



SAW Components

Data Sheet B7730, Pb-Free

Data Sheet

A large, stylized graphic of a globe is shown, with the word "EPCOS" overlaid in large, glowing, white letters. The globe is rendered with a grid of latitude and longitude lines, and the word "EPCOS" is positioned diagonally across the lower half of the globe, appearing to float or glow above it.



SAW Components

B7730

Low-Loss Filter for Mobile Communication

881,5 MHz

Data Sheet



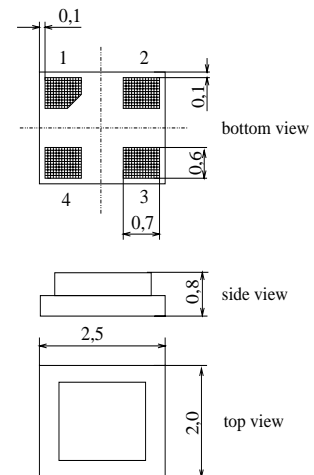
Chip Sized SAW Package DCS4H

Features

- Low-loss RF filter for mobile telephone
Cell systems, receive path
- High Tx band selectivity
- Low amplitude ripple
- Usable passband 25 MHz
- Suitable for GPRS class 1 to 12
- Package for Surface Mounted
Technology (SMT)
- Pb-Free

Terminals

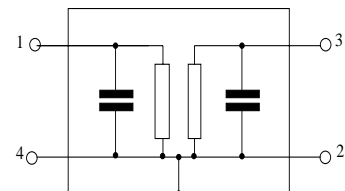
- Gold-plated Ni



Dimensions in mm, approx. weight 0,015 g

Pin configuration

- | | |
|------|--------|
| 1 | Input |
| 3 | Output |
| 2, 4 | Ground |



Type	Ordering code	Marking and Package according to	Packing according to
B7730	B39881-B7730-K710	C61157-A7-A136	F61074-V8189-Z000

Electrostatic Sensitive Device (ESD)

Maximum ratings

Operable temperature range	T	- 40/+ 85	°C	Machine Model, 10 pulses peak power of GSM signal, duty cycle 4:8
Storage temperature range	T_{stg}	- 40/+ 85	°C	
DC voltage	V_{DC}	5	V	
ESD voltage	V_{ESD}^*	100*	V	
Input power at GSM850, GSM900, GSM1800 and GSM1900 Tx bands	P_{IN}	15	dBm	

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



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Characteristics

Operating temperature range: $T = -30$ to $+85$ °C

Terminating source impedance: $Z_S = 50 \Omega$

Terminating load impedance: $Z_L = 50 \Omega$

			min.	typ.	max.	
Center frequency	f_C		—	881,5	—	MHz
Maximum insertion attenuation	α_{\max}					
	869,0 ... 894,0 MHz		—	2,5	2,7	dB
Amplitude ripple (p-p)	$\Delta\alpha$					
	869,0 ... 894,0 MHz		—	0,9	1,1	dB
Return loss						
	869,0 ... 894,0 MHz		10,0	12,0	—	dB
Attenuation	α					
	0,0 ... 824,0 MHz		45,0	55,0	—	dB
	824,0 ... 849,0 MHz		45,0	50,0	—	dB
	914,0 ... 924,0 MHz		24,0	26,0	—	dB
	924,0 ... 950,0 MHz		35,0	40,0	—	dB
	950,0 ... 997,0 MHz		35,0	50,0	—	dB
	997,0 ... 2200,0 MHz		40,0	50,0	—	dB
	2200,0 ... 3000,0 MHz		35,0	42,0	—	dB
	3000,0 ... 4000,0 MHz		20,0	28,0	—	dB
	4000,0 ... 6000,0 MHz		10,0	18,0	—	dB
Tx band suppression	α					
	824,0 ... 849,0 MHz		45,0	50,0	—	dB



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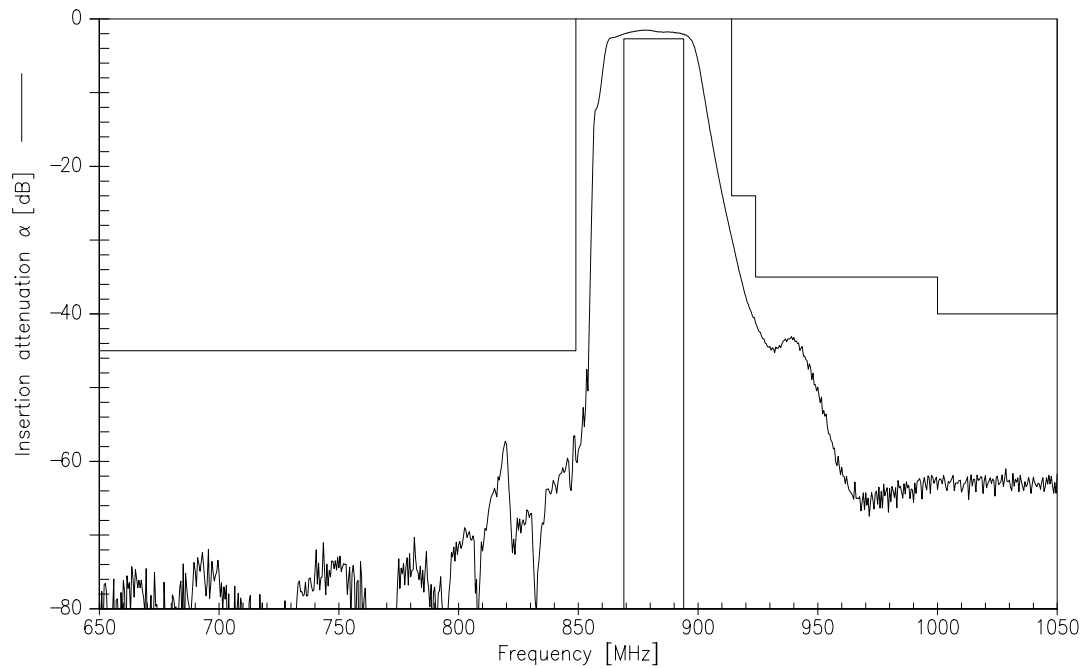
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881,5 MHz

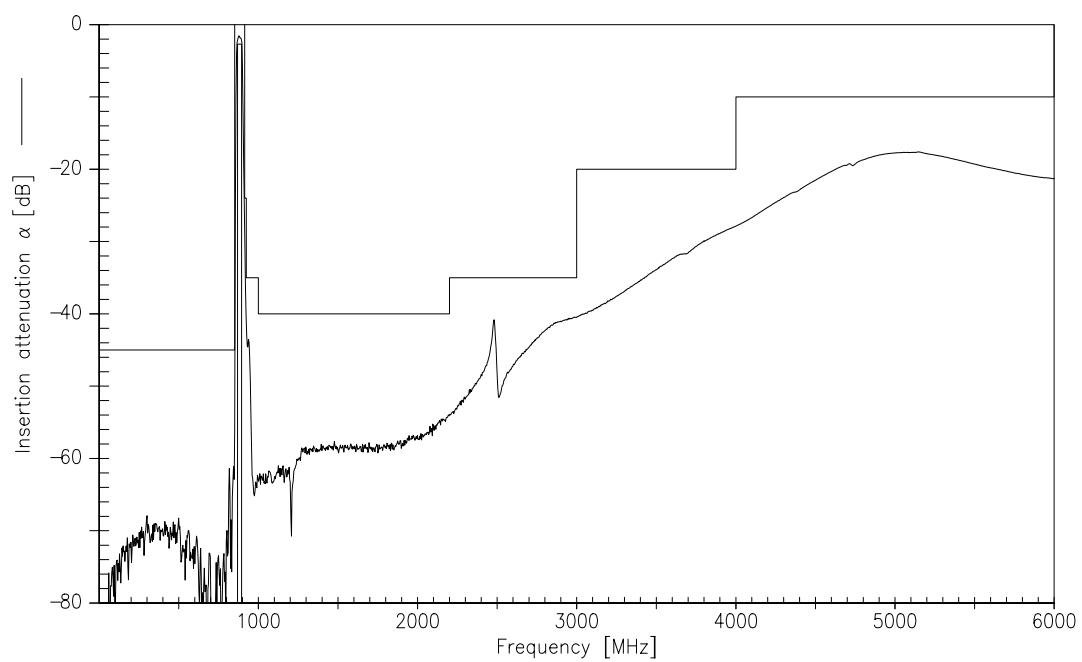
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Transfer function (narrowband measurement at 25 °C)



Transfer function (wideband measurement)





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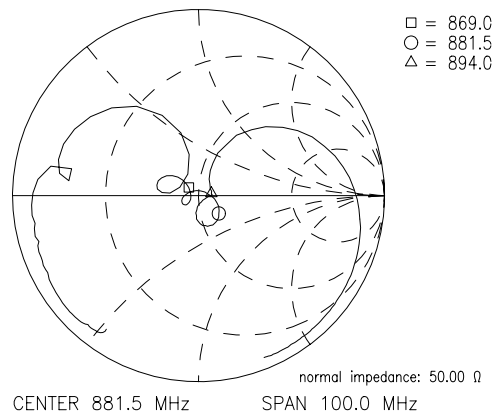
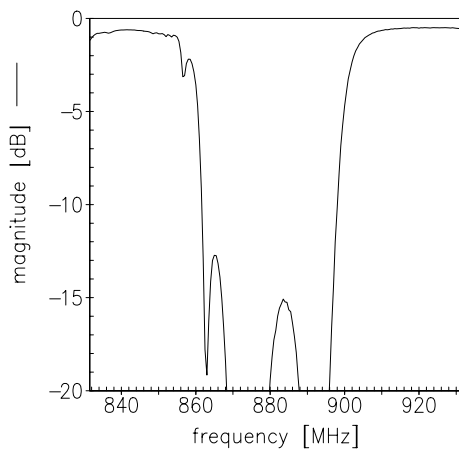
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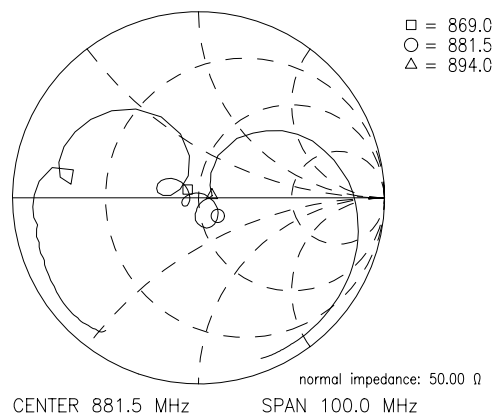
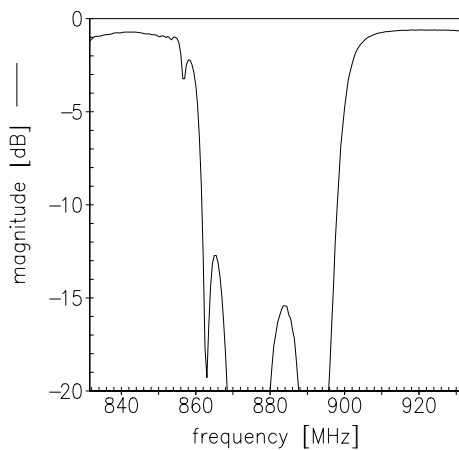


Reflection functions

S_{11}



S_{22}





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Data Sheet	SMD

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