



Surface Mount High Q Wirewound Inductors

- *Excellent high frequency applications*
- *High Q factors and self-resonant frequency values*
- *Flat top suitable for high speed pick-and-place components*
- *RoHS compliant*



KQ & KQT Series Specifications

Part Number Determination

KQ1008LTE10NJ					
KQ	1008	L	TE	10N	J
SERIES	SIZE	TERMINATION	PACKAGING	INDUCTANCE	TOLERANCE
KQ KQT	0402 0603 0805 1008	L=SnPb (Tin/Lead) T=Sn (100% Tin)	TE=7" embossed plastic tape TD=7% paper tape	10N=10nH R10=0.1uH 1R0=1.0uH	C=0.2nH G=±2% H=±3% J=±5% K=±10% M=±20

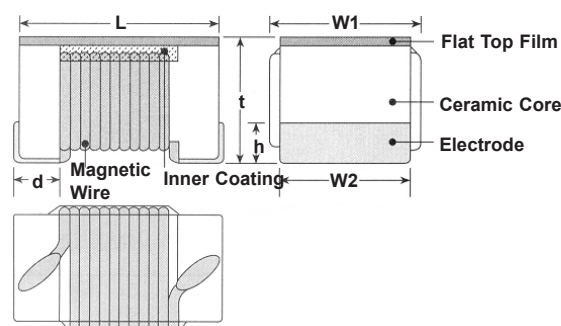
Package Dimensions (in/mm)

Size	L	W1	W2	t	h	d
0402	0.39±.004 (1.0±0.1)	0.2±.004 (0.5±0.1)	.02±.004 (0.5±0.1)	.022±.004 (0.55±0.1)	.006±.004 (0.15±0.1)	0.1±.004 (0.25±0.1)
0603	.063 ±.004 (1.6±0.1)	.039±.004 (1.0±0.1)	.033±.004 (0.85±0.1)	.035±.004 (0.9±0.1)	.01±.006 (0.25±0.15)	.014±.004 (0.35±0.1)
0805	.079±.008 2.0±0.2	.059±.008 1.5±0.2	.053±.004 1.35±0.1	.051±.008 1.3±0.2	.016±.006 0.40±0.15	.018±.004 0.45±0.1
1008	.098±.008 2.5±0.2	.087±.008 2.2±0.2	.079±.004 2.0±0.1	.071+.008-0 1.8+0.2-0	.018±.006 0.45±0.15	.018±.004 0.45±0.1

Electrical Characteristics (0402)

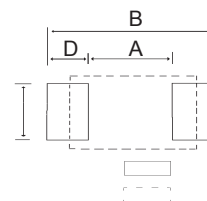
Part Number	Case Size	Inductance		Quality Factor		SRF min. (MHz)	DC. Res. Max.	Allowable DC Current max. (mA)	Meas. Freq. (MHz)
		Ind. (nH)	Tol. (%)	Q min	Freq. (MHz)				
KQT0402TTD1N0	0402	1.0	C:0.2nH	16	6000	0.045	1360	250	
KQT0402TTD2N0		2.0					1040		
KQT0402TTD2N2		2.2		960					
KQT0402TTD3N3		3.3		0.066		840			
KQT0402TTD3N6		3.6							
KQT0402TTD3N9		3.9							
KQT0402TTD5N1		5.1	5800	800					
KQT0402TTD5N6		5.6		760					
KQT0402TTD6N2		6.2							
KQT0402TTD7N5		7.5	22	4400	0.104	680			
KQT0402TTD8N2		8.2							
KQT0402TTD9N0		9.0		4160					
KQT0402TTD10N		10	21	3900	0.195	480			
KQT0402TTD11N		11	24	3680	0.120	640			
KQT0402TTD12N		12		3600					
KQT0402TTD15N		15		3280	0.172	560			
KQT0402TTD19N		19		3040	0.202	480			
KQT0402TTD23N		23		2720	0.214	400			
KQT0402TTD27N		27		2480	0.298				
KQT0402TTD34N		34	20	2400	0.550	340			
KQT0402TTD36N		36		2320	0.560	320			
KQT0402TTD40N		40		2240	0.620				
KQT0402TTD47N		47		2100	0.830	150			
KQT0402TTD56N		56		2800	1.170	200			
KQT0402TTD68N		68		2000	1.120				
KQT0402TTD82N		82	1800	1.800	140				
KQT0402TTD10		100	22	1600	2.090	130			
KQT0402TTD12		120		1500	2.320	120			

Construction



Land Pattern (mm)

Size	Dimension	A	B	C	D
0402	1.0X0.5	0.45	1.18	0.66	0.36
0603	1.6X1.0	0.64	1.92	1.02	0.64
0805	2.0X1.5	0.76	2.8	1.78	0.016
1008	2.5X2.2	1.27	3.31	2.54	1.0



Engineering Design Kits Available
See Garrett Kit Catalog

(specifications continued on following pages)



Surface Mount High Q Wirewound Inductors



KQ 0603 Series Specifications

Electrical Characteristics (0603)

Part Number	Case Size	Marking	Inductance		Quality Factor		SRF min. (MHz)	DC Res. Max. (W)	Allowable DC Current max. (mA)	Meas. Freq. Mhz	
			Ind. (nH)	Tol. (%)	Q min.	Freq. (MHz)					
KQ0603TTE1N6	0603	C	1.6	J: ±5% K: ±10%	24	250	12500	0.03	700	250	
KQ0603TTE1N8		0	1.8		16			0.045			
KQ0603TTE3N3		X	3.3		22		6900	0.055			
KQ0603TTE3N6		E	3.6					0.063			
KQ0603TTE3N9		1	3.9					0.08			
KQ0603TTE4N3		F	4.3	G: ±2% J: ±5% K: ±10%	20		5900	0.063			
KQ0603TTE4N7		G	4.7					0.116			
KQ0603TTE5N1		Y	5.1				5800	0.115			
KQ0603TTE6N8		2	6.8		27			0.11			
KQ0603TTE7N5		H	7.5		28		4800	0.106			
KQ0603TTE8N2		A	8.2					0.12			
KQ0603TTE8N7		J	8.7				4600	0.109			
KQ0603TTE9N5		B	9.5		31			0.125			
KQ0603TTE10N		3	10		4800		0.13				
KQ0603TTE11N		K	11				33	0.086			
KQ0603TTE12N		4	12		35		4000	0.13			
KQ0603TTE15N		5	15					0.17			
KQ0603TTE16N		L	16		34		3300	0.104	600	200	
KQ0603TTE18N		6	18		35		3100	0.17			
KQ0603TTE22N		7	22		38		3000	0.19			
KQ0603TTE23N		S	23		37		2700	0.15			
KQ0603TTE24N		M	24				2650	0.135			
KQ0603TTE27N		8	27		40		2800	0.22			
KQ0603TTE30N		N	30		37	200	2250	0.144			
KQ0603TTE33N		9	33		40		2300	0.22			
KQ0603TTE36N		P	36		38		2080	0.25			
KQ0603TTE39N		0	39		40	150	2200	0.28			
KQ0603TTE43N		Q	43		39		1700	0.30	400	150	
KQ0603TTE47N		1	47		38			0.31			
KQ0603TTE51N		T	51		200			0.34			
KQ0603TTE56N		2	56		37	1400	0.49				
KQ0603TTE68N		3	68		34		100				0.54
KQ0603TTE72N		4	72			32		1350	0.61	300	
KQ0603TTE82N		5	82		1300			0.65			
KQ0603TTER10		6	100		25		1400	0.92	280		
KQ0603TTER11		7	110		100	1300	2.2	140	100		
KQ0603TTER12		8	120				1200	2.3		130	
KQ0603TTER15		9	150				1000	2.4		120	
KQ0603TTER18		0	180			24		900		2.3	170
KQ0603TTER20		U	200					800		3.0	100
KQ0603TTER21		V	210			30		700		3.7	80
KQ0603TTER22		1	220								
KQ0603TTER25		W	250								
KQ0603TTER27		2	270								
KQ0603TTER33		3	330								
KQ0603TTER39		4	390								

(specifications continued on following page)



Surface Mount High Q Wirewound Inductors



KQ 0805 Series Specifications

Electrical Characteristics (0805)

Part Number	Case Size	Marking	Inductance		Quality Factor		SRF min. (MHz)	DC. Res. Max.	Allowable DC Current max. (mA)	Meas. Freq. (MHz)
			Ind. (nH)	Tol. (%)	Q min	Freq. (MHz)				
KQ0805TTE3N3	0805	0	3.3	J(±5%) K(±10%) M(±20%)	50	1500	6000	0.08	600	250
KQ0805TTE6N8		1	6.8			1000	5500	0.11		
KQ0805TTE8N2		2	8.2				4700	0.12		
KQ0805TTE12N		3	12			500	4000	0.15		
KQ0805TTE15N		4	15				3400	0.17		
KQ0805TTE18N		5	18				3300	0.20		
KQ0805TTE22N		6	22		55	2600	0.22	500		
KQ0805TTE27N		7	27			2500	0.25			
KQ0805TTE33N		8	33		60	2050	0.27			
KQ0805TTE39N		9	39			2000	0.29			
KQ0805TTE47N		0	47			1650	0.31	200		
KQ0805TTE56N		1	56	1550		0.34				
KQ0805TTE68N		2	68	G(±2%) J(±5%) K(±10%)	65	1450	0.38	400		
KQ0805TTE82N		3	82			1300	0.42			
KQ0805TTER10		4	100		50	1200	0.46		150	
KQ0805TTER12		5	120			1100	0.51			
KQ0805TTER15		6	150		250	920	0.56	100		
KQ0805TTER18		7	180			870	0.64			
KQ0805TTER22		8	220			850	0.70			
KQ0805TTER27		9	270		48	650	1.0		350	
KQ0805TTER33		0	330			600	1.4		310	
KQ0805TTER39		1	390			560	1.5	290		
KQ0805TTER47		2	470		33	100	375	1.76	250	50
KQ0805TTER56		3	560	340			1.9	230		
KQ0805TTER68		4	680	J(±5%) K(±10%)	23	50	188	2.2	190	25
KQ0805TTER82		5	820				215	2.35	180	

(specifications continued on following page)



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KQ 1008 Series Specifications

Electrical Characteristics (1008)

Part Number	Case Size	Marking	Inductance		Quality Factor		SRF min. (MHz)	DC Res. Max. (W)	Allowable DC Current max. (mA)	Meas Freq. Mhz
			Ind. (nH)	Tol. (%)	Q min.	Freq. (MHz)				
KQ1008TTE10N	1008	10N	10	K(±10%) M(±20%)	50	500	4100	0.08	1000	50
KQ1008TTE12N		12N	12				3300	0.09		
KQ1008TTE15N		15N	15				3000	0.10		
KQ1008TTE18N		18N	18				2500	0.11		
KQ1008TTE22N		22N	22				2400	0.12		
KQ1008TTE27N		27N	27		55	350	1600	0.13		
KQ1008TTE33N		33N	33				1500	0.14		
KQ1008TTE39N		39N	39		60		1300	0.15		
KQ1008TTE47N		47N	47				1000	0.16		
KQ1008TTE56N		56N	56		65		1300	0.18		
KQ1008TTE68N		68N	68					0.20		
KQ1008TTE82N		82N	82	60	1000		0.22			
KQ1008TTER10		R10	100				0.56			
KQ1008TTER12		R12	120	45	100	950	0.63	800		
KQ1008TTER15		R15	150			850	0.70			
KQ1008TTER18		R18	180			750	0.77		750	
KQ1008TTER22		R22	220			700	0.84		720	
KQ1008TTER27		R27	270			600	0.91	690		
KQ1008TTER33		R33	330			570	1.05	660		
KQ1008TTER39		R39	390			500	1.12	630		
KQ1008TTER47		R47	470			450	1.19	600		
KQ1008TTER56		R56	560			415	1.33	580		
KQ1008TTER62		R62	620			375	1.40	560		
KQ1008TTER68		R68	680			360	1.47	540		
KQ1008TTER75		R75	750			350	1.54	520		
KQ1008TTER82		R82	820			350	1.61	500		
KQ1008TTER91		R91	910			320	1.68	480		
KQ1008TTE1R0		1R0	1000	35	50	290	1.75	460		
KQ1008TTE1R2		1R2	1200			250	2.0	440		
KQ1008TTE1R5		1R5	1500			200	2.3	420		
KQ1008TTE1R8		1R8	1800			28	160	2.6	400	
KQ1008TTE2R2		2R2	2200	140	2.8		380			
KQ1008TTE2R7		2R7	2700	22	25	110	3.2	360		
KQ1008TTE3R3		3R3	3300			100	3.4	350		
KQ1008TTE3R9		3R9	3900	20		100	3.6	340		
KQ1008TTE4R7		4R7	4700			90	4.0	330		
KQ1008TTE5R6		5R6	5600	15	7.9	80	2.2	150		
KQ1008TTE6R8		6R8	6800			70	2.5			
KQ1008TTE8R2		8R2	8200			65	2.8			
KQ1008TTE100		100	10000			60	3.2			