AF190-30-11-14 250-500V 50/60Hz / DC



General Information

Extended Product Type: AF190-30-11-14 250-500V 50/60Hz / DC

 Product ID:
 1SFL487002R1411

 EAN:
 7320500480441

Catalog Description: AF190-30-11-14 Contactor

Long Description: A 3-phase Contactor suitable for various applications such as Motor starting, Isolation, By-

pass and Distribution application up to max 1000 V. Operated with wide control voltage

range 250-500 V, 50/60 Hz and DC

Categories

Products » Low Voltage Products and Systems » Control Products » Contactors » Block Contactors

Ordering

 Minimum Order Quantity:
 1 piece

 Customs Tariff Number:
 85364900

 EAN:
 7320500480441

Dimensions

Product Net Depth: 152.0 mm
Product Net Height: 196.0 mm
Product Net Weight: 2.778 kg
Product Net Width: 105.0 mm

Container Information

Package Level 1 Width:223 mmPackage Level 1 Length:133 mmPackage Level 1 Height:186 mmPackage Level 1 Gross Weight:3.228 kgPackage Level 1 EAN:7320500480441Package Level 1 Units:1 piece

Technical

Number of Main Contacts NC: 0
Number of Auxiliary Contacts NO: 1
Number of Auxiliary Contacts NC: 1

Rated Operational Voltage: Main Circuit 1000 V
Rated Frequency (f): Main Circuit 50/60 Hz

Conventional Free-air Thermal

Current (Ith):

acc. to IEC 60947-4-1, Open Contactors q = 40 $^{\circ}$ C 275 A

Rated Operational Current AC-1 (I_e): (690 V) 55 °C 250 A

(690 V) 40 °C 275 A (1000 V) 40 °C 250 A (1000 V) 55 °C 225 A (690 V) 70 °C 200 A (1000 V) 70 °C 185 A

Rated Operational Current AC-3 (I_e): (1000 V) 55 °C 85 A

(1000 V) 55 °C 85 A (415 V) 55 °C 190 A (690 V) 55 °C 135 A

(220 / 230 / 240 V) 55 °C 190 A (440 V) 55 °C 190 A (380 / 400 V) 55 °C 190 A (500 V) 55 °C 135 A

Rated Operational Power AC-3 (Pe): (500 V) 90 kW

(300 V) 30 kW (1000 V) 110 kW (220 / 230 / 240 V) 55 kW (690 V) 132 kW (380 / 400 V) 90 kW (440 V) 110 kW (415 V) 90 kW

Rated Breaking Capacity AC-3 acc. 8 x le AC-3

to IEC 60947-4-1:

Rated Making Capacity AC-3 acc. to 10 x le AC-3

IEC 60947-4-1:

Short-Circuit Protective Devices: gG Type Fuses 355 A

Rated Short-time Withstand Current at 40 °C Ambient Temp, in Free Air, from a Cold State 30 s 878 A (I_{cw}): at 40 °C Ambient Temp, in Free Air, from a Cold State 10 s 1520 A

at 40 °C Ambient Temp, in Free Air, from a Cold State 15 min 275 A at 40 °C Ambient Temp, in Free Air, from a Cold State 1 s 1900 A at 40 °C Ambient Temp, in Free Air, from a Cold State 1 min 621 A

Maximum Breaking Capacity:

cos phi=0.45 (cos phi=0.35 for le > 100 A) at 440 V 3300 A cos phi=0.45 (cos phi=0.35 for le > 100 A) at 690 V 2200 A

Maximum Electrical Switching

Frequency:

AC-3 300 cycles per hour AC-1 300 cycles per hour AC-2 / AC-4 150 cycles per hour

Rated Operational Current DC-1 (I_e): (110 V) 2 Poles in Series, 40 °C 250 A

(220 V) 3 Poles in Series, 40 °C 250 A

Rated Operational Current DC-3 (I_e): (110 V) 2 Poles in Series, 40 °C 250 A

(220 V) 3 Poles in Series, 40 °C 250 A

Rated Operational Current DC-5 (I_e): (110 V) 2 Poles in Series, 40 °C 250 A

(220 V) 3 Poles in Series, 40 °C 250 A

Rated Insulation Voltage (Ui): acc. to UL/CSA 600 V

acc. to IEC 60947-4-1 and VDE 0110 (Gr. C) 1000 V

Rated Impulse Withstand Voltage

(U_{imp}):

Main Circuit 8 kV

Mechanical Durability: 5 million

Maximum Mechanical Switching

Frequency:

300 cycles per hour

Coil Operating Limits: (acc. to IEC 60947-4-1) $0.85 \times Uc$ Min. ... $1.1 \times Uc$ Max. (at $\theta \le 70$ °C) °C

Rated Control Circuit Voltage (U_c):

60 Hz 250...500 V 50 Hz 250...500 V DC Operation 250...500 V

Coil Consumption: Pull-in at Max. Rated Control Circuit Voltage 60 Hz 185 V·A

Holding at Max. Rated Control Circuit Voltage DC 3.9 W Holding at Max. Rated Control Circuit Voltage 50 Hz 16.1 V·A Pull-in at Max. Rated Control Circuit Voltage DC 188 W Pull-in at Max. Rated Control Circuit Voltage 50 Hz 185 V·A Holding at Max. Rated Control Circuit Voltage 60 Hz 16.1 V·A Between Coil Energization and NO Contact Closing 25...55 ms

Between Coil De-energization and NO Contact Opening 37...47 ms

Rigid Al-Cable 1x95...185 mm² Flexible 2x50...95 mm² Rigid Cu-Cable 1x6...150 mm²

Connecting Capacity Auxiliary

Connecting Capacity Main Circuit:

Circuit:

Operate Time:

Solid 2x1...4 mm²

Flexible with Insulated Ferrule 2x0.75...2.5 mm²

Stranded 2x1...4 mm² Flexible 2x0.75...2.5 mm²

Flexible with Ferrule 2x0.75...2.5 mm²

Degree of Protection: acc. to IEC 60529, IEC 60947-1, EN 60529 Coil Terminals IP20

acc. to IEC 60529, IEC 60947-1, EN 60529 Main Terminals IP00

Terminal Type: Main Circuit: Bars

Number of Main Contacts NO: 3

Environmental

Maximum Operating Altitude Permissible:

3000 m

RoHS Status:

Following EU Directive 2002/95/EC August 18, 2005 and amendment

Ambient Air Temperature:

Close to Contactor Fitted with Thermal O/L Relay (0.85 ... 1.1 Uc) -25...+50 °C Close to Contactor without Thermal O/L Relay (0.85 ... 1.1 Uc) -40...+70 °C

Close to Contactor for Storage -40...+70 °C

Technical UL/CSA

General Use Rating UL/CSA: (600 V AC) 250 A

Horsepower Rating UL/CSA: (208 V AC) Three Phase 50 Hp

(440 ... 480 V AC) Three Phase 125 Hp (550 ... 600 V AC) Three Phase 150 Hp (220 ... 240 V AC) Three Phase 60 Hp (200 V AC) Three Phase 50 Hp

Maximum Operating Voltage

UL/CSA:

Main Circuit 600 V

Certificates and Declarations (Document Number)

Instructions and Manuals: 1SFC100008M0201

CB Certificate: SE-71797M1

Data Sheet, Technical Information: 1SFC101070D0201

Declaration of Conformity - CE: 2CMT004613

RINA Certificate: ELE060313XG/002

RoHS Information: 1SFC101055D0202

Classifications

 E-nummer:
 3210135

 ETIM 4:
 EC000066 - Magnet contactor, AC-switching

 ETIM 5:
 EC000066 - Magnet contactor, AC-switching

 UNSPSC:
 39121529

 Object Classification Code:
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