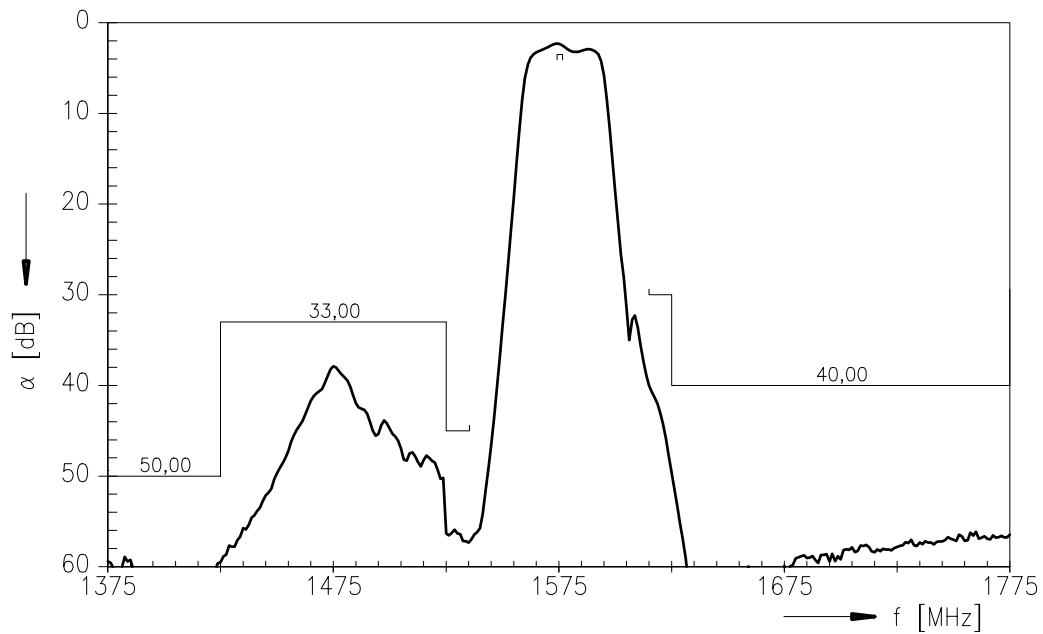
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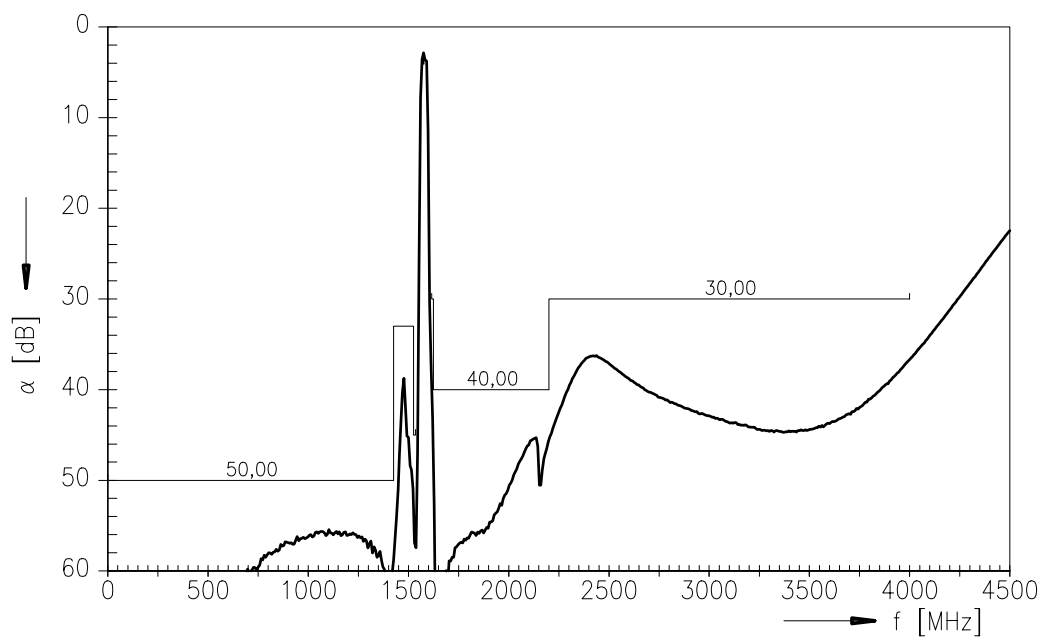
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Transfer function



Transfer function (wide band)





SAW Components	B4059
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