

Power Capacitors

B25667B4247A375

Power Factor Correction

MKK440-D-15-01

Construction

- Dielectric: Polypropylene film
- Gas-impregnated / dry type
- Concentric winding
- Wave cut
- Extruded round aluminum can with stud
- Provided with ceramic discharge module
- Triple safety system

Features

- Three phase, delta connected
- Self-healing technology
- Naturally air cooled (or forced air cooling)
- Indoor mounting

Typical applications

■ For Power Factor Correction

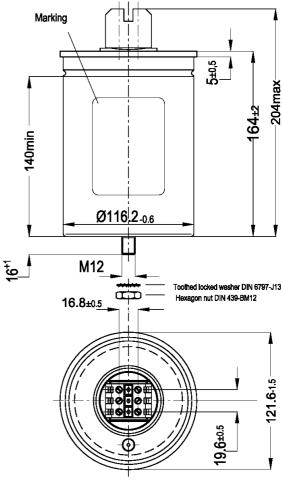
Terminals

■ SIGUT terminals

Mounting parts

■ Threaded stud at bottom of can (max. torque = 10 Nm for M12)

Dimensional drawing



All dimensions in mm

Technical data and specifications

| Characteristics | | |
|----------------------------------|--------------|---------|
| Rated capacitance C _R | 3 x 83 μF | |
| Tolerance | -5 / +10% | |
| Connection | D (Delta) | |
| Rated voltage V _R | 440 VAC | |
| Rated frequency f _R | 50 Hz | 60 Hz |
| Output | 15 kvar | 18 kvar |
| Rated current I _R | 20 A | 24 A |
| tanδ (dielectric) | 0.2 W / kvar | |

Edition 2. 20.10.05



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| Maximum ratings | |
|------------------------------------|--------------------------|
| U _{max} (up to 8 h daily) | 480 VAC |
| U _{max} (up to 1 min) | 570 VAC |
| I _{max} | 1.3 x I _R (A) |
| I _S | 200 x I _R (A) |

| Test data | |
|-----------------|-------------------------------|
| U _{TT} | 950 VAC / 50 Hz during 10 s |
| U _{TC} | 3,000 VAC / 50 Hz during 10 s |
| tanδ (50 Hz) | ≤ 0.5 W / kvar |

| Climatic category / -40/D | | |
|---------------------------|------------|----------------|
| T _{min} | (-) | 40 °C |
| T _{max} | (+) | 55 °C |
| Humidity | | av. rel. < 95% |
| Maximun | n altitude | 4,000 m |

| Mean life expectancy | |
|---|---------------------|
| t _{LD} | Up to 115,000 hours |
| Max. 5000 switchings per year acc. to IEC 60831 | |

| Design data | |
|---------------------------|--|
| Dimensions (∅ x l) | 121 x 164 mm |
| Weight approx | 1.4 kg |
| Impregnation | Dry, inert gas |
| Fixing | Threaded bolt M12 |
| Max. torque (Al can stud) | 10 Nm |
| Mounting position | Any mounting position possible. See "Maintenance and Installation Manual" for further details. |

Label design



SIEMENS

PhaseCap™ MKK440-D-15-01 4RB5 150-5 AB 45

Power Quality

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 $C_N = 3 \times 83 \,\mu\text{F} + 10/-5\%$ Δ SH

Q_N /50 Hz Q_N /60 Hz U_N 15,0 kvar 18,0 kvar 13,3 kvar 16,0 kvar 440 V 415 V 400 V 12,4 kvar 14,9 kvar

U₁ = 3/- kV -40/D

Overpressure disconnector Dry, Inert Gas IEC 60831(96) AFC 10 kA -40...+55°C

Internally protected CSA C22.2 No.190 Made by EPCOS

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| Terminals | |
|--------------------------|----------------------------|
| Degree of protection | Isolated terminals, IP20 |
| Max. torque | 1.2 Nm |
| Terminal cross section | 16 mm ² (5 AWG) |
| Maximum terminal current | 50 A |
| Creepage distance | 12.7 mm |
| Clearance | 9.6 mm |

| Safety | |
|----------------------------|---------------------------|
| Mechanical safety | Overpressure disconnector |
| Max. short circuit current | (AFC: 10 kA) |
| Discharge resistor time | ≤ 1 min (75 V) |

| Reference Standards |
|-----------------------------------|
| IEC 60831-1/2, UL 810-5th edition |
| Certification: cUL file E238746 |

⚠ Please read information about PFC capacitors and cautions as well as installation and maintenance instructions (Power Factor Correction Product Profile, actual version, and Installation and Maintenance Instructions for PFC-capacitors, available in the Internet) to ensure optimum performance and prevent products from failing, and in worst case, bursting and fire.

Information given in the PFC-product profile and values given in the data sheet reflect typical specifications. You are kindly requested to approve our product

Information given in the PFC-product profile and values given in the data sheet reflect typical specifications. You are kindly requested to approve our product specifications or request our approval for your specification before ordering.

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