## GA75-10-00 $24 \mathrm{~V} 50 \mathrm{~Hz} / 24 \mathrm{~V} 60 \mathrm{~Hz}$ GA75-10-00 24V 50Hz / 24V 60Hz Contactor



General Information

| Extended Product Type | GA75-10-00 24V $50 \mathrm{~Hz} / 24 \mathrm{~V} 60 \mathrm{~Hz}$ |
| :---: | :---: |
| Product ID | 1SBL411025R8100 |
| EAN | 3471522099815 |
| Catalog Description | GA75-10-00 $24 \mathrm{~V} 50 \mathrm{~Hz} / 24 \mathrm{~V} 60 \mathrm{~Hz}$ Contactor |
| Long Description | GA75 contactors are designed for DC circuit switching. Arc suppression is more difficult in DC than in AC. To choose a contactor, it is necessary to know the current and voltage to be broken as well as the L/R time constant of the power circuit to be controlled. GA75 contactors are of the block type design. - Main poles: the contactors are fitted with arc chutes with permanent magnets specially designed for DC breaking. The three contactor paths are arranged in series via two supplied and fitted insulated connections ( $25 \mathrm{~mm}^{2}$ ). The GA75 are "single-pole" devices for which the connection polarities indicated next to the connection terminals must be respected. Furthermore, they are marked 1 L 1 for the positive terminal and 2T1 for the negative terminal. - Control circuit: AC operated with laminated magnet circuit - Accessories: a wide range of accessories is available |


| Ordering |  |
| :--- | ---: |
| Minimum Order Quantity | 1 piece |
| Customs Tariff Number | 85364900 |

## Popular Downloads

| Instructions and Manuals | FPTC407691P0003 |
| :--- | :---: |
| CAD Dimensional <br> Drawing | 2CDC001079B0201 |
|  |  |
| Dimensions | 70 mm |
| Product Net Width | 108 mm |
| Product Net Depth $/$ | 132 mm |
| Length | 1.22 kg |
| Product Net Height |  |

Technical

| Number of Main Contacts NO | 3 |
| :---: | :---: |
| Number of Main Contacts NC | 0 |
| Number of Auxiliary Contacts NO | 0 |
| Number of Auxiliary Contacts NC | 0 |
| Rated Operational Voltage | Main Circuit 1000 V DC |
| Rated Frequency (f) | Control Circuit 50 / 60 Hz |
| Conventional Free-air Thermal Current ( $l_{\text {th }}$ ) | acc. to IEC 60947-4-1, Open Contactors $\Theta=40^{\circ} \mathrm{C} 125 \mathrm{~A}$ |
| Short-Circuit Protective Devices | gG Type Fuses 160 A |
| Maximum Electrical Switching Frequency | 300 cycles per hour |
| Rated Operational Current DC-1 ( $\mathrm{l}_{\mathrm{e}}$ ) | (1000 V) 1-Pole, $40^{\circ} \mathrm{C} 35 \mathrm{~A}$ (1000 V) 1-Pole, $55^{\circ} \mathrm{C} 35 \mathrm{~A}$ (110 V) 1 Pole, $70^{\circ} \mathrm{C} 35 \mathrm{~A}$ (110 V) 1-Pole, $55^{\circ} \mathrm{C} 100 \mathrm{~A}$ (110 V) 1-Pole, $70{ }^{\circ} \mathrm{C} 85 \mathrm{~A}$ (220 V) 1-Pole, $40^{\circ} \mathrm{C} 120 \mathrm{~A}$ (220 V) 1-Pole, $55^{\circ} \mathrm{C} 100 \mathrm{~A}$ (220 V) 1-Pole, $70^{\circ} \mathrm{C} 85 \mathrm{~A}$ (440 V) 1-Pole, $40{ }^{\circ} \mathrm{C} 100 \mathrm{~A}$ (440 V) 1-Pole, $55^{\circ} \mathrm{C} 100 \mathrm{~A}$ (440 V) 1-Pole, $70^{\circ} \mathrm{C} 85 \mathrm{~A}$ (600 V) 1-Pole, $40^{\circ} \mathrm{C} 75 \mathrm{~A}$ (600 V) 1-Pole, $55^{\circ} \mathrm{C} 75 \mathrm{~A}$ (600 V) 1-Pole, $70^{\circ} \mathrm{C} 75 \mathrm{~A}$ (72 V) 1-Pole, $40^{\circ} \mathrm{C} 120 \mathrm{~A}$ (72 V) 1-Pole, $55^{\circ} \mathrm{C} 100 \mathrm{~A}$ (72 V) 1-Pole, $70{ }^{\circ} \mathrm{C} 85 \mathrm{~A}$ |
| Rated Operational Current DC-3 ( $\mathrm{I}_{\mathrm{e}}$ ) | (110 V) 1-Pole, $40^{\circ} \mathrm{C} 120 \mathrm{~A}$ (110 V) 1-Pole, $55^{\circ} \mathrm{C} 100 \mathrm{~A}$ (220 V) 1-Pole, $40{ }^{\circ} \mathrm{C} 100 \mathrm{~A}$ (220 V) 1-Pole, $55^{\circ} \mathrm{C} 100 \mathrm{~A}$ (440 V) 1-Pole, $40^{\circ} \mathrm{C} 85 \mathrm{~A}$ (440 V) 1-Pole, $55^{\circ} \mathrm{C} 85 \mathrm{~A}$ (72 V) 1-Pole, $40^{\circ} \mathrm{C} 120 \mathrm{~A}$ (72 V) 1-Pole, $55^{\circ} \mathrm{C} 100 \mathrm{~A}$ |
| Rated Operational Current DC-5 ( $\mathrm{I}_{\mathrm{e}}$ ) | (110 V) 1-Pole, $40^{\circ} \mathrm{C} 85 \mathrm{~A}$ (110 V) 1-Pole, $55^{\circ} \mathrm{C} 85 \mathrm{~A}$ (220 V) 1-Pole, $40^{\circ} \mathrm{C} 85 \mathrm{~A}$ (220 V) 1-Pole, $55^{\circ} \mathrm{C} 85 \mathrm{~A}$ (440 V) 1-Pole, $40^{\circ} \mathrm{C} 35 \mathrm{~A}$ (440 V) 1-Pole, $55^{\circ} \mathrm{C} 35 \mathrm{~A}$ (72 V) 1-Pole, $40^{\circ} \mathrm{C} 85 \mathrm{~A}$ (72 V) 1-Pole, $55^{\circ} \mathrm{C} 85 \mathrm{~A}$ |
| Rated Insulation Voltage $\left(\mathrm{U}_{\mathrm{i}}\right)$ | acc. to IEC 60947-4-1 1000 V acc. to UL/CSA 600 V |
| (C) 2023 ABB. All rig | 2023/09/05 Subject to chang |


| Rated Impulse Withstand Voltage ( $\mathrm{U}_{\mathrm{imp}}$ ) | 8 kV |
| :---: | :---: |
| Mechanical Durability | 10 million |
| Maximum Mechanical Switching Frequency | 3600 cycles per hour |
| Rated Control Circuit Voltage ( $\mathrm{U}_{\mathrm{c}}$ ) | $\begin{aligned} & 50 \mathrm{~Hz} 24 \mathrm{~V} \\ & 60 \mathrm{~Hz} 24 \mathrm{~V} \end{aligned}$ |
| Coil Consumption | Average Holding Value 50 / $60 \mathrm{~Hz} 18 \mathrm{~V} \cdot \mathrm{~A}$ Average Pull-in Value 50 Hz 190 V•A Average Pull-in Value $60 \mathrm{~Hz} 180 \mathrm{~V} \cdot \mathrm{~A}$ Holding at Max. Rated Control Circuit Voltage $50 \mathrm{~Hz} 18 \mathrm{~V} \cdot \mathrm{~A}$ Holding at Max. Rated Control Circuit Voltage 50 Hz 5.5 W Holding at Max. Rated Control Circuit Voltage $60 \mathrm{~Hz} 18 \mathrm{~V} \cdot \mathrm{~A}$ Holding at Max. Rated Control Circuit Voltage 60 Hz 5.5 W Pull-in at Max. Rated Control Circuit Voltage 50 Hz 190 V•A Pull-in at Max. Rated Control Circuit Voltage 60 Hz 180 V•A |
| Operate Time | Between Coil De-energization and NO Contact Opening $4 \ldots 11 \mathrm{~ms}$ Between Coil Energization and NO Contact Closing $8 . . .27 \mathrm{~ms}$ |
| Mounting on DIN Rail | TH35-15 ( $35 \times 15 \mathrm{~mm}$ Mounting Rail) acc. to IEC 60715 TH75-25 ( $75 \times 25 \mathrm{~mm}$ Mounting Rail) acc. to IEC 60715 |
| Mounting by Screws (not supplied) | $2 \times \mathrm{M} 6$ screws placed diagonally |
| Connecting Capacity Main Circuit | Flexible with Cable End $6 \ldots 16 \mathrm{~mm}^{2}$ Rigid Cable 6 ... $25 \mathrm{~mm}^{2}$ |
| Connecting Capacity Auxiliary Circuit | Flexible with Cable End $0.75 \ldots 2.5 \mathrm{~mm}^{2}$ Rigid Cable 1 ... $4 \mathrm{~mm}^{2}$ |
| 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 | M $6(+,-)$ pozidriv 2 screws with $1 \times(13 \times 10 \mathrm{~mm})$ connector |
| Terminal Type | Screw Terminals |

## Technical UL/CSA

| Maximum Operating | Main Circuit 1000 V DC |
| :--- | ---: |
| Voltage UL/CSA | $(1000 \mathrm{~V} \mathrm{DC)} 35 \mathrm{~A}$ |
| General Use Rating | $(440 \mathrm{~V} \mathrm{DC)} 100 \mathrm{~A}$ |
| UL/CSA | (600 V DC) 75 A |

## Environmental

| Ambient Air Temperature | Close to Contactor for Storage $-60 \ldots+80^{\circ} \mathrm{C}$ <br> Near Contactor for Operation in Free Air ( $0.85 \ldots 1.1$ Uc) $-40 \ldots+55^{\circ} \mathrm{C}$ Near Contactor for Operation in Free Air (Uc) - 40 ... $70^{\circ} \mathrm{C}$ |
| :---: | :---: |
| Climatic Withstand | acc. to IEC 60068-2-30 and 60068-2-11 - UTE C 63-100 specification II |
| Maximum Operating Altitude Permissible | Without Derating 3000 m |
| RoHS Status | Following EU Directive 2011/65/EU |

## Certificates and Declarations

| CB Certificate | CB_CN45325 |
| :--- | ---: |
| CCC Certificate | CCC_2018010304129268 |
| CQC Certificate | CQC2018010304129268 |
| CSA Certificate | CSA_1033838_LR056745 |
| Declaration of Conformity | 2020980304001625 |
| CCC | $2023 / 09 / 05$ |
| Declaration of Conformity | 1SBD250807U1000 |
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| - CE |  |
| :--- | ---: |
| Declaration of Conformity | 1SBD250824U1000 |
| - UKCA | EAC_RU C-FR ME77 B03599 |
| EAC Certificate | UL_E319322 |
| UL Listing Card |  |


| Container Information |  |
| :--- | ---: |
| Package Level 1 Units | box 1 piece |
| Package Level 1 Width | 140 mm |
| Package Level 1 Depth / <br> Length | 146 mm |
| Package Level 1 Height | 96 mm |
| Package Level 1 Gross <br> Weight | 1.22 kg |
| Package Level 1 EAN | 3471522099815 |
| Package Level 2 Units | box 63 piece |
| Package Level 2 Gross | 76.86 kg |
| Weight |  |


| Classifications |  |
| :--- | :--- |
| Object Classification Code | EC002552 - Power contactor, DC switching |
| ETIM 4 | EC002552 - Power contactor, DC switching |
| ETIM 5 | EC002552 - Power contactor, DC switching |
| ETIM 6 | EC002552 - Power contactor, DC switching |
| ETIM 7 | EC002552 - Power contactor, DC switching |
| ETIM 8 | V11.0 : 27371018 |
| eClass | 39121529 |
| UNSPSC | 4763 >> Power contactor, DC switching |
| IDEA Granular Category |  |
| Code (IGCC) |  |

Categories
Low Voltage Products and Systems $\rightarrow$ Control Products $\rightarrow$ Contactors $\rightarrow$ Block Contactors


