# Type SK 85 °C Radial Leaded Aluminum Electrolytic Capacitors

## 2000 Hour Long Life, General Purpose Aluminum Electrolytic

Type SK is a radial leaded aluminum electrolytic capacitor with a +85 °C, 2000 hour long life rating. The SK is a high CV rated product and is ideal for general purpose applications such as stereo radio, TV, computers and other consumer electronic products.

## Highlights

- +85 °C
- 2000 hours - long life
- High CV
- Available in T&R and ammo pack

## Specifications

| | |
|---|---|
| **Capacitance Range** | 0.47 to 15,000 µF |
| **Capacitance Tolerance** | ±20% |
| **Rated Voltage** | 6.3 to 450 Vdc |
| **Operating Temperature Range** | –40 °C to +85 °C; 6.3 to 100 Vdc<br>–25 °C to +85 °C; 160 to 450 Vdc |
| **DC Leakage Current** | 6.3 to 100 Vdc; I = ≤.01CV or 3 µA Max<br>Whichever is greater after 2 minutes application of DC working voltage at 20 °C<br>≥100 Vdc; I = ≤.03CV or 10 µA Max<br>Whichever is greater after 2 minutes application of DC working voltage at 20 °C<br>C = Capacitance in (µF)<br>V = Rated voltage<br>I = Leakage current in µA |
| **Dissipation Factor @ 120 Hz, +20 °C** | See table below |
| **Ripple Multipliers for Voltage and Temperature:** | See tables below |
| **Load Life Test** | Apply WVDC for 2000 hours at +85 °C<br>Capacitance change within 20% of initial limit<br>DF not to exceed 200% of initial requirement<br>Leakage current not to exceed 200% of initial |
| **Shelf Life Test** | 1000 hrs at +85 °C with no voltage applied<br>Cap change within ±20% of initial values<br>DF not to exceed 200% of initial requirement<br>DC leakage current meets initial requirement |

| WV (V) | 6.3 | 10 | 16 | 25 | 35 | 50 | 63 | 100 | 160-250 | 350-450 |
|---|---|---|---|---|---|---|---|---|---|---|
| DF(%) | 24 | 20 | 16 | 14 | 12 | 10 | 10 | 10 | 20 | 24 |

| Rated WVDC | Ripple Multipliers | | | |
|---|---|---|---|---|
| | 60Hz | 120Hz | 1kHz | 10kHz |
| **6 to 25** | 0.80 | 1.0 | 1.1 | 1.2 |
| **35 to 100** | 0.75 | 1.0 | 1.3 | 1.4 |
| **160 to 250** | 0.70 | 1.0 | 1.4 | 1.6 |

For capacitance values > 1000 µF, the DF (%) value is increased 2% for every additional 1000 µF

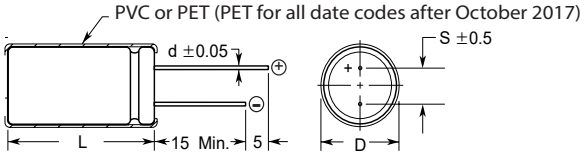
| Ambient Temperature | Ripple Multiplier |
|---|---|
| +85 °C | 1.00 |
| +75 °C | 1.14 |
| +65 °C | 1.25 |

RoHS Compliant

# Type SK 85 °C Radial Leaded Aluminum Electrolytic Capacitors

## Outline Drawing

**Outline Dimensions**
**(Millimeters)**



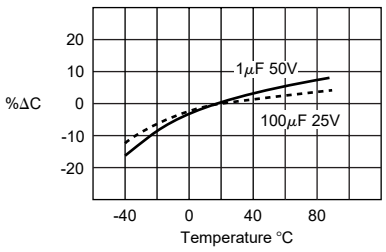

Case vented on diameters 6.3 and greater

sleeve adds .5 Max. to diameter and 2.0 Max. to length

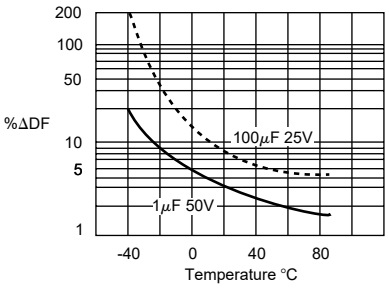
## Part Numbering System

| SK | 100 | M | 100 | S | T |
|---|---|---|---|---|---|
| Type | Capacitance (µF) | Capacitance Tolerance (%) | Rated Voltage (Vdc) | Packaging | Lead Configuration |
| SK | 1R0 = 1 | K = ±10 | 6R3 = 6.3 | A = Tape & Ammo | 1 = Lead cut |
| | 100 = 10 | M = ±20 | 010 = 10 | E = Different Characteristic | 2 = Lead form |
| | 101 = 100 | | 100 = 100 | R = Tape & Reel | 4 = Lead crimp & cut (form) |
| | 102 = 1000 | | | S = Standard | T = Standard |

## Temperature Characteristics

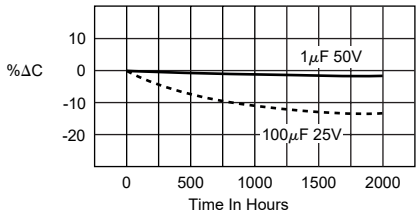



**Capacitance Change Ratio**

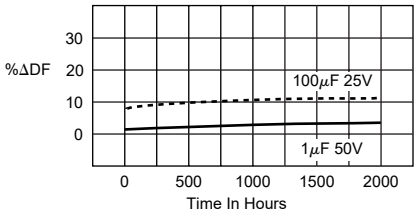



**Dissipation Factor Change**

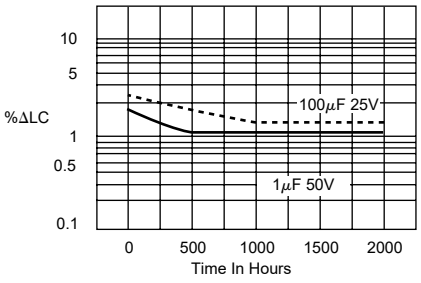
## Load Life Characteristics




**Capacitance Change Ratio**




**Dissipation Factor Change**




**Leakage Current Change**

# Type SK 85 °C Radial Leaded Aluminum Electrolytic Capacitors

## Ratings

| Cap (µF) | Catalog Part Number | Max ESR 120 Hz +25 °C (Ω) | Max Ripple 120 Hz +85 °C (mA) | Size in. (mm) Diameter (D) | Length (L) | Lead Space (S) | Lead Dia. (d) |
|---|---|---|---|---|---|---|---|
| **6.3 Vdc (8 Volts Surge)** | | | | | | | |
| 100 | SK101M6R3ST | 2.92 | 130 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 220 | SK221M6R3ST | 1.33 | 240 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 330 | SK331M6R3ST | 0.88 | 300 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 470 | SK471M6R3ST | 0.62 | 380 | .315 (8.0) | .453 (11.5) | .138 (3.5) | .0236 (0.6) |
| 1000 | SK102M6R3ST | 0.29 | 580 | .394 (10.0) | .512 (13.0) | .197 (5.0) | .0236 (0.6) |
| 2200 | SK222M6R3ST | 0.14 | 1050 | .394 (10.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 3300 | SK332M6R3ST | 0.10 | 1250 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 4700 | SK472M6R3ST | 0.08 | 1700 | .512 (13.0) | .984 (26.0) | .197 (5.0) | .0236 (0.6) |
| 6800 | SK682M6R3ST | 0.07 | 1900 | .630 (16.0) | .984 (25.0) | .295 (7.5) | .0315 (0.8) |
| 10000 | SK103M6R3ST | 0.05 | 2250 | .630 (16.0) | 1.26 (32.0) | .295 (7.5) | .0315 (0.8) |
| 15000 | SK153M6R3ST | 0.04 | 2680 | .630 (16.0) | 1.38 (35.0) | .295 (7.5) | .0315 (0.8) |
| **10 Vdc (13 Volts Surge)** | | | | | | | |
| 33 | SK330M010ST | 7.64 | 80 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 47 | SK470M010ST | 5.36 | 95 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 100 | SK101M010ST | 2.52 | 180 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 220 | SK221M010ST | 1.15 | 250 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 330 | SK331M010ST | 0.76 | 330 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 470 | SK471M010ST | 0.54 | 400 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 1000 | SK102M010ST | 0.25 | 630 | .394 (10.0) | .630 (16.0) | .197 (5.0) | .0236 (0.6) |
| 2200 | SK222M010ST | 0.14 | 1100 | .394 (10.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 3300 | SK332M010ST | 0.10 | 1400 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 4700 | SK472M010ST | 0.08 | 1800 | .630 (16.0) | .984 (25.0) | .295 (7.5) | .0315 (0.8) |
| 6800 | SK682M010ST | 0.07 | 2150 | .630 (16.0) | 1.26 (32.0) | .295 (7.5) | .0315 (0.8) |
| 10000 | SK103M010ST | 0.05 | 2500 | .709 (18.0) | 1.38 (35.0) | .295 (7.5) | .0315 (0.8) |
| 15000 | SK153M010ST | 0.04 | 2950 | .709 (18.0) | 1.65 (42.0) | .295 (7.5) | .0315 (0.8) |
| **16 Vdc (20 Volts Surge)** | | | | | | | |
| 22 | SK220M016ST | 9.65 | 75 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 33 | SK330M016ST | 6.43 | 110 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 47 | SK470M016ST | 4.52 | 130 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 100 | SK101M016ST | 2.12 | 185 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 220 | SK221M016ST | 0.97 | 320 | .315 (8.0) | .453 (11.5) | .138 (3.5) | .0236 (0.6) |
| 330 | SK331M016ST | 0.64 | 360 | .315 (8.0) | .453 (11.5) | .138 (3.5) | .0236 (0.6) |
| 470 | SK471M016ST | 0.45 | 470 | .394 (10.0) | .512 (13.0) | .197 (5.0) | .0236 (0.6) |
| 1000 | SK102M016ST | 0.21 | 790 | .394 (10.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 2200 | SK222M016ST | 0.14 | 1350 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 3300 | SK332M016ST | 0.10 | 1700 | .512 (13.0) | .984 (26.0) | .197 (5.0) | .0236 (0.6) |
| 4700 | SK472M016ST | 0.08 | 2100 | .630 (16.0) | 1.26 (32.0) | .295 (7.5) | .0315 (0.8) |
| 6800 | SK682M016ST | 0.07 | 2500 | .709 (18.0) | 1.38 (35.0) | .295 (7.5) | .0315 (0.8) |
| 10000 | SK103M016ST | 0.05 | 2700 | .709 (18.0) | 1.65 (42.0) | .295 (7.5) | .0315 (0.8) |
| **25 Vdc (32 Volts Surge)** | | | | | | | |
| 10 | SK100M025ST | 18.57 | 50 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 22 | SK220M025ST | 8.44 | 90 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 33 | SK330M025ST | 5.63 | 110 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 47 | SK470M025ST | 3.95 | 130 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 100 | SK101M025ST | 1.85 | 185 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |

# Type SK 85 °C Radial Leaded Aluminum Electrolytic Capacitors

| Cap (µF) | Catalog Part Number | Max ESR 120 Hz +25 °C (Ω) | Max Ripple 120 Hz +85 °C (mA) | Size in. (mm) Diameter (D) | Length (L) | Lead Space (S) | Lead Dia. (d) |
|---|---|---|---|---|---|---|---|
| **25 Vdc (32 Volts Surge)** | | | | | | | |
| 220 | SK221M025ST | 0.84 | 320 | .315 (8.0) | .453 (11.5) | .138 (3.5) | .0236 (0.6) |
| 330 | SK331M025ST | 0.56 | 420 | .394 (10.0) | .512 (13.0) | .197 (5.0) | .0236 (0.6) |
| 470 | SK471M025ST | 0.39 | 540 | .394 (10.0) | .630 (16.0) | .197 (5.0) | .0236 (0.6) |
| 1,000 | SK102M025ST | 0.18 | 950 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 2,200 | SK222M025ST | 0.14 | 1550 | .512 (13.0) | .984 (26.0) | .197 (5.0) | .0236 (0.6) |
| 3,300 | SK332M025ST | 0.10 | 1950 | .630 (16.0) | 1.26 (32.0) | .295 (7.5) | .0315 (0.8) |
| 4,700 | SK472M025ST | 0.08 | 2360 | .709 (18.0) | 1.38 (35.0) | .295 (7.5) | .0315 (0.8) |
| 6,800 | SK682M025ST | 0.06 | 2550 | .709 (18.0) | 1.65 (42.0) | .295 (7.5) | .0315 (0.8) |
| **35 Vdc (44 Volts Surge)** | | | | | | | |
| 10 | SK100M035ST | 15.92 | 60 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 22 | SK220M035ST | 7.23 | 95 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 33 | SK330M035ST | 4.82 | 115 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 47 | SK470M035ST | 3.38 | 140 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 100 | SK101M035ST | 1.59 | 230 | .315 (8.0) | .453 (11.5) | .138 (3.5) | .0236 (0.6) |
| 220 | SK221M035ST | 0.72 | 370 | .394 (10.0) | .512 (13.0) | .197 (5.0) | .0236 (0.6) |
| 330 | SK331M035ST | 0.48 | 490 | .394 (10.0) | .630 (16.0) | .197 (5.0) | .0236 (0.6) |
| 470 | SK471M035ST | 0.33 | 640 | .394 (10.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 1,000 | SK102M035ST | 0.15 | 1100 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 2,200 | SK222M035ST | 0.14 | 1800 | .630 (16.0) | 1.26 (32.0) | .295 (7.5) | .0315 (0.8) |
| 3,300 | SK332M035ST | 0.10 | 2220 | .709 (18.0) | 1.38 (35.0) | .295 (7.5) | .0315 (0.8) |
| 4,700 | SK472M035ST | 0.08 | 2400 | .709 (18.0) | 1.65 (42.0) | .295 (7.5) | .0315 (0.8) |
| **50 Vdc (63 Volts Surge)** | | | | | | | |
| 0.47 | SKR47M050ST | 282.33 | 5 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 1.0 | SK010M050ST | 132.70 | 10 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 2.2 | SK2R2M050ST | 60.32 | 23 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 3.3 | SK3R3M050ST | 40.21 | 35 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 4.7 | SK4R7M050ST | 28.23 | 40 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 10 | SK100M050ST | 13.27 | 65 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 22 | SK220M050ST | 6.03 | 100 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 33 | SK330M050ST | 4.02 | 125 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 47 | SK470M050ST | 2.82 | 150 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 100 | SK101M050ST | 1.33 | 250 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 220 | SK221M050ST | 0.60 | 440 | .394 (10.0) | .630 (16.0) | .197 (5.0) | .0236 (0.6) |
| 330 | SK331M050ST | 0.40 | 580 | .394 (10.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 470 | SK471M050ST | 0.28 | 760 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 1,000 | SK102M050ST | 0.13 | 1350 | .630 (16.0) | .984 (25.0) | .295 (7.5) | .0315 (0.8) |
| 2,200 | SK222M050ST | 0.14 | 2090 | .709 (18.0) | 1.38 (35.0) | .295 (7.5) | .0315 (0.8) |
| 3,300 | SK332M050ST | 0.10 | 2320 | .709 (18.0) | 1.65 (42.0) | .295 (7.5) | .0315 (0.8) |
| **63 Vdc (79 Volts Surge)** | | | | | | | |
| 0.47 | SKR47M063ST | 254.10 | 5 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 1.0 | SK010M063ST | 119.43 | 10 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 2.2 | SK2R2M063ST | 54.28 | 29 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 3.3 | SK3R3M063ST | 36.19 | 40 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 4.7 | SK4R7M063ST | 25.41 | 45 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 10.0 | SK100M063ST | 11.94 | 70 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |

* Note max leakage current ≥100 Vdc is measured at 3 minutes

Parts highlighted in yellow are obsolete.

# Type SK 85 °C Radial Leaded Aluminum Electrolytic Capacitors

| Cap (µF) | Catalog Part Number | Max ESR 120 Hz +25 °C (Ω) | Max Ripple 120 Hz +85 °C (mA) | Size in. (mm) Diameter (D) | Length (L) | Lead Space (S) | Lead Dia. (d) |
|---|---|---|---|---|---|---|---|
| **63 Vdc (79 Volts Surge)** | | | | | | | |
| 22 | SK220M063ST | 5.43 | 115 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 33 | SK330M063ST | 3.62 | 140 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 47 | SK470M063ST | 2.54 | 190 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 100 | SK101M063ST | 1.19 | 300 | .394 (10.0) | .512 (13.0) | .197 (5.0) | .0236 (0.6) |
| 220 | SK221M063ST | 0.54 | 490 | .394 (10.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 330 | SK331M063ST | 0.36 | 680 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 470 | SK471M063ST | 0.25 | 880 | .512 (13.0) | .984 (26.0) | .197 (5.0) | .0236 (0.6) |
| 1,000 | SK102M063ST | 0.12 | 1550 | .630 (16.0) | 1.26 (32.0) | .295 (7.5) | .0315 (0.8) |
| **100 Vdc (125 Volts Surge)** | | | | | | | |
| 0.47 | SKR47M100ST | 225.87 | 10 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 1 | SK010M100ST | 106.16 | 21 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 2.2 | SK2R2M100ST | 48.25 | 30 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 3.3 | SK3R3M100ST | 32.17 | 40 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 4.7 | SK4R7M100ST | 22.59 | 50 | .197 (5.0) | .433 (11.0) | .079 (2.0) | .0197 (0.5) |
| 10 | SK100M100ST | 10.62 | 75 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 22 | SK220M100ST | 4.83 | 130 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 33 | SK330M100ST | 3.22 | 170 | .394 (10.0) | .512 (13.0) | .197 (5.0) | .0236 (0.6) |
| 47 | SK470M100ST | 2.26 | 230 | .394 (10.0) | .630 (16.0) | .197 (5.0) | .0236 (0.6) |
| 100 | SK101M100ST | 1.06 | 400 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 220 | SK221M100ST | 0.48 | 710 | .630 (16.0) | .984 (25.0) | .295 (7.5) | .0315 (0.8) |
| 330 | SK331M100ST | 0.32 | 860 | .630 (16.0) | .984 (25.0) | .295 (7.5) | .0315 (0.8) |
| 470 | SK471M100ST | 0.23 | 1100 | .630 (16.0) | 1.26 (32.0) | .295 (7.5) | .0315 (0.8) |
| **160 Vdc (200 Volts Surge)** | | | | | | | |
| 0.47 | SKR47M160ST | 423.50 | 12.0 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 1.0 | SK010M160ST | 199.04 | 17.0 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 2.2 | SK2R2M160ST | 90.47 | 26.0 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 3.3 | SK3R3M160ST | 60.32 | 35.0 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 4.7 | SK4R7M160ST | 42.35 | 40.0 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 10 | SK100M160ST | 19.90 | 65.0 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 22 | SK220M160ST | 9.05 | 110.0 | .394 (10.0) | .630 (16.0) | .197 (5.0) | .0236 (0.6) |
| 33 | SK330M160ST | 6.03 | 150.0 | .394 (10.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 47 | SK470M160ST | 4.23 | 180.0 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 100 | SK101M160ST | 1.99 | 300.0 | .512 (13.0) | .984 (26.0) | .197 (5.0) | .0236 (0.6) |
| 220 | SK221M160ST | 0.90 | 510.0 | .630 (16.0) | 1.42 (36.0) | .295 (7.5) | .0315 (0.8) |
| 330 | SK331M160ST | 0.60 | 600.0 | .709 (18.0) | 1.65 (42.0) | .295 (7.5) | .0315 (0.8) |
| **200 Vdc (250 Volts Surge)** | | | | | | | |
| 0.47 | SKR47M200ST | 423.50 | 12 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 1.0 | SK010M200ST | 199.04 | 17 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 2.2 | SK2R2M200ST | 90.47 | 26 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 3.3 | SK3R3M200ST | 60.32 | 35 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 4.7 | SK4R7M200ST | 42.35 | 45 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 10 | SK100M200ST | 19.90 | 70 | .394 (10.0) | .512 (13.0) | .197 (5.0) | .0236 (0.6) |
| 22 | SK220M200ST | 9.05 | 110 | .394 (10.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 33 | SK330M200ST | 6.03 | 160 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 47 | SK470M200ST | 4.23 | 180 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |

* Note max leakage current ≥100 Vdc is measured at 3 minutes

Parts highlighted in yellow are obsolete.

# Type SK 85 °C Radial Leaded Aluminum Electrolytic Capacitors

| Cap (µF) | Catalog Part Number | Max ESR 120 Hz +25 °C (Ω) | Max Ripple 120 Hz +85 °C (mA) | Size in. (mm) Diameter (D) | Length (L) | Lead Space (S) | Lead Dia. (d) |
|---|---|---|---|---|---|---|---|
| **200 Vdc (250 Volts Surge)** | | | | | | | |
| 100 | SK101M200ST | 1.99 | 330 | .630 (16.0) | .984 (25.0) | .295 (7.5) | .0315 (0.8) |
| 220 | SK221M200ST | 0.90 | 520 | .709 (18.0) | 1.65 (42.0) | .295 (7.5) | .0315 (0.8) |
| **250 Vdc (300 Volts Surge)** | | | | | | | |
| 0.47 | SKR47M250ST | 423.50 | 12 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 1.0 | SK010M250ST | 199.04 | 17 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 2.2 | SK2R2M250ST | 90.47 | 30 | .248 (6.3) | .433 (11.0) | .098 (2.5) | .0197 (0.5) |
| 3.3 | SK3R3M250ST | 60.32 | 35 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 4.7 | SK4R7M250ST | 42.35 | 45 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 10 | SK100M250ST | 19.90 | 70 | .394 (10.0) | .630 (16.0) | .197 (5.0) | .0236 (0.6) |
| 22 | SK220M250ST | 9.05 | 130 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 33 | SK330M250ST | 6.03 | 160 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 47 | SK470M250ST | 4.23 | 210 | .512 (13.0) | .984 (26.0) | .197 (5.0) | .0236 (0.6) |
| 100 | SK101M250ST | 1.99 | 310 | .630 (16.0) | 1.26 (32.0) | .295 (7.5) | .0315 (0.8) |
| **350 Vdc (400 Volts Surge)** | | | | | | | |
| 0.47 | SKR47M350ST | 564.67 | 14 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 1.0 | SK010M350ST | 265.39 | 18 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 2.2 | SK2R2M350ST | 120.63 | 28 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 3.3 | SK3R3M350ST | 80.42 | 35 | .394 (10.0) | .512 (13.0) | .197 (5.0) | .0236 (0.6) |
| 4.7 | SK4R7M350ST | 56.47 | 40 | .394 (10.0) | .512 (13.0) | .197 (5.0) | .0236 (0.6) |
| 10 | SK100M350ST | 26.54 | 70 | .394 (10.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 22 | SK220M350ST | 12.06 | 110 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 33 | SK330M350ST | 8.04 | 140 | .512 (13.0) | .984 (26.0) | .197 (5.0) | .0236 (0.6) |
| 47 | SK470M350ST | 5.65 | 220 | .630 (16.0) | .984 (25.0) | .295 (7.5) | .0315 (0.8) |
| 100 | SK101M350ST | 2.65 | 360 | .709 (18.0) | 1.42 (36.0) | .295 (7.5) | .0315 (0.8) |
| **400 Vdc (450 Volts Surge)** | | | | | | | |
| 0.47 | SKR47M400ST | 564.67 | 14 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 1.0 | SK010M400ST | 265.39 | 18 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 2.2 | SK2R2M400ST | 120.63 | 28 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 3.3 | SK3R3M400ST | 80.42 | 32 | .394 (10.0) | .512 (13.0) | .197 (5.0) | .0236 (0.6) |
| 4.7 | SK4R7M400ST | 56.47 | 41 | .394 (10.0) | .630 (16.0) | .197 (5.0) | .0236 (0.6) |
| 10 | SK100M400ST | 26.54 | 70 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 22 | SK220M400ST | 12.06 | 120 | .512 (13.0) | .984 (26.0) | .197 (5.0) | .0236 (0.6) |
| 33 | SK330M400ST | 8.04 | 140 | .630 (16.0) | .984 (25.0) | .295 (7.5) | .0315 (0.8) |
| 47 | SK470M400ST | 5.65 | 160 | .630 (16.0) | 1.26 (32.0) | .295 (7.5) | .0315 (0.8) |
| **450 Vdc (500 Volts Surge)** | | | | | | | |
| 0.47 | SKR47M450ST | 564.67 | 14 | .315 (8.0) | .433 (11.0) | .138 (3.5) | .0236 (0.6) |
| 1.0 | SK010M450ST | 265.39 | 19 | .315 (8.0) | .453 (11.5) | .138 (3.5) | .0236 (0.6) |
| 2.2 | SK2R2M450ST | 120.63 | 29 | .394 (10.0) | .512 (13.0) | .197 (5.0) | .0236 (0.6) |
| 3.3 | SK3R3M450ST | 80.42 | 35 | .394 (10.0) | .630 (16.0) | .197 (5.0) | .0236 (0.6) |
| 4.7 | SK4R7M450ST | 56.47 | 50 | .394 (10.0) | .709 (18.0) | .197 (5.0) | .0236 (0.6) |
| 10 | SK100M450ST | 26.54 | 75 | .512 (13.0) | .827 (21.0) | .197 (5.0) | .0236 (0.6) |
| 22 | SK220M450ST | 12.06 | 110 | .630 (16.0) | .984 (25.0) | .295 (7.5) | .0315 (0.8) |
| 33 | SK330M450ST | 8.04 | 150 | .630 (16.0) | 1.42 (36.0) | .295 (7.5) | .0315 (0.8) |
| 47 | SK470M450ST | 5.65 | 230 | .630 (16.0) | 1.57 (40.0) | .295 (7.5) | .0315 (0.8) |

Parts highlighted in yellow are obsolete.

## Taping & Packaging

**Fig. 1 - Formed Taping**

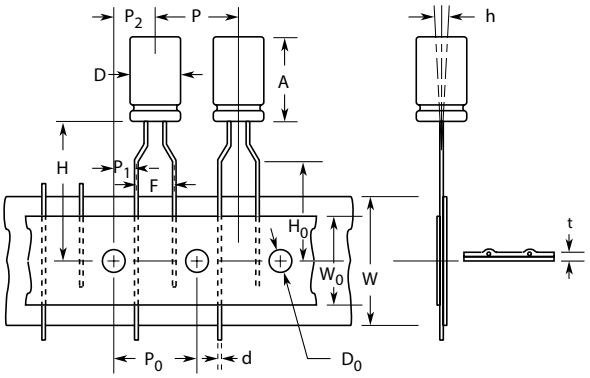



**Fig. 2 - Straight Taping (5φ, 6.3φ, 8φ)**

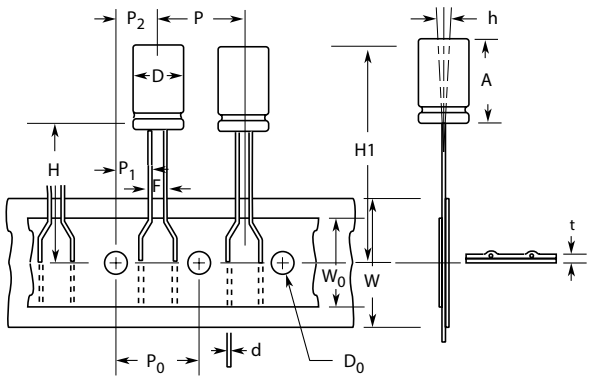



**Fig. 3- Straight Taping (Under 10φ, 12φ, 13φ)**

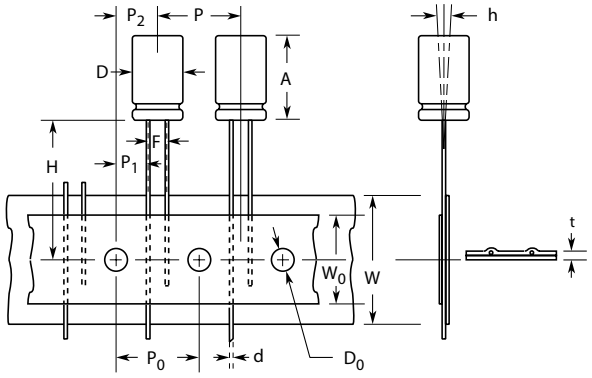
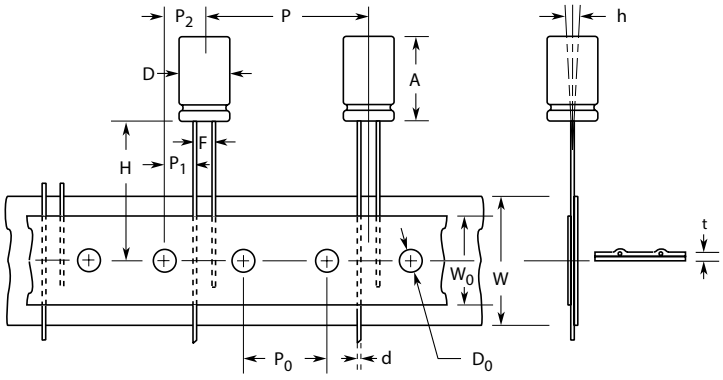



**Fig. 4- Straight Taping (16φ, 18φ)**

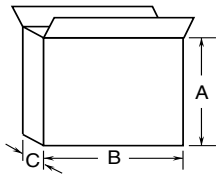



**Standard Lead Spacing of Taped Components is 5mm**
**Other Lead Spacing is Available by Special Order**

| Code | D | A | d | P | $P_0$ | $P_1$ | $P_2$ | F | W | $W_0$ | H | $H_0$ | $D_0$ | t | ih | Fig. |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Tolerance | 0.5 | 1.0 | ±0.05 | ±1.0 | ±0.2 | ±0.7 | ±1.3 | +0.8 -0.2 | ±0.5 | Min. | ±0.75 | ±0.5 | ±0.2 | ±0.2 | Max. | |
| Item | 4 ~ 6.3 | 7.0 | 0.45 | 12.7 | 12.7 | 3.85 | 6.35 | 5.0 | 18.0 | 12.5 | 18.5 | 16.0 | 4.0 | 0.7 | 2.0 | 1 |
| | 5 ~ 8 | 12.5 | 0.5 | 12.7 | 12.7 | 3.85 | 6.35 | 5.0 | 18.0 | 12.5 | 18.5 | 16.0 | 4.0 | 0.7 | 2.0 | |
| | 5, 6.3 | 12.5 | 0.5 | 12.7 | 12.7 | 5.1 | 6.35 | 2.5 | 18.0 | 12.5 | 18.5 | —— | 4.0 | 0.7 | 2.0 | 2 |
| | 8 | 12.5 | 0.5 | 12.7 | 12.7 | 4.6 | 6.35 | 3.5 | 18.0 | 12.5 | 18.5 | —— | 4.0 | 0.7 | 2.0 | |
| | 10 | 21.0 | 0.6 | 12.7 | 12.7 | 3.85 | 6.35 | 5.0 | 18.0 | 12.5 | 18.5 | —— | 4.0 | 0.7 | 2.0 | 3 |
| | 12, 13 | 26.0 | 0.6 | 15.0 | 15.0 | 5.0 | 7.5 | 5.0 | 18.0 | 12.5 | 18.5 | —— | 4.0 | 0.7 | 2.0 | |
| | 16, 18 | 26.0 | 0.8 | 30.0 | 15.0 | 3.75 | 7.5 | 7.5 | 18.0 | 12.5 | 18.0 | —— | 4.0 | 0.7 | 2.0 | 4 |

| Capacitor Diameter D (mm) | Ammo Pack Box Dimensions (mm) | | | Quantity Per Ammo Pack Box |
|---|---|---|---|---|
| | A±5 | B Max | C±3 | |
| 4 | 250 | 340 | 54 | 3000 |
| 5 | 250 | 340 | 54 | 2,000 |
| 6.3 | 290 | 340 | 54 | 2,000 |
| 8 | 250 | 340 | 54 | 1,000 |
| 10 (12 L) | 290 | 340 | 54 | 600 |
| 10 (16 L) | 350 | 340 | 59 | 600 |
| 10 (20 L) | 340 | 340 | 71 | 600 |
| 12, 13 | 340 | 340 | 71 | 400 |
| 16 | 340 | 340 | 71 | 300 |

**Ammo Pack**




Ammo Pack boxes are shipped 5 to the outer packing carton

Tape And Reel Quantities

| Case Diameter D (mm) | Reel Width | Reel Qty. (Pcs.) |
|---|---|---|
| 4 | 44 | 1500 |
| 5 | 44 | 1200 |
| 6 | 44 | 1000 |
| 8 | 44 | 800 |
| 10 (12L) | 44 | 600 |
| 10 (16L) | 50 | 600 |
| 12, 13 | - | - |
| 16 | - | - |

**Notice and Disclaimer:** All product drawings, descriptions, specifications, statements, information and data (collectively, the "Information") in this datasheet or other publication are subject to change. The customer is responsible for checking, confirming and verifying the extent to which the Information contained in this datasheet or other publication is applicable to an order at the time the order is placed. All Information given herein is believed to be accurate and reliable, but it is presented without any guarantee, warranty, representation or responsibility of any kind, expressed or implied. Statements of suitability for certain applications are based on the knowledge that the Cornell Dubilier company providing such statements ("Cornell Dubilier") has of operating conditions that such Cornell Dubilier company regards as typical for such applications, but are not intended to constitute any guarantee, warranty or representation regarding any such matter – and Cornell Dubilier specifically and expressly disclaims any guarantee, warranty or representation concerning the suitability for a specific customer application, use, storage, transportation, or operating environment. The Information is intended for use only by customers who have the requisite experience and capability to determine the correct products for their application. Any technical advice inferred from this Information or otherwise provided by Cornell Dubilier with reference to the use of any Cornell Dubilier products is given gratis (unless otherwise specified by Cornell Dubilier), and Cornell Dubilier assumes no obligation or liability for the advice given or results obtained. Although Cornell Dubilier strives to apply the most stringent quality and safety standards regarding the design and manufacturing of its products, in light of the current state of the art, isolated component failures may still occur. Accordingly, customer applications which require a high degree of reliability or safety should employ suitable designs or other safeguards (such as installation of protective circuitry or redundancies or other appropriate protective measures) in order to ensure that the failure of an electrical component does not result in a risk of personal injury or property damage. Although all product-related warnings, cautions and notes must be observed, the customer should not assume that all safety measures are indicated in such warnings, cautions and notes, or that other safety measures may not be required.