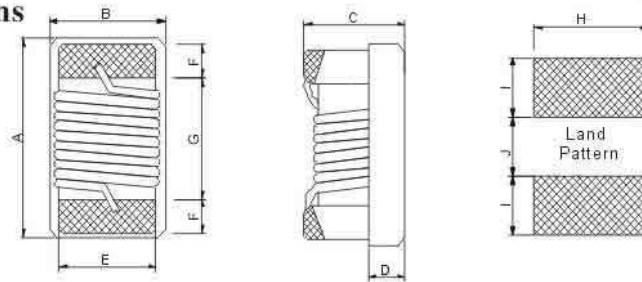




## ● Shapes and Dimensions (形状及尺寸)



UNIT:mm

F H	0 6 0 3	C S	1 R 8	J	R	S	L F
1	2	3		4	5		
SERIES NAME	DIMENSIONS	INDUCTANCE		TOLERANCE CODE	PACKING CODE		SERIES系列品
				J: ±5%, K: ±10%, L: ±15% M: ±20%, P: ±25%, N: ±30%	R: Tape&Reel (卷装)		LF无铅
品名	尺寸	电感值		公差	包装		

	A max	B max	C max	D ref	E	F	G	H	I	J
FN0402CS	1.19	0.70	0.66	0.25	0.51	0.23	0.56	0.66	0.36	0.46
FN0603CS	1.8	1.12	1.02	0.38	0.76	0.33	0.86	1.02	0.64	0.64
FN0805CS	2.29	1.73	1.52	0.51	1.27	0.51	1.02	1.78	1.02	0.76
FN1008CS	2.92	2.79	2.03	0.51	2.03	0.51	1.52	2.54	1.02	1.27

## ● Introduction And Application

Wire-wound chip inductors offer the best overall combination of low cost, close tolerance, better Q factor and high SRF than multilayer chip inductor which are widely used in communication and wireless application

For high-frequency application such as:

Mobile phones; wireless phones; cordless phones; PHS & 2.4GHz applications

## ● 描述及产品应用

绕线式晶片电感比积层式电感在通讯与无线通讯产品应用上提供更全面的低成本、感量公差小、高Q值与SRF值的组合。

手机、家用式无线电话、PHS与2.4GHz的无线产品应用。

## ● Feature

High frequency applications

Close tolerance application. Tolerance of 2% is available for particular inductance values.

Small footprint as well as low profile

High Q factor

Available for custom values

Material available for ceramic or ferrite

## ● 特性

高频与低公差应用，最小感量公差可达到2%

角距小、高度低

高Q值

能提供客制产品

可以使用陶瓷与镍锌材质来进行绕制

## ● Test Equipment and Conditions

Inductance measured by using HP-4286A LCR meter with HP-16193A test fixture.

Q measured with HP-4291B impedance analyzer.

According to EIA-481 standard.

## ● 测试仪器和条件

电感量是藉由HP-4286A LCR测试仪与HP-16193A制具来进行测试。

Q值是藉由HP-4291B阻抗分析仪来进行测试。

包装符合EIA-481标准。



# FN0603CS



Part Number <sup>1</sup> 品名	Inductance <sup>2</sup> (nH) 电感值	Tolerance <sup>3</sup> 公差	Q <sup>4</sup> min <sup>4</sup> 品质因数	900MHz		1.7GHz		SRF min <sup>5</sup> (MHz) 自谐频率	DCR max <sup>6</sup> (Ohms) 直流阻抗	I <sub>rms</sub> <sup>7</sup> (mA) 额定电流	Color code 色码
				L <sub>typ</sub>	Q <sub>typ</sub> <sup>1</sup>	L <sub>typ</sub>	Q <sub>typ</sub> <sup>1</sup>				
FN0603CS-1N6X_L_L	1.6@ 250 MHz	5	24	1.67	49	1.65	63	12500	0.030	700	Red
FN0603CS-1N8X_L_L	1.8@ 250 MHz	5	16	1.63	35	1.63	50	12500	0.045	700	Black
FN0603CS-2N2X_L_L	2.2@ 250 MHz	5	13	2.22	31	2.24	44	12500	0.250	100	Yellow
FN0603CS-3N3X_L_L	3.3@ 250 MHz	5.2	35	3.31	75	3.38	88	5900	0.045	700	Blue
FN0603CS-3N6X_L_L	3.6@ 250 MHz	5.2	22	3.72	53	3.71	65	5900	0.063	700	Red
FN0603CS-3N9X_L_L	3.9@ 250 MHz	5.2	22	3.95	49	3.96	67	6900	0.080	700	Brown
FN0603CS-4N3X_L_L	4.3@ 250 MHz	5.2	22	4.32	50	4.33	70	5900	0.063	700	Orange
FN0603CS-4N7X_L_L	4.7@ 250 MHz	5.2	20	4.72	47	4.75	57	5800	0.116	700	Violet
FN0603CS-5N1X_L_L	5.1@ 250 MHz	5.2	20	4.93	47	4.95	56	5700	0.140	700	Green
FN0603CS-5N6X_L_L	5.6@ 250 MHz	5.2	20	5.53	56	5.86	77	5800	0.170	700	Black
FN0603CS-6N8X_L_L	6.8@ 250 MHz	5.2	27	6.75	60	7.1	81	5800	0.110	700	Red
FN0603CS-7N5X_L_L	7.5@ 250 MHz	5.2	28	7.7	60	7.82	65	4800	0.106	700	Brown
FN0603CS-8N2X_L_L	8.2@ 250 MHz	5.2	28	8.3	60	8.5	60	4700	0.109	700	Orange
FN0603CS-8N7X_L_L	8.7@ 250 MHz	5.2	28	8.86	62	9.32	58	4600	0.109	700	Yellow
FN0603CS-9N5X_L_L	9.5@ 250 MHz	5.2	28	9.7	59	9.92	61	5400	0.135	700	Blue
FN0603CS-10NX_L_L	10@ 250 MHz	5.2	31	10.0	66	10.6	83	4800	0.130	700	Orange
FN0603CS-11NX_L_L	11@ 250 MHz	5.2	33	11	53	11.5	56	4000	0.086	700	Gray
FN0603CS-12NX_L_L	12@ 250 MHz	5.2	35	12.3	72	13.5	83	4000	0.130	700	Yellow
FN0603CS-15NX_L_L	15@ 250 MHz	5.2	35	15.4	64	16.8	89	4000	0.170	700	Green
FN0603CS-16NX_L_L	16@ 250 MHz	5.2	34	16.2	55	17.3	52	3300	0.104	700	White
FN0603CS-18NX_L_L	18@ 250 MHz	5.2	35	18.7	70	21.4	69	3100	0.170	700	Blue
FN0603CS-22NX_L_L	22@ 250 MHz	5.2	38	22.8	73	26.1	71	3000	0.190	700	Violet
FN0603CS-23NX_L_L	23@ 250 MHz	5.2	38	24.1	71	28	67	2850	0.190	700	Orange
FN0603CS-24NX_L_L	24@ 250 MHz	5.2	37	24.5	45	28.7	39	2650	0.135	700	Black
FN0603CS-27NX_L_L	27@ 250 MHz	5.2	40	29.2	74	34.6	65	2800	0.220	600	Gray
FN0603CS-30NX_L_L	30@ 250 MHz	5.2	37	31.4	47	39.9	28	2250	0.144	600	Brown
FN0603CS-33NX_L_L	33@ 250 MHz	5.2	40	36	67	49.5	42	2300	0.220	600	White
FN0603CS-36NX_L_L	36@ 250 MHz	5.2	38	39.4	47	52.7	24	2080	0.250	600	Red
FN0603CS-39NX_L_L	39@ 250 MHz	5.2	40	42.7	60	60.2	40	2200	0.250	600	Black
FN0603CS-43NX_L_L	43@ 250 MHz	5.2	39	47	44	64.9	21	2000	0.280	600	Orange
FN0603CS-47NX_L_L	47@ 200 MHz	5.2	38	52.5	62	77.2	35	2000	0.280	600	Brown
FN0603CS-51NX_L_L	51@ 200 MHz	5.2	35	55.5	69	82.2	34	1900	0.270	600	Blue
FN0603CS-56NX_L_L	56@ 200 MHz	5.2	38	62.5	56	97	26	1900	0.310	600	Red
FN0603CS-68NX_L_L	68@ 200 MHz	5.2	37	80.5	54	168	21	1700	0.340	600	Orange
FN0603CS-72NX_L_L	72@ 150 MHz	5.2	34	82	53	135	20	1700	0.490	400	Yellow
FN0603CS-82NX_L_L	82@ 150 MHz	5.2	34	96.2	54	177	21	1700	0.540	400	Green
FN0603CS-R10X_L_L	100@ 150 MHz	5.2	34	124	49	-	-	1400	0.580	400	Blue
FN0603CS-R11X_L_L	110@ 150 MHz	5.2	32	138	43	-	-	1350	0.610	300	Violet
FN0603CS-R12X_L_L	120@ 150 MHz	5.2	32	166	39	-	-	1300	0.750	300	Gray
FN0603CS-R15X_L_L	150@ 150 MHz	5.2	28	250	25	-	-	990	0.920	280	White
FN0603CS-R18X_L_L	180@ 100 MHz	5.2	25	305	22	-	-	990	1.250	240	Black
FN0603CS-R20X_L_L	200@ 100 MHz	5.2	25	-	-	-	-	900	1.980	200	Green
FN0603CS-R21X_L_L	210@ 100 MHz	5.2	27	-	-	-	-	895	2.060	200	Gray
FN0603CS-R22X_L_L	220@ 100 MHz	5.2	25	-	-	-	-	900	2.100	200	Brown
FN0603CS-R25X_L_L	250@ 100 MHz	5.2	25	-	-	-	-	822	3.550	120	Violet
FN0603CS-R27X_L_L	270@ 100 MHz	5.2	24	-	-	-	-	900	2.300	170	Red
FN0603CS-R33X_L_L	330@ 100 MHz	5.2	25	-	-	-	-	900	3.890	100	Blue
FN0603CS-R39X_L_L	390@ 100 MHz	5.2	25	-	-	-	-	900	4.350	100	Yellow

1. When ordering, specify tolerance, termination and packaging:  
FN0603CS-R39J-R-S-LF

Tolerance: G=2% J=5% (Table shows stock tolerances in bold.)

2. Inductance measured using a Fenfa SMD-A fixture in an Agilent/HP 4286 impedance analyzer with Fenfa-provided correlation pieces.

3. Tolerances in bold are stocked for immediate shipment.

4. Q measured at the same frequency as inductance using an Agilent HP 4291 A with an Agilent/HP4287A test fixture.

5. SRF measured using an Agilent/HP 4287A network analyzer and a Fenfa SMD-D test fixture.

6. DCR measured on a Cambridge Technology micro-ohmmeter and a Fenfa CCF858 test fixture.

7. Average current for a 15°C rise from 25°C ambient

8. Operating temperature Range -25°C to +125°C.

9. Electrical specifications at 25°C

See Qualification Standards section for environmental and test data