

Features

1. Coil body of ceramic material.
2. Contact area of pure tin with a nickel barrier layer.
3. Windings are created by laser-cutting of the copper layer and are –for protection – completely lacquer-coated.
4. Lead Free (RoHS Compliance)

Applications

Typical applications are resonant circuits or impedance matching for video cameras, mobile telephones and antenna amplifiers etc

Ordering Information

5514	270	*	4	51
(1)	(2)	(3)	(4)	

(1) Series

- 5514 : Size 0402 (1005), Laser-trimmed.

(4) Delivery Form

4 : coated, taped on 8 mm cardboard tape packing unit reels Φ 180mm, 10.000 pcs.

(2) Inductance Value

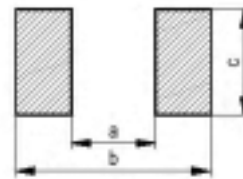
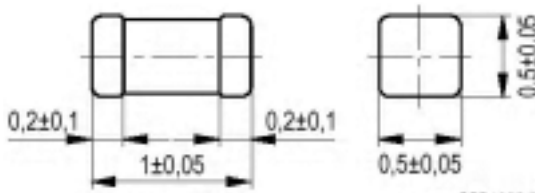
example: $27 \times 10^x = 27 \times 10^0 = 27 \text{ (nH)}$

(3) Inductance Tolerance

8 : ± 0.2 nH	3 : $\pm 5\%$
9 : ± 0.3 nH	4 : $\pm 2\%$

Shape and Dimensions (mm)

Pad Layout Recommendation



a	b	c
$0,55 \pm 0,05$	$1,6 \pm 0,1$	$0,55 \pm 0,05$

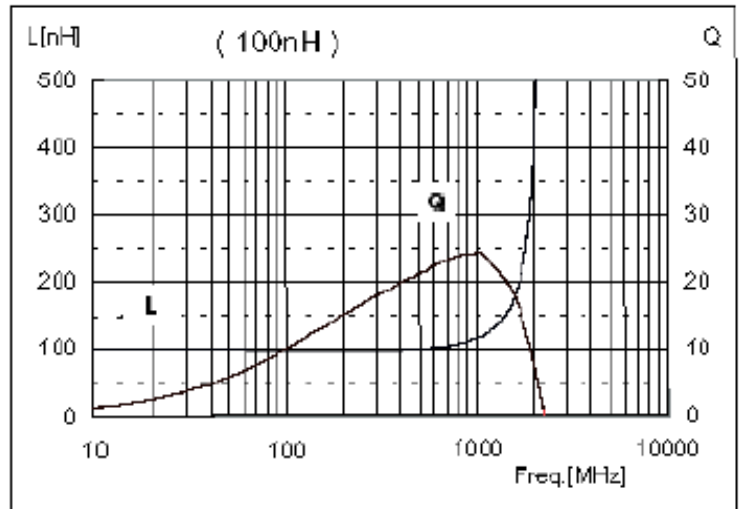
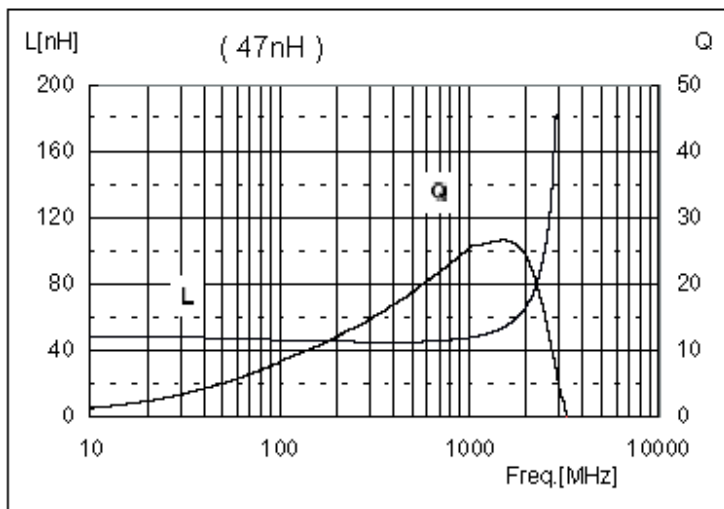
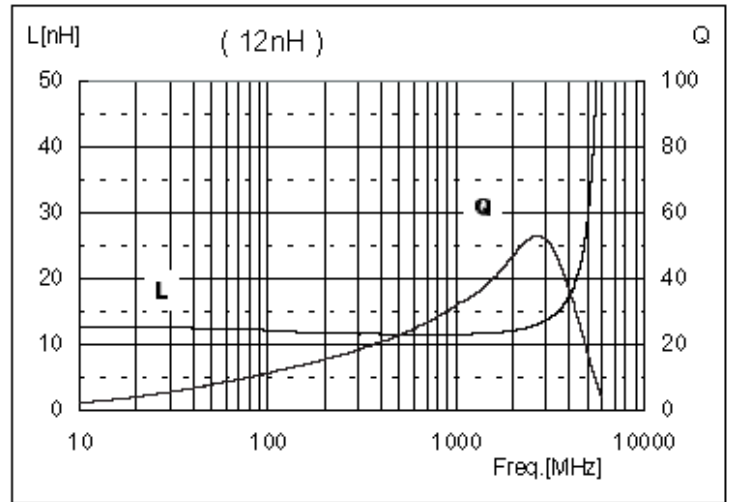
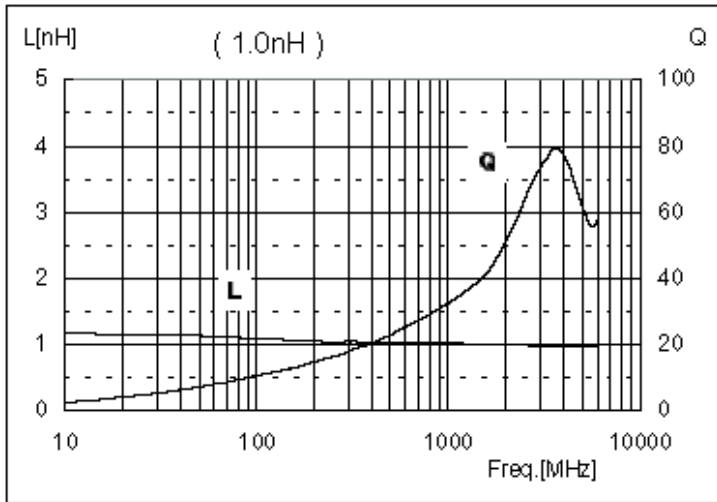
Electrical Parameters

Order No.	L [nH]	Q _{min}	Q _{typ} @800MHz	f _{L,Q} [MHz]	f _{res,min} [MHz]	D.C.R. max. [mΩ]	I _{N,max} [mA]	Tol. [%]
5514 010 *4 51	1,0	8	21	100	6000	50	400	±0,2 /0,3 nH
5514 012 *4 51	1,2	8	21	100	6000	60	400	±0,2 /0,3 nH
5514 015 *4 51	1,5	8	21	100	6000	70	400	±0,2 /0,3 nH
5514 018 *4 51	1,8	8	21	100	6000	80	400	±0,2 /0,3 nH
5514 022 *4 51	2,2	8	21	100	6000	80	400	±0,2 /0,3 nH
5514 027 *4 51	2,7	8	21	100	5500	100	400	±0,2 /0,3 nH
5514 033 *4 51	3,3	8	21	100	5500	120	400	±0,2 /0,3 nH
5514 039 *4 51	3,9	8	20	100	5200	150	360	±0,2 /0,3 nH
5514 047 *4 51	4,7	8	20	100	4800	170	360	±0,2 /0,3 nH
5514 056 *4 51	5,6	8	20	100	4600	190	340	±0,2 /0,3 nH
5514 068 *4 51	6,8	8	19	100	4000	300	320	±0,2 nH/ 5%
5514 082 *4 51	8,2	8	19	100	3500	350	320	±0,2 nH / 5%
5514 100 *4 51	10	8	19	100	2800	410	320	2 % / 5 %
5514 120 *4 51	12	8	19	100	2800	450	320	2 % / 5 %
5514 150 *4 51	15	8	19	100	2500	600	240	2 % / 5 %
5514 180 *4 51	18	8	19	100	2200	700	240	2 % / 5 %
5514 220 *4 51	22	8	19	100	2000	800	200	2 % / 5 %
5514 270 *4 51	27	8	19	100	1800	1200	200	2 % / 5 %
5514 330 *4 51	33	8	18	100	1800	1400	170	2 % / 5 %
5514 390 *4 51	39	8	18	100	1800	1700	150	2 % / 5 %
5514 470 *4 51	47	8	17	100	1800	2100	140	2 % / 5 %
5514 560 *4 51	56	8	17	100	1500	2500	130	5 %
5514 680 *4 51	68	8	15	100	1500	4000	120	5 %
5514 820 *4 51	82	8	15	100	1400	4500	110	5 %
5514 101 *4 51	100	8	14	100	1200	5500	90	5 %

All values on ceramic core.

Electrical Characteristic Curves

Typical Inductance / Q factor vs. frequency



Climatic category acc. to DIN IEC 68-1:55/125/56

Test equipment : Inductance and Q: Agilent 4291A+16096A.

Resonant Frequency : Agilent 8720.

D.C.R. : Burst Resistomat 2329.(at20°C)