



# SAW Components

Data Sheet R2712

Data Sheet

A large, stylized graphic of a globe with a grid of latitude and longitude lines. The word "EPCOS" is written across the globe in a large, white, sans-serif font, appearing to be part of the globe's structure. The globe is set against a dark, circular background with a subtle glow.



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Resonator

804.50 MHz

Data Sheet

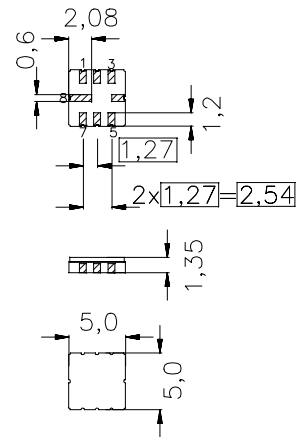
SMD Ceramic package QCC8C

Features

- 2-port resonator
- nominal 180°-phase at resonance
- Provides reliable, fundamental mode, quartz frequency stabilization i.e. in transmitters or local oscillators
- Passivation layer: Protec

Terminals

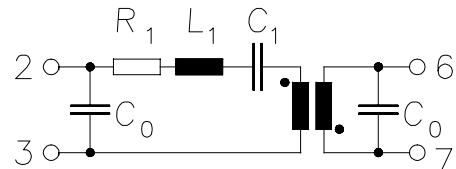
- Ni, gold plated



Dimensions in mm, approx. weight 0,1 g

Pin configuration

- |     |                         |
|-----|-------------------------|
| 2   | Input / Output          |
| 6   | Output / Input          |
| 7   | Ground (Input / Output) |
| 3   | Ground (Output / Input) |
| 4,8 | Ground (case)           |



Type	Ordering code	Marking and Package according to	Packing according to
R2712	B39801-R2712-U310	C61157-A7-A56	F61074-V8169-Z000

Electrostatic Sensitive Device (ESD)

Maximum ratings

Operable temperature range	$T_A$	-45/+85	°C	between any terminals
Storage temperature range	$T_{stg}$	-45/+85	°C	
DC voltage	$V_{DC}$	0	V	
Source power	$P_s$	0	dBm	


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**Resonator**
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**Characteristics**

Reference temperature:  $T_A = 25\text{ °C}$   
 Terminating Source impedance:  $Z_S = 50\ \Omega$   
 Terminating Load impedance:  $Z_L = 50\ \Omega$

		<b>min.</b>	<b>typ.</b>	<b>max.</b>	
<b>Center frequency</b> (center frequency between 3 dB points)	$f_c$	804,25	804.5	804,75	MHz
<b>Minimum insertion attenuation</b>	$\alpha_{\min}$	—	6,3	8,3	dB
Phase at $f_c$	$\varphi$	—	140	—	° el.
Loaded quality factor	$Q_L$	3000	3700	—	
Unloaded quality factor	$Q_U$	6300	7500	—	
<b>Ageing of <math>f_c</math></b>		—	—	-10/+40	ppm
<b>Equivalent circuit elements</b>					
Motional capacitance	$C_1$	—	0,293	—	fF
Motional inductance	$L_1$	—	133,8	—	$\mu\text{H}$
Motional resistance	$R_1$	—	91	—	$\Omega$
Input / Output capacitance	$C_0$	—	1,6	—	pF
<b>Temperature coefficient of frequency</b> <sup>1)</sup>	$TC_f$	—	-0,03	—	ppm/K <sup>2</sup>
Turnover temperature	$T_0$	15	—	35	°C

<sup>1)</sup> Temperature dependence of  $f_c$ :  $f_c(T_A) = f_c(T_0)(1 + TC_f(T_A - T_0)^2)$



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**P.O. Box 80 17 09, D-81617 München**

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This brochure replaces the previous edition.

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