SIEMENS

## Data sheet 3RA2210-1JA16-2AP0

Load feeder fuseless, Reversing duty 400 V AC, Size S00 7.00...10.0 A 230 V AC screw terminal for installation on standard mounting rail Type of coordination 1, Iq = 150 kA 1 NC (contactor)

| | |
|---|---|
| **product brand name** | SIRIUS |
| **product designation** | Reversing starter |
| **design of the product** | for standard rail or screw mounting |
| **product type designation** | 3RA22 |
| **manufacturer's article number** | |
| ● of the supplied contactor | 3RT2016-1AP02 |
| ● of the supplied circuit-breakers | 3RV2011-1JA10 |
| ● of the supplied link module | 3RA1921-1DA00 |
| **General technical data** | |
| **size of the circuit-breaker** | S00 |
| **size of load feeder** | S00 |
| **power loss [W] for rated value of the current** | |
| ● at AC in hot operating state per pole | 3.4 W |
| ● without load current share typical | 4.2 W |
| insulation voltage with degree of pollution 3 at AC rated value | 690 V |
| **surge voltage resistance rated value** | 6 kV |
| **degree of protection NEMA rating** | other |
| **shock resistance according to IEC 60068-2-27** | 6g / 11 ms |
| mechanical service life (operating cycles) of contactor typical | 30 000 000 |
| **type of assignment** | 1 |
| **type of protection according to ATEX directive 2014/34/EU** | Ex II (2) GD |
| certificate of suitability according to ATEX directive 2014/34/EU | DMT 02 ATEX F 001 |
| **reference code according to IEC 81346-2:2019** | Q |
| **Substance Prohibitance (Date)** | 10/01/2009 |
| **Ambient conditions** | |
| **ambient temperature** | |
| ● during operation | -20 ... +60 °C |
| ● during storage | -50 ... +80 °C |
| ● during transport | -50 ... +80 °C |
| **temperature compensation** | -20 ... +60 °C |
| relative humidity during operation | 10 ... 95 % |
| **Main circuit** | |
| **number of poles for main current circuit** | 3 |
| **design of the switching contact** | electromechanical |
| **adjustable current response value current of the current-dependent overload release** | 7 ... 10 A |
| **operating voltage** | |
| ● rated value | 690 V |
| ● at AC-3 rated value maximum | 690 V |
| ● at AC-3e rated value maximum | 690 V |

| | |
|---|---|
| **operating frequency rated value** | 50 ... 60 Hz |
| **operational current** | |
| ● at AC-3 at 400 V rated value | 9 A |
| ● at AC-3e at 400 V rated value | 9 A |
| **operating power** | |
| ● at AC-3 | |
| — at 400 V rated value | 4 000 W |
| ● at AC-3e | |
| — at 400 V rated value | 4 000 kW |
| **Control circuit/ Control** | |
| **type of voltage of the control supply voltage** | AC |
| **control supply voltage at AC** | |
| ● at 50 Hz rated value | 230 V |
| ● at 50 Hz rated value | 230 ... 230 V |
| ● at 60 Hz rated value | 230 V |
| ● at 60 Hz rated value | 230 ... 230 V |
| **apparent holding power of magnet coil at AC** | 4.2 VA |
| ● at 50 Hz | 4.2 VA |
| ● at 60 Hz | 3.3 VA |
| **inductive power factor with the holding power of the coil** | 0.25 |
| ● at 50 Hz | 0.25 |
| ● at 60 Hz | 0.25 |
| **Auxiliary circuit** | |
| **product extension auxiliary switch** | Yes |
| **Protective and monitoring functions** | |
| **trip class** | CLASS 10 |
| **design of the overload release** | thermal (bimetallic) |
| response value current of instantaneous short-circuit trip unit | 130 A |
| **UL/CSA ratings** | |
| **full-load current (FLA) for 3-phase AC motor** | |
| ● at 480 V rated value | 7.6 A |
| ● at 600 V rated value | 7.6 A |
| **yielded mechanical performance [hp]** | |
| ● for single-phase AC motor | |
| — at 110/120 V rated value | 0.33 hp |
| — at 230 V rated value | 1 hp |
| ● for 3-phase AC motor | |
| — at 200/208 V rated value | 2 hp |
| — at 220/230 V rated value | 3 hp |
| — at 460/480 V rated value | 5 hp |
| — at 575/600 V rated value | 7.5 hp |
| **Short-circuit protection** | |
| **product function short circuit protection** | Yes |
| **design of the short-circuit trip** | magnetic |
| **conditional short-circuit current (Iq)** | |
| ● at 400 V according to IEC 60947-4-1 rated value | 150 000 A |
| **Installation/ mounting/ dimensions** | |
| **mounting position** | vertical |
| **fastening method** | screw and snap-on mounting onto 35 mm DIN rail |
| **height** | 170 mm |
| **width** | 90 mm |
| **depth** | 97 mm |
| **required spacing** | |
| ● for grounded parts | |
| — forwards | 32 mm |
| — backwards | 0 mm |
| — upwards | 50 mm |
| — at the side | 10 mm |
| — downwards | 10 mm |
| ● for live parts | |

| | |
|---|---|
| — forwards | 32 mm |
| — backwards | 0 mm |
| — upwards | 50 mm |
| — downwards | 10 mm |
| — at the side | 10 mm |

**Connections/ Terminals**

| | |
|---|---|
| **type of electrical connection** | |
| ● for main current circuit | screw-type terminals |
| ● for auxiliary and control circuit | screw-type terminals |

**Safety related data**

| | |
|---|---|
| B10 value with high demand rate according to SN 31920 | 1 000 000 |
| **proportion of dangerous failures** | |
| ● with high demand rate according to SN 31920 | 73 % |
| **touch protection on the front according to IEC 60529** | finger-safe, for vertical contact from the front |

**Communication/ Protocol**

| | |
|---|---|
| **protocol is supported** | |
| ● PROFINET IO protocol | No |
| ● PROFIsafe protocol | No |
| protocol is supported AS-Interface protocol | No |

**Certificates/ approvals**

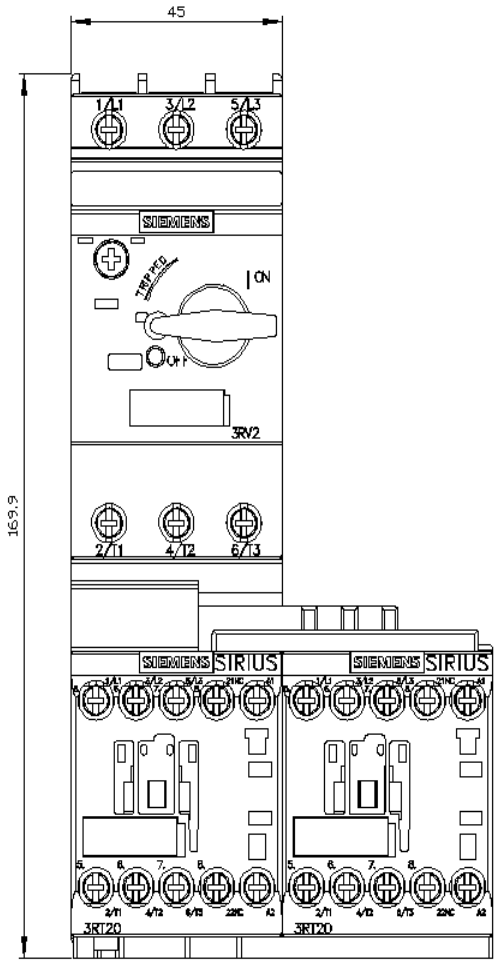
| General Product Approval | | | For use in hazard-ous locations | Declaration of Conformity | |
|---|---|---|---|---|---|
| Confirmation | UL | EAC | ATEX | EG-Konf. | UKCA |

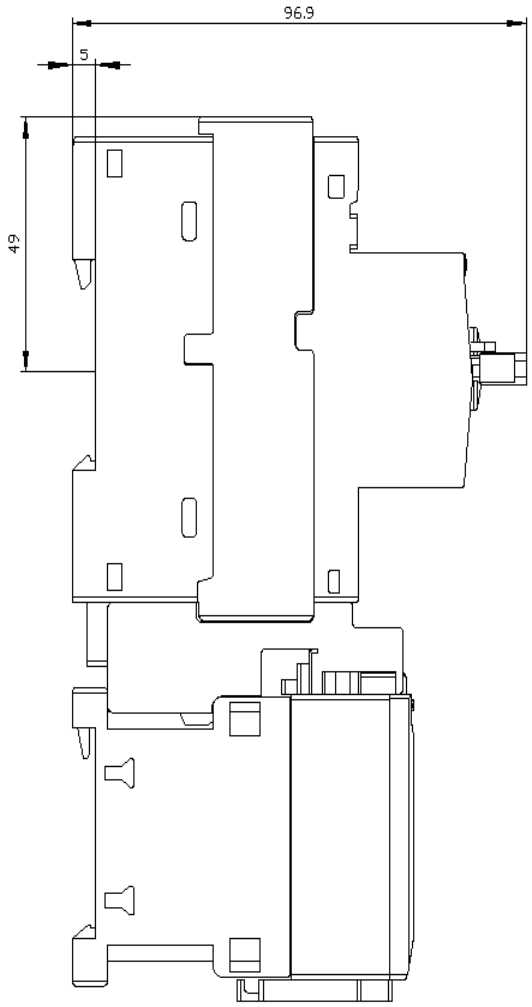
| Test Certificates | | Marine / Shipping | | | |
|---|---|---|---|---|---|
| Type Test Certific-ates/Test Report | Special Test Certific-ate | ABS | BUREAU VERITAS | LRS | PRS |

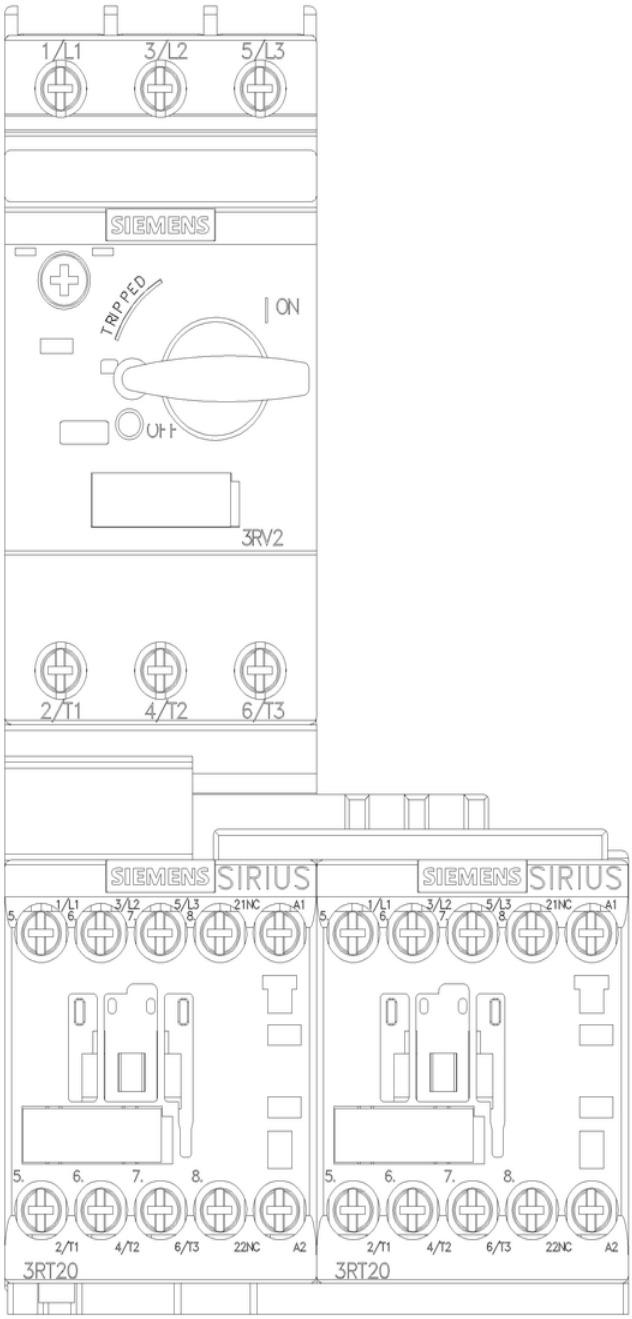
| Marine / Shipping | | | other | Railway |
|---|---|---|---|---|
| RINA | RMRS | DNV·GL | Confirmation | Vibration and Shock |

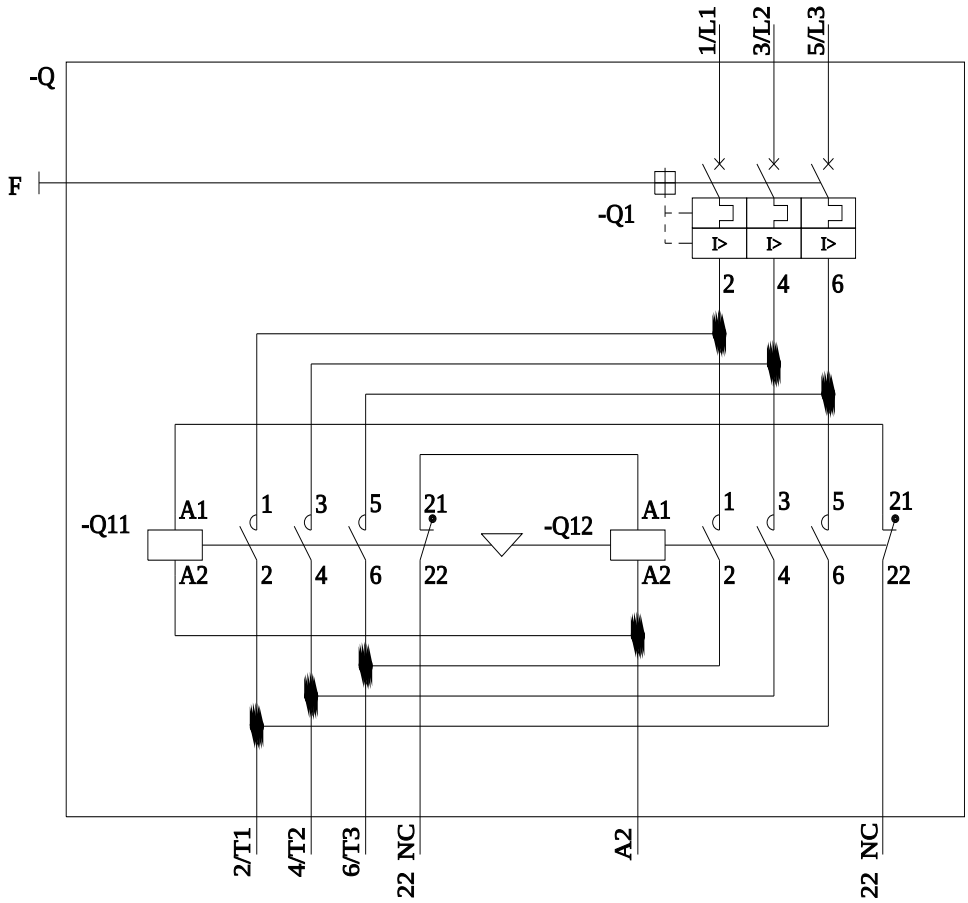
**Further information**

**Siemens has decided to exit the Russian market (see here).**
https://press.siemens.com/global/en/pressrelease/siemens-wind-down-russian-business
**Siemens is working on the renewal of the current EAC certificates.**
Please contact your local Siemens office on the status of validity of the EAC certification if you intend to import or offer to supply these products to an EAC relevant market (other than the sanctioned EAEU member states Russia or Belarus).
**Information on the packaging**
https://support.industry.siemens.com/cs/ww/en/view/109813875
**Information- and Downloadcenter (Catalogs, Brochures,…)**
https://www.siemens.com/ic10
**Industry Mall (Online ordering system)**
https://mall.industry.siemens.com/mall/en/en/Catalog/product?mlfb=3RA2210-1JA16-2AP0
**Cax online generator**
http://support.automation.siemens.com/WW/CAXorder/default.aspx?lang=en&mlfb=3RA2210-1JA16-2AP0
**Service&Support (Manuals, Certificates, Characteristics, FAQs,...)**
https://support.industry.siemens.com/cs/ww/en/ps/3RA2210-1JA16-2AP0
**Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, EPLAN macros, ...)**
http://www.automation.siemens.com/bilddb/cax_de.aspx?mlfb=3RA2210-1JA16-2AP0&lang=en
**Characteristic: Tripping characteristics, I²t, Let-through current**
https://support.industry.siemens.com/cs/ww/en/ps/3RA2210-1JA16-2AP0/char
**Further characteristics (e.g. electrical endurance, switching frequency)**
http://www.automation.siemens.com/bilddb/index.aspx?view=Search&mlfb=3RA2210-1JA16-2AP0&objecttype=14&gridview=view1








**last modified:** 4/18/2023