

Siemens
EcoTech



circuit breaker 3VA2 IEC Frame 100 breaking capacity class H Icu=85 kA @ 415 V 3-pole, line protection ETU860, LSIG, In=100 A overload protection Ir=40 A...100 A short-circuit protection I_{sd}=0.6..10x I_n, I_i=1.5..12x I_n neutral conductor protection optionally with external current transformer, up to 160% ground-fault protection, can be switched off I_g=0.2...1 x I_n, t_g=0.05-0.8s nut keeper kit



| Model | |
|---|---|
| product brand name | SENTRON |
| product designation | Molded case circuit breaker |
| design of the product | Line protection |
| design of the overcurrent release | ETU860 |
| protection function of the overcurrent release | LSIG |
| number of poles | 3 |
| General technical data | |
| insulation voltage / rated value | 800 V |
| operating voltage / at AC / rated value | 690 V |
| power loss [W] / maximum | 13.5 W |
| power loss [W] / for rated value of the current / at AC / in hot operating state / per pole | 4.5 W |
| mechanical service life (operating cycles) / typical | 25 000 |
| electrical endurance (operating cycles) / at AC-1 / at 380/415 V | 15 000 |
| electrical endurance (operating cycles) / at AC-1 / at 690 V | 10 500 |
| product feature / for neutral conductors / upgradable/retrofitable / short-circuit and overload proof | Yes |
| ground-fault monitoring version | Summation current formation L-conductor |
| product function | |
| • communication function | Yes |
| • other measurement function | Yes |
| Net Weight | 2.5 kg |
| Current | |
| operational current | |
| • at 40 °C | 100 A |
| • at 45 °C | 100 A |
| • at 50 °C | 100 A |
| • at 55 °C | 100 A |
| • at 60 °C | 100 A |
| • at 65 °C | 100 A |
| • at 70 °C | 100 A |
| Switching capacity according to IEC 60947 | |
| switching capacity class of the circuit breaker | H |
| maximum short-circuit current breaking capacity (I _{cu}) | |
| • at 240 V | 110 kA |
| • at 415 V | 85 kA |
| • at 440 V | 85 kA |

| | |
|--|--|
| <ul style="list-style-type: none"> • at 500 V • at 690 V | 55 kA 2 kA |
| operating short-circuit current breaking capacity (Ics) <ul style="list-style-type: none"> • at 240 V • at 415 V • at 440 V • at 500 V • at 690 V | 110 kA 85 kA 85 kA 55 kA 2 kA |
| short-circuit current making capacity (Icm) <ul style="list-style-type: none"> • at 240 V • at 415 V • at 440 V • at 500 V • at 690 V | 242 kA 187 kA 187 kA 121 kA 3 kA |

Adjustable parameters

| | |
|---|-----------------------------|
| product feature / for L-tripping / can be switched on/off | No |
| adjustable response value setting current (Ir) / of the L-trip / with I2t characteristic <ul style="list-style-type: none"> • minimum • maximum | 40 A 100 A |
| adjustable response value delay time (tr) / for L-tripping / with I2t characteristic <ul style="list-style-type: none"> • minimum • maximum | 0.5 s 25 s |
| adjustable response value setting current (Isd) / of S-trip / with I0t characteristic <ul style="list-style-type: none"> • minimum • maximum | 60 A 1 000 A |
| adjustable response value setting current (Isd) / of S-trip / with I2t characteristic <ul style="list-style-type: none"> • minimum • maximum | 60 A 1 000 A |
| adjustable response value delay time (tsd) / for S-tripping / with I0t characteristic <ul style="list-style-type: none"> • minimum • maximum | 0.05 s 0.5 s |
| adjustable response value delay time (tsd) / for S-tripping / with I2t characteristic <ul style="list-style-type: none"> • minimum • maximum | 0.05 s 0.5 s |
| adjustable response value setting current (Ii) / for I-tripping <ul style="list-style-type: none"> • minimum • maximum | 150 A 1 200 A |
| adjustable current response value current / for G-tripping / with standard characteristic <ul style="list-style-type: none"> • initial value • full-scale value | 20 A 100 A |
| adjustable response value delay time (tg) / for G-tripping / with I0t characteristic <ul style="list-style-type: none"> • minimum • maximum | 0.05 s 0.8 s |
| adjustable response value setting current (Ig) / for G-tripping / with I2t characteristic <ul style="list-style-type: none"> • minimum • maximum | 20 A 100 A |
| adjustable response value delay time (tg) / for G-tripping / with I2t characteristic <ul style="list-style-type: none"> • minimum • maximum | 0.05 s 0.8 s |
| adjustable setting current (InN) / for N-tripping <ul style="list-style-type: none"> • minimum • maximum | 20 A 160 A |
| design of the N-conductor protection | adjustable OFF; 20% to 160% |
| product function / grounding protection | Yes |

| Mechanical Design | |
|---|------------------------------|
| product component | |
| • undervoltage release | No |
| • voltage trigger | No |
| • trip indicator | No |
| height [in] | 7.13 in |
| height | 181 mm |
| width [in] | 4.13 in |
| width | 105 mm |
| depth [in] | 3.39 in |
| depth | 86 mm |
| Connections | |
| arrangement of electrical connectors / for main current circuit | Front terminal |
| type of electrical connection / for main current circuit | on both sides nut keeper kit |
| type of connectable conductor cross-sections / for flat-bar terminal connection / minimum | 13 x 1 mm |
| type of connectable conductor cross-sections / for flat-bar terminal connection / maximum | 25 x 8 mm |
| design of the surface / of the connections / on the top of the switch (N, 1, 3, 5) | tin |
| design of the surface / of the connections / on the bottom of the switch (N, 2, 4, 6) | tin |
| Auxiliary circuit | |
| number of CO contacts / for auxiliary contacts | 0 |
| Accessories | |
| product extension / optional / motor drive | Yes |
| Environmental conditions | |
| protection class IP / on the front | IP40 |
| ambient temperature | |
| • during operation / minimum | -25 °C |
| • during operation / maximum | 70 °C |
| • during storage / minimum | -40 °C |
| • during storage / maximum | 80 °C |
| Environmental footprint | |
| Global Warming Potential [CO2 eq] / total | 61.814 kg |
| Global Warming Potential [CO2 eq] / during manufacturing | 14.6 kg |
| Global Warming Potential [CO2 eq] / during operation | 48.9 kg |
| Global Warming Potential [CO2 eq] / after end of life | -2.2 kg |
| Siemens Eco Profile (SEP) | Siemens EcoTech |
| reference code / according to IEC 81346-2 | Q |

Approvals / Certificates

| | |
|---------------------------------|-----|
| General Product Approval | EMV |
|---------------------------------|-----|






[Confirmation](#)



[Miscellaneous](#)



Test Certificates

| | | | | | |
|--|--|-------------------------------|---|---|---|
| Type Test Certificates/Test Report | Special Test Certificate | Miscellaneous |  |  |  |
|--|--|-------------------------------|---|---|---|

Marine / Shipping

| | | | | | |
|---|---|--|------------------------------|-------------------------------|-------------------------------|
|  |  | CCS (China Classification Society) | Confirmation | Miscellaneous | Miscellaneous |
|---|---|--|------------------------------|-------------------------------|-------------------------------|

[Transport Information](#)



Siemens
EcoTech



[Environmental Con-
firmations](#)

[Environmental Con-
firmations](#)

Further information

Information on the packaging

<https://support.industry.siemens.com/cs/ww/en/view/109813875>

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

<http://www.siemens.com/lowvoltage/catalogs>

Industry Mall (Online ordering system)

<https://mall.industry.siemens.com/mall/en/en/Catalog/product?mlfb=3VA2010-6KQ32-0AA0>

Service&Support (Manuals, Certificates, Characteristics, FAQs,...)

<https://support.industry.siemens.com/cs/ww/en/ps/3VA2010-6KQ32-0AA0>

Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, ...)

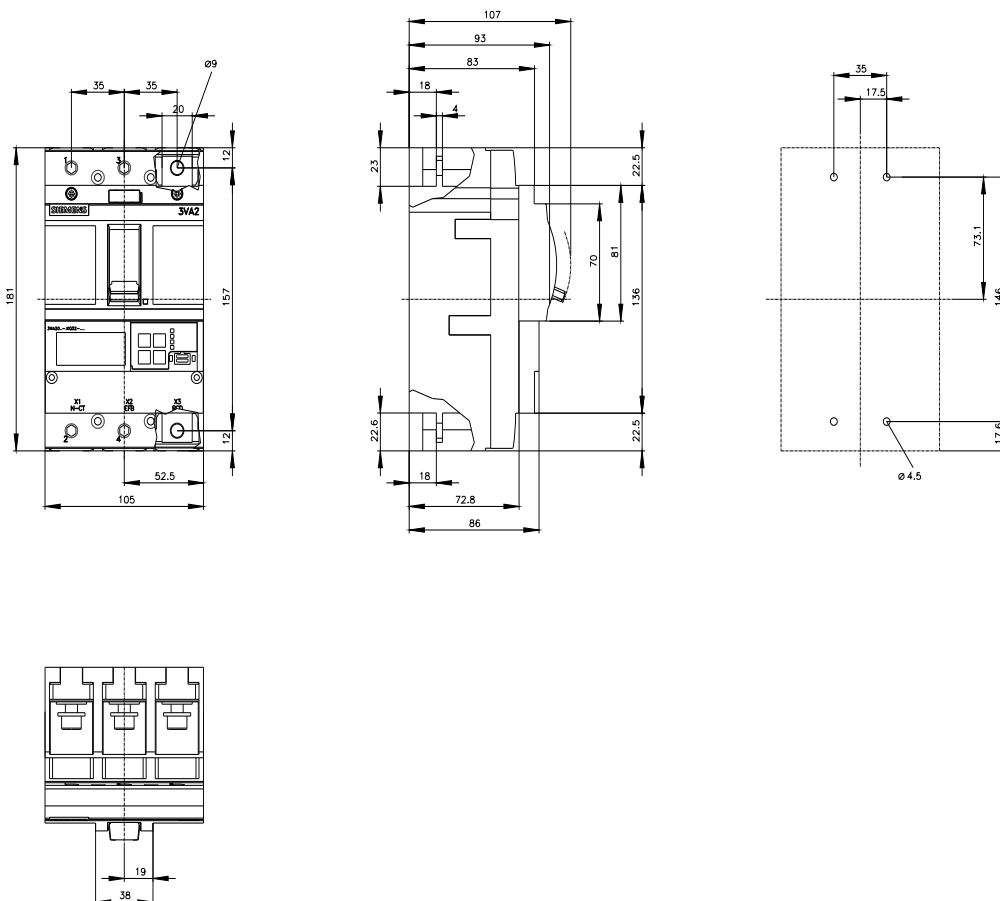
http://www.automation.siemens.com/bilddb/cax_en.aspx?mlfb=3VA2010-6KQ32-0AA0

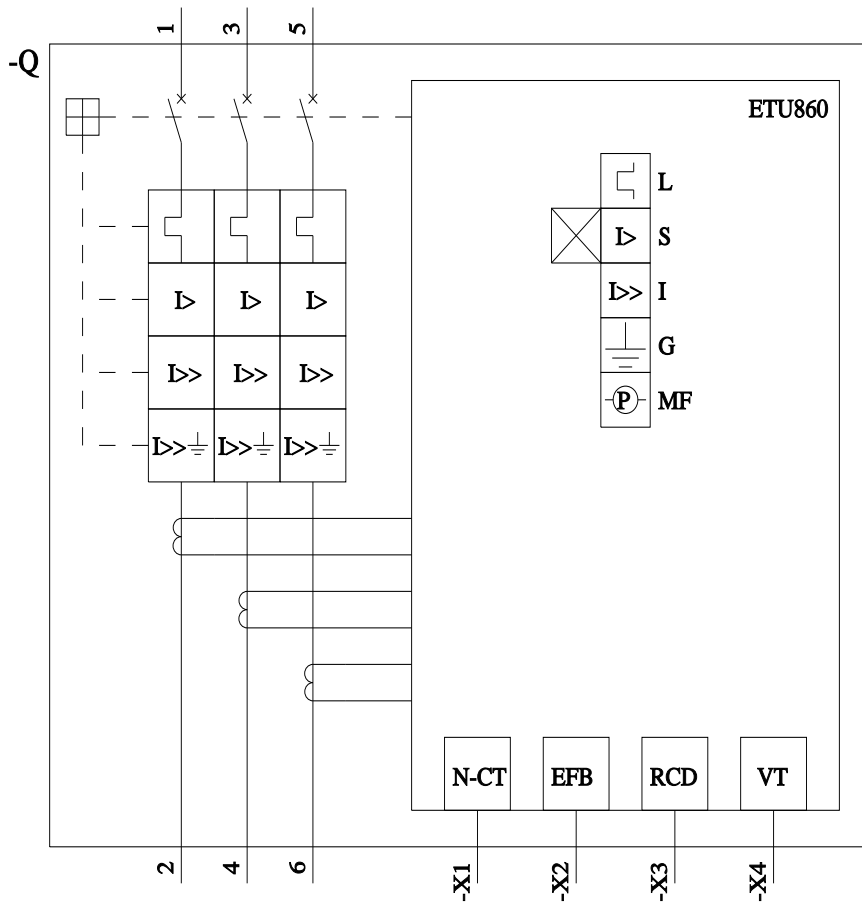
CAX-Online-Generator

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

Tender specifications

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





last modified:

10/24/2024

