

PW Series high power SuperCapacitors



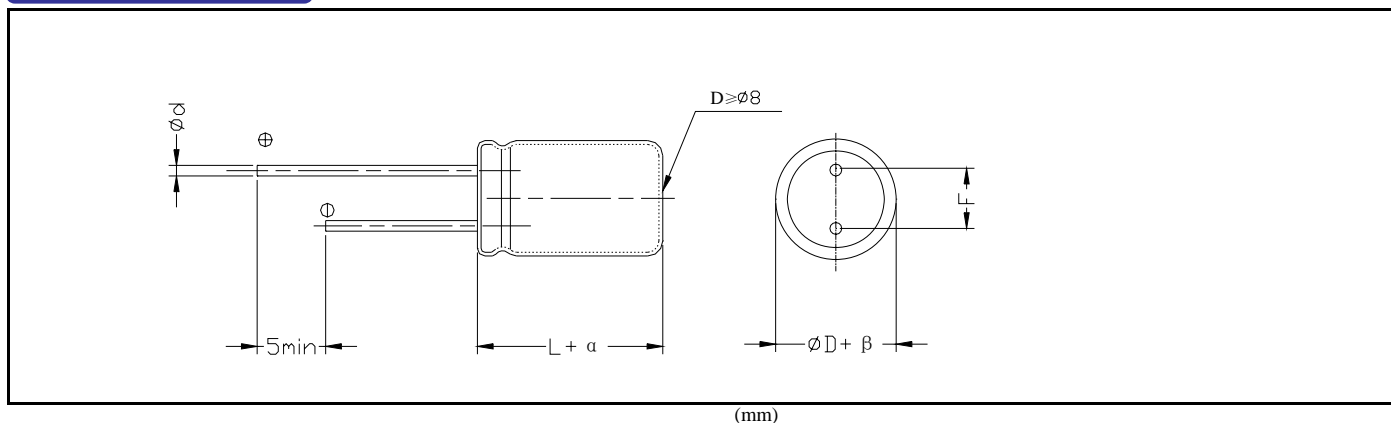
Features

- Case diameter: : Φ 8mm – Φ 22mm, capacitance 0.5~100F
- Ultralow resistance and long life time.
- Available for high power density situation and consumer electronics.
- Adapted to the ROHS directive (2002/95/EC)。

Specifications

| Items | Characteristics | |
|-------------------------------|--|--|
| Operating Temperature Range | -40℃ ~+60℃ | |
| Storage Temperature Range | -40~+70℃ | |
| Rated Voltage Range | 2.7V | |
| Nominal Capacitance Range | 0.5 ~ 100 F | |
| Nominal Capacitance Tolerance | ±20% (25℃) | |
| Leakage Current | $I \leq 0.01C_R V_R$ or 3(mA) Whichever is greater(at 25℃, after 72hours) C_R : Nominal Capacitance (F) U_R : Rated voltages (V) | |
| Load Life | After 1000 hours' application of rated voltage at 60℃, the capacitor shall meet the following requirement: | |
| | Capacitance Change | Within ±30% of the initial value (16V: within ±25% of the initial value) |
| | ESR(1KHz) | Not more than 200% of the initial specified value |
| | Leakage Current | Not more than the initial specified value |
| Shelf Life | After storage for 1000 hours at +105℃, the capacitors shall meet the requirement of load life above | |
| Cycles life | The capacitors shall be charged/discharged with constant current between the U_R and $1/2U_R$ maintained at 25℃ for 500000cycles. After removing the current at room temperature, they meet the following requirement. | |
| | Capacitance Change | Within ±30% of the initial value |
| | ESR | Not more than two times of the initial specified value |
| | Leakage Current | Not more than the initial specified value |

Dimensions



(mm)

■ Nominal capacitance, rated voltage, ESR and case size table

| V | 2.7V | | | | | | |
|---|------|-----------|-------------------|-----------------|-----------|-------------------|-----------------|
| | F | DxL mm | ESR mΩ 1KHz | Lc mA 72h | DxL mm | ESR mΩ 1KHz | Lc mA 72h |
| | 0.5 | 8×12 | 600 | 0.005 | | | |
| | 1 | | | | 8×12 | 300 | 0.008 |
| | 2 | 10×20 | 200 | 0.010 | 8×20 | 200 | 0.010 |
| | 4.7 | 12×20 | 80 | 0.012 | 10×20 | 100 | 0.012 |
| | 10 | 10×30 | 60 | 0.030 | 12.5×25 | 50 | 0.030 |
| | 15 | 12.5×34 | 40 | 0.035 | | | |
| | 22 | 16×34 | 35 | 0.045 | | | |
| | 30 | | | | 18×34 | 30 | 0.065 |
| | 50 | 18×41 | 20 | 0.075 | | | |
| | 70 | | | | 18×45 | 20 | 0.100 |
| | 90 | 22×45 | 18 | 0.250 | | | |
| | 100 | | | | 22×45 | 16 | 0.300 |

Load Life Data

