

# **SAW Components**

## SAW filter

Short range devices

Series/type: B4041

Ordering code: B39252B4041U410

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Version: 2.2

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SAW Components B4041

SAW filter 2450.00 MHz

**Data sheet** 



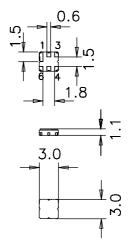
#### **Application**

- Low-loss RF filter for ISM 2450 MHz
- Low amplitude ripple
- Usable passband 97 MHz
- $\blacksquare$  No matching network required for operation at 50  $\Omega$



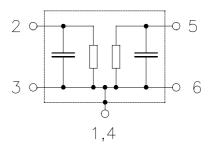
#### **Features**

- Package size 3.0 x 3.0 x 1.1 mm<sup>3</sup>
- Package code DCC6C
- RoHS compatible
- Approximate weight 0.037 g
- Package for Surface Mount Technology (SMT)
- Ni, gold-plated terminals
- Lead free soldering compatible with J STD20C
- Electrostactic Sensitive Device (ESD)



## Pin configuration

- 2 Input
- 5 Output
- 1, 3, 4, 6 To be grounded





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**Characteristics** 

Temperature range for specification:

 $T_A$  = -40 °C to +85 °C  $Z_S$  = 50  $\Omega$   $Z_L$  = 50  $\Omega$ Terminating source impedance: Terminating load impedance:

		min.	typ.	max.	
			@ 25 °C		
Center frequency	f <sub>C</sub>	_	2448.50	_	MHz
Maximum insertion attenuation	$\alpha_{\sf max}$				
2400.00 2497.00 N	ИHz	_	2.9	4.0	dB
Amplitude ripple (p-p)	$\Delta \alpha$				
2400.00 2497.00 N	ИHz	_	1.4	2.7	dB
Attenuation	α				
50.00 1785.00 N	ИHz	15.0	19.0	_	dB
1785.00 2100.00 N	ИHz	18.0	22.0	_	dB
2100.00 2300.00 N	ИHz	24.0	28.0	_	dB
2600.00 2800.00 N	ИHz	22.0	26.0	_	dB
2800.00 3100.00 N	ИHz	24.0	28.0	_	dB
3100.00 4200.00 N	ИHz	20.0	25.0	_	dB
4200.00 5000.00 N	ИHz	7.0	10.0	_	dB

## **Maximum ratings**

Operable temperature range	T <sub>A</sub>	-45/+125	°C	
Storage temperature range	$T_{stg}$	-45/+125	°C	
DC voltage	$V_{DC}$	0	V	
Input power max.	$P_{IN}$	7.5	dBm	source impedance 50 $\Omega$



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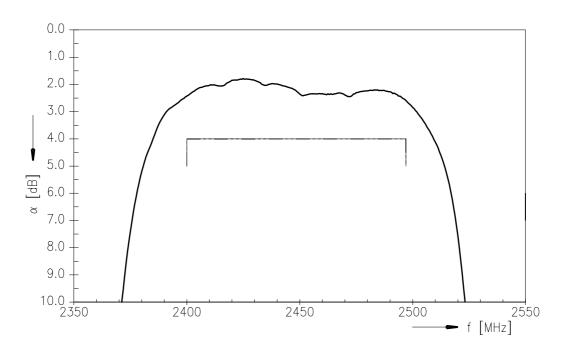
SAW filter

Data sheet

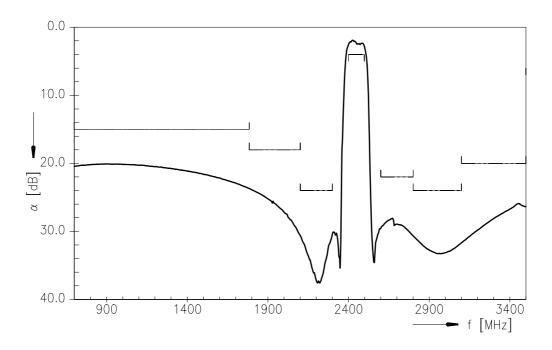
B4041

2450.00 MHz

## Transfer function (passband)



## **Transfer function**





SAW Components

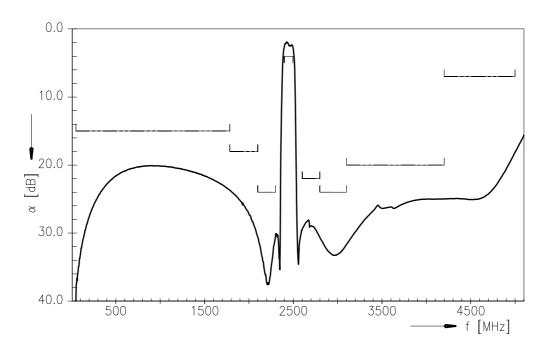
SAW filter

Data sheet

B4041

2450.00 MHz

## Transfer function (wideband)





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#### References

Туре	B4041
Ordering code	B39252B4041U410
Marking and package	C61157-A7-A67
Packaging	F61074-V8168-Z000
Date codes	L_1126
S-parameters	B4041_SB.s2p B4041_WB.s2p
Soldering profile	S_6001
RoHS compatible	defined as compatible with the following documents: "DIRECTIVE 2002/95/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 27 January 2003 on the restriction of the use of certain hazardous substances in electrical and electronic equipment. 2005/618/EC from April 18th, 2005, amending Directive 2002/95/EC of the European Parliament and of the Council for the purposes of establishing the maximum concentration values for certain hazardous substances in electrical and electronic equipment."

For further information please contact your local EPCOS sales office or visit our webpage at www.epcos.com.

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