

418 MHz SMD SAW RESONATOR

ASR418E



RoHS
Compliant



5.0 x 5.0 x 1.35mm

FEATURES:

- Low passband insertion loss
- 5.0 x 5.0 x 1.35mm package
- 50Ω terminating impedance

APPLICATIONS:

- Wireless remote controller
- Mobile communication

STANDARD SPECIFICATIONS:

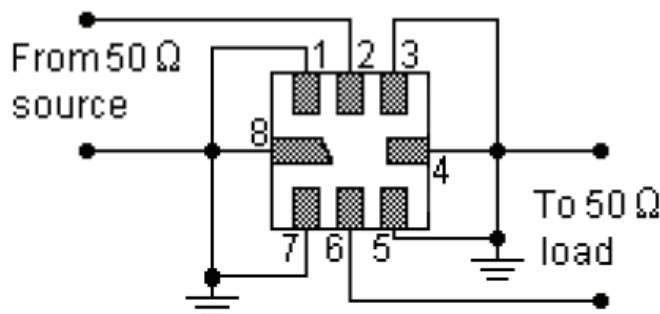
MAXIMUM RATINGS

Item	Value
Operating Temperature Range	-10°C to +60°C
Storage Temperature Range	-40°C to +85°C
DC Voltage Between Terminals	±30 V DC
CW RF Power Dissipation	0 dBm

ELECTRICAL CHARACTERISTICS

Item	Sym.	Min.	Typ.	Max.	Unit	
Center Frequency (+25°C)	Absolute Frequency	f_c	417.925	418.075	MHz	
	Tolerance from 418.000MHz	Δf_c		±75	kHz	
Insertion Loss	IL		1.6	2.0	dB	
Quality Factor	Unloaded Q	Q_U	--	11400		
	50Ω Loaded Q	Q_L	--	1900		
Temperature Stability	Turnover Temperature	T_0	25	55	°C	
	Turnover Frequency	f_0		f_c	kHz	
	Frequency Temperature Coefficient	FTC		0.032		ppm/°C ²
Frequency aging	Absolute Value during the first year	fA		≤10	ppm/yr	
DC Insulation Resistance Between Any Two Terminals			1.0		MΩ	
RF Equivalent RLC Model	Motional Resistance	R_M		20	26	Ω
	Motional Inductance	L_M		86.8558		μH
	Motional Capacitance	C_M		1.6708		fF
	Shunt Static Capacitance	C_0	1.7	2.0	2.3	pF

TEST CIRCUIT:



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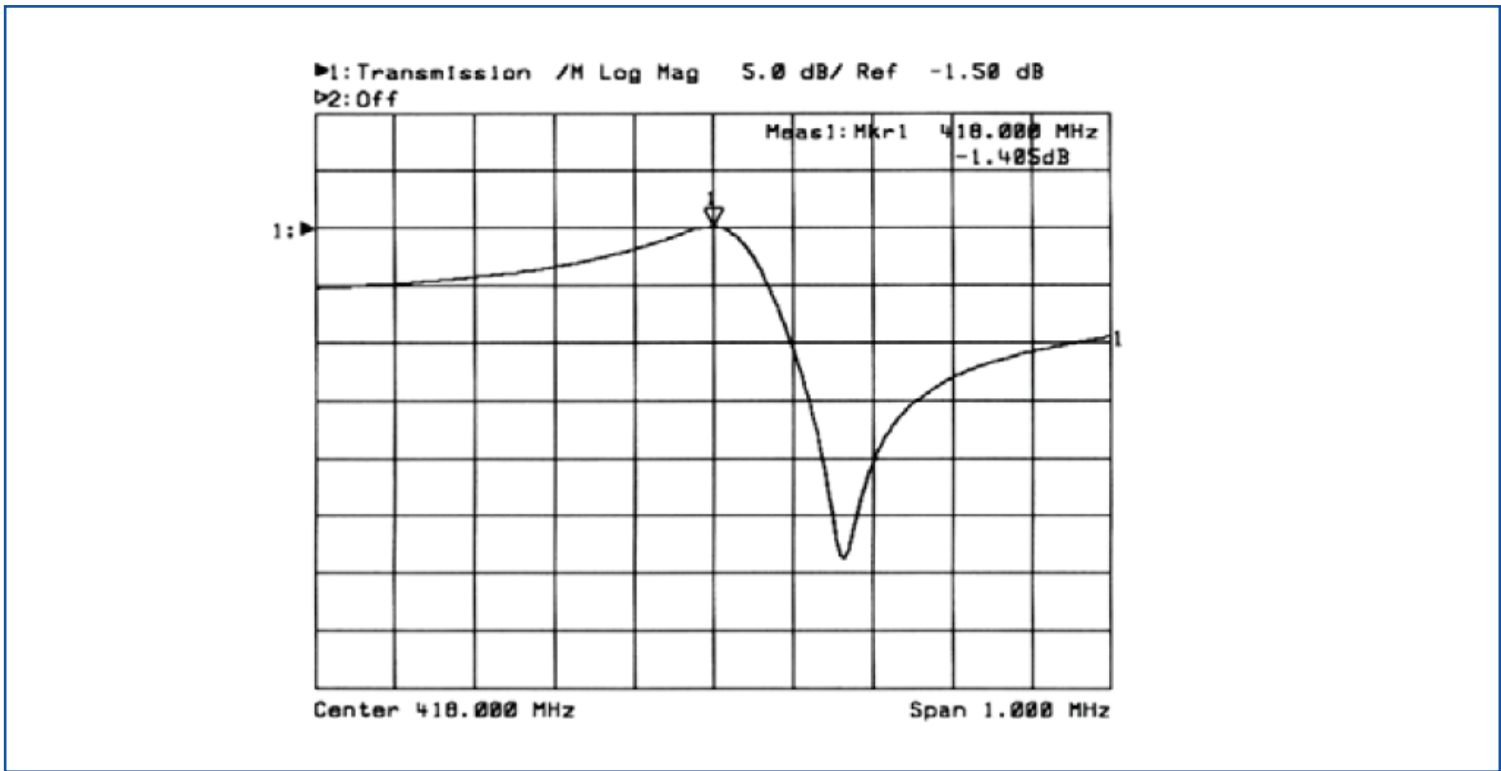
5.0 x 5.0 x 1.3mm

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FREQUENCY CHARACTERISTICS



OUTLINE DIMENSIONS:

Sign	Data (mm)	Sign	Data (mm)
A	2.08	E	1.20
B	0.60	F	1.35
C	1.27	G	5.00
D	2.54	H	5.00

Pins	Configuration
2	Terminal 1
6	Terminal 2
4, 8	Case Ground
1, 3, 5, 7	Empty

RECOMMENDED LAND PATTERN

Unit: mm

Dimension : mm

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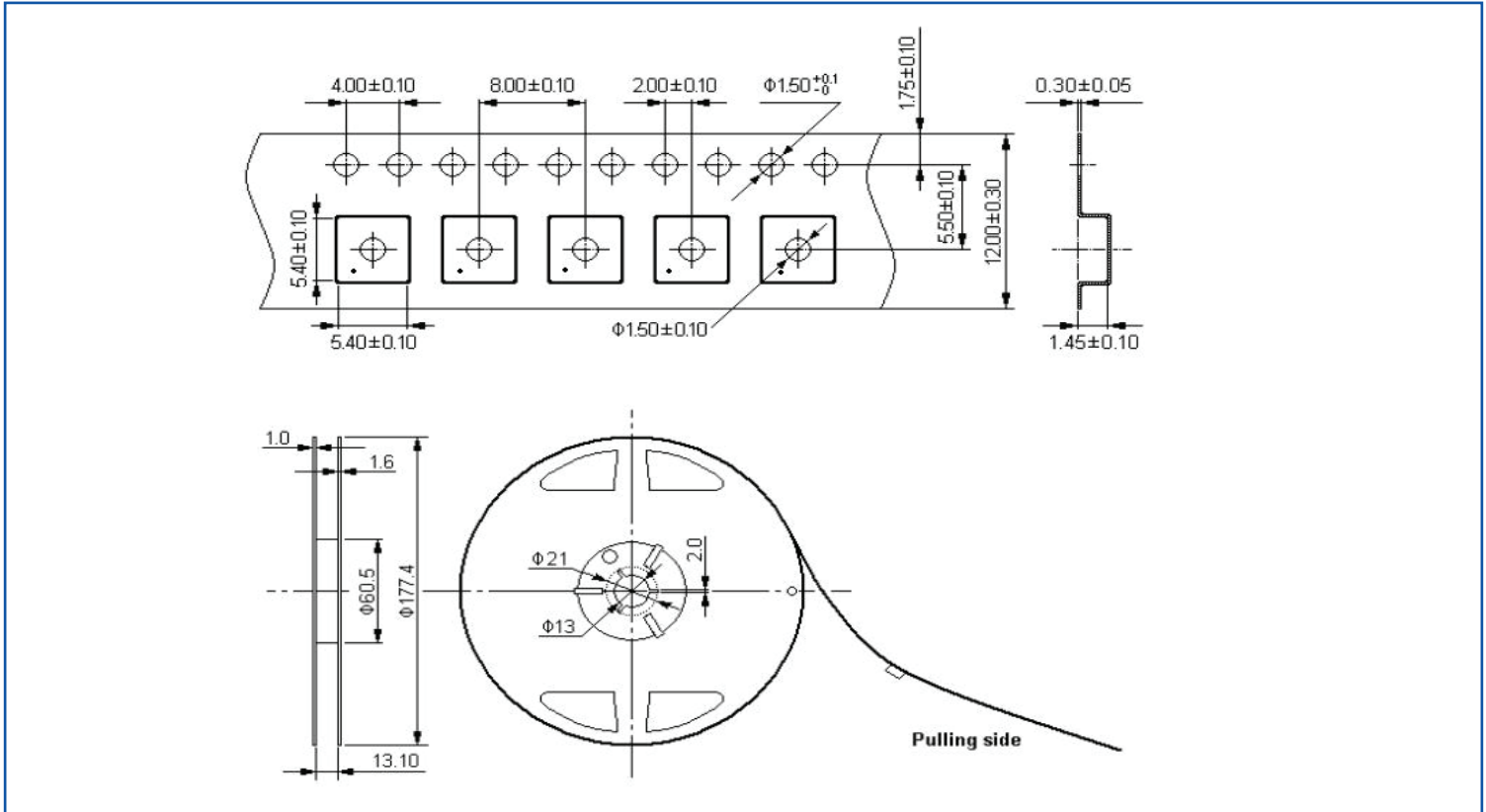


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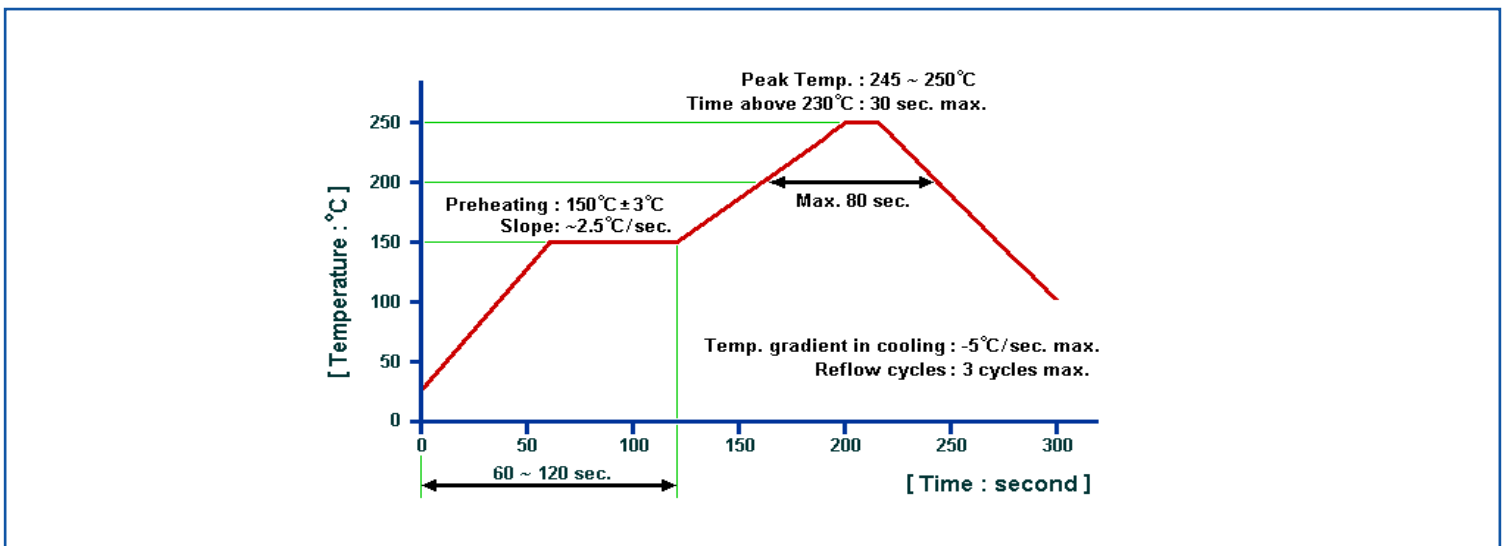


5.0 x 5.0 x 1.3mm

TAPE AND REEL:



REFLOW PROFILE:



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ABRACON IS
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