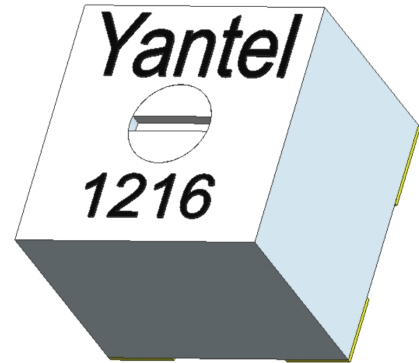


Variable RF Inductor
1216

- ◆ Operated frequency: 160~2100 MHz
- ◆ Q value: 138(no core) , 112(full core)
- ◆ Inductance tuning range: 7.2 to 8.3(nH)
- ◆ Core material: Aluminum
- ◆ SRF: 3.8 GHz
- ◆ Operating temperature: -40°C~+125°C
- ◆ Rotation times(min): 100



Features

- SMD package
- High temperature resistance, operating reliably from -40°C ~125°C and in other harsh environment
- Hermetic microstrip circuit, reliable and stable over temperature and humidity changes.
- Excellent RF performance, operating from 30MHz to 6GHz.
- High Q value, linear tunable, available in increasing or decreasing inductance value
- Built with advanced multi-layer processing, high consistence and high reliability in manufacturing, contributing to good consistence in tuning resonant circuit
- Anti-interference with non-magnetic core, no interference with other devices
- Small size: 3×3×2.5(mm)
- Termination leads: RoHS compliant, tin or golden over copper
- Low cost, high performance

Applications

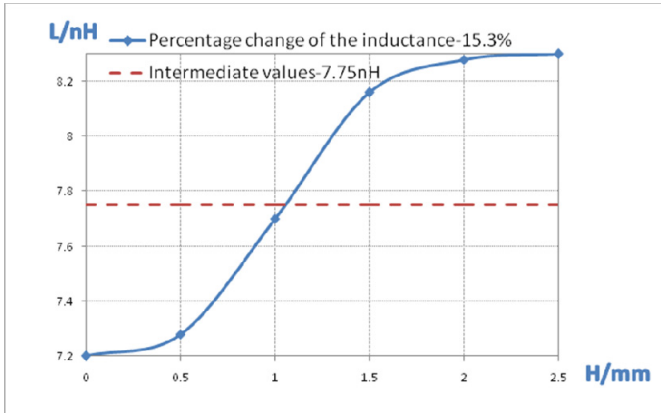
- Super regenerative receiver module
- RF Impedance Matching
- Tunable Antennas
- Tuning Resonant Circuit
- Tunable Filter
- Phase Shifter
- Phased Array Radar
- MRI(Magnetic Resonance Imaging)
- NMR(Nuclear Magnetic Resonance)
- Crystal Oscillator
- Broadband Antenna

| Part No. | No core | | At L max | | At L min | | Freq at max Q (MHz) | Freq Range at 1/2 Qmax | No core SRF min(MHz) | Irms (A) |
|----------|---------|------|----------|------|----------|------|------------------------|---------------------------|-------------------------|-------------|
| | L(nH) | Qmin | L(nH) | Qmin | L(nH) | Qmin | | | | |
| 1216 | 8.3 | 138 | 8.3 | 138 | 7.2 | 112 | 1100 | 160~2100 | 3800 | 1.7 |

Notes:

1. Operating frequency is based on the half of the maximum Q value.

Inductance VS The height of the core rotation

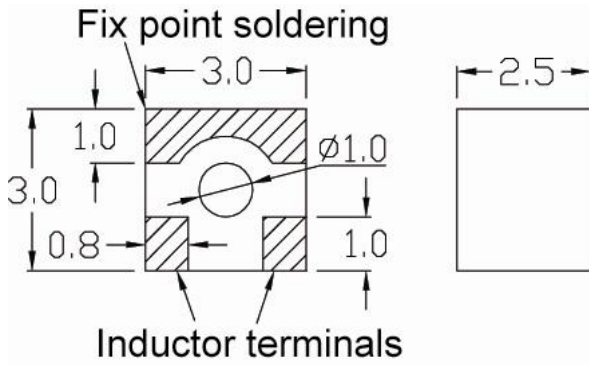


Notes

- H represents the height of Al core rotation, H max=2.5mm.
- Inductance changes around the intermediate value.

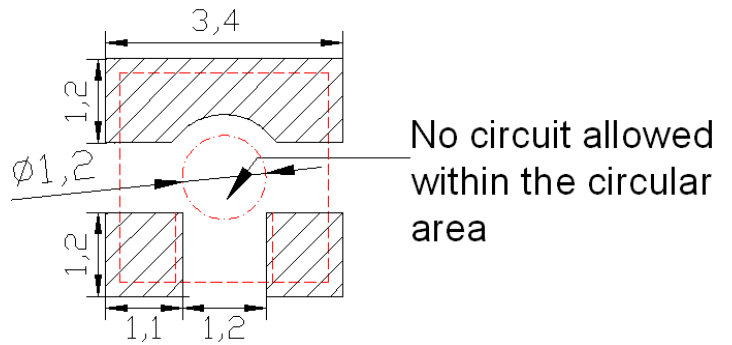
Package Outlines

All dimensions shown in mm unless stated otherwise



Recommended Layout

All dimensions shown in mm unless stated otherwise



Tape and Reel Drawing

