



SAW filters for mobile communications

Series/Type: B7831

The following products presented in this data sheet are being withdrawn.

| Ordering Code | Substitute Product | Date of Withdrawal | Deadline Last Orders | Last Shipments |
|-----------------|--------------------|--------------------|----------------------|----------------|
| B39182B7831C710 | B39182B9441M410 | 2009-06-19 | 2009-12-31 | 2010-03-31 |

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SAW Components

B7831

Low-Loss Filter for Mobile Communication

1765,00 MHz

Data Sheet



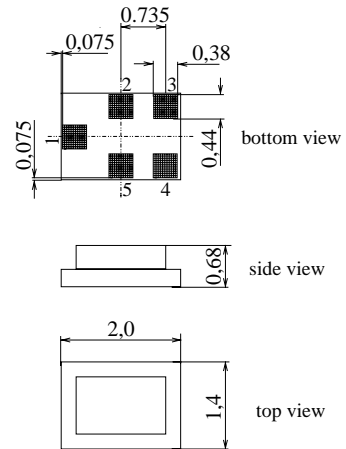
Chip sized SAW package

Features

- Low-loss RF filter for mobile telephone Korean PCS systems, transmit path
- Usable passband 30 MHz
- No matching network required for operation at 50 Ω
- Ceramic package for **Surface Mounted** technology (**SMT**)

Terminals

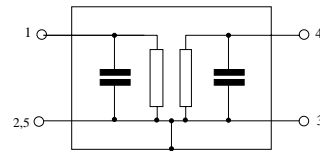
- Ni, gold-plated



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 |
|-------|-------------------|----------------------------------|----------------------|
| B7831 | B39182-B7831-C710 | C61157-A7-A111 | F61074-V8151-Z000 |

Electrostatic Sensitive Device (ESD)

Maximum ratings

| | | | | |
|----------------------------|-----------|-----------|-----|-------------|
| Operable temperature range | T | - 30/+ 85 | °C | CDMA signal |
| Storage temperature range | T_{stg} | - 40/+ 85 | °C | |
| DC voltage | V_{DC} | 0 | V | |
| Input power max. | P_{IN} | 10 | dBm | |



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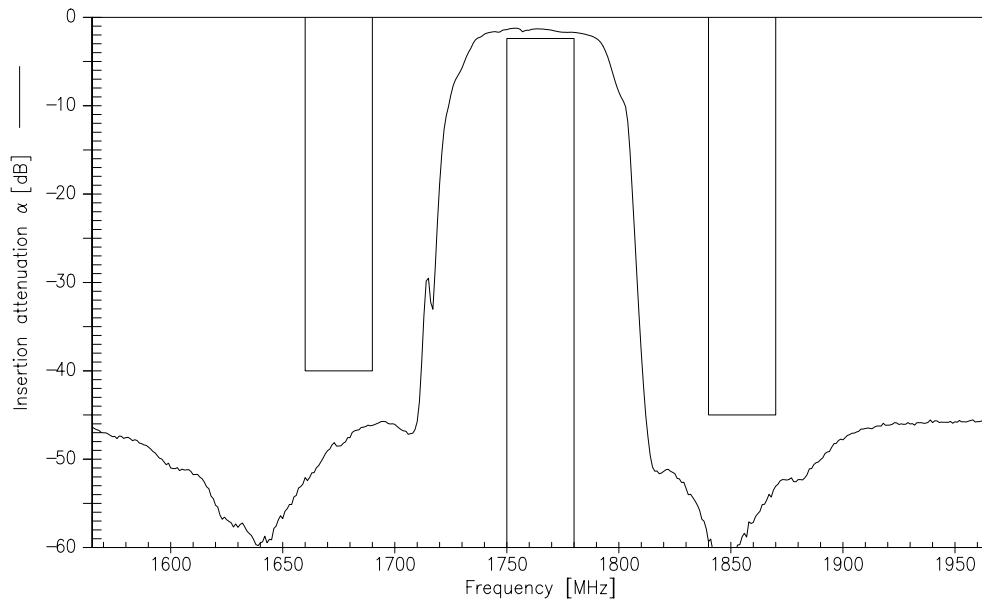
Characteristics

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

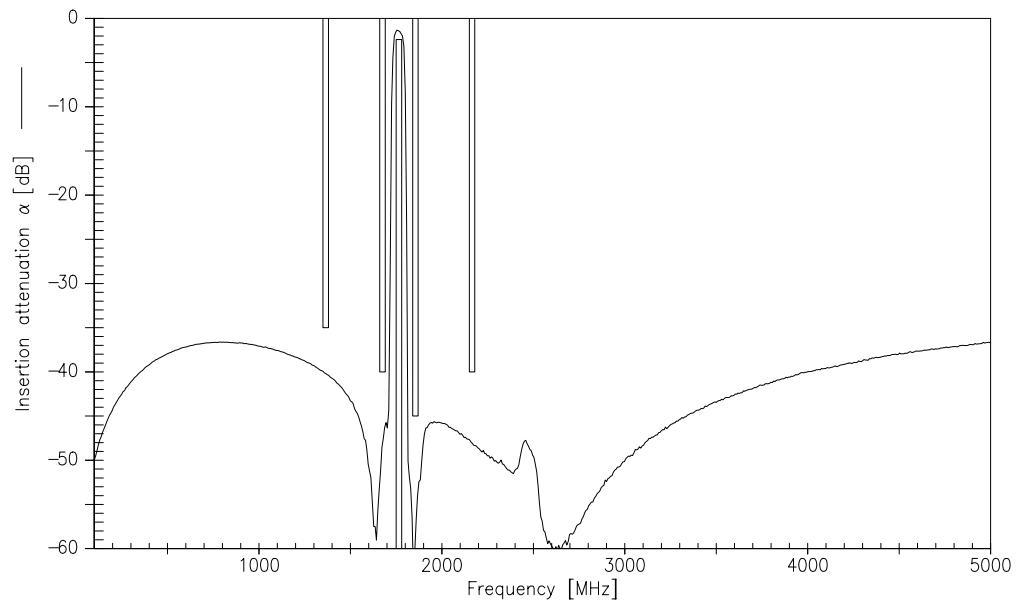
| | | | min. | typ. | max. | |
|--------------------------------------|-----------------|-----------------------|------|--------|------|-----|
| Center frequency | f_c | | — | 1765,0 | — | MHz |
| Maximum insertion attenuation | α_{\max} | | | | | |
| | | 1750,0 ... 1780,0 MHz | — | 1,8 | 2,4 | dB |
| Amplitude ripple (p-p) | $\Delta\alpha$ | | | | | |
| | | 1750,0 ... 1780,0 MHz | — | 0,6 | 1,2 | dB |
| VSWR | | | | | | |
| | | 1750,0 ... 1780,0 MHz | — | 1,5 | 1,9 | |
| Attenuation | α | | | | | |
| | | 1350,0 ... 1380,0 MHz | 35,0 | 40,0 | — | dB |
| | | 1660,0 ... 1690,0 MHz | 40,0 | 46,0 | — | dB |
| | | 1840,0 ... 1870,0 MHz | 45,0 | 52,0 | — | dB |
| | | 2150,0 ... 2180,0 MHz | 40,0 | 47,0 | — | dB |



Transfer function (measurement)

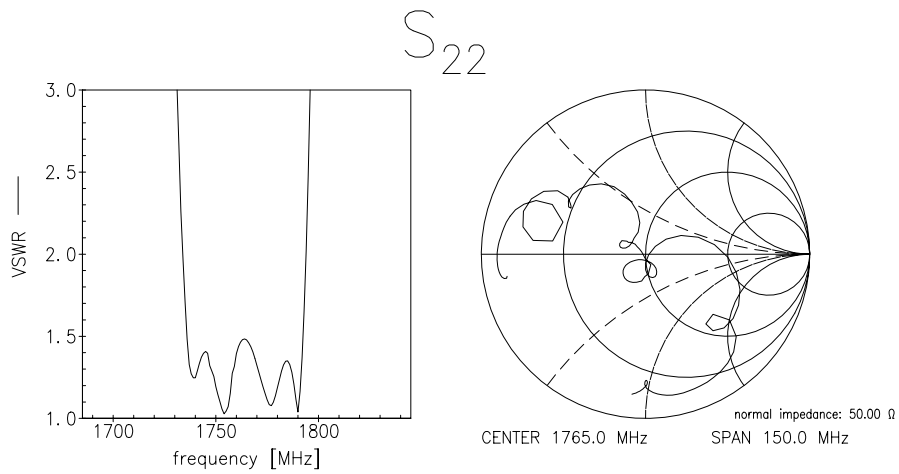
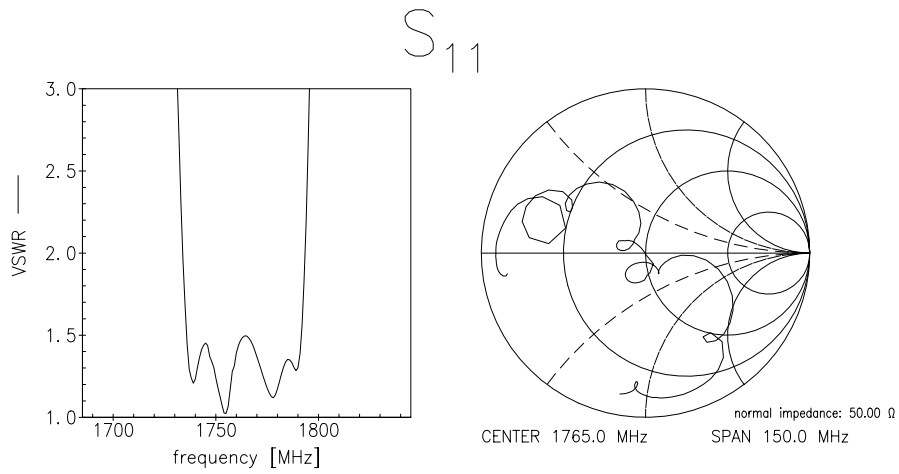


Transfer function (wideband measurement)





Matching (measurement)





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This brochure replaces the previous edition.

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