
PRODUCT-DETAILS

AF110B-30-11-72

AF110B-30-11 20-60V DC Contactor

For sale but "Obsolete", replaced by



General Information

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| Extended Product Type | AF110B-30-11-72 |
| Product ID | 1SFL457063R7211 |
| EAN | 7320500256480 |
| Catalog Description | AF110B-30-11 20-60V DC Contactor |
| Long Description | A 3-phase Contactor suitable for Rail way applications application. Operated with a wide voltage control voltage range 20-60V, DC |

Ordering

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|------------------------------|-----------------|
| Minimum Order Quantity | 1 piece |
| Customs Tariff Number | 85364900 |
| Replacement Product ID (NEW) | 1SFL427063R1122 |

Popular Downloads

| | |
|-----------------------------------|-----------------|
| Data Sheet, Technical Information | 1SBC100192C0206 |
| Instructions and Manuals | 5309660-60 |
| Dimension Diagram | 53540923-8 |

Dimensions

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| Product Net Width | 102 mm |
| Product Net Depth / Length | 123.5 mm |
| Product Net Height | 148 mm |
| Product Net Weight | 1.9 kg |

Technical

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| Number of Main Contacts NO | 3 |
| 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 |
| Conventional Free-air Thermal Current (I_{th}) | acc. to IEC 60947-4-1, Open Contactors $q = 40^\circ\text{C}$ 160 A |
| Rated Operational Current AC-1 (I_e) | (690 V) 40°C 160 (690 V) 55°C 145 (690 V) 70°C 130 |
| Rated Operational Current AC-3 (I_e) | (415 V) 55°C 110 A (440 V) 55°C 100 A (500 V) 55°C 100 A (690 V) 55°C 82 A (1000 V) 55°C 30 A (380 / 400 V) 55°C 110 A (220 / 230 / 240 V) 55°C 110 |
| Rated Operational Power AC-3 (P_e) | (415 V) 59 kW (440 V) 59 kW (500 V) 59 kW (690 V) 75 kW (1000 V) 40 kW (380 / 400 V) 55 kW (220 / 230 / 240 V) 30 kW |
| Rated Breaking Capacity AC-3 acc. to IEC 60947-4-1 | 8 x I_e AC-3 |
| Rated Making Capacity AC-3 acc. to IEC 60947-4-1 | 10 x I_e AC-3 |
| Short-Circuit Protective Devices | gG Type Fuses 160 A |
| Maximum Breaking Capacity | $\cos \phi = 0.45$ ($\cos \phi = 0.35$ for $I_e > 100$ A) at 440 V 1160 A $\cos \phi = 0.45$ ($\cos \phi = 0.35$ for $I_e > 100$ A) at 690 V 800 A |
| Maximum Electrical Switching Frequency | (AC-1) 300 cycles per hour (AC-2 / AC-4) 150 cycles per hour (AC-3) 300 cycles per hour |
| Rated Operational Current DC-1 (I_e) | (110 V) 2 Poles in Series, 40°C 160 A (220 V) 3 Poles in Series, 40°C 160 A |
| Rated Operational Current DC-3 (I_e) | (110 V) 2 Poles in Series, 40°C 160 A (220 V) 3 Poles in Series, 40°C 160 A |
| Rated Operational Current DC-5 (I_e) | (110 V) 2 Poles in Series, 40°C 160 A (220 V) 3 Poles in Series, 40°C 160 A |
| Rated Insulation Voltage (U_i) | acc. to IEC 60947-4-1 and VDE 0110 (Gr. C) 1000 V acc. to UL/CSA 600 V |
| Rated Impulse Withstand Voltage (U_{imp}) | Main Circuit 8 kV |
| Mechanical Durability | 10 million |
| Maximum Mechanical Switching Frequency | 300 cycles per hour |
| Coil Operating Limits | (acc. to IEC 60947-4-1) $0.85 \times U_c$ Min. ... $1.1 \times U_c$ Max. (at $\theta \leq 70^\circ\text{C}$) |
| Rated Control Circuit Voltage (U_c) | DC Operation 20 ... 60 V |

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| Coil Consumption | Holding at Max. Rated Control Circuit Voltage 50 Hz 7 V·A Holding at Max. Rated Control Circuit Voltage 60 Hz 7 V·A Holding at Max. Rated Control Circuit Voltage DC 2 W Pull-in at Max. Rated Control Circuit Voltage 50 Hz 350 V·A Pull-in at Max. Rated Control Circuit Voltage 60 Hz 350 V·A Pull-in at Max. Rated Control Circuit Voltage DC 400 W |
| Operate Time | Between Coil De-energization and NC Contact Closing 60 ... 130 ms Between Coil De-energization and NO Contact Opening 55 ... 125 ms Between Coil Energization and NC Contact Opening 27 ... 77 ms Between Coil Energization and NO Contact Closing 30 ... 80 ms |
| Connecting Capacity Main Circuit | Bar 30 mm ² Flexible with Cable End 1 x 10 ... 70 mm ² Rigid 2 x 6 ... 65 mm ² |
| Connecting Capacity Auxiliary Circuit | Flexible with Ferrule 2x 0.75 ... 2.5 mm ² Flexible with Insulated Ferrule 2x 0.75 ... 2.5 mm ² Flexible 1x0.75 ... 2.5 mm ² Solid 2 x 1 ... 4 mm ² Stranded 2 x 1 ... 4 mm ² |
| 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 IP10 |
| Connecting Terminals (delivered in open position) Main Poles | M8 hexagon socket screw with single connector |
| Terminal Type | Cable Clamp |

Technical UL/CSA

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|----------------------------------|---|
| Maximum Operating Voltage UL/CSA | Main Circuit 600 V |
| General Use Rating UL/CSA | (600 V AC) 140 A |
| Horsepower Rating UL/CSA | (200 V AC) Three Phase 30 hp (208 V AC) Three Phase 30 hp (220 ... 240 V AC) Three Phase 40 hp (440 ... 480 V AC) Three Phase 75 hp (550 ... 600 V AC) Three Phase 100 hp |

Environmental

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| 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 -60 ... +80 °C |
| Maximum Operating Altitude Permissible | Without Derating 3000 m |
| Resistance to Shock acc. to IEC 60068-2-27 | Half-sine Pulse for 11 ms, No Change in Contact Position, Open, Shock Direction: A 20 g Half-sine Pulse for 11 ms, No Change in Contact Position, Closed, Shock Direction: A 20 g Half-sine Pulse for 11 ms, No Change in Contact Position, Closed, Shock Direction: B1 15 g Half-sine Pulse for 11 ms, No Change in Contact Position, Closed, Shock Direction: C1 20 g Half-sine Pulse for 11 ms, No Change in Contact Position, Closed, Shock Direction: C2 20 g Half-sine Pulse for 11 ms, No Change in Contact Position, Open, Shock Direction: B1 5 g Half-sine Pulse for 11 ms, No Change in Contact Position, Open, Shock Direction: B2 15 g Half-sine Pulse for 11 ms, No Change in Contact Position, Open, Shock Direction: C1 20 g Half-sine Pulse for 11 ms, No Change in Contact Position, Open, Shock Direction: C2 20 g |
| RoHS Status | Following EU Directive 2011/65/EU |

Certificates and Declarations (Document Number)

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|----------------|-------------|
| BV Certificate | 13409/C0 BV |
| CB Certificate | SE-73668 |

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|------------------------------------|---------------------|
| CQC Certificate | CQC2002010304007860 |
| Declaration of Conformity - CCC | 2020980304001857 |
| Declaration of Conformity - CE | 2CMT2015-005436 |
| EAC Certificate | 9AKK107046A8618 |
| Environmental Information | 1SFC101006D0201 |
| GL Certificate | GL_20260-04HH |
| Instructions and Manuals | 5309660-60 |
| LOVAG Certificate | SE9831016 |
| LR Certificate | LR_04-00015-E1 |
| RINA Certificate | ELE060313XG/002 |
| RMRS Certificate | RMRS_12-03683-315 |
| RoHS Information | 2CMT2015-005436 |

Container Information

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|-----------------------------------|---------------|
| Package Level 1 Units | box 1 piece |
| Package Level 1 Width | 130 mm |
| Package Level 1 Depth / Length | 265 mm |
| Package Level 1 Height | 162 mm |
| Package Level 1 Gross Weight | 2.1 kg |
| Package Level 1 EAN | 7320500256480 |

Classifications

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|---------------------------------------|---|
| Object Classification Code | Q |
| ETIM 4 | EC000066 - Magnet contactor, AC-switching |
| ETIM 5 | EC000066 - Magnet contactor, AC-switching |
| ETIM 6 | EC000066 - Power contactor, AC switching |
| ETIM 7 | EC000066 - Power contactor, AC switching |
| eClass | V11.0 : 27371003 |
| UNSPSC | 39121529 |
| IDEA Granular Category Code (IGCC) | 4755 >> Contactors |

Categories

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

