

# 150°C Use, Miniature, Low ESR, High Vibration Resistance Capacitors



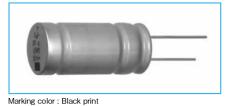




- Vibration resistance (40G,10 to 2000Hz, X,Y,Z = per 2hours).
- For Automotive application (ABS and electric power steering etc.)
- •Guaranteed 2000 hours at 150℃

(63V, 80V: 1000 hours)

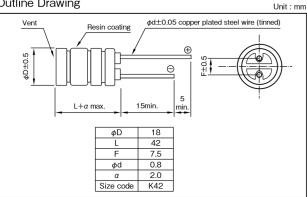




#### Specifications

Item	Performance								
Category temperature range (°C)	-40 to +150								
Tolerance at rated capacitance (%)	±20 (20°C,120Hz								
Leakage current (μΑ) (max.)	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)	25	35	50	63	80			
	tanδ (max.)	0.14	0.12	0.10	0.10	0.08			
	0.02 is added to every 1000µF increase over 1000µF. (20°C,1								
Characteristics at high and low temperature	Rated voltage (V)	25	35	50	63	80			
	Impedance ratio (max.) Z-40°C/Z+20°C	3	3	3	3	3			
		(120Hz)							
	Test time	2000 hours (63V, 80V : 1000 hours)							
Endurance	Leakage current	The initial specified value or less							
(150°C or 125°C) (Applied ripple current)	Percentage of capacitance change	Within ±30% of initial value							
(, the mean tiple is called it)	Tangent of the loss angle	300% or less of the initial specified value							
Shelf life (150°C)	Test time: 1000hours; other items are same as the endurance. Voltage application treatment: According to JIS C5101-4 4.1								
	Vibration test condition								
	Frequency range 10 to 2000Hz								
	Amplitude or Acceleration 1.5 mm peak to peak or 40G (392m/s²), whichever is the less severe								
Vibration	Sweep rate	0.5 octave/min.							
	Vibration axis and duration	X, Y, Z per 2 hours, total 6 hours							
	Fixation								
	Specification after test								
	Leakage current	The initial specified value or less							
	Percentage of capacitance change	Within ±30% of initial value							
	Tangent of the loss angle	300% or less of the initial specified value							
Applicable standards	JIS C5101 - 1, - 4 (IEC 60384 - 1, - 4)								

### **Outline Drawing**



## Coefficient of Frequency for Rated Ripple Current

Rated Frequency (Hz) capacitance (µF)	120	1k	10k	100k
800	0.75	0.90	1.00	1
1200 to 3900	0.85	0.95	1.00	1

Product code system : 35V2700μF (*For automotive: powertrain, safety)							
RA*	RKG	272	М	1G	K42		Т
Category code	Series code	capacitance code	Cap tol.	Voltage code	Size code	Lead-forming and packing code	Additional code

For details, refer to the various "Product Code System" pages.

## Standard Ratings

Rated voltage	Rated capacitance	$\begin{array}{c} \text{ESR} \\ (\Omega \text{ max.} / \text{100kHz}) \end{array}$		Rated ripple current (mArms / 100kHz)		
(V)	(μF)	20℃	-40℃	150℃	125℃	
25 (1T)	3900	0.020	0.11	3100	8000	
35 (1G)	2700	0.020	0.11	3100	8000	
50 (1U)	1800	0.034	0.19	2800	7000	
63 (4E)	1200	0.034	0.19	2900	7300	
80 (1R)	800	0.034	0.19	2900	7300	