

# LZ

## Series

Low Impedance



- Solvent proof (within 2 minutes)

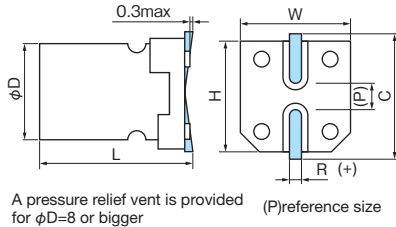
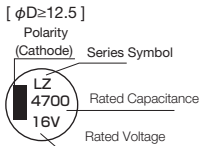
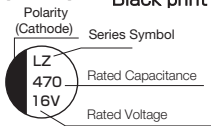


### Specifications

Items	Condition	Specifications										
Rated voltage (V)	—	4	6.3	10	16	25	35	50	63	100		
Surge voltage (V)	Room temperature	5.0	8.0	13	20	32	44	63	79	125		
Category temperature range (°C)	—	-55 to +105										
Capacitance tolerance (%)	120Hz/20°C	M : ±20										
Dissipation Factor (tan δ)	tan δ (max) 120Hz/20°C	φ4 to φ10	0.35	0.30	0.24	0.20	0.18	0.16	0.14	0.14	0.14	
		φ12.5 to φ16	0.40	0.38	0.34	0.30	0.28	0.22	0.18	0.16	0.16	
Leakage current (LC)	μA/after 2minutes (max)	Exceeding 1,000μF, +0.02 every 1,000μF The greater value of either 0.01CV or 3μA										
Impedance ratio at low temperature	Based on the value at 120Hz, +20°C	-25°C Z/Z <sub>20°C</sub>	4	4	3	3	2	2	2	2	2	
		-55°C Z/Z <sub>20°C</sub>	6	6	5	5	4	4	3	3	3	
Endurance	105°C, 2,000hours rated voltage applied (With the rated ripple current)	ΔC/C	Within ±20% of the initial value(≤10V:±30%)									
		tan δ	Less than 200% of the specified value(≤10V:≤300%)									
		LC	Less than the specified value									

### Marking, Dimensions

[φD≤10] Black print on the case top



(Unit : mm)

D <sup>±0.5</sup>	L	W <sup>±0.2</sup>	H <sup>±0.2</sup>	C <sup>±0.2</sup>	R	P <sup>±0.2</sup>
4	5.4 <sup>±0.4</sup>	4.3	4.3	5.1	0.5 to 0.8	1.0
5	5.4 <sup>±0.4</sup>	5.3	5.3	6.1	0.5 to 0.8	1.3
6.3	5.4 <sup>±0.4</sup>	6.6	6.6	7.3	0.5 to 0.8	2.2
6.3	7.7 <sup>±0.4</sup>	6.6	6.6	7.3	0.5 to 0.8	2.2
8	6.5 <sup>±0.5</sup>	8.3	8.3	9.2	0.7 to 1.2	3.1
8	10.5 <sup>±0.5</sup>	8.3	8.3	9.2	0.7 to 1.2	3.1
10	7.7 <sup>±0.5</sup>	10.3	10.3	11.2	0.7 to 1.2	4.4
10	10.5 <sup>±0.5</sup>	10.3	10.3	11.2	0.7 to 1.2	4.4
10	13.5 <sup>±0.5</sup>	10.3	10.3	11.2	0.7 to 1.2	4.4
12.5	13.5 <sup>±0.5</sup>	13.0	13.0	14.0	1.0 to 1.4	4.4
12.5	16.0 <sup>±0.5</sup>	13.0	13.0	14.0	1.0 to 1.4	4.4
16	16.5 <sup>±0.5</sup>	17.0	17.0	18.0	1.0 to 1.4	6.4

### Ripple Current Frequency Coefficient

Frequency:F(Hz)		100≤F<1k	1k≤F<10k	10k≤F<100k	100k≤F
Capacitance:C(μF)	C≤33	0.35	0.70	0.90	1.00
	33<C≤150	0.40	0.85	0.92	1.00
	150<C	0.60	0.85	0.95	1.00

**Size, Rated Ripple Current**

μF	V	6.3			10			16			25			35		
		Case size	Rated ripple current	Impedance	Case size	Rated ripple current	Impedance	Case size	Rated ripple current	Impedance	Case size	Rated ripple current	Impedance	Case size	Rated ripple current	Impedance
4.7														4x5.4	3.0	60
10														4x5.4	3.0	60
														5x5.4	1.8	95
22								4x5.4	3.0	60				5x5.4	1.8	95
														6.3x5.4	1.0	39
33					4x5.4	3.0	60				5x5.4	1.8	95	6.3x5.4	1.0	140
														6.3x7.7	0.6	230
47					4x5.4	3.0	60	5x5.4	1.8	95	6.3x5.4	1.0	140	6.3x5.4	1.0	140
														6.3x7.7	0.6	230
68														8x6.5	0.6	230
					5x5.4	1.8	95	6.3x5.4	1.0	140				6.3x7.7	0.6	230
100					5x5.4	1.8	100	6.3x5.4	1.0	140	6.3x5.4	1.0	140	6.3x7.7	0.6	230
											6.3x7.7	0.6	230	8x6.5	0.6	230
150					6.3x5.4	1.0	140	6.3x7.7	0.6	230	8x6.5	0.6	230	8x10.5	0.4	450
														10x7.7	0.4	450
220		6.3x5.4	1.0	140	6.3x5.4	1.0	140	6.3x7.7	0.6	230	8x10.5	0.3	450	8x10.5	0.4	450
					6.3x7.7	0.6	230	8x6.5	0.6	230	10x7.7	0.4	450	10x10.5	0.15	670
330		6.3x7.7	0.6	230	6.3x7.7	0.6	230	8x10.5	0.4	450	8x10.5	0.4	450	10x10.5	0.15	670
					8x6.5	0.6	230	10x7.7	0.4	450	10x10.5	0.15	670			
470		6.3x7.7	0.6	230	6.3x7.7	0.6	230	8x10.5	0.4	450	10x10.5	0.15	670	10x10.5	0.15	670
		8x6.5	0.6	230	8x6.5	0.6	230	10x10.5	0.15	670				10x13.5	0.13	750
680					10x7.7	0.4	450									
		8x10.5	0.4	450	10x10.5	0.15	670	10x10.5	0.15	670	10x13.5	0.13	750	10x13.5	0.13	750
1000		10x7.7	0.4	450										12.5x13.5	0.11	820
		8x10.5	0.4	450	8x10.5	0.4	450	10x10.5	0.15	670	10x13.5	0.13	750	12.5x13.5	0.11	820
1500		10x7.7	0.4	450	10x10.5	0.15	670	10x13.5	0.13	750	12.5x13.5	0.11	820	12.5x16	0.09	950
		10x10.5	0.15	670	10x13.5	0.13	750	12.5x13.5	0.11	820	12.5x16	0.09	950	16x16.5	0.08	1260
2200		10x13.5	0.13	750	12.5x13.5	0.11	820	12.5x16	0.09	950	16x16.5	0.08	1260			
		10x13.5	0.13	750	12.5x13.5	0.11	820	12.5x16	0.09	950	16x16.5	0.08	1260			
3300		12.5x13.5	0.11	820	16x16.5	0.08	1260	16x16.5	0.08	1260						
		12.5x16	0.09	950												
4700		16x16.5	0.08	1260	16x16.5	0.08	1260									

 Case size:  $\phi$ DxL(mm)

 Rated ripple current  
 mA rms(100kHz, 105°C)

 Impedance( $\Omega$ )  
 max at 100kHz, 20°C

**Size, Rated Ripple Current**

$\mu\text{F}$ \ V	50			63			80			100		
1.0	4x5.4	5.0	30									
2.2	4x5.4	5.0	30						5x5.4	5.0	25	
3.3	4x5.4	5.0	30						5x5.4	5.0	25	
4.7	4x5.4	5.0	30	5x5.4	5.0	50			5x5.4	5.0	25	
	5x5.4	3.0	50						6.3x5.4	5.0	40	
10	5x5.4	3.0	50	6.3x5.4	3.0	80	6.3x7.7	3.0	60	6.3x7.7	3.0	60
										8x6.5	3.0	60
22	6.3x5.4	2.0	70	6.3x7.7	2.5	100	8x10.5	2.0	130	8x10.5	2.0	130
	6.3x7.7	1.0	120							10x10.5	1.5	180
33	6.3x7.7	1.0	120	8x10.5	2.0	250	10x10.5	1.5	180	10x10.5	1.5	180
										10x13.5	1.2	210
47	6.3x7.7	1.0	120	8x10.5	2.0	250	8x10.5	2.0	130	10x10.5	1.5	180
	8x6.5	1.0	120	10x7.7	2.0	250	10x10.5	1.5	180	10x13.5	1.2	240
	8x10.5	0.8	280	10x10.5	1.5	300	10x13.5	1.2	240	12.5x13.5	0.85	500
68	8x10.5	0.8	300	10x10.5	1.5	300	10x10.5	1.5	180	12.5x13.5	0.85	500
	10x10.5	0.6	450	10x13.5	1.0	400	10x13.5	1.2	240	12.5x16	0.75	550
				12.5x13.5	0.85	500	12.5x13.5	0.85	500			
100	8x10.5	0.8	300	10x10.5	1.5	300	10x10.5	1.5	180	12.5x13.5	0.85	500
	10x7.7	0.8	300	10x13.5	1.0	400	10x13.5	1.2	240	12.5x16	0.75	550
	10x10.5	0.6	450	12.5x13.5	0.85	500	12.5x13.5	0.85	500	16x16.5	0.55	650
150	10x10.5	0.6	450	10x13.5	1.0	400	12.5x13.5	0.85	500			
	10x13.5	0.45	500	12.5x13.5	0.85	500	12.5x16	0.75	550			
220	10x10.5	0.45	500	12.5x13.5	0.65	550	12.5x16	0.65	650			
	10x13.5	0.35	550	12.5x16	0.55	650	16x16.5	0.55	750			
330	10x13.5	0.35	580	16x16.5	0.45	850	16x16.5	0.45	850			
	12.5x13.5	0.25	650									
470	12.5x16	0.20	850									
	16x16.5	0.15	950									
680	16x16.5	0.15	950									

 Case size:  $\phi$ DxL(mm)

 Impedance( $\Omega$ )  
 max at 100kHz, 20°C

 Rated ripple current  
 mA rms(100kHz, 105°C)