

MINIATURE ALUMINUM ELECTROLYtic CAPACITORS

LA Low Leakage Current Series

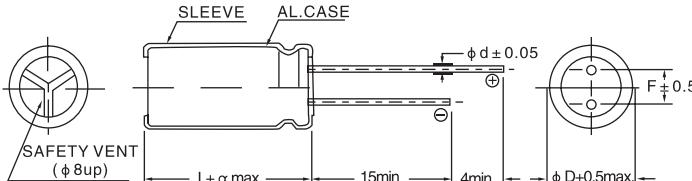
- Standard low leakage current series
- Suitable for high gain audio coupling applications
- Stable leakage current characteristics for a long period
- Load life of 2000 hours at 85°C



• SPECIFICATIONS

| Item | Characteristics | | | | | | | | | | | | | | | | | | | | | | | | |
|---|--|------|---------|------|------|------|--|--------------------|-------|----|-------|----|---------|-------------------|---------|------|------|------|------|-------------------|------|---|---|---|---|
| Operating Temperature Range | -40~+85°C | | | | | | | | | | | | | | | | | | | | | | | | |
| Rated Working Voltage Range | 10~63V.DC | | | | | | | | | | | | | | | | | | | | | | | | |
| Capacitance Tolerance | $\pm 20\%$ (M)at 120Hz,25°C | | | | | | | | | | | | | | | | | | | | | | | | |
| Leakage Current (max.) | I=0.002CV or 0.4 μA whichever is greater after 2 minutes. I: Leakage Current (μA) C: Nominal Capacitance (μF) V: Rated Working Voltage(V) | | | | | | | | | | | | | | | | | | | | | | | | |
| Dissipation Factor (tan δ) (at 120Hz, 25°C) (max.) | When nominal capacitance is over 1000 μF,Tan δ shall be added 0.03 to the listed value with increase of every 1000 μF. <table border="1" style="margin-left: 20px;"> <tr> <td>WV</td> <td>10</td> <td>16</td> <td>25</td> <td>35</td> <td>50</td> <td>63</td> </tr> <tr> <td>tan δ</td> <td>0.20</td> <td>0.16</td> <td>0.14</td> <td>0.12</td> <td>0.10</td> <td>0.09</td> </tr> </table> | | | | | | | WV | 10 | 16 | 25 | 35 | 50 | 63 | tan δ | 0.20 | 0.16 | 0.14 | 0.12 | 0.10 | 0.09 | | | | |
| WV | 10 | 16 | 25 | 35 | 50 | 63 | | | | | | | | | | | | | | | | | | | |
| tan δ | 0.20 | 0.16 | 0.14 | 0.12 | 0.10 | 0.09 | | | | | | | | | | | | | | | | | | | |
| Low Temperature Stability (Impedance ratio at 120Hz) | <table border="1" style="margin-left: 10px;"> <tr> <td>WV</td> <td>10~25</td> <td>35</td> <td>40</td> <td>50</td> <td>63</td> </tr> <tr> <td>Z(-25°C)/Z(+25°C)</td> <td>2</td> <td>1.75</td> <td>1.75</td> <td>1.5</td> <td>1.5</td> </tr> <tr> <td>Z(-40°C)/Z(+25°C)</td> <td>4</td> <td>4</td> <td>4</td> <td>2</td> <td>2</td> </tr> </table> | | | | | | | WV | 10~25 | 35 | 40 | 50 | 63 | Z(-25°C)/Z(+25°C) | 2 | 1.75 | 1.75 | 1.5 | 1.5 | Z(-40°C)/Z(+25°C) | 4 | 4 | 4 | 2 | 2 |
| WV | 10~25 | 35 | 40 | 50 | 63 | | | | | | | | | | | | | | | | | | | | |
| Z(-25°C)/Z(+25°C) | 2 | 1.75 | 1.75 | 1.5 | 1.5 | | | | | | | | | | | | | | | | | | | | |
| Z(-40°C)/Z(+25°C) | 4 | 4 | 4 | 2 | 2 | | | | | | | | | | | | | | | | | | | | |
| Load Life | <p>After 2000 hours application of W.V. at 85°C the capacitor shall meet the following limits.</p> <table border="1" style="margin-left: 20px; width: fit-content;"> <tr> <td rowspan="2" style="width: 15%;">Capacitance Change</td> <td colspan="2" style="width: 30%;">WV≤16</td> <td colspan="2" style="width: 30%;">WV>16</td> </tr> <tr> <td>ϕ D≤6.3</td> <td>±20%</td> <td>ϕ D>6.3</td> <td>±20%</td> </tr> </table> <p>Dissipation Factor ≤150% of the initial specified value.</p> <p>Leakage current ≤the initial specified value.</p> | | | | | | | Capacitance Change | WV≤16 | | WV>16 | | ϕ D≤6.3 | ±20% | ϕ D>6.3 | ±20% | | | | | | | | | |
| Capacitance Change | WV≤16 | | WV>16 | | | | | | | | | | | | | | | | | | | | | | |
| | ϕ D≤6.3 | ±20% | ϕ D>6.3 | ±20% | | | | | | | | | | | | | | | | | | | | | |
| Shelf Life(at 85°C) | After 500 hours no load test, leakage current capacitance and tan δ are same as load life value | | | | | | | | | | | | | | | | | | | | | | | | |
| Reference Standard | JISC-5141 | | | | | | | | | | | | | | | | | | | | | | | | |

• DRAWING(Unit:mm)



| φ D | 5 | 6.3 | 8 | 10 | 13 | 16 |
|-----|-----|-----|-----|-----|-----|-----|
| F | 2.0 | 2.5 | 3.5 | | 5.0 | 7.5 |
| φ d | 0.5 | | | 0.6 | | 0.8 |
| α | 1.0 | | 1.5 | | | |

• DIMENSIONS & MAXIMUM PERMISSIBLE RIPPLE CURRENT

| WV | 10 | | 16 | | 25 | | 35 | | 50 | | 63 | |
|------|-----------------|------|--------|------|--------|------|---|------|--------|------|--------|------|
| | Cap.(μF) \ SIZE | R.C. | SIZE | R.C. | SIZE | R.C. | SIZE | R.C. | SIZE | R.C. | SIZE | R.C. |
| 1.0 | | | | | | | | | | | 5×11 | 20 |
| 2.2 | | | | | | | | | | | 5×11 | 30 |
| 3.3 | | | | | | | | | 5×11 | 35 | 5×11 | 37 |
| 4.7 | | | | | | | | | 5×11 | 42 | 5×11 | 44 |
| 6.8 | | | | | | | 5×11 | 46 | 5×11 | 50 | 5×11 | 53 |
| 10 | | | | | 5×11 | 55 | 5×11 | 55 | 6.3×11 | 70 | 6.3×11 | 73 |
| 22 | 5×11 | 69 | 5×11 | 73 | 5×11 | 82 | 6.3×11 | 94 | 8×11 | 122 | 8×11 | 129 |
| 33 | 5×11 | 84 | 5×11 | 90 | 5×11 | 116 | 6.3×11 | 116 | 8×11 | 149 | 8×12 | 183 |
| 47 | 5×11 | 95 | 5×11 | 105 | 6.3×11 | 120 | 8×11 | 136 | 8×12 | 180 | 8×16 | 239 |
| 68 | 5×11 | 110 | 5×11 | 110 | 6.3×11 | 130 | 10×12 | 150 | 8×12 | 200 | 8×16 | 290 |
| 100 | 6.3×11 | 120 | 6.3×11 | 120 | 6.3×12 | 150 | 10×16 | 169 | 8×12 | 220 | 8×16 | 314 |
| 220 | 8×11 | 170 | 8×12 | 210 | 8×12 | 225 | 13×20 | 305 | 10×17 | 420 | 10×20 | 400 |
| 330 | 8×12 | 235 | 8×14 | 265 | 8×16 | 330 | 13×25 | 400 | 10×20 | 520 | 13×21 | 610 |
| 470 | 8×12 | 275 | 8×14 | 370 | 10×17 | 400 | 13×25 | 530 | 13×21 | 760 | 13×25 | 720 |
| 680 | 8×16 | 390 | 10×17 | 480 | 10×20 | 520 | 16×25 | 610 | 13×25 | 800 | 16×26 | 920 |
| 1000 | 10×17 | 650 | 10×20 | 670 | 13×21 | 775 | 16×31 | 900 | 16×26 | 1000 | | |
| 2200 | 13×21 | 790 | 13×25 | 1100 | 16×26 | 1150 | Ripple current (mA rms) at 85°C,120Hz Case size φ D × L (mm) | | | | | |
| 3300 | 13×25 | 1100 | 16×26 | 1200 | | | | | | | | |