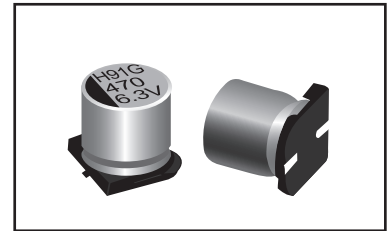
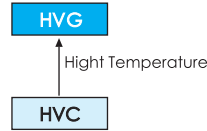


- Chip Type, Higher Temperature 125°C, 1000 hours
- Low ESR, high ripple current capability
- Applications: DC/DC Converter, Switching Power Supply, Back up Power Supplies for CPU etc.
- RoHS Compliant



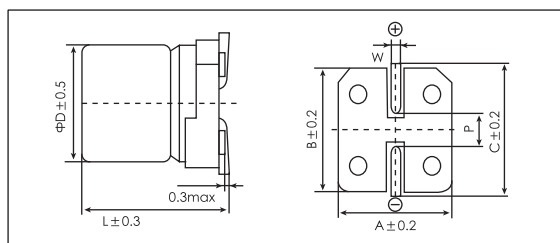
Items	Characteristics
Operating Temperature Range (°C)	-55 ~ +125
Voltage Range (V)	2.5 ~ 20
Capacitance Range (μF) (20°C, 120Hz)	22 ~ 560
Capacitance Tolerance (20°C, 120Hz)	± 20%
Surge Voltage	$U_r \times 1.15$
Leakage Current (μA) ※1	Please see the attached ratings list (20°C, 2min)
Dissipation Factor (20°C, 120Hz)	Please see the attached ratings list
Equivalent Series Resistance (20°C, 100kHz)	Please see the attached ratings list
Temperature Characteristics (Max Impedance Ratio at 100kHz)	$Z_{+125^\circ\text{C}} / Z_{+20^\circ\text{C}} \leq 1.25$ $Z_{-55^\circ\text{C}} / Z_{+20^\circ\text{C}} \leq 1.25$
Endurance	1000h, Rated voltage applied at 125°C Capacitance change: within ± 20% of the initial measured value Dissipation Factor (Tan δ): ≤ 200% of initial specified value ESR: ≤ 200% of initial specified value DC Leakage Current: ≤ the initial specified value
Damp heat(Steady state)	1000h, No-applied voltage 60°C, 90~95% RH Capacitance change: within ± 20% of the initial measured value Dissipation Factor (Tan δ): ≤ 150% of initial specified value ESR: ≤ 150% of initial specified value DC Leakage Current: ≤ the initial specified value (after voltage processing)
Resistance to soldering heat	Reflow method (260°C×5s) Capacitance change: within ± 10% of the initial measured value Dissipation Factor (Tan δ): ≤ 130% of initial specified value ESR: ≤ 130% of initial specified value DC Leakage Current: ≤ the initial specified value (after voltage processing)

※1 In case of some problems for measured values, measure after applying rated voltage for 120 minutes at 125°C.

Dimensions

mm

Size list



(unit:mm)

Size Code	ΦD±0.5	L	A±0.2	B±0.2	C±0.2	W	P±0.2
F60	6.3	5.7	6.6	6.6	7.3	0.5~0.8	2.0
B70	8	6.7	8.3	8.3	9.0	0.5~0.8	3.1

U _r [S.V] Cap.(μF)	2.5 [2.9]	4 [4.6]	6.3 [7.2]	10 [12]	16 [18]	20 [23]
22						F60
39					F60	
47						B70
56				F60		
82			F60		B70	
100			F60			
120				B70		
150		F60	B70	B70		
180						
220	F60	B70	B70			
330				B70		
470						
560	B70					

Ratings for HVG Series

U _R Code	Rated Capacitance 20°C, 120Hz	Max ESR 20°C, 100kHz	Allowable Ripple Current 100kHz, T ≤ 105°C	Rated Ripple Current 100kHz, 105°C < T ≤ 125°C	Dissipation Factor 20°C, 120Hz	Leakage Current 20°C, 2min	Size ΦD x L	P/N
(V)	(μF)	(mΩ)	(mArms)	(mArms)	(%)	(μA)	(mm)	-
2.5 0E	220	35	2500	770	12	110	6.3×5.7	PCV0EVG221MF60□□
	560	30	3100	960	12	280	8×6.7	PCV0EVG561MB70□□
4 0G	150	35	2450	770	12	120	6.3×5.7	PCV0GVG151MF60□□
	220	30	3020	960	12	176	8×6.7	PCV0GVG221MB70□□
6.3 0J	82	40	2400	720	12	103	6.3×5.7	PCV0JVG820MF60□□
	100	40	2400	720	12	126	6.3×5.7	PCV0JVG101MF60□□
	150	30	3020	960	12	189	8×6.7	PCV0JVG151MB70□□
	220	30	3020	960	12	277	8×6.7	PCV0JVG221MB70□□
10 1A	56	45	2250	680	12	112	6.3×5.7	PCV1AVG560MF60□□
	120	35	2800	880	12	240	8×6.7	PCV1AVG121MB70□□
	150	35	2800	880	12	300	8×6.7	PCV1AVG151MB70□□
	330	35	2800	880	12	660	8×6.7	PCV1AVG331MB70□□
16 1C	39	50	2050	650	12	125	6.3×5.7	PCV1CVG390MF60□□
	82	40	2700	830	12	262	8×6.7	PCV1CVG820MB70□□
20 1D	22	60	1650	590	12	88	6.3×5.7	PCV1DVG220MF60□□
	47	45	2000	780	12	188	8×6.7	PCV1DVG470MB70□□

Customer products are available on request.

Frequency coefficient for ripple current

Frequency	120Hz ≤ f < 1kHz	1kHz ≤ f < 10kHz	10kHz ≤ f < 100kHz	100kHz ≤ f < 500kHz
Coefficient	0.05	0.3	0.7	1