## SIEMENS



CONTACTOR RELAY, 4NO, AC $24 \mathrm{~V}, 50 \mathrm{HZ}$, SCREW CONNECTION, SIZE SOO

| General details: |  |  |
| :---: | :---: | :---: |
| product brand name |  | SIRIUS |
| product designation |  | contactor relay |
| Size of the contactor |  | S00 |
| Protection class IP / on the front |  | IP20 |
| Degree of pollution |  | 3 |
| Insulation voltage / with degree of pollution 3/rated value | V | 690 |
| Installation altitude / at a height over sea level / maximum | m | 2,000 |
| Ambient temperature |  |  |
| - during transport | ${ }^{\circ} \mathrm{C}$ | $-55 \ldots+80$ |
| - during storage | ${ }^{\circ} \mathrm{C}$ | $-55 \ldots+80$ |
| - during operating | ${ }^{\circ} \mathrm{C}$ | $-25 \ldots+60$ |
| Contact reliability |  | one incorrect switching operation of 100 million switching operations ( $17 \mathrm{~V}, 1 \mathrm{~mA}$ ) |
| Resistance against shock |  | $10 \mathrm{~g} / 5 \mathrm{~ms}$ and $5 \mathrm{~g} / 10 \mathrm{~ms}$ |
| Impulse voltage resistance / rated value | kV | 6 |
| Item designation |  |  |
| - according to DIN EN 61346-2 |  | K |
| - according to DIN 40719 extendable after IEC 204-2 / according to IEC 750 |  | K |
| Mechanical operating cycles as operating time |  |  |

- of the contactor / typical
- of the contactor with added auxiliary switch block / typical
- of the contactor with added electronics-compatible auxiliary
switch block / typical

30,000,000
10,000,000
5,000,000

## Control circuit:

| Type of voltage / of the controlled supply voltage |  | AC |
| :---: | :---: | :---: |
| Control supply voltage frequency |  |  |
| - 1 / rated value | Hz | 50 |
| - 2 / rated value | Hz | 60 |
| Control supply voltage / 1 |  |  |
| - at 50 Hz |  |  |
| - for AC / rated value | V | 24 |
| - at 60 Hz |  |  |
| - for AC / rated value | V | 24 |
| Working range factor supply voltage rated value / of the magnet coil |  |  |
| - at 50 Hz |  |  |
| - for AC |  | $0.8 \ldots 1.1$ |
| - at 60 Hz |  |  |
| - for AC |  | $0.85 \ldots 1.1$ |
| Apparent pull-in power / of the solenoid / for AC | $V \cdot A$ | 27 |
| Apparent holding power / of the solenoid / for AC | V.A | 4.6 |
| Inductive power factor |  |  |
| - with the pull-in power of the coil <br> - with the pull-in power of the coil |  | 0.8 0.27 |

## Auxiliary circuit:

| Product extension / auxiliary switch | Yes |
| :---: | :---: |
| Identification number and letter for switching elements | 40 E |
| Contact reliability / of the auxiliary contacts | 1 faulty switching per 100 million ( $17 \mathrm{~V}, 1 \mathrm{~mA}$ ) |
| Number of NC contacts / for auxiliary contacts | 0 |
| - delayed switching | 0 |
| - instantaneous switching | 0 |
| - asynchronous switching | 0 |
| - lagging switching | 0 |
| Number of NO contacts / for auxiliary contacts | 4 |
| - instantaneous switching | 4 |
| - delayed switching | 0 |
| - asynchronous switching | 0 |
| - leading switching | 0 |


| Number of changeover contacts |  |  |
| :---: | :---: | :---: |
| - for auxiliary contacts |  | 0 |
| - of the auxiliary contacts / instantaneous switching |  | 0 |
| Operating current / of the auxiliary contacts |  |  |
| - at AC-12 / maximum | A | 10 |
| - at AC-15 |  |  |
| - at 230 V | A | 6 |
| - at 400 V | A | 3 |
| - at 500 V | A | 2 |
| - at 690 V | A | 1 |
| - with 1 current path |  |  |
| - at DC-12 |  |  |
| - at 24 V | A | 10 |
| - at 110 V | A | 3 |
| - at 220 V | A | 1 |
| - at DC-13 |  |  |
| - at 24 V | A | 10 |
| - at 110 V | A | 1 |
| - at 220 V | A | 0.27 |

Short-circuit:
Design of the fuse link / for short-circuit protection of the
auxiliary switch / required
fuse gL/gG: 10 A

## Installation/mounting/dimensions:

| Built in orientation |  | with vertical mounting surface $+/-180^{\circ}$ rotatable, with <br> vertical mounting surface $+/-30^{\circ}$ tiltable to the front <br> and back |
| :--- | :--- | :--- | :--- |
| Type of mounting |  | screw and snap-on mounting |
| Width | mm | 45 |
| Height | mm | 57.5 |
| Depth | mm | 72 |
| Distance, to be maintained, to the ranks assembly / sidewards | mm | 0 |

## Connections:

Design of the electrical connection / for auxiliary and control current circuit

Type of the connectable conductor cross-section

- for auxiliary contacts
- solid
- finely stranded
- with conductor end processing
screw-type terminals
$2 x\left(0.5 \ldots 1.5 \mathrm{~mm}^{2}\right), 2 \times\left(0.75 \ldots 2.5 \mathrm{~mm}^{2}\right), 2 \times 4 \mathrm{~mm}^{2}$
$2 x\left(0.5 \ldots 1.5 \mathrm{~mm}^{2}\right), 2 \times\left(0.75 \ldots 2.5 \mathrm{~mm}^{2}\right)$
- for AWG conductors / for auxiliary contacts
$2 x(20 \ldots 16), 2 x(18 \ldots 14), 1 \times 12$

Certificates/approvals:

| Verification of suitability |  |  | CSA / UL / CCC / GL / LRS / BV / DNV / RMRS / RINA |  |
| :---: | :---: | :---: | :---: | :---: |
| General Product Approval |  |  | Functional Safety / <br> Safety of Machinery | Test Certificates |
|  | ROSTEST |  | SUVA | Manufacturer |
| Shipping Approval |  |  |  |  |
|  | I足 DNV DNV | GL | $\begin{aligned} & \begin{array}{l} \text { Cloyd's } \\ \text { Register } \end{array} \\ & \text { LRs } \end{aligned}$ |  |
| Shipping Approval | other |  |  |  |
|  | Manufacturer |  |  |  |

## Safety:

Proportion of dangerous failures

- with high demand rate / according to SN 31920
- with low demand rate / according to SN 31920

T1 value / for proof test interval or service life / according to IEC 61508

Protection against electrical shock
B10 value / with high demand rate / according to SN 31920
\% $\quad 75$
\% 40
a 20
finger-safe
1,000,000

## Further information:

Information- and Downloadcenter (Catalogs, Brochures,...)
http://www.siemens.com/industrial-controls/catalogs
Industry Mall (Online ordering system)
http://www.siemens.com/industrial-controls/mall

## CAx-Online-Generator

http://www.siemens.com/cax
Service\&Support (Manuals, Certificates, Characteristics, FAQs,...)
http://support.automation.siemens.com/WW/view/en/3RH1140-1AB00/all
Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, ...)
http://www.automation.siemens.com/bilddb/cax_en.aspx?mlfb=3RH1140-1AB00


