

LEADED POWER INDUCTORS

Series DC *Leaded & Bobbin & Shielded*



FEATURES

- The series power inductors have low D.C resistance and large permissible D.C current with high reliability.
- Magnetic shielded products are available for each series for the consideration against radiation.
- The series has high saturation magnetic-flux density and high efficiency.

APPLICATIONS

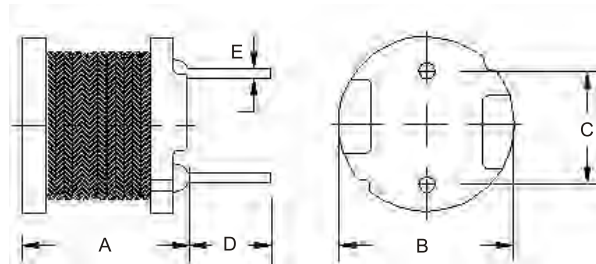
- For the smoothing circuit of D.C to D.C converter. As a choke coil or chopper coil.
- Suitable for use in power lines of camcorder. LCD set .OA equipment. Notebook computer. PDA and small size communication equipment.

PRODUCT IDENTIFICATION

DC 06 X 05 □ M 22U
 a b c d e f g

- a : Type of Products - Leaded Power Inductors
 b : Dimension(mm) - 06 : 6.0, 08 : 7.8, 10 : 10.0
 c : Materials - X = No Define
 d : Thickness(mm) - 05 : 5.0, 06 : 6.5 / 5.5, 07 : 7.5, 08 : 8.0, 09 : 9.5, 10 : 10.0
 e : Packing - PCS / REEL - E : 300, A : 100
 f : Tolerance - K : $\pm 10\%$ M : $\pm 20\%$
 g : Inductance - 100N = $0.1 \mu\text{H}$, 10U = $10.0 \mu\text{H}$, 1M2 = $1200 \mu\text{H}$

SHAPES & DIMENSIONS



Type	Inductance Range	Alias in mm	Dimensions (mm)				
			A	B	C	D	E
			max.	± 0.5	± 0.3	± 1.0	± 0.1
DC06X05	22 μH ~ 1.0mH	0605	5.00	6.00	4.00	15.00	0.50
DC06X06		0606	6.50	6.00	4.00	15.00	0.50
DC08X06	10 μH ~ 10mH	0805	5.50	7.80	5.00	15.00	0.70
DC08X07		0708	7.50	7.80	5.00	15.00	0.70
DC08X09	10 μH ~ 47mH	0809	9.50	7.80	5.00	15.00	0.70
DC10X08	10 μH ~ 1.0mH	1008	8.00	10.00	5.00	15.00	0.70
DC10X10		1010	10.0	10.00	5.00	15.00	0.70

LEADED POWER INDUCTORS

Series DC Leaded & Bobbin & Shielded ELECTRICAL CHARACTERISTICS

Part Number	Inductance L (μH)	Test Frequency	D.C Resistance (Ω) max.	Permissible D.C Current (A) max.	Part Number	Inductance L (μH)	Test Frequency	D.C Resistance (Ω) max.	Permissible D.C Current (A) max.	
DC06X05E□22U	22	7.96MHz	0.180	0.900	DC08X06E□220U	220	1KHz	1.010	0.540	
DC06X05E□27U	27		0.210	0.810	DC08X06E□270U	270		1.280	0.490	
DC06X05E□33U	33		0.270	0.740	DC08X06E□330U	330		1.470	0.440	
DC06X05E□39U	39		0.290	0.680	DC08X06E□390U	390		1.670	0.410	
DC06X05E□47U	47		0.340	0.620	DC08X06E□470U	470		1.950	0.380	
DC06X05E□56U	56		0.420	0.570	DC08X06E□560U	560		2.830	0.350	
DC06X05E□68U	68		0.480	0.510	DC08X06E□680U	680		3.250	0.320	
DC06X05E□82U	82		0.550	0.470	DC08X06E□820U	820		3.820	0.310	
DC06X05E□100U	100		0.680	0.420	DC08X06E□1M	1,000		5.280	0.250	
DC06X05E□120U	120		0.770	0.390	DC08X06E□1M2	1,200		6.030	0.230	
DC06X05E□150U	150		0.950	0.350	DC08X06E□1M5	1,500		7.150	0.210	
DC06X05E□180U	180		1.150	0.320	DC08X06E□1M8	1,800		8.260	0.200	
DC06X05E□220U	220		1.300	0.290	DC08X06E□2M2	2,200		11.100	0.180	
DC06X05E□270U	270		1.550	0.260	DC08X06E□2M7	2,700		13.100	0.160	
DC06X05E□330U	330	1KHz	2.180	0.230	DC08X06E□3M3	3,300	15.900	0.140		
DC06X05E□390U	390		2.470	0.210	DC08X06E□3M9	3,900	18.000	0.130		
DC06X05E□470U	470		2.920	0.200	DC08X06E□4M7	4,700	23.900	0.120		
DC06X05E□560U	560		3.970	0.180	DC08X06E□5M6	5,600	26.800	0.110		
DC06X05E□680U	680		4.570	0.160	DC08X06E□6M8	6,800	31.700	0.098		
DC06X05E□820U	820		5.280	0.150	DC08X06E□8M2	8,200	46.500	0.088		
DC06X05E□1M	1,000		7.060	0.130	DC08X06E□10M	10,000	55.700	0.081		
DC06X06E□22U	22		7.96MHz	0.150	1.270	DC08X07E□10U	10	7.96MHz	0.050	2.900
DC06X06E□27U	27			0.170	1.140	DC08X07E□12U	12		0.060	2.500
DC06X06E□33U	33			0.200	1.030	DC08X07E□15U	15		0.070	2.200
DC06X06E□39U	39			0.230	0.950	DC08X07E□18U	18		0.080	1.900
DC06X06E□47U	47			0.270	0.870	DC08X07E□22U	22		0.090	1.800
DC06X06E□56U	56			0.340	0.800	DC08X07E□27U	27		0.110	1.700
DC06X06E□68U	68			0.380	0.720	DC08X07E□33U	33		0.130	1.500
DC06X06E□82U	82	0.430		0.660	DC08X07E□39U	39	0.140		1.300	
DC06X06E□100U	100	0.550		0.590	DC08X07E□47U	47	0.150		1.300	
DC06X06E□120U	120	0.620		0.540	DC08X07E□56U	56	0.180		1.200	
DC06X06E□150U	150	0.740		0.480	DC08X07E□68U	68	0.200		1.100	
DC06X06E□180U	180	0.920		0.440	DC08X07E□82U	82	0.240		1.000	
DC06X06E□220U	220	1.030		0.400	DC08X07E□100U	100	0.280		0.890	
DC06X06E□270U	270	1.310		0.360	DC08X07E□120U	120	0.360		0.810	
DC06X06E□330U	330	1KHz	1.500	0.330	DC08X07E□150U	150	0.420	0.720		
DC06X06E□390U	390		1.700	0.300	DC08X07E□180U	180	0.570	0.660		
DC06X06E□470U	470		2.200	0.270	DC08X07E□220U	220	0.630	0.570		
DC06X06E□560U	560		3.100	0.250	DC08X07E□270U	270	0.880	0.510		
DC06X06E□680U	680		3.600	0.230	DC08X07E□330U	330	1.050	0.460		
DC06X06E□820U	820		3.850	0.210	DC08X07E□390U	390	1.170	0.440		
DC06X06E□1M	1,000		5.320	0.190	DC08X07E□470U	470	1.340	0.410		
DC08X06E□10U	10		0.070	2.500	DC08X07E□560U	560	1.720	0.360		
DC08X06E□12U	12		0.080	2.400	DC08X07E□680U	680	1.960	0.330		
DC08X06E□15U	15		0.090	2.100	DC08X07E□820U	820	2.560	0.300		
DC08X06E□18U	18		0.100	2.000	DC08X07E□1M	1,000	2.940	0.270		
DC08X06E□22U	22		0.120	1.700	DC08X07E□1M2	1,200	4.040	0.240		
DC08X06E□27U	27		0.140	1.600	DC08X07E□1M5	1,500	4.700	0.220		
DC08X06E□33U	33		7.96MHz	0.170	1.400	DC08X07E□1M8	1,800	5.050	0.200	
DC08X06E□39U	39	0.210		1.300	DC08X07E□2M2	2,200	6.250	0.180		
DC08X06E□47U	47	0.240		1.200	DC08X07E□2M7	2,700	8.720	0.160		
DC08X06E□56U	56	0.310		1.100	DC08X07E□3M3	3,300	10.600	0.150		
DC08X06E□68U	68	0.340		1.000	DC08X07E□3M9	3,900	14.200	0.140		
DC08X06E□82U	82	0.400		0.930	DC08X07E□4M7	4,700	16.700	0.120		
DC08X06E□100U	100	0.520		0.810	DC08X07E□5M6	5,600	18.700	0.110		
DC08X06E□120U	120	0.590		0.760	DC08X07E□6M8	6,800	21.800	0.100		
DC08X06E□150U	150	1KHz		0.710	0.670	DC08X07E□8M2	8,200	28.700	0.093	
DC08X06E□180U	180			0.890	0.620	DC08X07E□10M	10,000	33.000	0.084	

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DC08X09E□10U	10	7.96MHz	0.040	2.600	DC10X08A□10U	10	7.96MHz	0.027	4.500
DC08X09E□12U	12		0.040	2.600	DC10X08A□12U	12		0.031	4.100
DC08X09E□15U	15		0.050	2.100	DC10X08A□15U	15		0.036	3.700
DC08X09E□18U	18		0.050	2.000	DC10X08A□18U	18		0.049	3.400
DC08X09E□22U	22		0.060	1.700	DC10X08A□22U	22		0.055	3.100
DC08X09E□27U	27		0.060	1.600	DC10X08A□27U	27		0.062	2.800
DC08X09E□33U	33		0.070	1.400	DC10X08A□33U	33		0.079	2.500
DC08X09E□39U	39		0.080	1.400	DC10X08A□39U	39		0.087	2.300
DC08X09E□47U	47		0.100	1.300	DC10X08A□47U	47		0.099	2.100
DC08X09E□56U	56		0.110	1.200	DC10X08A□56U	56		0.130	1.900
DC08X09E□68U	68		0.140	1.100	DC10X08A□68U	68		0.140	1.700
DC08X09E□82U	82		0.160	1.000	DC10X08A□82U	82		0.160	1.600
DC08X09E□100U	100		0.190	0.900	DC10X08A□100U	100		0.210	1.400
DC08X09E□120U	120		0.220	0.820	DC10X08A□120U	120		0.240	1.300
DC08X09E□150U	150		0.270	0.740	DC10X08A□150U	150		0.320	1.200
DC08X09E□180U	180		0.310	0.710	DC10X08A□180U	180		0.350	1.100
DC08X09E□220U	220		0.380	0.640	DC10X08A□220U	220		0.450	0.960
DC08X09E□270U	270		0.530	0.570	DC10X08A□270U	270		0.610	0.870
DC08X09E□330U	330	0.610	0.510	DC10X08A□330U	330	0.690	0.790		
DC08X09E□390U	390	0.690	0.480	DC10X08A□390U	390	0.780	0.720		
DC08X09E□470U	470	0.890	0.430	DC10X08A□470U	470	1.000	0.660		
DC08X09E□560U	560	1.010	0.400	DC10X08A□560U	560	1.200	0.600		
DC08X09E□680U	680	1.180	0.350	DC10X08A□680U	680	1.400	0.550		
DC08X09E□820U	820	1.570	0.320	DC10X08A□820U	820	1.800	0.500		
DC08X09E□1M	1,000	1.870	0.300	DC10X08A□1M	1,000	2.100	0.450		
DC08X09E□1M2	1,200	2.100	0.270	DC10X10A□10U	10	0.022	5.300		
DC08X09E□1M5	1,500	2.800	0.230	DC10X10A□12U	12	0.023	4.900		
DC08X09E□1M8	1,800	3.210	0.210	DC10X10A□15U	15	0.026	4.400		
DC08X09E□2M2	2,200	1KHz	4.210	0.190	DC10X10A□18U	18	0.033	4.000	
DC08X09E□2M7	2,700		4.940	0.170	DC10X10A□22U	22	0.037	3.600	
DC08X09E□3M3	3,300		6.160	0.150	DC10X10A□27U	27	0.048	3.300	
DC08X09E□3M9	3,900		6.840	0.140	DC10X10A□33U	33	0.055	2.900	
DC08X09E□4M7	4,700		7.890	0.130	DC10X10A□39U	39	0.073	2.700	
DC08X09E□5M6	5,600		11.500	0.120	DC10X10A□47U	47	0.083	2.500	
DC08X09E□6M8	6,800		13.200	0.110	DC10X10A□56U	56	0.092	2.300	
DC08X09E□8M2	8,200		15.200	0.100	DC10X10A□68U	68	0.120	2.100	
DC08X09E□10M	10,000		22.000	0.089	DC10X10A□82U	82	0.140	1.900	
DC08X09E□12M	12,000		25.000	0.073	DC10X10A□100U	100	0.160	1.700	
DC08X09E□15M	15,000		29.100	0.068	DC10X10A□120U	120	0.200	1.500	
DC08X09E□18M	18,000		38.900	0.066	DC10X10A□150U	150	0.230	1.400	
DC08X09E□22M	22,000		44.900	0.056	DC10X10A□180U	180	0.310	1.300	
DC08X09E□27M	27,000		55.700	0.052	DC10X10A□220U	220	0.340	1.100	
DC08X09E□33M	33,000		64.200	0.048	DC10X10A□270U	270	0.400	1.000	
DC08X09E□39M	39,000		74.200	0.072	DC10X10A□330U	330	0.520	0.930	
DC08X09E□47M	47,000		96.400	0.038	DC10X10A□390U	390	0.650	0.860	
					DC10X10A□470U	470	0.710	0.780	
				DC10X10A□560U	560	1.000	0.710		
				DC10X10A□680U	680	1.100	0.650		
				DC10X10A□820U	820	1.300	0.590		
				DC10X10A□1M	1,000	1.700	0.530		