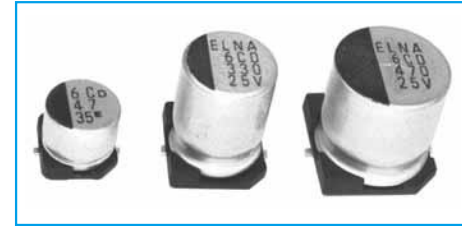
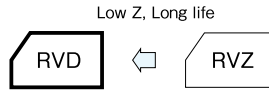


Chip Type, 105°C Use, Low Impedance, Long Life Capacitors

GREEN CAP SMD Low Z 105°C 2000hours Anti-cleaning solvent

- Compatible with surface mounting.
- Supplied with carrier taping.
- Guarantees 2000 hours at 105°C.
(6.3 to 50V 10.0L,10.5L:5000 hours)
(φ12.5x13.5L: 5000 hours)



Marking color : Black print

Specifications

Item	Performance										
Category temperature range (°C)	-55 to +105										
Tolerance at rated capacitance (%)	±20 (20°C,120Hz)										
Leakage current (μA)	Less than 0.01CV or 3 whichever is larger (after 2 minutes) C : Rated capacitance (μF), V : Rated voltage (V) (20°C)										
Tangent of loss angle (tanδ)	Rated voltage (V)	6.3	10	16	25	35	50	63	80	100	
	tanδ (max.)	0.26	0.19	0.16	0.14	0.12	0.10	0.08	0.08	0.07	
Characteristics at high and low temperature	Impedance ratio (max.)	Rated voltage (V)									
		Z-25°C/Z+20°C	2	2	2	2	2	2	2	2	2
		Z-40°C/Z+20°C	3	3	3	3	3	3	3	3	3
		Z-55°C/Z+20°C	8	4	4	3	3	3	3	3	3
Endurance (105°C)	Test time	2000 hours (6.3 to 50V 10.0L,10.5L,φ12.5x13.5L : 5000 hours)									
	Leakage current	The initial specified value or less									
	Percentage of capacitance change	Within ±30% of initial value									
	Tangent of the loss angle	200% or less of the initial specified value (6.3 to 50V 10.0L,10.5L,φ12.5x13.5L : 300% or less)									
Shelf life (105°C)	Test time : 1000 hours ; other items are the same as those for the endurance. Voltage application treatment : According to JIS C5101-1										
Applicable standards	JIS C 5101-1 1998, -18 1999(IEC 60384-1 1992, -18 1993)										

Outline Drawing

Unit : mm

φD	L	A	B	C	M	W	P	Casing symbol
4	5.8±0.3	4.3	4.3	2.0	0.4±0.2	0.5 to 0.8	1.0	D61
5	5.8±0.3	5.3	5.3	2.3	0.4±0.2	0.5 to 0.8	1.5	E61
6.3	5.8±0.3	6.6	6.6	2.7	0.4±0.2	0.5 to 0.8	2.0	F61
6.3	7.7±0.3	6.6	6.6	2.7	0.4±0.2	0.5 to 0.8	2.0	F80
8	6.5±0.3	8.4	8.4	3.4	0.4±0.2	0.5 to 0.8	2.3	G68
8	10±0.5	8.4	8.4	3.0	0.4±0.2	0.7 to 1.1	3.1	G10
8	10.5±0.5	8.4	8.4	3.0	0.4±0.2	0.7 to 1.1	3.1	GA5
10	10±0.5	10.4	10.4	3.3	0.4±0.2	0.7 to 1.1	4.7	H10
10	10.5±0.5	10.4	10.4	3.3	0.4±0.2	0.7 to 1.1	4.7	HA5
12.5	13.5±0.5	13.0	13.0	4.9	0.7±0.3	1.0 to 1.4	4.6	IE

Coefficient of Frequency for Rated Ripple Current

Frequency (Hz)	50	120	1k	10k·100k
Rated voltage (V)				
6.3 to 100	0.50	0.50	0.75	1

Part numbering system

φ10X10.5L or less (16V100μF)

RVD	—	16	V	101	M	F61	U	□
Series code		Rated voltage symbol		Rated capacitance symbol	Capacitance tolerance symbol	Casing symbol		Taping symbol

In the case of "for High Temperature Reflow" type, a series name is "RZB".

φ12.5X13.5 (16V1000μF)

RVD	—	16	V	102	M	IE	T	—	R5
Series code		Rated voltage symbol		Rated capacitance symbol	Capacitance tolerance symbol	Casing symbol			Taping symbol

- Soldering conditions are described on page 13.
- Land pattern size are described on page 11.
- The taping specifications are described on page 14.

Standard Ratings

Rated voltage (V)	Item	6.3				10				16			
		Case	Casing symbol	Impedance	Rated ripple current	Case	Casing symbol	Impedance	Rated ripple current	Case	Casing symbol	Impedance	Rated ripple current
		φD×L (mm)		(Ω max.)	(mA _{rms})	φD×L (mm)		(Ω max.)	(mA _{rms})	φD×L (mm)		(Ω max.)	(mA _{rms})
10	—	—	—	—	—	—	—	—	—	4×5.8	D61	1.35	90
22	4×5.8	D61	1.35	90	4×5.8	D61	1.35	90	4×5.8	D61	1.35	90	
											5×5.8	E61	0.70
33	—	—	—	—	4×5.8	D61	1.35	90	—	—	—	—	
					5×5.8	E61	0.70	170					
47	4×5.8	D61	1.35	90	—	—	—	—	5×5.8	E61	0.70	170	
	5×5.8	E61	0.70	170					6.3×5.8	F61	0.36	250	
100	5×5.8	E61	0.70	170	—	—	—	—	6.3×5.8	F61	0.36	250	
	6.3×5.8	F61	0.36	250									
220	6.3×5.8	F61	0.36	250	6.3×7.7	F80	0.30	300	6.3×7.7	F80	0.30	300	
					8×6.5	G68	0.30	300	8×6.5	G68	0.30	300	
330	6.3×7.7	F80	0.30	300	8×10	G10	0.16	600	8×10	G10	0.16	600	
	8×6.5	G68	0.30	300									
470	8×10	G10	0.16	600	8×10	G10	0.16	600	8×10	G10	0.16	600	
680	—	—	—	—	8×10	G10	0.16	600	10×10	H10	0.09	850	
									10×10.5	HA5	0.08	850	
1000	8×10	G10	0.16	600	10×10	H10	0.09	850	125×135	IE	0.054	1160	
					10×10.5	HA5	0.08	850					
1500	10×10	H10	0.09	850	125×135	IE	0.054	1160	125×135	IE	0.054	1160	
	10×10.5	HA5	0.08	850									
2200	125×135	IE	0.054	1160	125×135	IE	0.054	1160	—	—	—	—	

Rated voltage (V)	Item	25				35				50			
		Case	Casing symbol	Impedance	Rated ripple current	Case	Casing symbol	Impedance	Rated ripple current	Case	Casing symbol	Impedance	Rated ripple current
		φD×L (mm)		(Ω max.)	(mA _{rms})	φD×L (mm)		(Ω max.)	(mA _{rms})	φD×L (mm)		(Ω max.)	(mA _{rms})
4.7	—	—	—	—	4×5.8	D61	1.35	90	4×5.8	D61	2.7	60	
10	4×5.8	D61	1.35	90	4×5.8	D61	1.35	90	5×5.8	E61	1.5	90	
					5×5.8	E61	0.70	170	6.3×5.8	F61	0.86	170	
22	5×5.8	E61	0.70	170	5×5.8	E61	0.70	170	6.3×5.8	F61	0.86	170	
									6.3×7.7	F80	0.66	195	
33	5×5.8	E61	0.70	170	6.3×5.8	F61	0.36	250	8×6.5	G68	0.63	200	
	6.3×5.8	F61	0.36	250					6.3×7.7	F80	0.66	195	
47	6.3×5.8	F61	0.36	250	6.3×5.8	F61	0.36	250	8×6.5	G68	0.63	200	
									6.3×7.7	F80	0.66	195	
100	6.3×7.7	F80	0.30	300	6.3×7.7	F80	0.30	300	8×10	G10	0.34	350	
	8×6.5	G68	0.30	300					8×10.5	GA5	0.32	350	
220	8×10	G10	0.16	600	8×10	G10	0.16	600	10×10	H10	0.20	700	
									10×10.5	HA5	0.18	700	
330	8×10	G10	0.16	600	10×10	H10	0.09	850	125×135	IE	0.12	900	
					10×10.5	HA5	0.08	850					
470	10×10	H10	0.09	850	125×135	IE	0.054	1160	—	—	—	—	
	10×10.5	HA5	0.08	850									
680	125×135	IE	0.054	1160	125×135	IE	0.054	1160	—	—	—	—	
1000	125×135	IE	0.054	1160	—	—	—	—	—	—	—	—	

Rated voltage (V)	Item	63				80				100			
		Case	Casing symbol	Impedance	Rated ripple current	Case	Casing symbol	Impedance	Rated ripple current	Case	Casing symbol	Impedance	Rated ripple current
		φD×L (mm)		(Ω max.)	(mA _{rms})	φD×L (mm)		(Ω max.)	(mA _{rms})	φD×L (mm)		(Ω max.)	(mA _{rms})
4.7	5×5.8	E61	3.0	50	—	—	—	—	—	—	—	—	
10	6.3×5.8	F61	1.5	80	6.3×7.7	F80	2.4	60	—	—	—	—	
22	6.3×7.7	F80	1.2	120	8×10	G10	0.90	130	8×10	G10	1.30	130	
33	8×10	G10	0.65	250	8×10	G10	0.90	130	10×10	H10	0.70	200	
47	8×10	G10	0.65	250	10×10	H10	0.50	200	—	—	—	—	
68	8×10	G10	0.65	250	—	—	—	—	—	—	—	—	
100	10×10	H10	0.35	400	125×135	IE	0.18	550	—	—	—	—	
	125×135	IE	0.16	600									
220	125×135	IE	0.16	600	—	—	—	—	—	—	—	—	

(Note) Rated ripple current : 105°C, 100kHz
Impedance : 20°C, 100kHz