

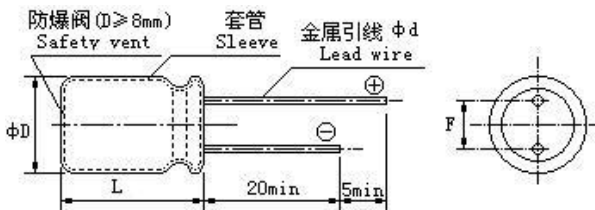
EL

- Low Impedance, Extra Long Life
- Endurance 5000-10000 hours at 105°C
- Comply with the RoHS

SPECIFICATIONS

Category Temperature	-40+105°C									
Voltage Range	6.3-100V.DC									
Capacitance Tolerance	±20%(120Hz,20°C)									
Leakage Current	I≤0.01CV(μA) or 3μA, whichever is greater (2 minutes))									
Dissipation Factor (120hz、20°C)	WV	6.3	10	16	25	35	50	63	80	100
	tgδ	0.22	0.19	0.16	0.14	0.12	0.10	0.09	0.09	0.08
When nominal capacitance is over 1000 μF, tanδ shall be added 0.02 to the list value with increase of every 1000 μF.										
Stability at Low Temperature (120Hz)	WV	6.3	10	16	25	35	50	63	80	100
	Z _{-25°C} /Z _{+20°C}	5	4	3	3	3	3	3	3	3
	Z _{-40°C} /Z _{+20°C}	10	8	5	4	4	4	4	4	4
Endurance	In an environment of +105°C, apply the operating voltage with ripple current for 5000-10000 hours, and after 16 hours of recovery, the product performance meets the following requirements:									
	Working Voltage	6.3-10V			16-100V			Diameter	6.3-10V	16-100V
	Capacitance	Within ±30%of			Within ±25%of initial			φ5~φ6.3	4000H	5000H
	Dissipation	≤200% of initial specified value								
	Leakage Current	≤initial specified value								
	≥Φ13	8000H	10000H							
Shelf Life	In an environment of +105°C, apply the operating voltage with ripple current for 1000 hours, and after 16 hours of recovery, the product performance meets the following requirements:									
	Capacitance Change	Within ±20%of initial measured value								
	Dissipation Factor	≤200% of initial specified value								
	Leakage Current	≤200% of initial specified value								

DRAWING & DIMENSIONS (Unit: mm)



ΦD	5	6.3	8	10	13	16	18
F±0.5	2.0	2.5	3.5	5.0	5.0	7.5	7.5
Φd±0.05	0.5	0.5	0.5	0.6	0.6	0.8	0.8
L	(L<20) ±1.5				(L≥20) ±2.0		
D	(D<20) ±0.5				(D≥20) ±1.0		

FREQUENCY COEFFICIENT OF ALLOWABLE RIPPLE CURRENT

Capacitance(μF) \ Coefficient	Frequency(Hz)			
	120	1K	10K	100K
Capacitance<47	0.55	0.70	0.90	1.00
47≤Capacitance<470	0.70	0.85	0.95	1.00
470≤Capacitance<1000	0.75	0.90	0.98	1.00
Capacitance≥1000	0.80	0.95	1.00	1.00

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NOMINAL CAPACITANCE, RATED VOLTAGE & DIMENSIONS

	6.3V (0J)				10V (1A)			
	Dimensions (mm)	ESR (Ω)	Ripple Current	Part Number	Dimensions (mm)	ESR (Ω)	Ripple Current	Part Number
100	5X11	0.58	210	EL0J101M0511BDH00000	5X11	0.58	210	EL1A101M0511BDH00000
150	5X11	0.58	210	EL0J151M0511BDH00000	5X11	0.58	210	EL1A151M0511BDH00000
220	6.3X12	0.22	340	EL0J221M6L12CDH00000	6.3X12	0.22	340	EL1A221M6L12CDH00000
330	6.3X12	0.22	340	EL0J331M6L12CDH00000	8X12	0.13	640	EL1A331M0812DDH00000
470	8X12	0.13	640	EL0J471M0812DDH00000	8X12	0.13	640	EL1A471M0812DDH00000
680	8X12	0.13	640	EL0J681M0812DDH00000	8X16	0.087	840	EL1A681M0816DDH00000
1000	8X16	0.087	840	EL0J102M0816DDH00000	8X20	0.069	1050	EL1A102M0820DDH00000
1500	10X20	0.046	1400	EL0J152M1020EDH00000	10X25	0.042	1650	EL1A152M1025EDH00000
2200	10X25	0.042	1650	EL0J222M1025EDH00000	13X20	0.035	1900	EL1A222M1320EDH00000
3300	13X20	0.035	1900	EL0J332M1320EDH00000	13X25	0.030	2124	EL1A332M1325EDH00000

	16V (1C)				25V (1E)			
	Dimensions (mm)	ESR (Ω)	Ripple Current	Part Number	Dimensions (mm)	ESR (Ω)	Ripple Current	Part Number
47	5X11	0.58	208	EL1C470M0511BDH00000	5X11	0.58	210	EL1E470M0511BDH00000
100	6.3X12	0.22	340	EL1C101M6L12CDH00000	6.3X12	0.22	340	EL1E101M6L12CDH00000
150	6.3X12	0.22	340	EL1C151M6L12CDH00000	6.3X12	0.22	340	EL1E151M6L12CDH00000
220	8X12	0.13	640	EL1C221M0812DDH00000	8X12	0.13	640	EL1E221M0812DDH00000
330	8X12	0.13	640	EL1C331M0812DDH00000	8X16	0.087	840	EL1E331M0816DDH00000
470	8X16	0.087	840	EL1C471M0816DDH00000	8X20	0.069	1050	EL1E471M0820DDH00000
680	8X20	0.069	1050	EL1C681M0820DDH00000	10X20	0.046	1400	EL1E681M1020EDH00000
1000	10X20	0.046	1400	EL1C102M1020EDH00000	13X20	0.035	1900	EL1E102M1320EDH00000
1500	13X20	0.035	1900	EL1C152M1320EDH00000	13X25	0.030	2124	EL1E152M1325EDH00000
2200	13X25	0.030	2124	EL1C222M1325EDH00000	13X30	0.027	2480	EL1E222M1330EDH00000
3300	13X30	0.027	2480	EL1C332M1330EDH00000	16X30	0.026	2880	EL1E332M1630FDH00000

Rated ripple current: (105°C, 100KHz); ESR: (20°C, 100KHz)

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NOMINAL CAPACITANCE, RATED VOLTAGE & DIMENSIONS

	35V (1V)				50V (1H)			
	Dimensions (mm)	ESR (Ω)	Ripple Current	Part Number	Dimensions (mm)	ESR (Ω)	Ripple Current	Part Number
4.7					5X11	3.0	75	EL1H4R7M0511BDH00000
6.8					5X11	3.0	91	EL1H6R8M0511BDH00000
10					5X11	1.4	110	EL1H100M0511BDH00000
15					5X11	1.4	110	EL1H150M0511BDH00000
22					6.3X12	0.505	183	EL1H220M6L12CDH00000
33	5X11	0.58	210	EL1V330M0511BDH00000	6.3X12	0.337	224	EL1H330M6L12CDH00000
47	6.3X12	0.337	224	EL1V470M6L12CDH00000	6.3X12	0.237	267	EL1H470M6L12CDH00000
68	6.3X12	0.237	267	EL1V680M6L12CDH00000	8X12	0.190	380	EL1H680M0812DDH00000
100	8X12	0.190	380	EL1V101M0812DDH00000	8X12	0.170	555	EL1H101M0812DDH00000
150	8X12	0.130	640	EL1V151M0812DDH00000	10X13	0.120	760	EL1H151M1013EDH00000
220	8X16	0.087	840	EL1V221M0816DDH00000	10X16	0.084	1050	EL1H221M1016EDH00000
330	10X16	0.060	1210	EL1V331M1016EDH00000	10X25	0.055	1440	EL1H331M1025EDH00000
470	10X20	0.046	1400	EL1V471M1020EDH00000	13X20	0.045	1660	EL1H471M1320EDH00000
680	13X20	0.035	1900	EL1V681M1320EDH00000	13X25	0.040	1930	EL1H681M1325EDH00000
1000	13X25	0.032	2124	EL1V102M1325EDH00000	16X25	0.036	2300	EL1H102M1625FDH00000
1500	13X30	0.030	2270	EL1V152M1330EDH00000	16X35	0.032	2750	EL1H152M1635FDH00000
2200	16X30	0.028	2780	EL1V222M1630FDH00000	18X35	0.030	3100	EL1H222M1835FDH00000

	63V (1J)				80V (1K)			
	Dimensions (mm)	ESR (Ω)	Ripple Current	Part Number	Dimensions (mm)	ESR (Ω)	Ripple Current	Part Number
10	5X11	2.3	49	EL1J100M0511BDH00000				
15	6.3X12	0.96	115	EL1J150M6L12CDH00000				
22	6.3X12	0.96	115	EL1J220M6L12CDH00000				
33	6.3X12	0.96	115	EL1J330M6L12CDH00000				
47	8X12	0.19	380	EL1J470M0812DDH00000				
68	8X12	0.17	555	EL1J680M0812DDH00000	8X12	0.400	340	EL1K680M0812DDH00000
100	8X16	0.14	610	EL1J101M0816DDH00000	8X16	0.270	460	EL1K101M0816DDH00000
150	10X16	0.11	700	EL1J151M1016EDH00000	10X16	0.210	520	EL1K151M1016EDH00000
220	10X20	0.080	920	EL1J221M1020EDH00000	10X20	0.130	850	EL1K221M1020EDH00000
330	13X20	0.065	1250	EL1J331M1320EDH00000	13X20	0.090	1150	EL1K331M1320EDH00000
470	13X25	0.053	1620	EL1J471M1325EDH00000	13X25	0.072	1300	EL1K471M1325EDH00000
680	13X30	0.043	1950	EL1J681M1330EDH00000	16X25	0.068	1600	EL1K681M1625FDH00000
1000					16X40	0.050	2200	EL1K102M1640FDH00000

	100V (2A)			
	Dimensions (mm)	ESR (Ω)	Ripple Current (mA)	Part Number
10	6.3X12	1.44	94	EL2A100M6L12CDH00000
15	6.3X12	0.96	115	EL2A150M6L12CDH00000
22	8X12	0.85	220	EL2A220M0812DDH00000
33	10X13	0.69	314	EL2A330M1013EDH00000
47	10X13	0.344	370	EL2A470M1013EDH00000
68	10X16	0.248	470	EL2A680M1016EDH00000
100	10X25	0.160	560	EL2A101M1025EDH00000
150	10X25	0.160	560	EL2A151M1025EDH00000
220	13X25	0.130	950	EL2A221M1325EDH00000
330	16X25	0.100	1440	EL2A331M1625FDH00000

Rated ripple current: (105°C, 100KH); ESR: (20°C,100KHz)