SEV SERIES

85℃ Standard, Lead Free Reflow Soldering

◆FEATURES

- Case Dia φ3～φ18mm
- Lead free reflow soldering is available.
- Available for high density mounting.
- RoHS compliance.

◆SPECIFICATIONS

Items	Characteristics
Category Temperature Range	−40～+85℃
Rated Voltage Range	4～100Vdc
Capacitance Tolerance	±20%(20℃,120Hz)
Leakage Current(MAX)	I=0.01CV or 3μA whichever is greater.(After 2 minutes application of rated voltage) I=Leakage Current(μA) C=Capacitance(μF) V=Rated Voltage(Vdc)
(tanδ) Dissipation Factor(MAX)	(20℃,120Hz)
Endurance	After applying rated voltage with rated ripple current for 2000 hrs at 85℃, the capacitors shall meet the following requirements.
Low Temperature Stability Impedance Ratio(MAX)	(120Hz)

Rated Voltage (Vdc)		4	6.3	10	16	25	35	50	63	100
tanδ	φ4,φ5,φ6.3×5.5	0.40	0.26	0.22	0.18	0.16	0.13	0.12	−	−
	φ6.3×8,φ8～φ12.5	0.50	0.35	0.26	0.20	0.16	0.14	0.12	0.12	0.10
	φ16,φ18	−	0.48	0.34	0.24	0.18	0.14	0.12	0.12	0.10

When rated capacitance is over 1000μF, tanδ shall be added 0.02 to the listed value with increase of every 1000μF.

Capacitance Change	Within ±25% of the initial value.
Dissipation Factor	Not more than 200% of the specified value.
Leakage Current	Not more than the specified value.

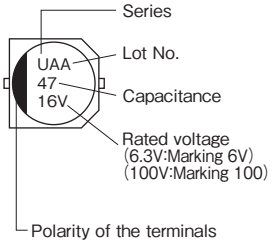
Rated Voltage (Vdc)	4	6.3	10	16	25	35	50	63	100
Z(−25℃)/Z(20℃)	7	4	3	2	2	2	2	2	2
Z(−40℃)/Z(20℃)	15	8	8	4	4	3	3	5	5

◆MULTIPLIER FOR RIPPLE CURRENT

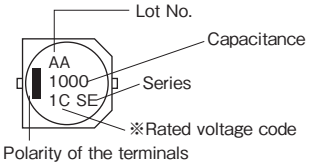
Frequency(Hz)		60(50)	120	500	1k	10k≦
Coefficient	0.47～1μF	0.50	1.00	1.20	1.30	1.50
	2.2～4.7μF	0.65	1.00	1.20	1.30	1.50
	10～47μF	0.80	1.00	1.20	1.30	1.50
	100～1000μF	0.80	1.00	1.10	1.15	1.20
	2200～10000μF	0.80	1.00	1.05	1.10	1.15

◆MARKING

〈φ4～φ10〉



〈φ12.5～φ18〉



※Voltage code

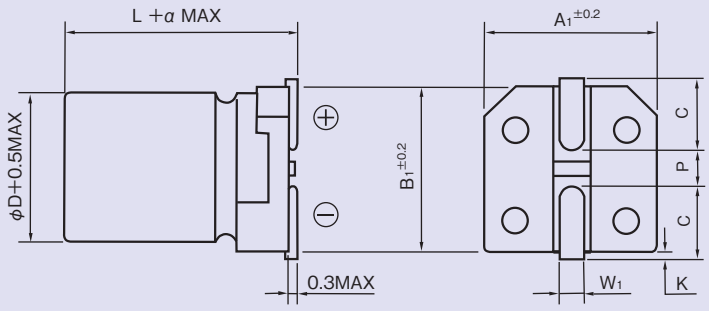
Rated Voltage (Vdc)	6.3	10	16	25	35	50	63	100
Rated Voltage code	0J	1A	1C	1E	1V	1H	1J	2A

◆PART NUMBER

□□□	SEV	□□□□□	□	□□□	D×L
Rated Voltage	Series	Capacitance	Capacitance Tolerance	Option	Case Size

◆DIMENSIONS

(mm)



φD	L	A1	B1	C	W1	P	K	α
4	5.5	4.3	4.3	1.8	0.5~0.8	1.0	0.5 MAX	0
5	5.5	5.3	5.3	2.2	0.5~0.8	1.3	0.5 MAX	0
6.3	5.5	6.6	6.6	2.7	0.5~0.8	1.8	0.5 MAX	0
6.3	8	6.6	6.6	2.7	0.5~0.8	1.8	0.5 MAX	0
8	6.5	8.3	8.3	3.4	0.5~0.8	2.2	0.5 MAX	0
8	10.5	8.3	8.3	2.9	0.8~1.1	3.1	0.5 MAX	0
10	10.5	10.3	10.3	3.2	0.8~1.1	4.5	0.5 MAX	0
12.5	13.5	13	13	4.9	0.8~1.1	4.5	0.7±0.4	0.5
12.5	16	13	13	4.9	0.8~1.1	4.5	0.7±0.4	0.5
16	16.5	17	17	6	1.0~1.6	6.8	0.7±0.4	0.5
16	21.5	17	17	6	1.0~1.6	6.8	0.7±0.4	0.5
18	16.5	19	19	7	1.0~1.6	6.8	0.7±0.4	0.5
18	21.5	19	19	7	1.0~1.6	6.8	0.7±0.4	0.5

◆STANDARD SIZE

Size φD×L(mm), Rated Ripple Current (mA r.m.s./85℃, 120Hz)

Vdc / Cap(μF)	4		6.3		10		16		25		35		50		63		100	
	Size	Ripple	Size	Ripple	Size	Ripple	Size	Ripple	Size	Ripple	Size	Ripple	Size	Ripple	Size	Ripple	Size	Ripple
0.47													4×5.5	4.0				
1													4×5.5	8.4				
2.2													4×5.5	14				
3.3													4×5.5	17				
4.7									4×5.5	18	4×5.5	18	4×5.5 5×5.5	18 22				
10							4×5.5	25	4×5.5	25	5×5.5	30	5×5.5 6.3×5.5	30 35			8×10.5	90
22			4×5.5	29			4×5.5 5×5.5	30 39			6.3×5.5	48	6.3×5.5 8×6.5	48 80	8×10.5	75	8×10.5	130
33	4×5.5	28			4×5.5 5×5.5	32 43	5×5.5	43	6.3×5.5	54	6.3×5.5	58	6.3×8 8×10.5	95 200	8×10.5	160	10×10.5	170
47	4×5.5	34	4×5.5 5×5.5	36 46			5×5.5 6.3×5.5	50 60	6.3×5.5	60	6.3×8 8×6.5	105 115	8×10.5 10×10.5	240 280	8×10.5	170	12.5×13.5	250
100	5×5.5	61	5×5.5 6.3×5.5	61 71	6.3×5.5	71	6.3×5.5 8×6.5	86 135	6.3×8 8×6.5	145 160	8×10.5 10×10.5	280 480	8×10.5 10×10.5	320 500	10×10.5	240	12.5×16	440
220	6.3×5.5	96	6.3×5.5	96	6.3×8 8×6.5	175 190	6.3×8 8×10.5	165 290	8×10.5 10×10.5	300 560	10×10.5	570	12.5×13.5	580	12.5×16	580	16×21.5 18×16.5	665
330			6.3×8 8×6.5	190 210	8×10.5	330	8×10.5 10×10.5	330 670	10×10.5	680			12.5×13.5	600	18×16.5	680	18×21.5	825
470	6.3× 8	200	8×10.5	380	8×10.5 10×10.5	380 680	8×10.5 10×10.5	385 690	12.5×13.5	700	12.5×13.5	700	16×16.5	740	16×21.5 18×16.5	850		
1000			10×10.5	700	12.5×13.5	710	12.5×13.5	720	12.5×16	820	16×16.5	1000	18×21.5	1150				
2200			12.5×16	890	12.5×16	960	16×16.5	1150	16×21.5 18×16.5	1350	18×21.5	1550						
3300			16×16.5	1200	16×16.5	1300	16×21.5 18×16.5	1450	18×21.5	1700								
4700			16×16.5	1400	16×21.5 18×16.5	1500	18×21.5	1750										
6800			16×21.5 18×16.5	1650	18×21.5	1850												
10000			18×21.5	2000														