

# MINIATURE ALUMINUM ELECTROLYTIC CAPACITORS



## ZE High Ripple Current, Height 5mmL Series

**M** Miniaturized **S** Solvent Proof **IZI** Low Impedance



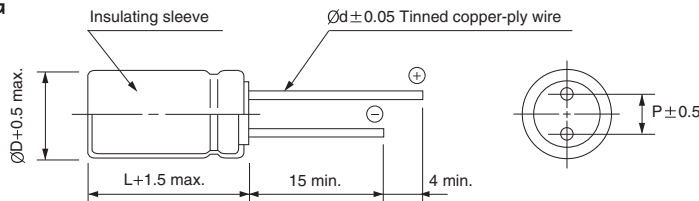
- Super miniature series with 5mmL height
- High ripple current & high temperature with RE series
- Load life of 2000 hours at 105°C
- Complied to the RoHS directive

**RE** → **ZE**  
High Ripple

Item	Characteristics					
Operating temperature range	-55 ~ +105°C					
Leakage current	I = 0.01CV or 3µA whichever is greater (after 2 minutes) I = 0.03CV or 4µA whichever is greater (after 1 minute)					
Capacitance tolerance	±20% at 120Hz, 20°C					
Dissipation factor max. (at 120Hz, 20°C)	WV	6.3	10	16	25	35
	tanδ	0.22	0.20	0.18	0.14	0.12
Low temperature characteristics (Impedance ratio at 120Hz)	WV	6.3	10	16	25	35
	Z-25°C / Z+20°C	3	3	2	2	2
	Z-40°C / Z+20°C	9	7	5	3	3
Load life	After an application of DC bias voltage plus the rated AC ripple current for 2000 hours at 105°C. The measurement shall meet the following limits. The DC voltage plus the peak AC voltage combined must not exceed the rated voltage.					
	Leakage current	Less than specified value				
	Capacitance change	Within ±20% of the initial value				
	tanδ	Less than 200% of the specified value				
Shelf life (at 105°C)	After 1000 hours no load test, leakage current, capacitance and tanδ are same as load life value. The measurement shall be performed at 20°C by the KS C IEC 60384 - 4					

### DRAWING

Unit : mm



ØD	5	6.3
P	2.0	2.5
Ød	0.45	0.45

### DIMENSIONS & MAXIMUM PERMISSIBLE RIPPLE CURRENT

WV Item µF	6.3			10			16			25			35		
	ØD×L (mm)	Imp.(Ω) max. 20°C 100kHz	Ripple current (mA rms) 105°C 100kHz	ØD×L (mm)	Imp.(Ω) max. 20°C 100kHz	Ripple current (mA rms) 105°C 100kHz	ØD×L (mm)	Imp.(Ω) max. 20°C 100kHz	Ripple current (mA rms) 105°C 100kHz	ØD×L (mm)	Imp.(Ω) max. 20°C 100kHz	Ripple current (mA rms) 105°C 100kHz	ØD×L (mm)	Imp.(Ω) max. 20°C 100kHz	Ripple current (mA rms) 105°C 100kHz
1													5×5	2.40	100
1.5													5×5	2.40	100
2.2													5×5	2.40	100
3.3													5×5	2.40	100
4.7													5×5	2.40	100
6.8													5×5	2.40	100
10													5×5	2.40	100
15							5×5	2.40	100	5×5	2.40	100	5×5	2.40	100
22							5×5	2.40	100	5×5	2.40	100	6.3×5	0.75	140
33	5×5	2.40	100	5×5	2.40	100	5×5	2.40	100	6.3×5	0.75	140	6.3×5	0.75	140
47	5×5	2.40	100	5×5	2.40	100	6.3×5	0.75	140	6.3×5	0.75	140			
68	6.3×5	0.75	140	6.3×5	0.75	140	6.3×5	0.75	140						
100	6.3×5	0.75	140	6.3×5	0.75	140									

### FREQUENCY COEFFICIENT OF PERMISSIBLE RIPPLE CURRENT

µF	Frequency	120Hz	1kHz	10kHz	50kHz	100kHz ≤
~ 33		0.35	0.55	0.75	0.87	1.00
47 ~		0.40	0.60	0.80	0.90	1.00