

## VT series

- Standard type of V-chip, 2000 hours, 105°C.
- Applicable to SMT process.
- RoHS Compliance.
- 105°C 2000hours V-Chip型標準品。
- 適用於SMT製程。

### SPECIFICATIONS

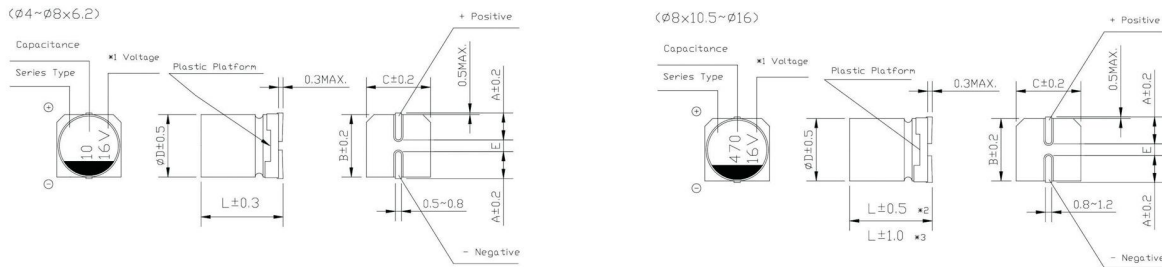
Items 項目	Performance Characteristics 特性									
Operating Temperature Range 適用溫度範圍	-55 ~ 105°C									
Rated Voltage Range 額定電壓範圍	4 ~ 100V									
Capacitance Range 靜電容量範圍	0.1 ~ 6800 $\mu$ F									
Capacitance Tolerance 靜電容量誤差	$\pm 20\%$ at 120 Hz 20°C									
Leakage Current 洩電電流	after 2 minutes application of rated voltage leakage current is not more than 0.01CV or 3( $\mu$ A) whichever is greater.									
Dissipation Factor 散逸因素 Tan $\delta$	Measurement frequency 120Hz Temperature 20°C									
	Rated voltage (V)	4	6.3	10	16	25	35	50	63	100
	Tan $\delta$ (max)	0.35	0.32	0.28	0.24	0.18	0.15	0.14	0.14	0.14
Low Temperature Stability 低溫特性 Impedance Ratio(Max) 阻抗比率(最大值)	Measurement frequency									
	Rated voltage (V.DC)	4	6.3	10	16	25	35	50	63	100
	Z(-25°C)/Z(20°C)	7	4	3	2	2	2	2	2	3
	Z(-55°C)/Z(20°C)	15	8	8	4	4	3	3	3	4
Load Life 負荷壽命	After 2000 hours, with application of rated voltage at 105°C									
	Capacitance Change	Within $\pm 20\%$ of Initial Value								
	tan $\delta$	200% or less of Initial Specified Value								
	Leakage Current	Initial Specified Value or less								
Shelf Life 放置壽命	The following specifications shall be satisfied when the capacitors are restored to 20°C after exposing them for 1,000 hours 105°C without voltage applied. Before the measurement, the capacitor shall be preconditioned by applying voltage according to them 4.1 of JIS C5101-4.									
	Capacitance Change	Within $\pm 25\%$ of Initial Value								
	tan $\delta$	200% or less of Initial Specified Value								
	Leakage Current	Initial Specified Value or less								
Resistance to Soldering Heat 焊錫耐熱性	After reflow soldering and restored at room temperature they meet the characteristics requirements listed at right.									
	Capacitance Change	Within $\pm 10\%$ of Initial Value								
	tan $\delta$	Initial Specified Value or less								
	Leakage Current	Initial Specified Value or less								
Applicable Standards	JIS C-5141 and JIS C-5102									

### Frequency Correction Factor of Rated Ripple Current

Frequency(Hz)	50Hz	120Hz	300Hz	1kHz	10kHz~
Coefficient	0.70	1.00	1.17	1.36	1.50

# Aluminum Electrolytic Capacitor

## VT series



- 1 Voltage mark 6V represents 6.3V for  $\phi 4\sim\phi 10$
- 2  $L\pm 0.3$  is applicable to  $\phi 6.3\times 7.7$  and  $\phi 8\times 6.2$
- 3  $L\pm 0.5$  is applicable to  $\phi 8\times 10.5\sim\phi 10$
- 4  $L\pm 1.0$  is applicable to  $\phi 12.5\sim\phi 16$ .

mm

D×L	4×5.4	5×5.4	6.3×5.4	6.3×7.7	8×6.2	8×10.5	10×10.5	10×13.5	12.5×13.5	12.5×16	16×16.5
A	1.8	2.1	2.4	2.4	3.3	2.	3.2	3.2	4.7	4.7	5.5
B	4.3	5.3	6.6	6.6	10.0	8.3	10.3	10.3	12.8	12.8	16.3
C	4.3	5.3	6.6	6.6	8.3	8.3	10.3	10.3	12.8	12.8	16.3
E	1.0	1.3	2.2	2.2	2.2	3.1	4.4	4.4	4.4	4.4	6.7
L	5.4	5.4	5.4	7.7	6.2	10.5	10.5	13.5	13.5	16.0	16.5

### Standard size

DxL (mm) ,Ripple Current (mArms) at 105°C 120Hz

WV Cap.( $\mu$ F)	4		6.3		10		16		25	
	D x L	R.C.	D x L	R.C.	D x L	R.C.	D x L	R.C.	D x L	R.C.
4.7									4×5.4	13
10							4×5.4	18	5×5.4	20
									4×5.4	14
22			4×5.4	22	5×5.4	25	5×5.4	27	6.3×5.4	36
					4×5.4	20	4×5.4	20	5×5.4	25
33	5×5.4	30	5×5.4	27	5×5.4	30	6.3×5.4	40	6.3×5.4	44
	4×5.4	18	4×5.4	22	4×5.4	22	5×5.4	28	5×5.4	29
47	5×5.4	36	5×5.4	33	6.3×5.4	41	6.3×5.4	48	6.3×5.4	4
	4×5.4	24	4×5.4	25	5×5.4	30	5×5.4	31	8×6.2	91
100	6.3×5.4	60	6.3×5.4	50	6.3×5.4	53	6.3×5.4	60	6.3×7.7	91
	5×5.4	43	5×5.4	30	8×6.2	110	8×6.2	120		
150	6.3×5.4	52	6.3×5.4	55	6.3×5.4	62	6.3×7.7	95	8×10.5	140
									6.3×7.7	100
220	6.3×5.4	57	6.3×7.7	105	6.3×7.7	105	8×10.5	150	8×10.5	175
			6.3×5.4	67	8×6.2	105	6.3×7.7	105		
330	6.3×7.7	100	6.3×7.7	105	8×10.5	196	8×10.5	195	10×10.5	240
									8×10.5	220
470	6.3×7.7	105	8×10.5	210	10×10.5	260	10×10.5	25	10×10.5	280
			6.3×7.7	120	8×10.5	210	8×10.5	230		
680	8×10.5	210	8×10.5	210	10×10.5	270	10×10.5	315	10×13.5	400
1000	8×10.5	230	10×10.5	300	10×10.5	315	12.5×13.5	500	12.5×13.5	580
			8×10.5	230			10×13.5	300		
1500	10×10.5	315	10×13.5	450	10×13.5	460	12.5×13.5	550	12.5×16	850
2200	10×13.5	440	12.5×13.5	620	12.5×13.5	680	16×16.5	950	16×16.5	1050
	10×10.5	340	10×13.5	500			12.5×16.5	750		
3300	10×13.5	490	12.5×16	700	16×16.5	1000	16×16.5	1000		
4700	12.5×13.5	600	16×16.5	1000						
6800	16×16.5	950								
	12.5×16	650								

## VT series

### Standard size

DxL (mm) ,Ripple Current (mA rms) at 105°C 120Hz

WV Cap.( $\mu$ F)	35		50		63		100	
	D x L	R.C.	D x L	R.C.	D x L	R.C.	D x L	R.C.
0.1			4x5.4	0.7	4x5.4	0.7		
0.2			4x5.4	1.6	4x5.4	1.6		
0.3			4x5.4	2.5	4x5.4	2.5		
0.5			4x5.4	3.5	4x5.4	3.5		
1.0			4x5.4	7	4x5.4	7	4x5.4	7
2.2			4x5.4	11	4x5.4	11	6.3x5.4	14
3.3	4x5.4	13	4x5.4	13	5x5.4	13	6.3x7.7	32
							6.3x5.4	20
4.7	4x5.4	14	5x5.4	16	5x5.4	16	6.3x7.7	35
			4x5.4	13			6.3x5.4	21
10	5x5.4	21	6.3x5.4	24	6.3x7.7	30	8x10.5	77
	4x5.4	14			6.3x5.4	24	6.3x7.7	35
22	6.3x5.4	38	6.3x7.7	51	8x10.5	98	10x10.5	126
			6.3x5.4	42	6.3x7.7	49	8x10.5	84
33	6.3x5.4	42	6.3x7.7	60	8x10.5	112	10x10.5	133
47	6.3x7.7	70	8x10.5	120	10x10.5	160	12.5x13.5	250
	6.3x5.4	50	6.3x7.7	63	8x10.5	119	10x13.5	160
68							12.5x13.5	300
							10x13.5	180
100	8x10.5	120	10x10.5	170	12.5x13.5	270	16x16.5	450
	6.3x7.7	84	8x10.5	140	10x13.5	210	12.5x13.5	380
150	8x10.5	155	10x10.5	170	10x13.5	225		
220	10x10.5	220	10x13.5	280	16x16.5	560	16x16.5	550
	8x10.5	190	10x10.5	220	12.5x13.5	470		
330	10x10.5	245	16x16.5	600	16x16.5	700		
			12.5x13.5	420	12.5x16	510		
470	12.5x13.5	520	16x16.5	700	16x16.5	750		
	10x13.5	375	12.5x16	520	16x16.5	750		
680	12.5x13.5	530	16x16.5	750				
	10x13.5	395						
1000	16x16.5	750						
	12.5x16	600						