Power Ring Film Capacitor™
3000 µF, 1100 Vdc

The 700A163 Power Ring is a 1100 Vdc, 3000 µF DC Link Capacitor with an ESR of 150 micro-Ohms at 20 kHz and an ESL of 10 nH.

Electrical Specifications

SBE Part #: 700A163
Capacitance/Tolerance: 3000 µF ±10%
DC Voltage Rating: 1100 Vdc
Dielectric/Construction: Metallized polypropylene. Single section design. 2 - windings
Dielectric Withstand Voltage: Units 100% tested at DC potential of 1275 Volts for two minutes at 25°C
UL Recognition: UL 810

ESL: 10 nH at the typical “half bridge” type package connection
Thermal Resistance: 0.34°C/W (case side cooling only) 0.17°C/W (case and bus side cooling only)
Operating Temperature: -40°C to +85°C
Voltage, Temperature De-rating: De-rate voltage linearly to 850 Volts from +85°C to +107°C, with respect to hotspot temperature
System Fault Current Rating: 20,000 Amps maximum (external to the capacitor)

Typical ESR vs. Frequency:

RMS Current Rating:

SBE reserves the right to amend design data

At the Leading Edge of Film Capacitor Technology®
Mechanical Specifications

Dimensions: See layout drawing for details
Terminals: Tin plated copper, 0.032” thick
Bus Structure: Tin plated copper, 0.080” thick each plate.
Nomex, 0.011” thick - UL 94-V0
UL recognized construction
Encapsulation: Capacitors potted with RTV case - UL 94-V0

Marking:
SBE 700A163 SBE company identification
3000 μF ±10% Capacitance value and tolerance
1100 Vdc DC voltage rating
yyww-lot#-unit Serial number (date code, lot number, unit number)

Layout Details:

Contact SBE Inc. to discuss your specific requirements.