Approved by
Checked by:
Issued by:

SPECIFICATION

Product: 1-port SAW Resonator

Model: NDR550

NANJING ELECTRONIC DEVICE INSTITUTE
Tel:+86-25-4490216 Fax:+86-25-4582372
E-mail:sales@ndsaw.com http://www.ndsaw.com

1.Feature

*1-port resonator
*Provides reliable, fundamental mode, quartz frequency Stabilization i.e. in transmitters or local oscillators

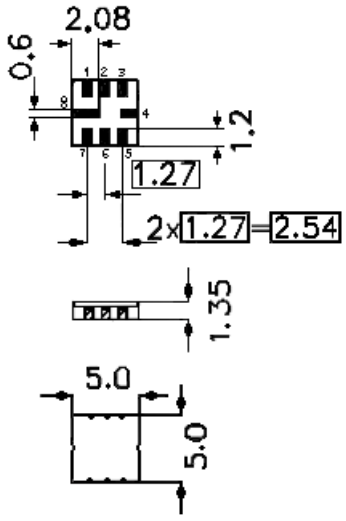
2.Terminals

Ni,gold plated

3.Marking: NDR550

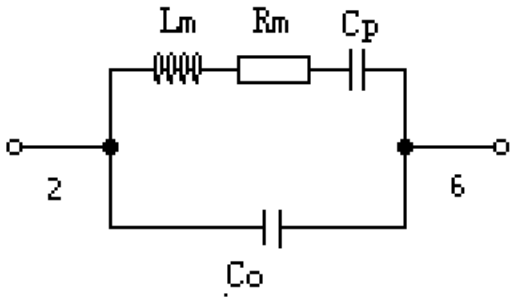
4.Package

Ceramic package QCC8C Dimensions in mm, approx.weight 0.1g



Pin configuration

2 input
6 output
4,8 Ground(case)



NANJING ELECTRONIC DEVICE INSTITUTE
Tel:+86-25-4490216 Fax:+86-25-4582372
E-mail:sales@ndsaw.com http://www.ndsaw.com

5.Performance

5-1.Maximum Rating

DC Voltage V_{DC}	10V
Operation Temperature	-45℃to +85℃
Storage Temperature	-45℃to +85℃
RF Power Dissipation	0 dBm

5-2. Electronic Characteristics

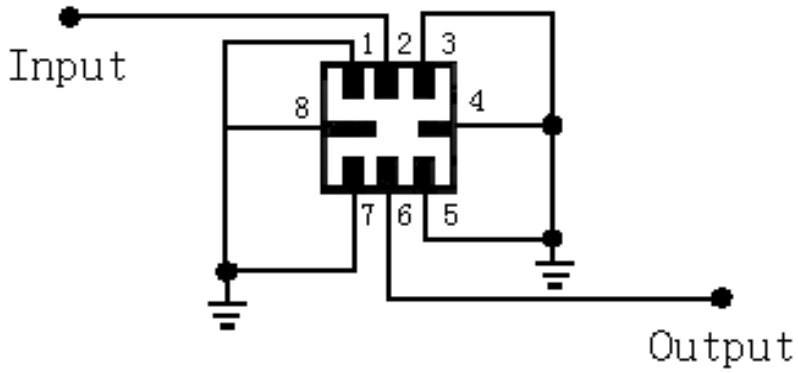
Reference temperature: TA=25℃

Characteristic		Sym	Minimu	Typical	Maximu	Units
Center Frequency (+25℃)	Absolute Frequency	fc	433.845	433.920	433.995	MHz
	Tolerance from 433.92 MHz	Δfc			±75	kHz
Insertion Loss		IL		1.2	1.5	dB
Quality Factor	Unloaded Q	Q_U		12,800		
	50 Ω Loaded Q	Q_L		2,000		
Temperature Stability	Turnover Temperature	T_0	24	39	54	℃
	Turnover Frequency	f_0		fc+2.7		kHz
	Frequency Temperature Coefficient	FTC		0.037		ppm/℃^{2}
Frequency Aging	Absolute Value during the First Year	|fA|		≤10		ppm/yr
DC Insulation Resistance between Any Two Pins			1.0			MΩ
RF Equivalent RLC Model	Motional Resistance	R_M		12	23	Ω
	Motional Inductance	L_M		82.3481		μH
	Motional Capacitance	C_M		1.64228		fF
	Pin 1 to Pin 2 Static	C_o		2.7		pF

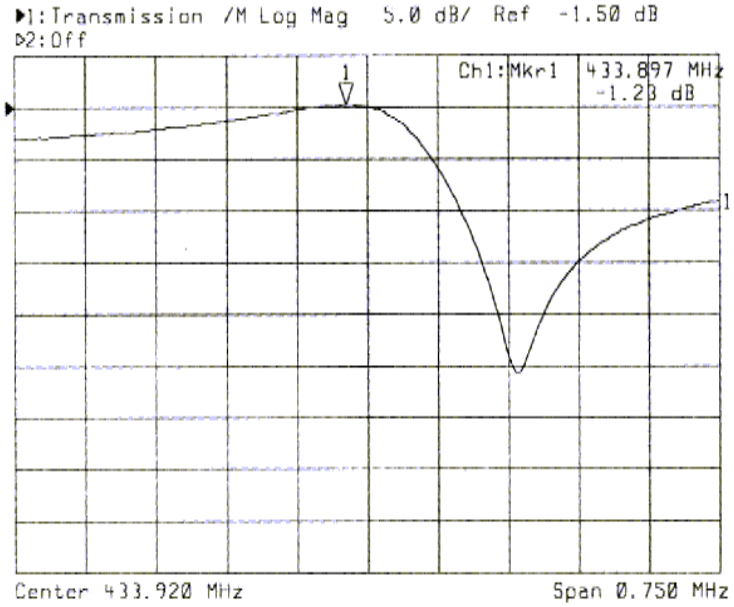
☺ CAUTION: Electrostatic Sensitive Device. Observe precautions for handling

NANJING ELECTRONIC DEVICE INSTITUTE
Tel:+86-25-4490216 Fax:+86-25-4582372
E-mail:sales@ndsaw.com http://www.ndsaw.com

6.Test Circuit



7. Typical Frequency Response



NANJING ELECTRONIC DEVICE INSTITUTE
Tel:+86-25-4490216 Fax:+86-25-4582372
E-mail:sales@ndsaw.com http://www.ndsaw.com