



SAW Components

Data Sheet B7836

Data Sheet

A large, stylized, 3D-rendered graphic of the EPCOS logo. The letters "EPCOS" are in a bold, sans-serif font, appearing to be part of a larger, curved structure that resembles a globe or a stylized wave. The graphic is rendered in a light gray color against a dark background.



SAW Components

B7836

Low-Loss Filter for Mobile Communication

1501,5 MHz

Preliminary Data



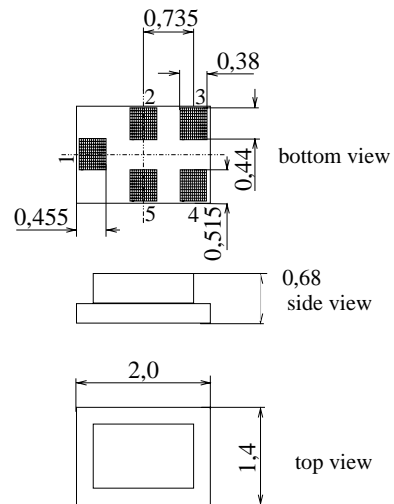
Chip sized SAW package QCS5C

Features

- Low-loss RF filter for PDC system, receive path
- Small insertion attenuation
- Low amplitude ripple
- Package for Surface Mounted Technology (SMT)
- Chip Sized SAW Package (CSSP)

Terminals

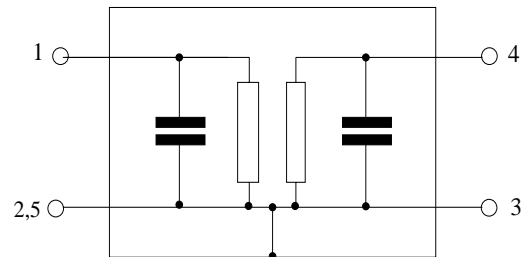
- Gold-plated Ni



Dimensions in mm, approx. weight 0,007 g

Pin configuration

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



| Type | Ordering code | Marking and Package according to | Packing according to |
|-------|-------------------|----------------------------------|----------------------|
| B7836 | B39152-B7836-C710 | C61157-A7-A111 | F61074-V8151-Z000 |

Electrostatic Sensitive Device (ESD)

Maximum ratings

| | | | | |
|-----------------------------|-----------|-----------|-----|---|
| Operating temperature range | T | - 20/+ 85 | °C | |
| Storage temperature range | T_{stg} | - 40/+ 85 | °C | |
| DC voltage | V_{DC} | 3 | V | |
| Source power | P_S | 13 | dBm | duty cycle 1:3, source and load impedance 50 Ω |



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Characteristics

Operating temperature range: $T = +25 \pm 2^\circ\text{C}$
Terminating source impedance: $Z_S = 50\ \Omega$
Terminating load impedance: $Z_L = 50\ \Omega$

| | | min. | typ. | max. | |
|--------------------------------------|-----------------|------|--------|------|-----|
| Center frequency | f_C | — | 1501,5 | — | MHz |
| Maximum insertion attenuation | α_{\max} | | | | |
| 1487,0 ... 1516,0 MHz | | — | 1,5 | 2,0 | dB |
| Amplitude ripple (p-p) | $\Delta\alpha$ | | | | |
| 1487,0 ... 1516,0 MHz | | — | 0,3 | 0,8 | dB |
| Absolute attenuation | α | | | | |
| 1227,0 ... 1256,0 MHz | | 35 | 36 | — | dB |
| 1241,5 ... 1270,5 MHz | | 35 | 36 | — | dB |
| 1357,0 ... 1386,0 MHz | | 25 | 30 | — | dB |
| 1371,5 ... 1400,5 MHz | | 25 | 30 | — | dB |
| 1422,0 ... 1451,0 MHz | | 21 | 23 | — | dB |
| 1451,0 ... 1468,0 MHz | | 11 | 15 | — | dB |
| 1552,0 ... 1581,0 MHz | | 13 | 16 | — | dB |
| 1617,0 ... 1646,0 MHz | | 22 | 27 | — | dB |
| 1747,0 ... 1776,0 MHz | | 28 | 34 | — | dB |



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Characteristics

Operating temperature range: $T = -20$ to $+85$ °C

Terminating source impedance: $Z_S = 50 \Omega$

Terminating load impedance: $Z_L = 50 \Omega$

| | | min. | typ. | max. | |
|--------------------------------------|-----------------|------|--------|------|-----|
| Center frequency | f_C | — | 1501,5 | — | MHz |
| Maximum insertion attenuation | α_{\max} | | | | |
| 1487,0 ... 1516,0 MHz | | — | 1,5 | 2,0 | dB |
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| 1357,0 ... 1386,0 MHz | | 25 | 30 | — | dB |
| 1371,5 ... 1400,5 MHz | | 25 | 30 | — | dB |
| 1422,0 ... 1451,0 MHz | | 21 | 23 | — | dB |
| 1451,0 ... 1468,0 MHz | | 7 | 13 | — | dB |
| 1552,0 ... 1581,0 MHz | | 13 | 16 | — | dB |
| 1617,0 ... 1646,0 MHz | | 22 | 25 | — | dB |
| 1747,0 ... 1776,0 MHz | | 28 | 34 | — | dB |



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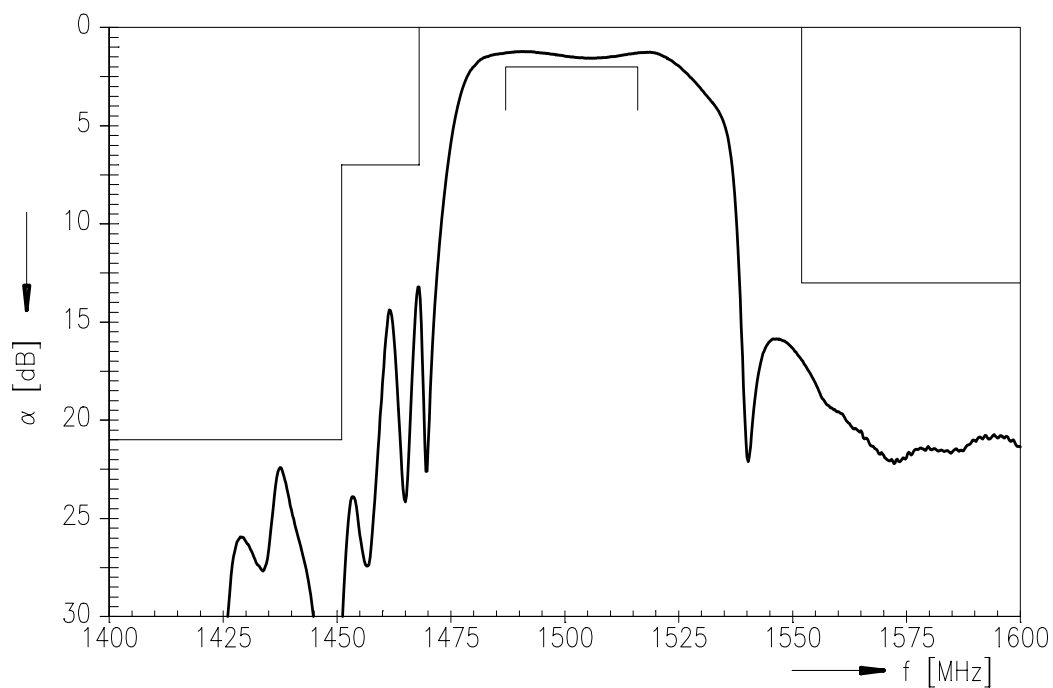
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1501,5 MHz

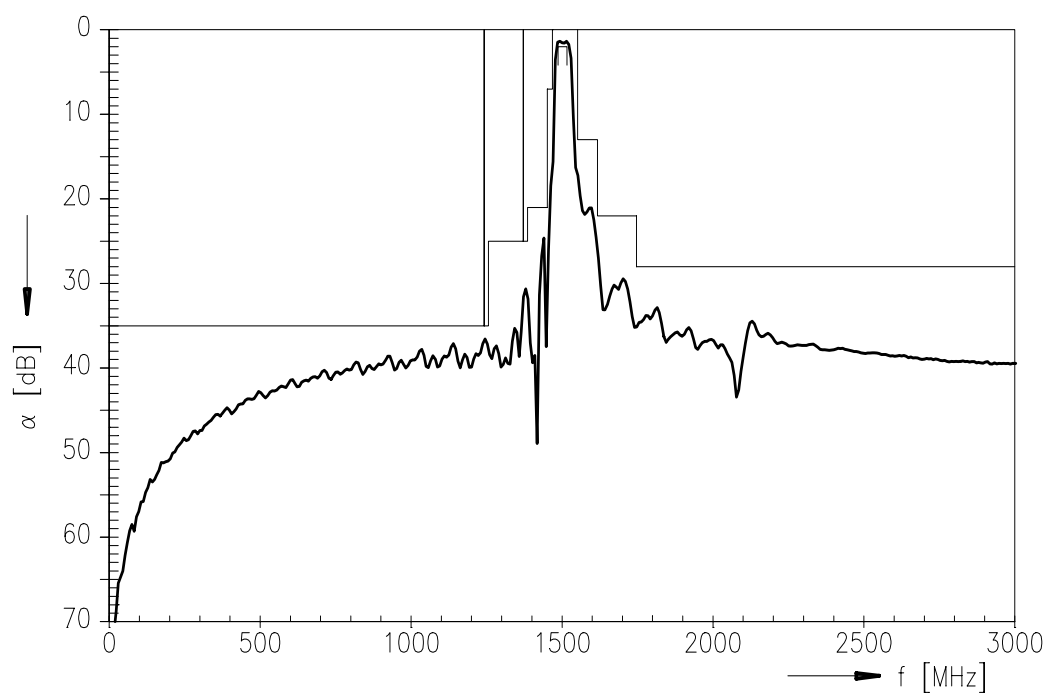
Preliminary Data



Transfer function (pass band) :



Transfer function (broad band) :





| | |
|---|---|
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| Low-Loss Filter for Mobile Communication | 1501,5 MHz |
| Preliminary Data |  |

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