SIEMENS

Data sheet

3VA1120-6GF42-0AA0



CIRCUIT BREAKER 3VA1 IEC FRAME 160 BREAKING CAPACITY CLASS H ICU=70KA @ 415 V 4-POLE, LINE PROTECTION TM240, ATAM, IN=20A OVERLOAD PROTECTION IR=14A ...20A SHORT CIRCUIT PROTECTION II=5 X IN NEUTRAL PROTECTION 100% BUSBAR CONNECTION

Figure similar

| Model | | |
|---|---|-----------------------------|
| product brand name | | SENTRON |
| Product designation | | Molded case circuit breaker |
| Design of the product | | Line protection |
| Product variations | | General Applications |
| Ground fault monitoring version | | Without |
| Design of the auxiliary release | | Without auxiliary release |
| Design of the auxiliary switch | | Without |
| Design of the operating mechanism | | toggle handle |
| Type of the driving mechanism / motor drive | | No |
| Design of the overcurrent release | | TM240 |
| General technical data | | |
| Number of poles | | 4 |
| Trip class / of the L-trip / with I2t characteristic / initial value | | 1 |
| Trip class / of the L-trip / with I2t characteristic / Full- scale value | | 1 |
| Electrical endurance (switching cycles) | | |
| • at AC-1 / at 380/415 V / at 50/60 Hz | | 8 000 |
| circuit-breaker / Design | | 3VA |
| Mechanical service life (switching cycles) / typical | | 15 000 |
| Voltage | | |
| Insulation voltage / Rated value | V | 800 |
| Protection class | | |

| Protection class IP / on the front Protective function of the overcurrent release Switching capacity Switching capacity class of the circuit breaker Dissipation Active power loss • maximum Electricity Continuous current / Rated value / maximum Continuous current / Rated value Adjustable response value current | W A A A | IP40 LI H 12 160 |
|--|------------------|------------------------------|
| Switching capacity Switching capacity class of the circuit breaker Dissipation Active power loss • maximum Electricity Continuous current / Rated value / maximum Continuous current / Rated value | A | H 12 |
| Switching capacity class of the circuit breaker Dissipation Active power loss • maximum Electricity Continuous current / Rated value / maximum Continuous current / Rated value | A | 12 |
| Switching capacity class of the circuit breaker Dissipation Active power loss • maximum Electricity Continuous current / Rated value / maximum Continuous current / Rated value | A | 12 |
| Dissipation Active power loss • maximum Electricity Continuous current / Rated value / maximum Continuous current / Rated value | A | 12 |
| Active power loss • maximum Electricity Continuous current / Rated value / maximum Continuous current / Rated value | A | |
| maximum Electricity Continuous current / Rated value / maximum Continuous current / Rated value | A | |
| Electricity Continuous current / Rated value / maximum Continuous current / Rated value | A | |
| Continuous current / Rated value / maximum Continuous current / Rated value | | 160 |
| Continuous current / Rated value | | 160 |
| | А | |
| Adjustable response value current | | 20 |
| , | | |
| of the current-dependent overload release / Full-scale value | A | 1 |
| of the instantaneous short-circuit release / initial value | A | 5 |
| Main circuit | | |
| Operating voltage | | |
| • with AC / at 50/60 Hz / Rated value | V | 690 |
| for DC / Rated value | V | 600 |
| Operating current | | |
| • at 40 °C / Rated value | A | 20 |
| • at 50 °C / Rated value | А | 20 |
| ● at 55 °C / Rated value | A | 20 |
| • at 60 °C / Rated value | A | 19 |
| ● at 65 °C / Rated value | A | 19 |
| • at 70 °C / Rated value | А | 19 |
| Auxiliary circuit | | |
| Number of CO contacts / for auxiliary contacts | | 0 |
| Suitability | | |
| Suitability for use | | system protection |
| Adjustable parameters | | |
| Adjustable response value current | | |
| of I-trip / Full-scale value | А | 10 |
| for N-conductor protection / initial value | A | 100 |
| for N-conductor protection / Full-scale value | A | 100 |
| Adjustable response value current / of the current- dependent overload release / initial value | A | 0.7 |
| Product details | | |
| Product component | | |

| Trip indicator | | No |
|---|----|--------------------|
| • display | | No |
| Voltage trigger | | No |
| undervoltage release | | No |
| undervoltage release with leading contact | | No |
| Product property | | |
| for neutral conductors / upgradeable/retrofittable / Short-circuit and overload proof | | No |
| Product expansion / optional / motor drive | | Yes |
| Product function | | |
| Product function | | |
| Intrinsic device protection | | Yes |
| communication function | | No |
| Phase failure detection | | No |
| other measurement function | | No |
| Accessories | | |
| Manufacturer article number / of the supplied basic | | 3VA1120-6GF42-0AA0 |
| switch | | |
| Short circuit | | |
| Operational short-circuit current breaking capacity (Ics) | | |
| • at 240 V / Rated value | kA | 100 |
| • at 415 V / Rated value | kA | 70 |
| • at 440 V / Rated value | kA | 36 |
| • at 500 V / Rated value | kA | 15 |
| • at 690 V / Rated value | kA | 5 |
| Maximum short-circuit current breaking capacity (Icu) | | |
| • at 240 V / Rated value | kA | 100 |
| • at 415 V / Rated value | kA | 70 |
| • at 440 V / Rated value | kA | 36 |
| • at 500 V / Rated value | kA | 20 |
| • at 690 V / Rated value | kA | 10 |
| Short-circuit current making capacity (Icm) | | |
| • at 240 V / Rated value | kA | 220 |
| • at 415 V / Rated value | kA | 154 |
| • at 690 V / Rated value | kA | 17 |
| Connections | | |
| Arrangement of electrical connectors / for main | | Front terminal |
| current circuit | | |

Type of connectable conductor cross-section

| | | EG-Konf. | DNV DNV GL |
|---|---------|----------------|-------------------|
| | other | Conformity | ĴÅ GI 🚳 |
| General Product Approval EM | С | Declaration of | Shipping Approval |
| • acc. to DIN EN 81346-2 | | Q | |
| • acc. to DIN EN 61346-2 | | Q | |
| Equipment marking | | | |
| ertificates | | | |
| during storage / maximum | °C | 80 | |
| during storage / minimum | °C | -40 | |
| during operation / maximum | °C | 70 | |
| during operation / minimum | °C | -25 | |
| mbient temperature | | | |
| nvironmental conditions | | | |
| lounting type | | fixed mount | ung |
| Depth | mm | 70 | · |
| Vidth | mm | 101.6 | |
| leight | mm | 130 | |
| echanical Design | | | |
| ype of electrical connection / for main current c | circuit | Lug termina | |
| • for flat-bar terminal connection / maximum | | 17 x 6.5 | |
| | | | |

Further information

Information- and Downloadcenter (Catalogs, Brochures,...) http://www.siemens.com/lowvoltage/catalogs

Industry Mall (Online ordering system)

https://eb.automation.siemens.com/mall/en/WW/Catalog/Product/3VA11206GF420AA0

Service&Support (Manuals, Certificates, Characteristics, FAQs,...) http://support.automation.siemens.com/WW/view/en/3VA11206GF420AA0/all

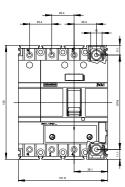
Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, ...) http://www.automation.siemens.com/bilddb/cax_en.aspx?mlfb=3VA11206GF420AA0

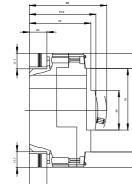
CAx-Online-Generator

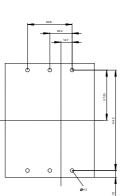
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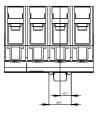
Tender specifications

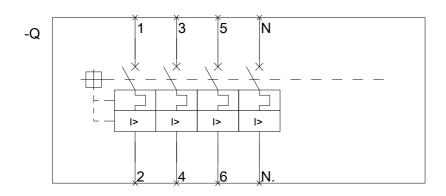
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