

VE series

Long life to 15000hours

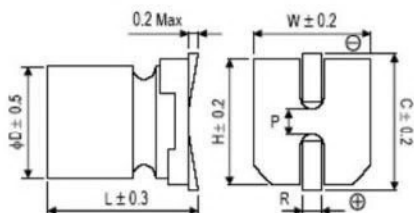
- SMD Type, Low ESR, High ripple current
- Load life of 15000 hours at 105°C
- Compliant to the RoHS directive (2011/65/EU)

低ESR和超大纹波电流贴片固态产品，产品满足RoHS指令(2011/65/EU)。

» Specifications

Items	Characteristics	
Operating Temp. Range	-55°C ~ +105°C	
Capacitance Range	150 ~ 2700 μ F	
Capacitance Tolerance	M: \pm 20%	
Rated Voltage Range	2.5V ~ 10V DC	
Dissipation Factor (at 120Hz, 20°C)	Not to exceed the value specified Not to exceed the value specified (after 2 minutes)	
Leakage Current	Not to exceed the value specified	
ESR (100K~300KHz)	Capacitance Change	Within \pm 20% of the value before test
	Leakage current	Not to exceed the value specified
Endurance 105°C, 15000h, at rated voltage	ESR	Not to exceed 150% of the value specified
	Dissipation Factor	Not to exceed 150% of the value specified
	Capacitance Change	Within \pm 20% of the value before test
Moisture Resistance Stored at 60°C, Rh90 ~ 95%, 1000h	Leakage Current	Not to exceed the value specified
	ESR	Not to exceed 150% of the value specified
	Dissipation Factor	Not to exceed 150% of the value specified
	Capacitance Change	Within \pm 20% of the value before test

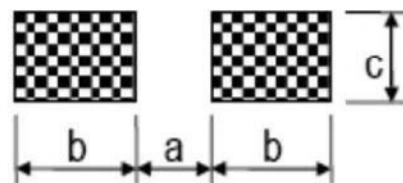
» Diagram of Dimensions



(unit: mm)

ϕ D \times L	W	H	C	R	P
6.3 \times 5.8	6.6	6.6	7.2	0.5to0.8	2.1
6.3 \times 7.7	6.6	6.6	7.2	0.5to0.8	2.1
8 \times 9.2	8.3	8.3	9.0	0.8to1.1	3.2
8 \times 12.2	8.3	8.3	9.0	0.8to1.1	3.2
10 \times 10.5	10.3	10.3	11.0	0.8to1.1	4.6
10 \times 12.7	10.3	10.3	11.0	0.8to1.1	4.6

» Recommended land pattern



(unit: mm)

ϕ D \times L	a	b	c
6.3 \times 5.8	2.1	3.5	1.6
6.3 \times 7.7	2.1	3.5	1.6
8 \times 9.2	2.8	4.2	1.9
8 \times 12.2	2.8	4.2	1.9
10 \times 10.5	4.3	4.4	1.9
10 \times 12.7	4.3	4.4	1.9

» Capacitance List

W.V (S.V) SIZE	2.5 (2.8)	4 (4.6)	6.3 (7.2)	10 (11.5)
6.3 × 5.8	330~560 uF	270~390 uF	220~330 uF	
6.3 × 7.7	560~820 uF	390~560 uF	330~470 uF	150~220 uF
8 × 9.2	1000~1800 uF	680~1200 uF	560~1000 uF	220~330 uF
8 × 12.2	1200~2200 uF	1000~1800 uF	820~1500 uF	390~680 uF
10 × 10.5	1200~2200 uF	1000~1800 uF	1000~1800 uF	560~1000 uF
10 × 12.7	1500~2700 uF	1200~2200 uF	1200~2200 uF	560~1000 uF

» Characteristics List

W.V (V)	Capacitance (uF)	L.C. (uA, 2min)	tg δ (120Hz, 20°C)	ESR (mΩ, 100kHz)	Rated Ripple Current (mA, r. m. s)	Size Φ D × L (mm)	Part Number
2.5	560	300	0.08	15	2800	6.3 × 5.8	VE561M2R5E058TR
	680	340	0.08	12	3500	6.3 × 7.7	VE681M2R5E077TR
	1200	600	0.08	8	5300	8 × 9.2	VE122M2R5F092TR
	1800	900	0.08	8	5700	8 × 12.2	VE182M2R5F122TR
	2200	1100	0.08	8	5500	10 × 10.5	VE222M2R5G105TR
	2700	1350	0.08	7	6100	10 × 12.7	VE272M2R5G127TR
4	330	300	0.08	15	2800	6.3 × 5.8	VE331M004E058TR
	470	376	0.08	12	3500	6.3 × 7.7	VE471M004E077TR
	820	656	0.08	8	5300	8 × 9.2	VE821M004F092TR
	1200	960	0.08	8	5700	8 × 12.2	VE122M004F122TR
	1500	1200	0.08	8	5500	10 × 10.5	VE152M004G105TR
	2200	1760	0.08	7	6100	10 × 12.7	VE222M004G127TR
6.3	330	415.8	0.08	15	2800	6.3 × 5.8	VE331M6R3E058TR
	470	592.2	0.08	12	3500	6.3 × 7.7	VE471M6R3E077TR
	560	705.6	0.08	8	5300	8 × 9.2	VE561M6R3F092TR
	1000	1260	0.08	8	5700	8 × 12.2	VE102M6R3F122TR
	1200	1512	0.08	8	5500	10 × 10.5	VE122M6R3G105TR
	1800	2268	0.08	7	6100	10 × 12.7	VE182M6R3G127TR
10	220	440	0.08	18	2500	6.3 × 5.8	VE221M010E058TR
	330	660	0.08	12	3500	6.3 × 7.7	VE331M010E077TR
	560	1120	0.08	8	5300	8 × 9.2	VE561M010F092TR
	820	1640	0.08	8	5700	8 × 12.2	VE821M010F122TR
	1000	2000	0.08	8	5500	10 × 10.5	VE102M010G105TR

» Frequency Coefficient for Ripple Current

Frequency	120Hz ≤ freq. < 1KHz	1KHz ≤ freq. < 10KHz	10KHz ≤ freq. < 100KHz	100KHz ≤ freq. < 300KHz
Coefficient	0.05	0.3	0.7	1