



CHIP COIL

Wire Wound Chip Coil **LQW1608A** Series for High Frequency

High-Q and Tight Inductance Tolerance ($\pm 0.2\text{nH}$ or $\pm 2\%$) Ultra Small Wire Wound Air-core Chip Coil

The LQW1608A series which consists of air-core chip coil using a miniature alumina core.

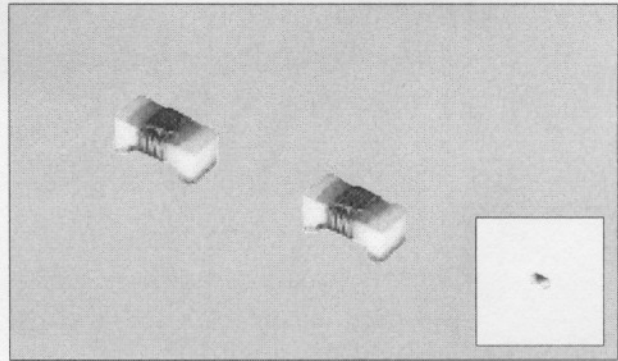
The tight inductance tolerance ($\pm 0.2\text{nH}$, $\pm 2\%$) is available due to Murata's original winding technology. The series has high Q value and high self resonant frequency in high frequency range. It is suitable for high frequency circuits which are used in telecommunication equipment.

■FEATURES

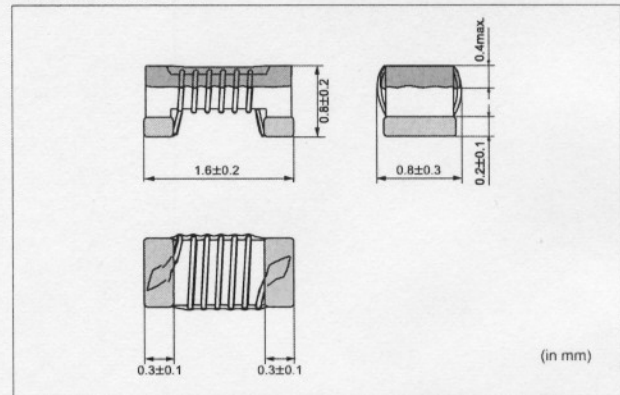
1. Horizontal winding structure enables tight inductance tolerance ($\pm 0.2\text{nH}$, $\pm 2\%$). Stable circuit operation is possible.
2. Broad range of inductance (3.9nH to 220nH).
3. The subminiature dimensions (1.6X0.8mm) allow high density mounting.
4. The high self resonant frequency realizes high-Q value and stable inductance at high frequency.
5. Low DC resistance design is ideal for low loss, high output and low power consumption.
4. Resin-coated surface enables excellent mounting.

■APPLICATIONS

- High frequency circuit in telecommunication equipment, such as DECT, PHS, PCS, PCN, GSM and CDMA.
- Impedance Matching—Power-AMP Module (PA), SAW filter
- Resonance circuits—VCO



■DIMENSIONS



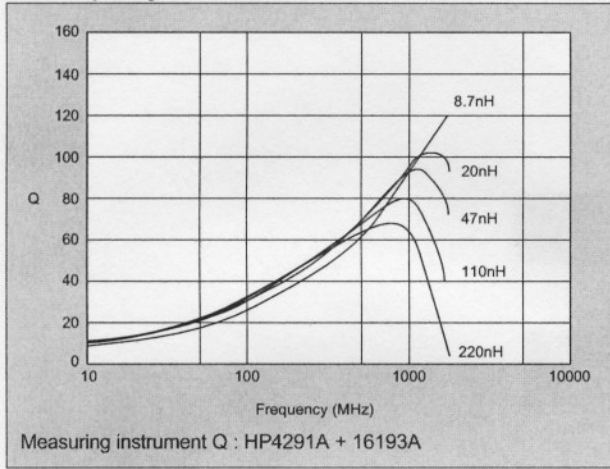
■ SPECIFICATIONS

Part Number	Inductance			Q			DC Resistance (Ω max.)	Self-resonant Frequency (MHz min.)	Allowable Current (mA)	Operating Temp. Range									
	Nominal Value (nH)	Tolerance	Test Frequency (MHz)	Nominal Value (min.)	Test Frequency (MHz)	300 (MHz) Typical					800 (MHz) Typical	1.5 (GHz) Typical							
LQW1608A2N2D00	2.2	±0.5nH	100	16	100	45	80	110	0.049	6000	700								
LQW1608A3N6D(C)00	3.6	±0.5nH (±0.2nH)		25															
LQW1608A3N9D(C)00	3.9																		
LQW1608A4N3D(C)00	4.3																		
LQW1608A4N7D00	4.7	±0.5nH	100	35	45	75	95	0.059	6000	850									
LQW1608A5N6D(C)00	5.6	±0.5nH (±0.2nH)																	
LQW1608A6N2D(C)00	6.2																		
LQW1608A6N8D(C)00	6.8																		
LQW1608A7N5D00	7.5	±0.5nH																	
LQW1608A8N2D00	8.2																		
LQW1608A8N7D00	8.7																		
LQW1608A9N1D00	9.1																		
LQW1608A9N5D00	9.5																		
LQW1608A10NJ(G)00	10	±5% (±2%)									100	40	250	50	85	100	0.11	6000	650
LQW1608A11NJ(G)00	11																		
LQW1608A12NJ(G)00	12																		
LQW1608A13NJ(G)00	13																		
LQW1608A15NJ(G)00	15																		
LQW1608A16NJ(G)00	16																		
LQW1608A18NJ(G)00	18																		
LQW1608A20NJ(G)00	20																		
LQW1608A22NJ(G)00	22																		
LQW1608A24NJ(G)00	24																		
LQW1608A27NJ(G)00	27																		
LQW1608A30NJ(G)00	30																		
LQW1608A33NJ(G)00	33																		
LQW1608A36NJ(G)00	36																		
LQW1608A39NJ(G)00	39																		
LQW1608A43NJ(G)00	43																		
LQW1608A47NJ(G)00	47																		
LQW1608A51NJ(G)00	51																		
LQW1608A56NJ(G)00	56																		
LQW1608A62NJ(G)00	62																		
LQW1608A68NJ(G)00	68																		
LQW1608A72NJ(G)00	72																		
LQW1608A75NJ(G)00	75																		
LQW1608A82NJ(G)00	82																		
LQW1608A91NJ(G)00	91																		
LQW1608AR10J(G)00	100																		
LQW1608AR11J(G)00	110																		
LQW1608AR12J(G)00	120																		
LQW1608AR13J(G)00	130																		
LQW1608AR15J(G)00	150																		
LQW1608AR16J(G)00	160																		
LQW1608AR18J(G)00	180																		
LQW1608AR20J(G)00	200																		
LQW1608AR22J(G)00	220																		

-25 to +85°C

■ TYPICAL ELECTRICAL CHARACTERISTICS

● Q-Frequency Characteristics



● Inductance - Frequency Characteristics

