

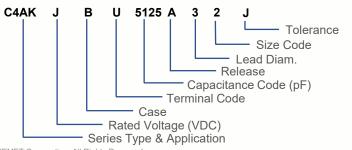
Overview

The C4AK film capacitor uses a new metallized dielectric material that meets the demanding Automotive Electronics Council's AEC-Q200 qualification requirements, and it has an extended life capability at 125°C hot-spot and can reach up to 135°C hot spot temperature.

Benefits

- Self-healing
- High ripple current
- High capacitance density
- · Harsh environment capability
- Miniaturization:
 - Minimize the qty of capacitors at high temperature applications
- High reliability:
 Long life up to 200,000 hours with voltage and current derating
- Suitable for high frequency applications

Part Number System



Automotive Grade, 135 °C, Long Life and High Voltage

C4AK, High Temperature, DC Link

Electrical Characteristics

Capacitance Range: 1.5 μ F to 60 μ F Rated Voltage V_{NDC} (85 °C): 700 V, 900 V +30 °C Max. self-heating and 100% Irms up to 95 °C ambient temperature.

Features

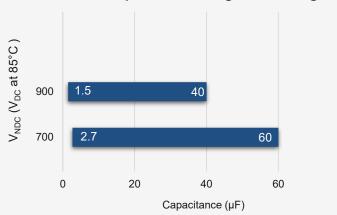
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Harsh Environment Capable
1,000 h at 85°C / 85% R.H., V_{NDC}
2 pins or 4 pins terminals leads
Low profile with 12.5 mm minimum height



Characteristics

Capacitance Range Per Voltage



Operative Voltage (Vop) Derating at Hot Spot T _{HS} (°C)	Voltage Range (VDC)		Life Expectancy (Hours)
VNDC at 85°C	700	900	100,000
Vop at 105°C	600	800	20,000
Vop at 125°C	500	720	4,000
Vop at 135°C	400	500	1,000

Applications

DC Link
DC Filtering
Energy storage

EV & HV automotive Renewable energy systems Electric motor drives

https://ec.kemet.com/dc-link/