

# ALUMINUM ELECTROLYTIC CAPACITORS

LZT series

LXU

high ripple

LZT

## FEATURES

- Enabled high ripple current by a reduction of impedance at high frequency range  
高頻低阻，高紋波
- Load life: 105°C 5000~6000 hours  
壽命：105°C 5000~6000 小時

## SPECIFICATIONS

Item 項目	Performance Characteristics 特性																			
Operating Temperature Range 工作溫度範圍	-55°C~105°C																			
Rated Voltage Range 額定電壓範圍	6.3~35W.V.																			
Capacitance Range 靜電容量範圍	47~3300 $\mu$ F																			
Capacitance Tolerance 靜電容量誤差	$\pm 20\%$ (20°C, 120Hz)																			
Leakage Current 洩漏電流	$I=0.01CV$ or $3\mu A$ whichever is greater.(After 2 minutes) $I=0.01CV$ or $3\mu A$ 取較大值.(2 分鐘後) $I$ =Leakage Current( $\mu A$ ), $C$ =Nominal Capacitance( $\mu F$ ), $V$ =Rated Voltage(V) $I$ =洩漏電流 ( $\mu A$ ), $C$ =額定容量( $\mu F$ ), $V$ =額定電壓(V)																			
Dissipation Factor ( $\tan \delta$ ) 散逸因素 (損失角正切值)	When nominal capacitance is over 1000 $\mu F$ , $\tan \delta$ shall be added 0.02 to the listed value with increase of every 1000 $\mu F$ . 容量超過 1000 $\mu F$ 時，額定容量每增加 1000 $\mu F$ ，以下損失角增加 0.02. <table border="1" style="margin-top: 5px;"> <tr> <td>Rated voltage 額定電壓 (V)</td> <td>6.3</td> <td>10</td> <td>16</td> <td>25</td> <td>35</td> <td rowspan="2">MAX (20°C 120Hz)</td> </tr> <tr> <td>Tan <math>\delta</math> 損失角正切值</td> <td>0.22</td> <td>0.19</td> <td>0.16</td> <td>0.14</td> <td>0.12</td> </tr> </table>	Rated voltage 額定電壓 (V)	6.3	10	16	25	35	MAX (20°C 120Hz)	Tan $\delta$ 損失角正切值	0.22	0.19	0.16	0.14	0.12						
Rated voltage 額定電壓 (V)	6.3	10	16	25	35	MAX (20°C 120Hz)														
Tan $\delta$ 損失角正切值	0.22	0.19	0.16	0.14	0.12															
Low Temperature Stability Impedance Ratio(MAX) 低溫特性阻抗比率	<table border="1" style="margin-top: 5px;"> <tr> <td>Rated Voltage 額定電壓(V)</td> <td>6.3</td> <td>10</td> <td>16</td> <td>25</td> <td>35</td> <td rowspan="3">MAX (120Hz)</td> </tr> <tr> <td>Z(-25°C)/Z(+20°C)</td> <td>2</td> <td>2</td> <td>2</td> <td>2</td> <td>2</td> </tr> <tr> <td>Z(-55°C)/Z(+20°C)</td> <td>3</td> <td>3</td> <td>3</td> <td>3</td> <td>3</td> </tr> </table>	Rated Voltage 額定電壓(V)	6.3	10	16	25	35	MAX (120Hz)	Z(-25°C)/Z(+20°C)	2	2	2	2	2	Z(-55°C)/Z(+20°C)	3	3	3	3	3
Rated Voltage 額定電壓(V)	6.3	10	16	25	35	MAX (120Hz)														
Z(-25°C)/Z(+20°C)	2	2	2	2	2															
Z(-55°C)/Z(+20°C)	3	3	3	3	3															

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Load Life 負荷壽命	After life test at conditions stated in the table below, the capacitors shall meet the following requirement. 依據以下壽命要求印加額定紋波電流後，電容需符合以下要求。			
	Capacitance Change 容量變化率	within $\pm 25\%$ of the initial value 初始值 $\pm 25\%$ 以內	Case Dia	Life Time(hrs)
	Dissipation Factor 散逸因素	Not more than 200% of the specified value. 不超出規格值的 2 倍	$\varphi D \leq 6.3$	5000
	Leakage Current 洩漏電流	Not more than the specified value. 不超出規格值。	$\varphi D \geq 8$	6000
Shelf Life 放置壽命	After leaving capacitors under no load at 105°C for 1000 hours, the capacitors shall meet the following requirements. 電容放置在 105°C 無印加電壓的情況下儲存 1000 小時後，電容需符合以下要求。			
	Capacitance Change 容量變化率	within $\pm 25\%$ of the initial value 初始值 $\pm 25\%$ 以內		
	Dissipation Factor 散逸因素	Not more than 200% of the specified value. 不超出規格值的 2 倍		
	Leakage Current 洩漏電流	Not more than the specified value. 不超出規格值。		
Standard 參照標準	According to JIS C 5101 依據 JIS C 5101 標準			

## Frequency coefficient

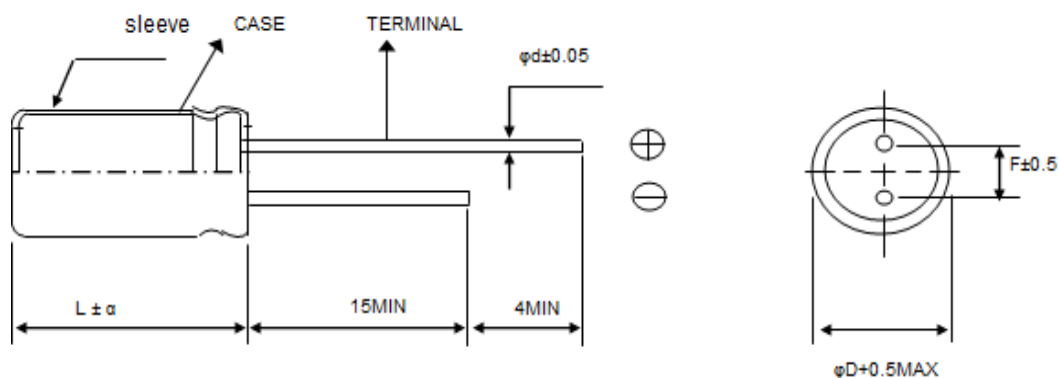
頻率系數

Frequency(Hz) Cap(μF)	60(50)	120	1K	10K	100K $\leq$
1-33	0.45	0.55	0.75	0.90	1.00
47-330	0.60	0.70	0.85	0.95	1.00
470-1000	0.65	0.75	0.90	0.98	1.00
1200-6800	0.75	0.80	0.95	1.00	1.00

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### DIMENSIONS 尺寸(mm) •



$\phi D$	5	6.3	8	10	12/12.5/13
$\phi d$	0.5		0.6		
F	2.0	2.5	3.5	5.0	
$\alpha$	$L \leq 19: \alpha = 1.5, L \geq 20: \alpha = 2.0$				

### STANDARD SIZE , RIPPLE CURRENT, IMPEDANCE

尺寸, 紋波電流及阻抗標準

Ripple Current (mA 105°C, 100KHz) r.m.s

Rated voltage 6.3V(OJ)				
Nominal capacitance ( $\mu\text{F}$ )	Size $\phi D \times L$ (mm)	Ripple Current (mA)	Impedance $\Omega$ (MAX)	
			25°C, 100KHz	-10°C, 100KHz
220	5x11	585	0.240	1.200
330	6.3x11	765	0.175	0.875
470	6.3x11	915	0.110	0.550
680	8x11.5	1275	0.085	0.425
820	8x11.5	1600	0.062	0.310
1000	10x12.5	1920	0.053	0.265
1200	10x12.5	2260	0.045	0.225
1500	8x20	2380	0.033	0.165
1800	10x16	2700	0.032	0.160
2200	10x20	2930	0.020	0.100
2700	10x23	3200	0.019	0.095

# ALUMINUM ELECTROLYTIC CAPACITORS

## LZT series

Rated voltage 10V(1A)				
Nominal capacitance (μF)	Size φDXL(mm)	Ripple Current (mA)	Impedance Ω(MAX)	
			25°C ,100KHz	-10°C ,100KHz
150	5x11	585	0.240	1.200
220	6.3x11	765	0.175	0.875
330	6.3x11	915	0.110	0.550
470	8x11.5	1255	0.086	0.430
680	8x11.5	1605	0.062	0.310
820	8x11.5	1920	0.053	0.265
1000	10x12.5	2260	0.045	0.225
1200	10x12.5	2615	0.038	0.190
1500	10x16	2990	0.032	0.160
1800	10x20	3330	0.023	0.100
2200	10x23	3825	0.023	0.095
3300	12.5x25	2580	0.026	0.122

## LZT series

Rated voltage 16V(1C)				
Nominal capacitance (μF)	Size φDXL(mm)	Ripple Current (mA)	Impedance Ω(MAX)	
			25°C ,100KHz	-10°C ,100KHz
100	5x11	585	0.240	1.200
150	6.3x11	745	0.175	0.875
220	6.3x11	915	0.110	0.550
330	8x11.5	1255	0.086	0.430
470	8x11.5	1605	0.062	0.310
680	10x12.5	2260	0.045	0.225
820	10x12.5	2615	0.038	0.190
1000	10x16	2990	0.032	0.160
1200	10x16	3160	0.026	0.130
1500	10x20	3330	0.021	0.100
1800	10x25	3770	0.021	0.090

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Rated voltage 25V(1E)				
Nominal Capacitance (μF)	Size φDXL(mm)	Ripple Current (mA)	Impedance Ω(MAX)	
			25°C,100KHz	-10°C,100KHz
47	5x11	425	0.300	1.500
68	6.3x11	585	0.240	1.200
100	6.3x11	745	0.175	0.875
150	8x11.5	915	0.110	0.550
220	8x11.5	1255	0.086	0.430
330	8x20	1605	0.062	0.310
390	10x16	2125	0.053	0.265
470	10x16	2260	0.045	0.225
560	10x23	2550	0.033	0.165
680	10x20	2990	0.032	0.160
820	10x20	3260	0.023	0.115
1000	10x28	3825	0.019	0.095
	12.5x20	3890	0.023	0.115
1200	12.5x20	4010	0.018	0.090

## LZT series

Rated voltage 35V(1V)				
Nominal capacitance (μF)	Size φDXL(mm)	Ripple Current (mA)	Impedance Ω(MAX)	
			25°C,100KHz	-10°C,100KHz
47	5x11	345	0.240	1.200
68	6.3x11	745	0.175	0.875
100	6.3x11	915	0.110	0.550
150	8x11.5	1255	0.086	0.430
220	8x11.5	1605	0.062	0.310
330	8x16	2000	0.055	0.272
	10x12.5	2260	0.045	0.225
390	8x20	2550	0.033	0.165
470	10x16	2990	0.032	0.160
560	10x20	3330	0.020	0.100
680	10x23	3825	0.019	0.095



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