



Miniature circuit breaker 230/400 V 6kA, 1-pole, C, 6A

| Model                                                                               |                                 |
|-------------------------------------------------------------------------------------|---------------------------------|
| product brand name                                                                  | SENTRON                         |
| product designation                                                                 | Miniature circuit breaker       |
| General technical data                                                              |                                 |
| number of poles                                                                     | 1                               |
| design of pole                                                                      | 1P                              |
| tripping characteristic class                                                       | C                               |
| mechanical service life (operating cycles) typical                                  | 10 000                          |
| overvoltage category                                                                | III                             |
| degree of pollution                                                                 | 3                               |
| Voltage                                                                             |                                 |
| type of voltage of the operating voltage                                            | AC                              |
| insulation voltage (Ui)                                                             |                                 |
| • with single-phase operation at AC rated value                                     | 250 V                           |
| • with multi-phase operation at AC rated value                                      | 440 V                           |
| supply voltage with single-phase operation at AC rated value                        | 230 V                           |
| operational current                                                                 |                                 |
| • at 40 °C rated value                                                              | 5.51 A                          |
| • at 50 °C rated value                                                              | 4.97 A                          |
| • at 55 °C rated value                                                              | 4.69 A                          |
| • at AC rated value                                                                 | 6 A                             |
| Supply voltage                                                                      |                                 |
| supply voltage                                                                      |                                 |
| • at AC                                                                             | 230 V                           |
| • at DC rated value                                                                 | 60 V                            |
| value range of the supply voltage frequency                                         | 50/60 Hz                        |
| operating voltage at DC rated value maximum                                         | 72 V                            |
| supply voltage frequency rated value                                                | 50/60 Hz                        |
| Protection class                                                                    |                                 |
| protection class IP                                                                 | IP20, with connected conductors |
| Breaking Capacity                                                                   |                                 |
| switching capacity current                                                          |                                 |
| • according to EN 60898 rated value                                                 | 6 kA                            |
| energy limitation class                                                             | 3                               |
| Dissipation                                                                         |                                 |
| power loss [W] for rated value of the current at AC in hot operating state per pole | 1.2 W                           |
| suitability for operation                                                           | Infrastructure / Industry       |
| Product details                                                                     |                                 |

|                                                                                                            |                                                                          |             |
|------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------|-------------|
| product feature touch protection                                                                           | Yes                                                                      |             |
| product component                                                                                          |                                                                          |             |
| <ul style="list-style-type: none"><li>combined terminal top</li></ul>                                      | Yes                                                                      |             |
| <ul style="list-style-type: none"><li>combined terminal bottom</li></ul>                                   | Yes                                                                      |             |
| <ul style="list-style-type: none"><li>neutral conductor switching</li></ul>                                | No                                                                       |             |
| product feature                                                                                            |                                                                          |             |
| <ul style="list-style-type: none"><li>properties for main switches in accordance with EN 60204-1</li></ul> | Yes                                                                      |             |
| <ul style="list-style-type: none"><li>halogen-free</li></ul>                                               | Yes                                                                      |             |
| <ul style="list-style-type: none"><li>sealable</li></ul>                                                   | Yes                                                                      |             |
| <ul style="list-style-type: none"><li>silicon-free</li></ul>                                               | Yes                                                                      |             |
| product extension installable supplementary devices                                                        | Yes                                                                      |             |
| Connections                                                                                                |                                                                          |             |
| connectable conductor cross-section solid                                                                  |                                                                          |             |
| <ul style="list-style-type: none"><li>minimum</li></ul>                                                    | 0.75 mm²                                                                 |             |
| <ul style="list-style-type: none"><li>maximum</li></ul>                                                    | 35 mm²                                                                   |             |
| connectable conductor cross-section stranded                                                               |                                                                          |             |
| <ul style="list-style-type: none"><li>minimum</li></ul>                                                    | 0.75 mm²                                                                 |             |
| <ul style="list-style-type: none"><li>maximum</li></ul>                                                    | 35 mm²                                                                   |             |
| connectable conductor cross-section finely stranded with core end processing                               |                                                                          |             |
| <ul style="list-style-type: none"><li>minimum</li></ul>                                                    | 0.75 mm²                                                                 |             |
| <ul style="list-style-type: none"><li>maximum</li></ul>                                                    | 25 mm²                                                                   |             |
| tightening torque [lbf-in] with screw-type terminals                                                       |                                                                          |             |
| <ul style="list-style-type: none"><li>minimum</li></ul>                                                    | 22 lbf-in                                                                |             |
| <ul style="list-style-type: none"><li>maximum</li></ul>                                                    | 31 lbf-in                                                                |             |
| tightening torque with screw-type terminals                                                                |                                                                          |             |
| <ul style="list-style-type: none"><li>minimum</li></ul>                                                    | 2.5 N-m                                                                  |             |
| <ul style="list-style-type: none"><li>maximum</li></ul>                                                    | 3.5 N-m                                                                  |             |
| position of power supply cord                                                                              | Any                                                                      |             |
| Mechanical Design                                                                                          |                                                                          |             |
| height                                                                                                     | 90 mm                                                                    |             |
| width                                                                                                      | 18 mm                                                                    |             |
| depth                                                                                                      | 76 mm                                                                    |             |
| installation depth                                                                                         | 70 mm                                                                    |             |
| number of modular width units                                                                              | 1                                                                        |             |
| fastening method                                                                                           | DIN rail                                                                 |             |
| mounting position                                                                                          | any                                                                      |             |
| net weight                                                                                                 | 160 g                                                                    |             |
| Environmental conditions                                                                                   |                                                                          |             |
| standard                                                                                                   | IEC / EN 60898-1                                                         |             |
| vibration resistance according to IEC 60068-2-6                                                            | ±1mm at 5 to 25 Hz; 50 m/s² at 25 to 150 Hz and 60 m/s² at 35 Hz (4 sec) |             |
| ambient temperature during operation                                                                       |                                                                          |             |
| <ul style="list-style-type: none"><li>minimum</li></ul>                                                    | -25 °C                                                                   |             |
| <ul style="list-style-type: none"><li>maximum</li></ul>                                                    | 55 °C                                                                    |             |
| ambient temperature during storage                                                                         |                                                                          |             |
| <ul style="list-style-type: none"><li>minimum</li></ul>                                                    | -40 °C                                                                   |             |
| <ul style="list-style-type: none"><li>maximum</li></ul>                                                    | 75 °C                                                                    |             |
| number of test cycles for environmental testing according to IEC 60068-2-30                                | 28                                                                       |             |
| Environmental footprint                                                                                    |                                                                          |             |
| Environmental Product Declaration(EPD)                                                                     | Yes                                                                      |             |
| global warming potential [CO2 eq] total                                                                    | 8.5 kg                                                                   |             |
| global warming potential [CO2 eq] during manufacturing                                                     | 0.683 kg                                                                 |             |
| global warming potential [CO2 eq] during operation                                                         | 7.83 kg                                                                  |             |
| global warming potential [CO2 eq] after end of life                                                        | -0.0048 kg                                                               |             |
| Approvals Certificates                                                                                     |                                                                          |             |
| General Product Approval                                                                                   | other                                                                    | Environment |

## Environment

[Environmental Con-  
firmations](#)[Environmental Con-  
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## 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=5SY6106-7CC>

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

<https://support.industry.siemens.com/cs/ww/en/ps/5SY6106-7CC>

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

[http://www.automation.siemens.com/bilddb/cax\\_en.aspx?mlfb=5SY6106-7CC](http://www.automation.siemens.com/bilddb/cax_en.aspx?mlfb=5SY6106-7CC)

CAx-Online-Generator

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

Tender specifications

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



