## SIEMENS

## Product data sheet

## 3RT1066-2NP36



CONTACTOR,

160KW/400V/AC-3 AC(40...60HZ)/DC OPERATION UC 200-277V AUXILIARY CONTACTS 2NO+2NC 3-POLE, SIZE S10 BAR CONNECTIONS ELECTRONIC OPERATING MECHANISM WITH 24 V DC PLC INTERFACE CAGE CLAMP TERMINAL

| General technical data:   |    |            |  |  |
|---|----|------------|--|--|
| product brand name  |    | SIRIUS     |  |  |
| Size of contactor   |    | S10        |  |  |
| Protection class IP / on the front  |    | IP00       |  |  |
| Degree of pollution   |    | 3          |  |  |
| Installation altitude / at height above sea level / maximum   | m  | 2,000      |  |  |
| Ambient temperature   |    |            |  |  |
| during operation  | °C | -25 +60    |  |  |
| Mechanical service life (switching cycles)  |    |            |  |  |
| of the contactor / typical  |    | 10,000,000 |  |  |
| of the contactor with added auxiliary switch block / typical  |    | 10,000,000 |  |  |
| <ul> <li>of the contactor with added electronics-compatible auxiliary<br/>switch block / typical</li> </ul> |    | 5,000,000  |  |  |
| Main circuit:   |    |            |  |  |
| Number of NC contacts / for main contacts   |    | 0          |  |  |
| Number of NO contacts / for main contacts   |    | 3          |  |  |
| Operating current   |    |            |  |  |
| • at AC-1 / up to 690 V   |    |            |  |  |
| • at ambient temperature 40 °C / Rated value  | А  | 330        |  |  |
| • at ambient temperature 60 °C / Rated value  | А  | 300        |  |  |
|   |    |            |  |  |

| at AC 2 / at 400 \/ / Dated using                                | ٥  | 200     |
|--|----|---------|
| • at AC-3 / at 400 V / Rated value                               | A  | 300     |
| tat AC-4 / at 400 V / Rated value                                | A  | 280     |
| Operating current / for $\geq$ 200000 operating cycles / at AC-4 |    |         |
| • at 400 V / Rated value   | A  | 125     |
| tat 690 V / Rated value  | A  | 115     |
| Operating current  |    |         |
| • with 1 current path / at DC-1                                  |    |         |
| • at 24 V / Rated value  | А  | 300     |
| • at 110 V / Rated value   | А  | 33      |
| <ul> <li>with 2 current paths in series / at DC-1</li> </ul>     |    |         |
| • at 24 V / Rated value  | А  | 300     |
| • at 110 V / Rated value   | А  | 300     |
| • with 3 current paths in series / at DC-1                       |    |         |
| • at 24 V / Rated value  | А  | 300     |
| • at 110 V / Rated value   | А  | 300     |
| Operating current  |    |         |
| • with 1 current path / at DC-3 / at DC-5                        |    |         |
| • at 24 V / Rated value  | А  | 300     |
| • at 110 V / Rated value   | А  | 3       |
| • with 2 current paths in series / at DC-3 / at DC-5             |    |         |
| • at 24 V / Rated value  | А  | 300     |
| • at 110 V / Rated value   | А  | 300     |
| • with 3 current paths in series / at DC-3 / at DC-5             |    |         |
| • at 24 V / Rated value  | А  | 300     |
| • at 110 V / Rated value   | А  | 300     |
| Operating power  |    |         |
| • at AC-1  |    |         |
| • at 400 V / Rated value   | kW | 197     |
| • at AC-2  |    |         |
| • at 400 V / Rated value   | kW | 171     |
| • at AC-3  |    |         |
| • at 400 V / Rated value   | kW | 171     |
| • at 500 V / Rated value   | kW | 215     |
| • at 690 V / Rated value   | kW | 280     |
| • at AC-4  |    |         |
| • at 400 V / Rated value   | W  | 160,000 |
| Operating power / for ≥ 200000 operating cycles / at AC-4        |    |         |
| • at 400 V / Rated value   | kW | 71      |
| • at 690 V / Rated value   | kW | 112     |
|  |    |         |

Active power loss / at AC-3 / at 400 V / for rated value of the r

22

W

| operating current / per conducto | וכ |
|----------------------------------|----|
|----------------------------------|----|

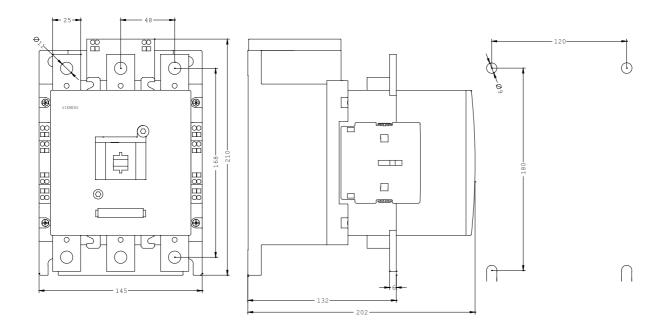
| Design of the surge suppressor   |     | with varistor |
|--|-----|---------------|
|  | _   |               |
| Type of voltage / of the control supply voltage                                | _   | AC/DC         |
| Control supply voltage   |     |               |
| • for DC   |     |               |
| Rated value  | V   | 200 277       |
| • with AC / at 50 Hz   |     |               |
| Rated value  | V   | 200 277       |
| • with AC / at 60 Hz   |     |               |
| Rated value  | V   | 200 277       |
| Operating range factor control supply voltage rated value / of the magnet coil |     |               |
| • with AC / at 50 Hz   |     | 0.8 1.1       |
| • with AC / at 60 Hz   |     | 0.8 1.1       |
| • for DC   |     | 0.8 1.1       |
| Apparent pick-up power / of the magnet coil / with AC                          | V·A | 530           |
| Apparent holding power / of the magnet coil / with AC                          | V·A | 5             |
| Inductive power factor   |     |               |
| with closing power of the coil   |     | 0.8           |
| with the holding power of the coil   |     | 0.4           |
| Closing power / of the magnet coil / for DC                                    | W   | 580           |
| Holding power / of the magnet coil / for DC                                    | W   | 3.8           |

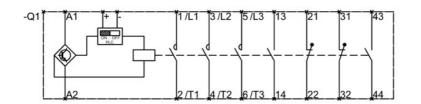
| Auxiliary circuit:   |   |    |
|--|---|----|
| Number of NC contacts / for auxiliary contacts / instantaneous contact |   | 2  |
| Number of NO contacts / for auxiliary contacts / instantaneous contact |   | 2  |
| Operating current  |   |    |
| • at AC-12 / maximum   | А | 10 |
| • at AC-15   |   |    |
| • at 230 V / Rated value   | А | 6  |
| • at 400 V / Rated value   | А | 3  |
| Operating current / at DC-12   |   |    |
| • at 60 V / Rated value  | А | 6  |
| • at 110 V / Rated value   | А | 3  |
| • at 220 V / Rated value   | А | 1  |
| Operating current / at DC-13   |   |    |
| • at 24 V / Rated value  | А | 10 |
|  |   |    |

| • at 60 V / Rated value   | А  | 2                    |
|---|----|----------------------|
| at 50 V / Rated value     at 110 V / Rated value                | A  | 1                    |
|   |    |                      |
| • at 220 V / Rated value  | A  | 0.3                  |
| Short-circuit:  |    |                      |
| Design of the fuse link   |    |                      |
| for short-circuit protection of the auxiliary switch / required |    | fuse gL/gG: 10 A     |
| for short-circuit protection of the main circuit                |    |                      |
| <ul> <li>with type of assignment 1 / required</li> </ul>        |    | fuse gL/gG: 500 A    |
| <ul> <li>with type of assignment 2 / required</li> </ul>        |    | fuse gL/gG: 400 A    |
| Installation/ mounting/ dimensions:                             |    |                      |
| Mounting type   |    | screw fixing         |
| Mounting type / Side-by-side mounting                           |    | Yes                  |
| Width   | mm | 145                  |
| Height  | mm | 210                  |
| Depth   | mm | 202                  |
| Spacing required / for grounded parts                           | mm | 10                   |
| Connections/ terminals:   |    |                      |
| Design of the electrical connection                             |    |                      |
| for main current circuit  |    | Cage Clamp terminals |
| <ul> <li>for auxiliary and control current circuit</li> </ul>   |    | Cage Clamp terminals |
| Type of connectable conductor cross-section                     |    |                      |
| for AWG conductors / for main contacts                          |    | 2/0 500 kcmil        |
| • for auxiliary contacts  |    |                      |
| • solid   |    | 2x (0.25 2.5 mm²)    |
| • finely stranded   |    |                      |
| with core end processing  |    | 2x (0.25 1.5 mm²)    |
| without core end processing                                     |    | 2x (0.25 2.5 mm²)    |
| <ul> <li>for AWG conductors / for auxiliary contacts</li> </ul> |    | 2x (24 14)           |

Certificates/ approvals:

| General Product Ap  | proval           |   |    | Functional Safety /<br>Safety of Machinery | Declaration of<br>Conformity |  |
|---|------------------|---|----|--|------------------------------|--|
|   | (SA)             | EHC   |    | Type Examination                           | EG-Konf.                     |  |
| Test Certificates   | Shipping Approva | I   |    |  |                              |  |
| Special Test<br>Certificate   | ABS              | ĴÅ<br>DNV<br>DNV                                | GL | RMRS                                       |                              |  |
| other   |                  |   |    |  |                              |  |
| Confirmation  | other            | Environmental<br>Confirmations                  |    |  |                              |  |
| Further information:<br>Information- and Downloadcenter (Catalogs, Brochures,)<br>http://www.siemens.com/industrial-controls/catalogs |                  |   |    |  |                              |  |
| ndustry Mall (Online<br>http://www.siemens.c  |                  |   |    |  |                              |  |
| Cax online generator  |                  |   |    |  |                              |  |
| Service&Support (Manuals, Certificates, Characteristics, FAQs,)<br>http://support.automation.siemens.com/WW/view/en/3RT1066-2NP36/all |                  |   |    |  |                              |  |
|   | -                | nsion drawings, 3D mod<br>/cax_en.aspx?mlfb=3RT | -  | rams,)                                     |                              |  |





last change:

Nov 11, 2014