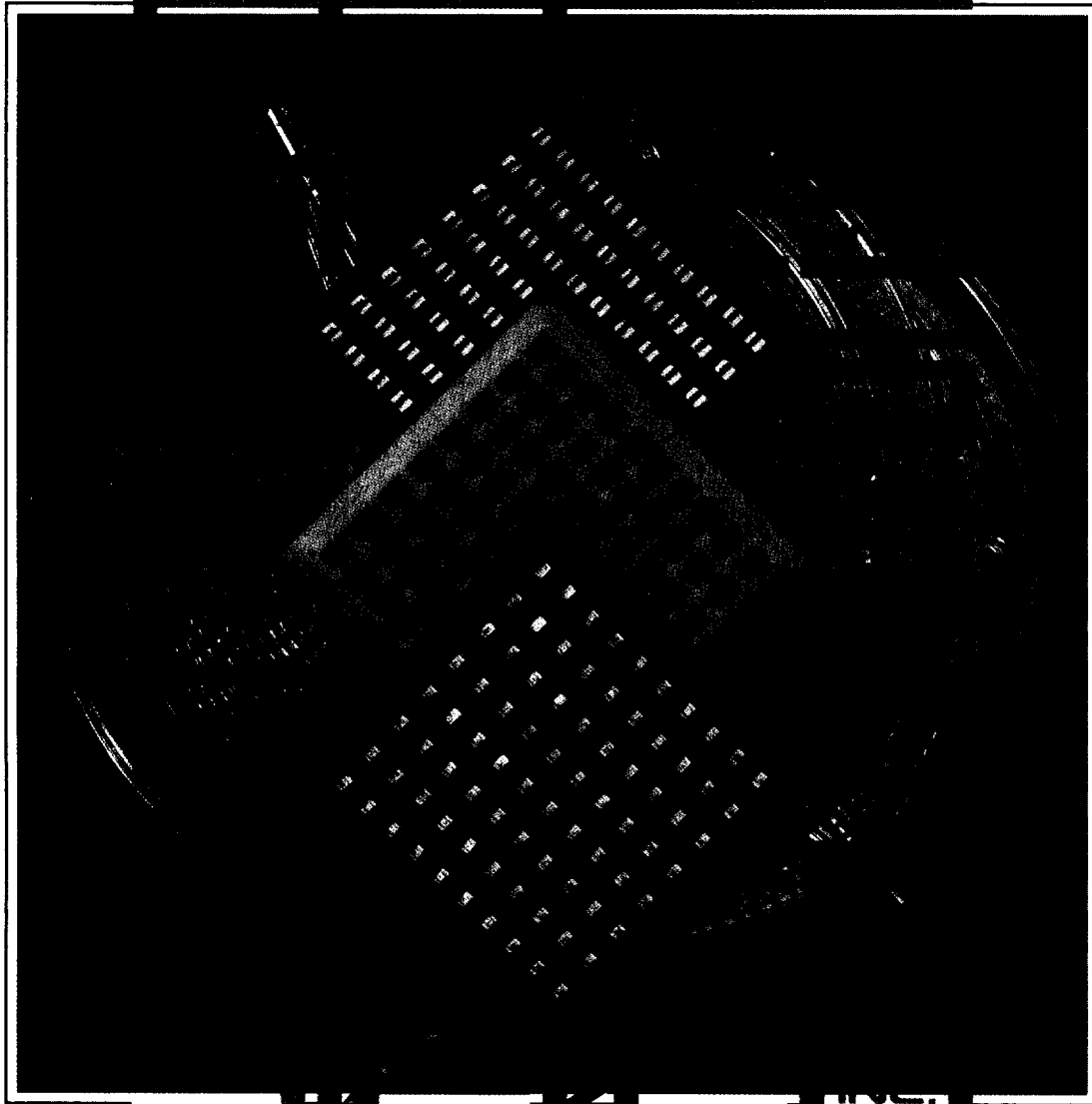


SECC INC.



SECC INC.

SECC INC.

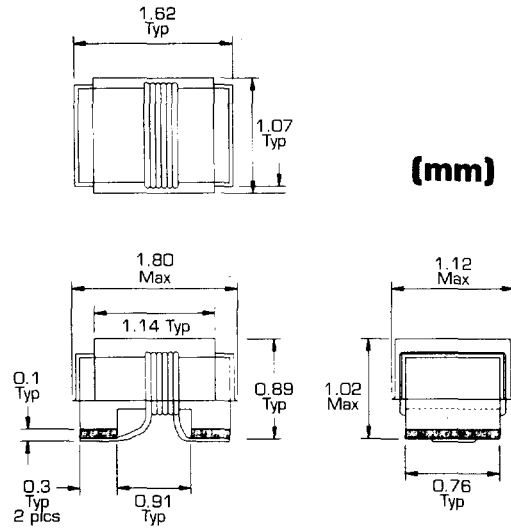
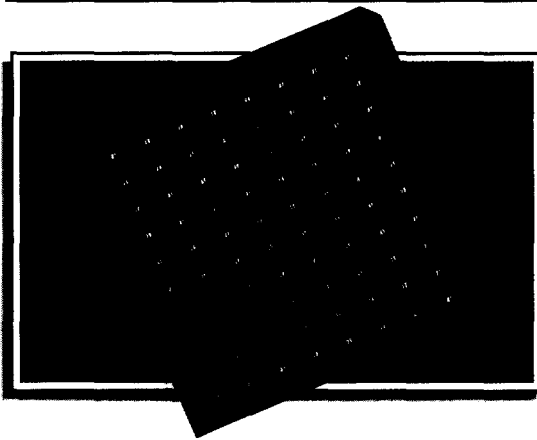
SECC INC.

PRECISION SURFACE MOUNT INDUCTORS

- HIGH Q ▪ HIGH SRF ▪ HIGH CURRENT ▪
- TIGHT TOLERANCE ▪

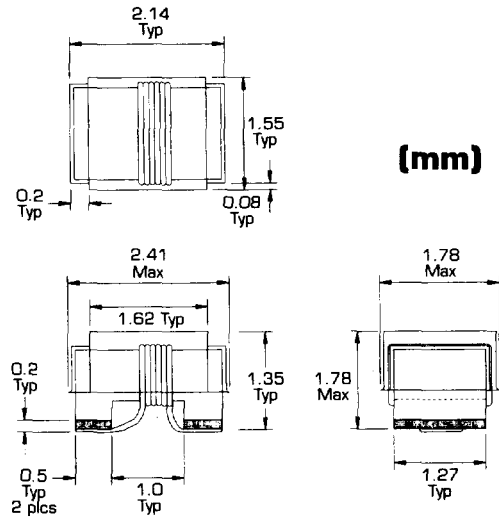
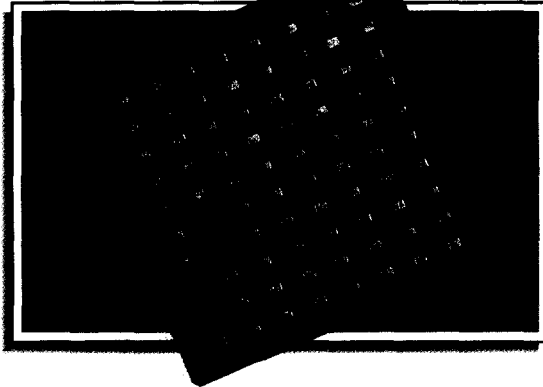
MADE IN USA

STETS00006



Part Number	L @ Freq. nH Mhz	Available Tolerances	Q @ Freq. Min. Mhz	SRF MHz	DCR ohm	I max. mA	Material
0603G1R4**E	1.4@250	K,M	20@250	>6000	.030	1000	ALUMINA
0603G1R5**E	1.5@250	K,M	20@250	>6000	.030	850	
0603G1R8**E	1.8@250	K,M	16@250	>6000	.040	850	
0603G2R0**E	2.0@250	K,M	11@250	>6000	.080	700	
0603G3R9**E	3.9@250	K,M	22@250	>6000	.070	800	
0603G4R7**E	4.7@250	K,M	25@250	>6000	.090	750	
0603G6R8**E	6.8@250	K,M	30@250	5800	.100	850	
0603G8R6**E	8.6@250	K,M	30@250	5500	.100	850	
0603G100**E	10@250	J,K	31@250	5000	.160	850	
0603G120**E	12@250	J,K	35@250	4000	.110	750	
0603G150**E	15@250	J,K	35@250	4000	.140	750	
0603G180**E	18@250	J,K	35@250	3100	.150	750	
0603G220**E	22@250	J,K	38@250	3000	.180	700	
0603G270**E	27@250	G,J	40@250	2900	.210	700	
0603G330**E	33@250	G,J	40@250	2300	.180	700	
0603G390**E	39@250	G,J	40@250	2200	.220	700	
0603G470**E	47@200	G,J	38@200	2100	.230	600	
0603G560**E	56@200	G,J	40@200	2000	.240	600	
0603G620**E	62@200	G,J	37@200	2000	.250	600	
0603G680**E	68@200	G,J	37@200	2000	.340	600	
0603G720**E	72@150	G,J	34@150	1900	.390	500	
0603G770**E	77@150	G,J	34@150	1900	.390	500	
0603G820**E	82@150	G,J	34@150	1900	.440	500	
0603G900**E	90@150	G,J	34@150	1800	.600	400	
0603G101**E	100@150	G,J	34@150	1800	.600	400	
0603G111**E	110@150	G,J	32@150	1500	.650	400	
0603G121**E	120@150	G,J	32@150	1450	.700	400	
0603G131**E	130@150	G,J	32@150	1400	.800	400	
0603G151**E	150@150	G,J	32@150	1380	1.10	380	
0603G181**E	180@150	G,J	25@150	1350	1.15	350	
0603G201**E	200@150	G,J	25@150	1200	1.20	350	

M = 20% K = 10% J = 5% G = 2%



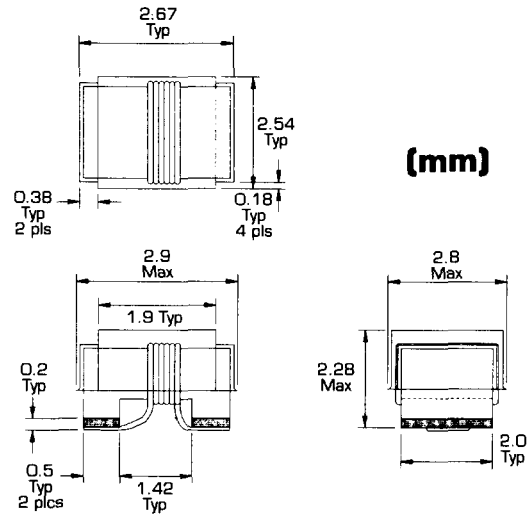
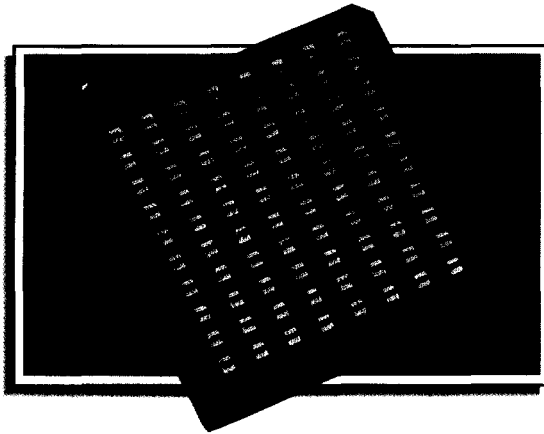
Part Number	L @ Freq. nH Mhz	Available Tolerances	Q @ Freq. Min. Mhz	SRF MHz	DCR ohm	I max. mA	Material
0805G2R4**E	2.4@250	K	55@1800	>6000	.05	1000	ALUMINA
0805G2R7**E	2.7@250	K	55@1800	>6000	.08	1000	
0805G3R3**E	3.3@250	K	50@1500	>6000	.08	1000	
0805G4R7**E	4.7@250	K	60@1500	5000	.08	1000	
0805G5R6**E	5.6@250	K	60@1500	5000	.09	1000	
0805G6R8**E	6.8@250	K	60@1500	5500	.10	1000	
0805G8R2**E	8.2@250	K	55@1000	5000	.10	1000	
0805G100**E	10@250	K	60@1500	4500	.13	1000	
0805G120**E	12@250	K	65@500	4500	.10	1000	
0805G150**E	15@250	K	50@500	4100	.10	1000	
0805G180**E	18@250	G,J	70@500	3500	.13	1000	
0805G220**E	22@250	G,J	55@500	3200	.13	900	
0805G270**E	27@250	G,J	60@500	2700	.13	750	
0805G300**E	30@250	G,J	60@500	2000	.26	750	
0805G330**E	33@250	G,J	60@500	2200	.16	750	
0805G390**E	39@250	G,J	70@500	2100	.20	750	
0805G470**E	47@200	G,J	65@500	2000	.22	750	
0805G560**E	56@200	G,J	60@500	1900	.25	650	
0805G680**E	68@200	G,J	70@500	1700	.28	600	
0805G820**E	82@150	G,J	65@500	1600	.31	500	
0805G101**E	100@150	G,J	65@500	1500	.35	600	
0805G121**E	120@150	G,J	50@250	1300	.37	450	
0805G151**E	150@100	G,J	50@250	1200	.40	450	
0805G181**E	180@100	G,J	50@250	1100	.45	450	
0805G221**E	220@100	G,J	50@250	1000	.80	400	
0805G271**E	270@100	G,J	40@200	950	1.0	320	
0805G331**E	330@100	G,J	45@200	890	1.2	260	
0805G391**E	390@100	G,J	45@200	830	1.5	200	
0805G471**E	470@100	G,J	45@200	750	2.5	170	
0805G561**E	560@100	G,J	45@200	700	3.5	170	
0805G681**E	680@50	G,J	45@200	650	4.0	170	
0805G102**E	1000@25	J	15@25	100	2.5	170	

K = 10% J = 5% G = 2%

NOTES:

0603 series available to 680nH

0805 series available to 1800nH



Part Number	L @ Freq. nH Mhz	Available Tolerances	Q @ Freq. Min. Mhz	SRF MHz	DCR ohm	I max. mA	Material
1008G4R7**E	4.7@100	J,K	60@1500	>6000	.12	1000	ALUMINA
1008G8R2**E	8.2@100	J,K	70@1500	>6000	.08	1000	
1008G100**E	10@100	J,K	70@500	2400	.05	1850	
1008G120**E	12@100	J,K	70@500	3000	.09	1000	
1008G150**E	15@100	J,K	50@500	3000	.20	1000	
1008G180**E	18@100	G,J	75@350	2600	.11	1000	
1008G220**E	22@100	G,J	75@350	2400	.06	1450	
1008G270**E	27@100	G,J	60@350	1600	.13	1450	
1008G330**E	33@100	G,J	60@350	1700	.06	1450	
1008G390**E	39@100	G,J	70@350	1500	.075	1300	
1008G470**E	47@100	G,J	65@350	1400	.075	1300	
1008G560**E	56@100	G,J	65@350	1200	.09	1260	
1008G680**E	68@100	G,J	65@350	1100	.09	1260	
1008G820**E	82@100	G,J	60@350	1000	.15	1000	
1008G101**E	100@100	G,J	65@350	1000	.15	820	
1008G121**E	120@100	G,J	60@350	1000	.15	820	
1008G151**E	150@100	G,J	45@100	825	.18	820	
1008G181**E	180@50	G,J	50@100	770	.20	770	
1008G221**E	220@50	G,J	50@100	690	.26	660	
1008G271**E	270@50	G,J	50@100	650	.30	610	
1008G331**E	330@50	G,J	50@100	570	.45	500	
1008G391**E	390@50	G,J	45@100	520	.70	470	
1008G431**E	430@50	G,J	45@100	500	.75	470	
1008G471**E	470@50	G,J	45@100	490	.78	470	
1008G561**E	560@35	G,J	45@100	440	1.20	400	
1008G621**E	620@35	G,J	45@100	400	2.10	300	
1008G681**E	680@35	G,J	45@100	390	2.10	280	
1008G751**E	750@35	G,J	45@100	330	2.30	280	
1008G821**E	820@35	G,J	45@100	360	2.30	270	
1008G911**E	910@35	G,J	40@50	310	2.70	270	
1008G102**E	1000@35	G,J	40@50	330	2.70	270	
1008G122**E	1200@35	G,J	40@50	310	3.00	250	
1008G152**E	1500@35	G,J	40@50	250	5.20	180	
1008G182**E	1800@35	G,J	35@50	225	7.20	130	
1008G222**E	2200@7.9	G,J	20@7.9	75	4.50	130	
1008G272**E	2700@7.9	G,J	20@7.9	44	4.80	130	
1008G332**E	3300@7.9	G,J	20@7.9	31	5.20	130	
1008G392**E	3900@7.9	G,J	20@7.9	36	5.40	130	
1008G472**E	4700@7.9	G,J	20@7.9	28	6.00	130	
1008G562**E	5600@7.9	K	20@7.9	21	6.50	100	
1008F152**E	1500@7.9	J,K	22@7.9	250	.95	370	FERRITE
1008F182**E	1800@7.9	J,K	22@7.9	235	1.10	350	
1008F222**E	2200@7.9	J,K	22@7.9	225	1.20	280	
1008F332**E	3300@7.9	J,K	22@7.9	165	1.50	250	
1008F392**E	3900@7.9	J,K	22@7.9	135	1.60	200	
1008F472**E	4700@7.9	J,K	22@7.9	125	2.70	180	
1008F562**E	5600@7.9	J,K	22@7.9	110	4.10	180	
1008F682**E	6800@7.9	J,K	22@7.9	105	5.40	180	
1008F822**E	8200@7.9	J,K	22@7.9	96	6.80	130	
1008F103**E	10,000@7.9	K	22@7.9	88	8.00	130	

K = 10% J = 5% G = 2%

GENERAL SPECIFICATIONS

- CORE MATERIAL IS RUBALIT 708 (ALUMINA) 96% AL₂O₃
- WRAP AROUND TERMINATIONS
- TERMINATIONS ARE TUNGSTEN-NICKEL WITH GOLD FLASH, 0.1um. SOLDER COAT OPTIONAL
- MOLDED FLAT TOP
- 8mm TAPE AND REEL
- SPECIAL VALUES AVAILABLE
- * **FERRITE 1008F:**
- WIRE TERMINATIONS ARE SPOT WELDED TO SILVER TIN NICKEL METALLIZATION

SOLDER PAD LAYOUT



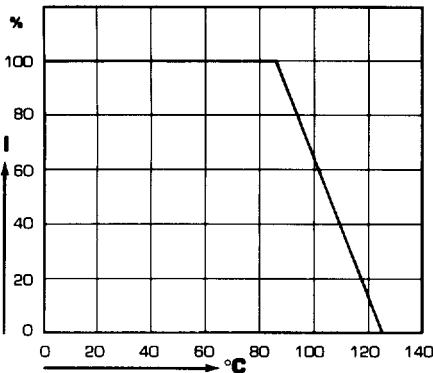
0.13mm Radius (8 places)

Series	Dimensions		
	A	B	C
0803	.63	.63	1.0
0805	.51	1.0	1.8
1008	.51	1.5	2.5



CURRENT CARRYING CAPABILITY DEPENDENT ON THE AMBIENT TEMPERATURE.

These measurements were conducted with coils soldered on Al₂O₃ substrates, 96%, size 10 x 10 x 0.6 mm.



CORE MATERIAL: Rubalit 708 (Alumina) 96% Al₂O₃

MATERIAL PREPARATION: The ceramic is pressed and fired at 1600 degrees Celsius in air.

METALLIZATION PROCEDURE: The base metallization is tungsten, applied through a screen printing process. The tungsten is fired at 1500 degrees Celsius in an inert atmosphere. Next, electrolytic nickel layer is a minimum 2um thick (5um typical). This nickel is then sintered at 850 degrees Celsius. Over the nickel an electrolytic gold flash .1um is applied.

COPPER WIRE DESCRIPTION: The wire is high temperature enamelled copper wire. The wire bears the trade name Estersol at U.L. and is equivalent to the ANSI-TYPE NW 77L(NEMA). Typical tin bath temperature is approximately 470 degrees Celsius.

1 0 0 8 G 1 5 2 K T E

PACKAGE STYLE
1st two digits are significant, 3rd digit denotes number of zeros to follow: 152-1500nh
(G = Gold Flash)
(T = Solder Coat)
(F = FERRITE)*

INDUCTANCE
(Nanohenrys)

TOLERANCE
*G = 2%, J = 5%, K = 10%, M = 20%

COATING
Epoxy Encapsulation

***PACKAGING**
(T = 8mm tape and reel, 2000 pcs per reel)
(W = Waffle Pack (80 per))

EXAMPLE: 1008 size 1500nh 10% tape and reel

0803G SERIES CHIP INDUCTORS

L nH	50 Mhz	75 Mhz	100 Mhz	150 Mhz	200 Mhz	250 Mhz	300 Mhz	400 Mhz	500 Mhz	600 Mhz	700 Mhz	800 Mhz	900 Mhz	1000 Mhz	1200 Mhz	1400 Mhz	1600 Mhz	1800 Mhz
1.4	17	19	22	26	28	30	43	46	49	51	50	54	53	61	63			
1.5	14	15	16	18	22	25	34	35	38	41	43	44	46	55	60	61		
1.8	11	12	14	17	20	23	32	39	37	45	49	48	56	59	64	71		
2.0	8	9	10	12	15	16	22	26	27	28	30	30	34	41	43	47		
3.9	12	15	18	22	26	28	44	51	52	55	58	64	67	72	71	74		
4.7	11	14	16	20	23	31	40	45	47	54	53	54	62	65	71	65		
6.8	17	20	23	28	32	36	52	61	61	68	73	76	75	86	86	90		
8.6	19	22	26	31	36	39	59	65	68	76	83	81	83	83	81	80		
10	14	16	21	25	26	35	59	64	67	74	77	78	70	82	76	70		
12	20	24	27	33	37	41	59	64	67	74	77	78	70	82	76	70		
15	17	21	24	29	34	39	52	63	64	66	69	70	65	72	67	60		
18	21	26	29	35	40	44	65	79	77	78	81	81	75	80	62	61		
22	19	22	26	31	35	43	57	64	62	68	73	66	64	66	57	55		
27	20	24	28	32	37	44	59	66	65	68	79	66	65	68	58	58		
33	22	26	30	36	40	45	62	65	64	66	77	69	55	59	48	47		
39	22	27	30	36	41	44	61	71	68	70	72	71	50	43	29	26		
47	23	27	30	36	40	43	61	68	63	59	65	59	50	52	28	28		
56	24	28	32	38	44	47	65	80	72	82	70	66	48	45	39	35		
67	24	28	32	38	43	48	68	77	65	68	71	77	69	78	38	25		
68	24	28	32	38	43	47	64	76	66	64	62	66	57	60	34	31		
72	25	29	33	39	44	49	71	82	82	83	100	65	68	35	23			
77	25	29	34	39	44	47	67	85	77	78	105	70	84	45	15			
82	26	31	34	41	47	51	74	96	73	114	105	68	40	28	24	26		
90	23	28	31	37	43	46	65	79	64	77	80	60	29	23	16			
110	24	29	32	38	44	46	65	85	62	76	73	56	35	28	13			
120	25	29	33	38	44	47	61	79	58	79	107	74	31	23				
130	25	30	33	39	45	46	61	79	56	65	72	48	21	17				
150	24	29	31	37	41	44	56	70	64	67	70	51	11					
180	24	28	32	38	42	45	63	81	48	54	53	34						
200	25	30	32	38	43	45	60	73	44	55	30							

0805G SERIES CHIP INDUCTORS

L nH	50 Mhz	75 Mhz	100 Mhz	150 Mhz	200 Mhz	300 Mhz	400 Mhz	500 Mhz	600 Mhz	700 Mhz	800 Mhz	900 Mhz	1000 Mhz	1200 Mhz	1400 Mhz	1600 Mhz	1800 Mhz
2.4	26	25	30	40	34	35	47	45	46	50	50	49	59	53	64	66	
2.7	12	14	15	18	20	24	33	39	40	51	48	48	54	64	69	78	
3.3	10	10	12	14	16	20	25	26	28	30	31	36	42	54	53	45	
4.7	23	26	29	34	38	43	55	63	65	72	78	80	90	90	91	84	
5.6	23	27	30	36	40	47	62	70	71	83	84	85	86	95	94	92	
6.8	30	34	38	46	48	54	70	75	79	81	93	93	98	100	106	108	
8.2	17	22	23	28	32	36	48	51	55	57	62	64	67	72	74	80	
8.2	33	39	42	50	54	59	75	82	86	96	82	80	78	84	85	83	
12	30	34	37	45	50	56	78	84	85	90	94	96	97	100	95	95	
15	20	24	27	32	37	42	56	62	65	68	70	71	78	80	78	78	
18	31	35	40	50	53	62	85	93	94	97	103	105	105	100	100	93	
22	22	26	30	35	40	47	62	68	69	70	72	72	75	67	65	57	
27	30	36	40	47	52	58	78	82	80	83	81	78	75	69	57	50	
30	22	25	30	37	41	51	66	79	72	76	84	85	68	70	50	58	
33	26	32	36	42	46	52	68	70	68	70	71	64	59	50	45	24	
39	34	40	43	51	55	62	84	87	78	84	85	80	74	73	59	45	
47	32	38	42	48	52	58	76	78	72	74	68	65	62	47	41	16	
56	30	34	38	44	50	53	68	68	60	60	55	50	45	22	13		
68	33	38	42	50	55	62	82	84	68	77	73	65	62	52			
82	33	39	42	50	54	59	75	76	56	64	47	42	40	19			
100	30	34	38	44	49	53	68	67	43	48	40	35	18				
120	32	36	41	48	51	56	82	84	43	57	53	40	25				
150	32	37	40	46	53	54	80	80	40	44	46						
180	32	36	40	45	54	53	76	78	33	33	17						
220	31	35	39	43	56	58	65	70									
270	31	35	38	42	44	42	51	32									
330	33	38	40	44	48	48	60	35									
390	33	37	40	44	48	46	38	33									
470	34	38	42	45	47	38	33										
560	35	40	44	47	48	49											
680	34	39	43	46	48	42											

1008G SERIES CHIP INDUCTORS

L nH	50 Mhz	75 Mhz	100 Mhz	150 Mhz	200 Mhz	300 Mhz	400 Mhz	500 Mhz	600 Mhz	700 Mhz	800 Mhz	900 Mhz	1000 Mhz	1200 Mhz	1400 Mhz	1600 Mhz	1800 Mhz
4.7	17	20	23	27	30	35	46	53	56	62	63	66	69	76	76	78	
8.2	33	39	43	50	54	64	79	89	88	100	103	105	99	106	105	95	
10	36	39	44	55	57	63	82	100	110	95	98	111	119	119	115	114	
12	33	38	40	52	58	62	83	105	105	96	99	106	110	96	100	70	
15	19	24	28	36	39	45	57	68	67	65	67	64	66	60	62	46	
18	49	54	58	72	78	86	112	140	135	130	130	130	120	103	107	98	
22	38	45	47	56	62	70	95	104	97	94	99	72	94	53	41	25	
27	35	41	46	55	61	69	91	97	93	91	95	86	85	54	49	23	
33	37	45	58	65	75	81	105	110	95	110	100	78	85	45	35	14	
39	44	52	57	67	71	79	103	125	85	99	97	92	97	40	36		
47	40	48	52	66	72	77	116	113	76	97	80	65	61	78	46		
56	46	53	57	68	76	81	94	97	62	57	54	77	31				
68	47	52	59	64	70	72	84	69	39	50	59	30					
82	43	48	55	60	69	68	89	90	50	55	66	36					
100	44	50	55	61	64	72	96	90	40	38	27	18					
120	47	51	57	65	64	70	76	42	25	22							
150	43	48	50	57	60	56	56	37	12								
180	46	52	57	63	64	61	55	30									

