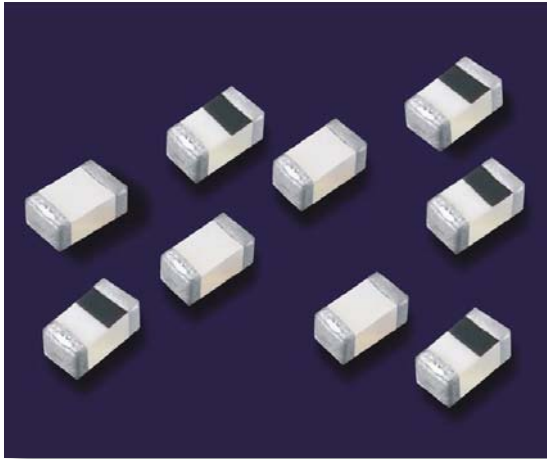


# RF CERAMIC CHIP INDUCTORS



Polarity Half-Marked Inductors (0201 only)

High frequency multi-layer chip inductors feature a monolithic body made of low loss ceramic and high conductivity metal electrodes to achieve optimal high frequency performance.

These RF chip inductors are compact in size and feature lead-free tin plated nickel barrier terminations and tape and reel packaging which makes them ideal for small size/high volume wireless applications.

## APPLICATIONS & FEATURES

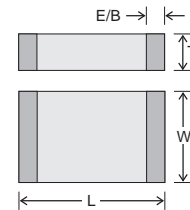
- CELL/PCS Modules
- Broadband Components
- RF Tranceivers
- RoHS Compliant (Standard, "V" Code)
- Sn/Pb Terminations Optional ("T" Code)
- Wireless LAN
- RFID

## PRODUCT RANGE SUMMARY

EIA SIZE (mm)	SIZE CODE	L RANGE	Q FACTOR (Min.)	SRF (Typ.)	TEMPERATURE
0201 (0603)	L-05	0.6 - 39 nH	4 (100 MHz)	>21 GHz (1.0 nH)	-40°C to +100°C
0402 (1005)	L-07	1.0 - 120 nH	8 (100 MHz)	>21 GHz (1.0 nH)	-40°C to +100°C
0603 (1608)	L-14	1.0 - 220 nH	12 (100 MHz)	>23 GHz (1.0 nH)	-40°C to +100°C

## MECHANICAL CHARACTERISTICS

	0201 (0603)		0402 (1005)		0603 (1608)	
	Inches	mm	Inches	mm	Inches	mm
Length	.024 ±.001"	(0.6 ±0.03)	.039 ±.004"	(1.00 ±.10)	.063 ±.006"	(1.60 ±.15)
Width	.012 ±.001"	(0.3 ±0.03)	.020 ±.004"	(0.50 ±.10)	.031 ±.006"	(0.80 ±.15)
Thickness	.012 ±.001"	(0.3 ±0.03)	.020 ±.004"	(0.50 ±.10)	.031 ±.006"	(0.80 ±.15)
End Band	.006 ±.002"	(0.15 ±0.05)	.009 ±.004"	(0.23 ±.10)	.012 ±.008"	(0.30 ±.20)

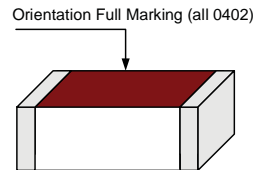


## HOW TO ORDER

DEVICE	SIZE	TYPE	VALUE	TOLERANCE	TERMINATION	MARKING	TAPE & REEL																				
Inductor	05 = 0201 07 = 0402 14 = 0603	B = Polarity Half-Marked (all 0201) C = 0402 and 0603 (see "Marking")	See Table	C = ± 0.2 nH ≤ 1.0 nH S = ± 0.3 nH 1.0 to 5.6 nH J = ± 5% 6.8 nH and above K = ± 10% 3.3 nH and above	V = Ni/Sn T = Ni / SnPb	4 = No Marking (all 0603) 6 = Orientation Mark (all 0201 and 0402*)	<table border="1"> <thead> <tr> <th>Size</th> <th>Code</th> <th>Tape</th> <th>Reel</th> <th>Qty</th> </tr> </thead> <tbody> <tr> <td>0201</td> <td>T</td> <td>Paper</td> <td>7"</td> <td>15,000</td> </tr> <tr> <td>0402</td> <td>T</td> <td>Paper</td> <td>7"</td> <td>10,000</td> </tr> <tr> <td>0603</td> <td>T</td> <td>Paper</td> <td>7"</td> <td>4,000</td> </tr> </tbody> </table>	Size	Code	Tape	Reel	Qty	0201	T	Paper	7"	15,000	0402	T	Paper	7"	10,000	0603	T	Paper	7"	4,000
Size	Code	Tape	Reel	Qty																							
0201	T	Paper	7"	15,000																							
0402	T	Paper	7"	10,000																							
0603	T	Paper	7"	4,000																							

Part number written: L-07C10NJV6T

\*Please note that all 0402 inductors (L-07C) have orientation full marking only.



## RF CHIP INDUCTOR SELECTION CHART

Inductor Value		EIA Size	0201 (L-05)	0402 (L-07)	0603 (L-14)	
Inductance nH	Code	Tolerance				
0.6	0N6	C	300 mA			
0.7	0N7		300 mA			
0.8	0N8		300 mA			
0.9	0N9		300 mA			
1.0	1N0		300 mA	300 mA	300 mA (S only)	
1.2	1N2	S	300 mA	300 mA (S only)	300 mA (S only)	
1.3	1N3		300 mA			
1.5	1N5		300 mA	300 mA (S only)	300 mA (S only)	
1.8	1N8	S	300 mA	300 mA	300 mA	
1.9	1N9		300 mA	300 mA		
2.0	2N0		300 mA	300 mA		
2.2	2N2		300 mA	300 mA	300 mA	
2.3	2N3		300 mA			
2.4	2N4		300 mA	300 mA		
2.5	2N5		300 mA			
2.7	2N7		300 mA	300 mA	300 mA	
3.0	3N0		K	300 mA	300 mA	
3.3	3N3			300 mA	300 mA	300 mA
3.6	3N6	300 mA		300 mA		
3.7	3N7	300 mA				
3.9	3N9	300 mA		300 mA	300 mA	
4.3	4N3	S			300 mA	
4.7	4N7			300 mA	300 mA	300 mA
5.1	5N1			300 mA	300 mA	
5.6	5N6			300 mA	300 mA	300 mA
6.2	6N2				300 mA	
6.8	6N8	J	250 mA	250 mA	300 mA	
7.5	7N5			250 mA		
8.2	8N2		250 mA	250 mA	300 mA	
10	10N		250 mA	250 mA	300 mA	
12	12N		250 mA	250 mA	300 mA	
13	13N		250 mA	250 mA		
15	15N		250 mA	250 mA	300 mA	
18	18N		200 mA	200 mA	300 mA	
20	20N		200 mA	200 mA		
22	22N		200 mA	200 mA	300 mA	
23	23N			200 mA		
27	27N		200 mA	200 mA	300 mA	
33	33N		200 mA	200 mA	300 mA	
39	39N		200 mA	150 mA	300 mA	
43	43N		K		150 mA	
47	47N				150 mA	300 mA
56	56N				150 mA	300 mA
68	68N				100 mA	300 mA
82	82N				100 mA	300 mA
100	R10				100 mA	300 mA
120	R12			100 mA	300 mA	
150	R15				300 mA	
180	R18				300 mA	
220	R22				300 mA	
270	R27					
330	R33					
390	R39					
420	R42					
560	R56					
680	R68					

Consult factory for Non-Standard values.

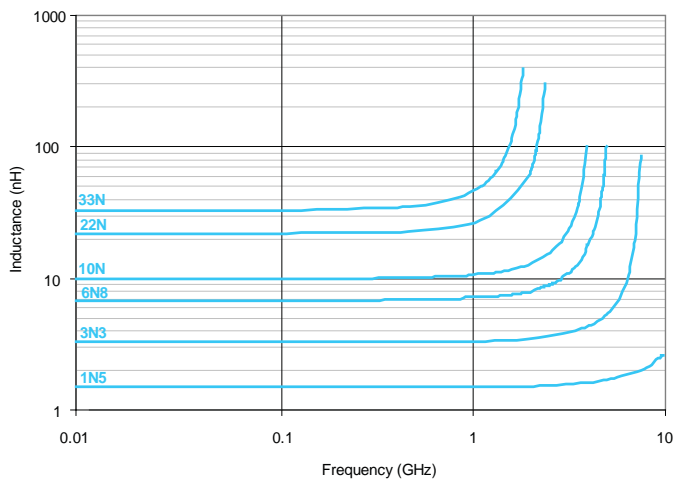
See web page for Chip Inductor Product Detail Summary by part number



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# RF CHARACTERISTICS CHARACTERISTICS (TYPICAL)

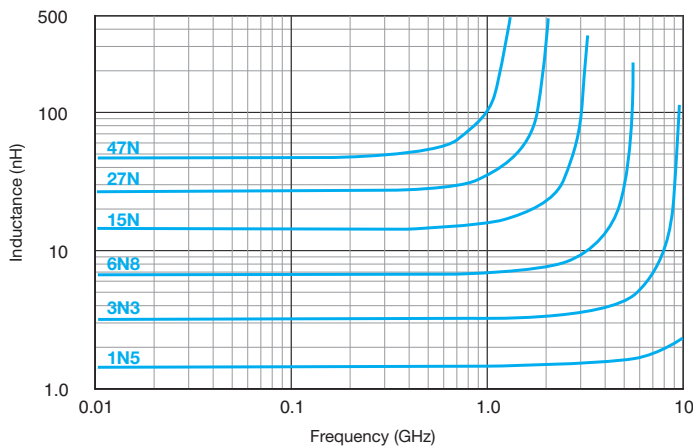
INDUCTANCE VS FREQUENCY: SIZE 0201



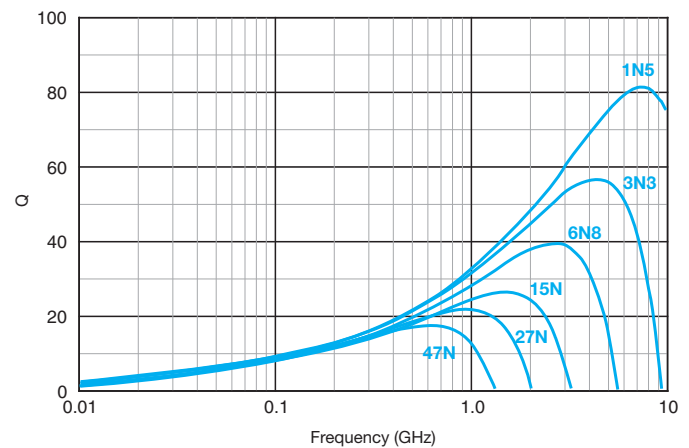
Q VS FREQUENCY: SIZE 0201



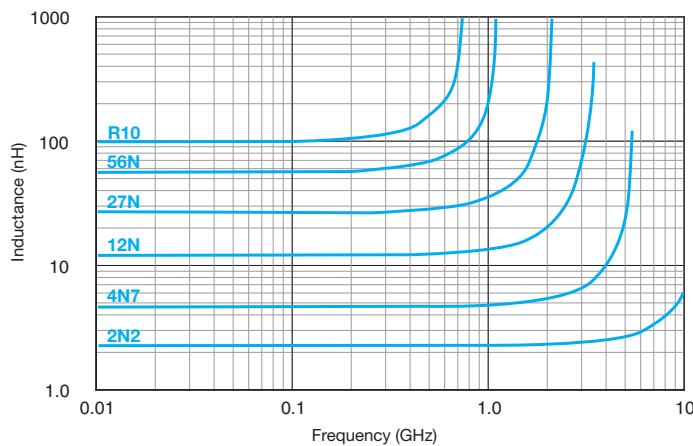
INDUCTANCE VS FREQUENCY: SIZE 0402



Q VS FREQUENCY: SIZE 0402



INDUCTANCE VS FREQUENCY: SIZE 0603



Q VS FREQUENCY: SIZE 0603

