



LOAD FEEDER FUSELESS REVERSING DUTY,  
AC 400V, SZ. S0, 27...32A,  
DC 24V SPRING-LOADED CONNECTION FOR RAIL  
MOUNTING,  
W. MOUNTING RAIL ADAPTER TYPE OF COORD. 2, IQ =  
150KA (ALSO ACHIEVES TYPE OF COORD.1) 1NO+1NC  
(CONTACTOR)

### General technical data:

|  |                |  |
|--|----------------|--|
| Product brand name   |                | SIRIUS                                 |
| product designation  |                | non-fused load feeders 3RA2            |
| Design of the product  |                | reversing starter                      |
| Size of the load feeder  |                | S0                                     |
| Protection class IP / on the front   |                | IP20                                   |
| Degree of pollution  |                | 3                                      |
| Insulation voltage / rated value   | V              | 690                                    |
| Installation altitude / at a height over sea level / maximum   | m              | 2,000                                  |
| Ambient temperature <ul style="list-style-type: none"> <li>during transport</li> <li>during storage</li> <li>during operating</li> </ul>   | °C<br>°C<br>°C | -55 ... 80<br>-55 ... 80<br>-20 ... 60 |
| Impulse voltage resistance / rated value   | kV             | 6                                      |
| Active power loss / per conductor / typical  | W              | 4.3                                    |
| Item designation <ul style="list-style-type: none"> <li>according to DIN 40719 extendable after IEC 204-2 / according to IEC 750</li> <li>according to DIN EN 61346-2</li> </ul> |                | Q<br>Q                                 |
| Type of assignment   |                | 2                                      |

|   |   |                               |
|---|---|-------------------------------|
| <b>Mechanical operating cycles as operating time / of the contactor</b> |   |                               |
| • typical   |   | 10,000,000                    |
| <b>Manufacturer article number</b>                                      |   |                               |
| • of the standard mounting rail adapter included in the scope of supply |   | <a href="#">3RA2922-1AA00</a> |
| • of the circuit-breakers included in the scope of supply               |   | <a href="#">3RV2021-4EA20</a> |
| • of the contactor included in the scope of supply                      |   | <a href="#">3RT2027-2BB40</a> |
| • of the link module included in the scope of supply                    |   | <a href="#">3RA2921-2AA00</a> |
| • of the RH applied assembly kit  |   | <a href="#">3RA2923-1BB2</a>  |
| <b>Design of the switching contact</b>                                  |   | mechanical                    |
| <b>Type of the motor protection</b>                                     |   | bimetal                       |
| <b>Adjustable response current</b>                                      |   |                               |
| • of the current-dependent overload release                             | A | 27 ... 32                     |

#### Communication:

|  |  |    |
|--|--|----|
| <b>Product function / bus-communication</b>                  |  | No |
| <b>Protocol / will be supported</b>                          |  |    |
| • AS interface protocol                                      |  | No |
| • PROFIBUS DP protocol                                       |  | No |
| • PROFINET protocol  |  | No |
| <b>Product extension / function module for communication</b> |  | No |

#### Main circuit:

|  |     |        |
|--|-----|--------|
| <b>Number of poles / for main current circuit</b>          |     | 3      |
| <b>Number of NC contacts / for main contacts</b>           |     | 0      |
| <b>Number of NO contacts / for main contacts</b>           |     | 3      |
| <b>Operating voltage / at AC-3 / rated value / maximum</b> | V   | 690    |
| <b>Operating current</b>                                   |     |        |
| • at AC-1 / at 400 V / rated value                         | A   | 32     |
| • at AC-2 / at 400 V / rated value                         | A   | 29     |
| • at AC-3 / at 400 V / rated value                         | A   | 29     |
| • at AC-4 / at 400 V / rated value                         | A   | 29     |
| <b>Service power</b>                                       |     |        |
| • at AC-2 / at 400 V / rated value                         | W   | 15,000 |
| • at AC-3  |     |        |
| • at 400 V / rated value                                   | W   | 15,000 |
| • at 500 V / rated value                                   | W   | 18,500 |
| • at 690 V / rated value                                   | W   | 30,000 |
| • at AC-4 / at 400 V / rated value                         | W   | 15,000 |
| <b>Off-load operating frequency</b>                        | 1/h | 10,000 |
| <b>Frequency of operation</b>                              |     |        |

- at AC-1 / according to IEC 60947-6-2 / maximum
- at AC-2 / according to IEC 60947-6-2 / maximum
- at AC-3 / according to IEC 60947-6-2 / maximum
- at AC-4 / according to IEC 60947-6-2 / maximum

|     |       |
|-----|-------|
| 1/h | 1,000 |
| 1/h | 1,000 |
| 1/h | 1,000 |
| 1/h | 300   |

#### Control circuit:

Type of voltage / of the controlled supply voltage

DC

Control supply voltage frequency

- 1 / rated value

Hz

0

Control supply voltage / 1

- for DC / rated value

V

24

Holding power / of the solenoid / for DC

W

5.9

#### Auxiliary circuit:

Product extension / auxiliary switch

Yes

Number of NC contacts / for auxiliary contacts

1

Number of NO contacts / for auxiliary contacts

1

Number of change-over switches / for auxiliary contacts

0

#### Inputs/ Outputs:

Number of digital inputs

0

#### Short-circuit:

Product function / short circuit protection

Yes

Design of the short-circuit protection

circuit-breakers

Breaking capacity limit short-circuit current (Icu)

- at 400 V / rated value
- at 500 V / rated value
- at 690 V / rated value

A

25,000

A

5,000

A

2,000

#### Installation/mounting/dimensions:

Built in orientation

vertical

Type of mounting

screw and snap-on mounting onto 35 mm standard mounting rail

Width

mm

90

Height

mm

269.4

Depth

mm

130.7

Distance, to be maintained, to the ranks assembly

- forwards
- backwards
- upwards
- downwards

mm

10

mm

0

mm

30

mm

30

|  |    |    |
|--|----|----|
| • sideways   | mm | 0  |
| <b>Distance, to be maintained, to earthed part</b>     |    |    |
| • forwards   | mm | 10 |
| • backwards  | mm | 0  |
| • upwards  | mm | 30 |
| • downwards  | mm | 10 |
| • sideways   | mm | 9  |
| <b>Distance, to be maintained, conductive elements</b> |    |    |
| • forwards   | mm | 10 |
| • backwards  | mm | 0  |
| • upwards  | mm | 30 |
| • downwards  | mm | 10 |
| • sideways   | mm | 9  |

## Connections:

### Design of the electrical connection

- for main current circuit
- for auxiliary and control current circuit

spring-loaded terminals

spring-loaded terminals

### Type of the connectable conductor cross-section

- for main contacts
  - solid
  - stranded
  - finely stranded
    - with conductor end processing
    - without conductor final cutting
- for AWG conductors / for main contacts
- for auxiliary contacts
  - solid
  - finely stranded
    - with conductor end processing
    - without conductor final cutting
- for AWG conductors / for auxiliary contacts

2x (1 ... 10 mm<sup>2</sup>)

2x (1.0 ... 10 mm<sup>2</sup>)

2x (1 ... 6 mm<sup>2</sup>)

2x (1 ... 6 mm<sup>2</sup>)

1x (18 ... 8)

2x (0.5 ... 2.5 mm<sup>2</sup>)

2x (0.5 ... 1.5 mm<sup>2</sup>)

2 x (0.5 ... 1.5 mm<sup>2</sup>)

2x (20 ... 14)

## Certificates/approvals:

### Verification of suitability

CE / UL / CSA / CCC

### Varification of suitability / ATEX

No

| General Product Approval | For use in hazardous locations | Test Certificates | Shipping Approval |  |  |
|--------------------------|--------------------------------|-------------------|-------------------|--|--|
|--------------------------|--------------------------------|-------------------|-------------------|--|--|

[ROSTEST](#)

[DEKRA EXAM, DMT](#)

[Manufacturer](#)



ABS



PRS



RINA

other

[Manufacturer](#)

[other](#)

## UL/CSA ratings

### yielded mechanical performance (hp)

- for single-phase squirrel cage motors
  - at 230 V / rated value
- for three-phase squirrel cage motors
  - at 220/230 V / rated value
  - at 460/480 V / rated value
  - at 575/600 V / rated value

|    |    |
|----|----|
| hp | 5  |
| hp | 10 |
| hp | 20 |
| hp | 25 |

### Operating current (FLA) / for three-phase squirrel cage motors

- at 480 V / rated value
- at 600 V / rated value

|   |    |
|---|----|
| A | 14 |
| A | 17 |

### Contact rating designation / for auxiliary contacts / according to UL

A600 / Q600

## Safety:

### B10 value / with high demand rate

- according to SN 31920

1,000,000

### Failure rate (FIT value) / with low demand rate

- according to SN 31920

|     |     |
|-----|-----|
| FIT | 250 |
|-----|-----|

### Proportion of dangerous failures

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

|   |    |
|---|----|
| % | 40 |
| % | 75 |

### T1 value / for proof test interval or service life

- according to IEC 61508

|   |    |
|---|----|
| a | 10 |
|---|----|

### Protection against electrical shock

finger-safe

## Further information:

### Information- and Downloadcenter (Catalogs, Brochures,...)

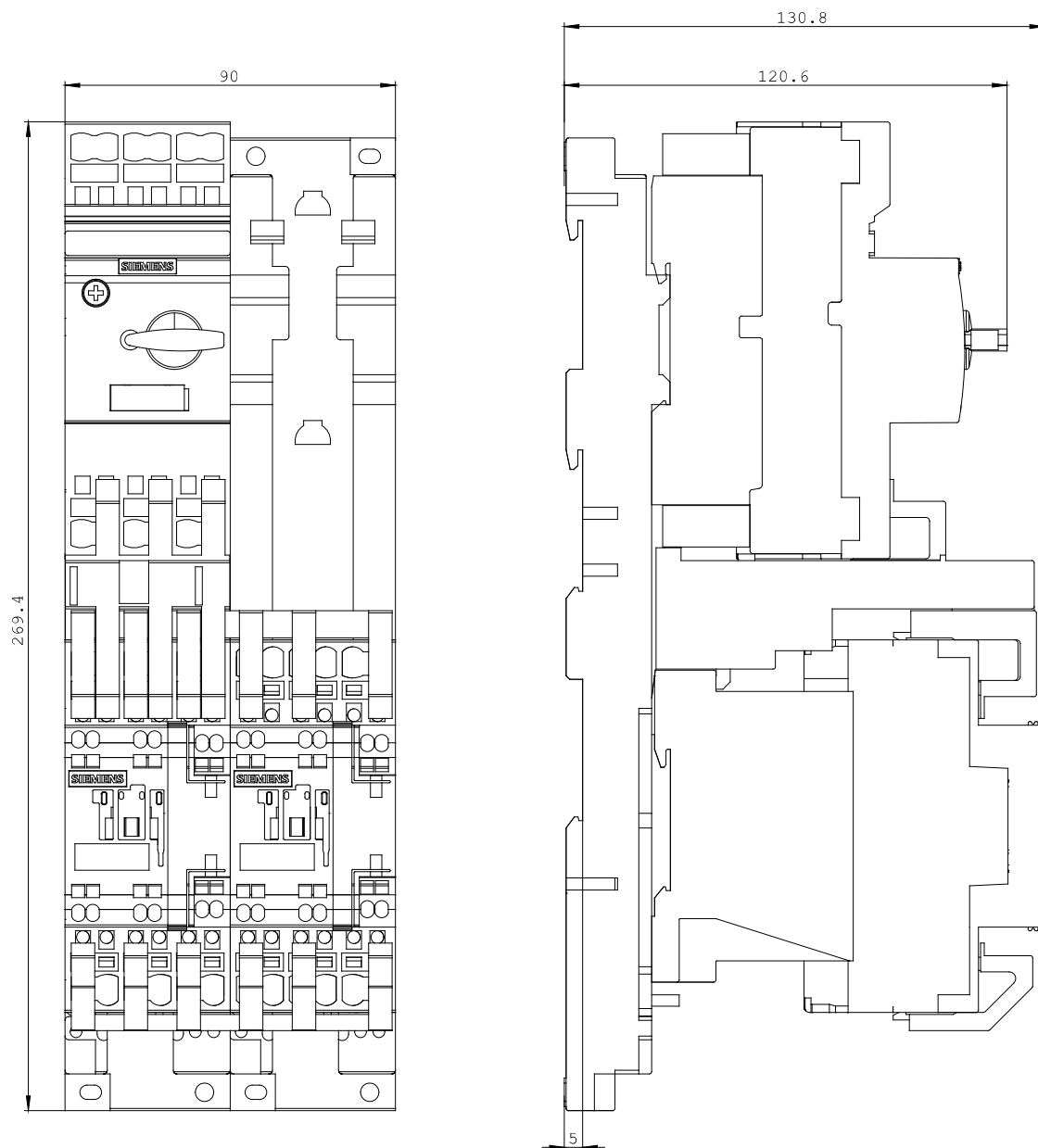
<http://www.siemens.com/industrial-controls/catalogs>

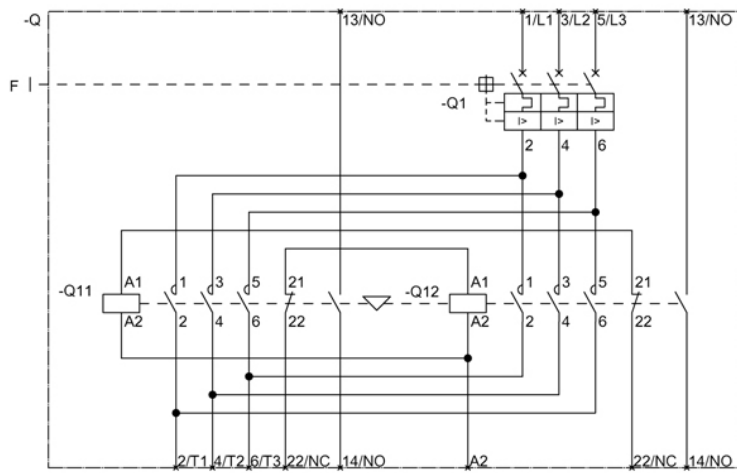
### Industry Mall (Online ordering system)

<http://www.siemens.com/industrial-controls/mall>

### CAX-Online-Generator

<http://www.siemens.com/cax>





last change:

Oct 17, 2011