



Miniature circuit breaker 400 V 6kA, 2-pole, C, 50 A

Model	
product brand name	SENTRON
product designation	Miniature circuit breaker
General technical data	
number of poles	2
design of pole	2P
tripping characteristic class	C
mechanical service life (operating cycles) typical	10 000
overvoltage category	3
degree of pollution	2
Voltage	
type of voltage of the operating voltage	AC
type of voltage	Use only in alternating current or direct current circuits. Mixed use is not permitted.
insulation voltage (U <sub>i</sub> )	
<ul style="list-style-type: none"> <li>with multi-phase operation at AC rated value</li> </ul>	440 V
<ul style="list-style-type: none"> <li>operational current                             <ul style="list-style-type: none"> <li>at 30 °C rated value</li> <li>at 40 °C rated value</li> <li>at 55 °C rated value</li> </ul> </li> <li>operational current at AC rated value</li> </ul>	50 A 46.97 A 42.01 A 50 A
Supply voltage	
supply voltage at AC	400 V
value range of the supply voltage frequency	50/60 Hz
operating voltage	
<ul style="list-style-type: none"> <li>with multi-phase operation at AC maximum</li> <li>at DC rated value maximum</li> <li></li> </ul>	440 V 62.5 V The operational voltage 62,5V DC/pole takes into account a battery charging voltage with peak value of 72V
Protection class	
protection class IP	IP20, with connected conductors
Breaking Capacity	
switching capacity current	
<ul style="list-style-type: none"> <li>according to EN 60898 rated value</li> <li>according to IEC 60947-2 rated value</li> </ul>	6 kA 6 kA
energy limitation class	3
Dissipation	
power loss [W] for rated value of the current at AC in hot operating state per pole	3.8 W

suitability for operation	Residential buildings/infrastructure
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### Product details

product feature touch protection	Yes
product component neutral conductor switching	No
product feature halogen-free	Yes
product feature sealable	Yes
product feature silicon-free	Yes
product extension installable supplementary devices	Yes

### Connections

connectable conductor cross-section solid	
<ul style="list-style-type: none"> <li>• minimum</li> <li>• maximum</li> </ul>	0.75 mm <sup>2</sup> 25 mm <sup>2</sup>
connectable conductor cross-section stranded	
<ul style="list-style-type: none"> <li>• minimum</li> <li>• maximum</li> </ul>	0.75 mm <sup>2</sup> 25 mm <sup>2</sup>
connectable conductor cross-section finely stranded with core end processing	
<ul style="list-style-type: none"> <li>• minimum</li> <li>• maximum</li> </ul>	0.75 mm <sup>2</sup> 25 mm <sup>2</sup>
tightening torque with screw-type terminals	
<ul style="list-style-type: none"> <li>• minimum</li> <li>• maximum</li> </ul>	2.5 N·m 3 N·m

### Mechanical Design

height	90 mm
width	36 mm
depth	76 mm
installation depth	70 mm
number of modular width units	2
mounting position	any
Net Weight	324 g

### Environmental conditions

ambient temperature during operation	
<ul style="list-style-type: none"> <li>• minimum</li> <li>• maximum</li> </ul>	-25 °C 45 °C
ambient temperature during storage	
<ul style="list-style-type: none"> <li>• minimum</li> <li>• maximum</li> </ul>	-40 °C 75 °C

### Approvals Certificates

Environment	General Product Approval
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[Environmental Con-  
firmations](#)

[Environmental Con-  
firmations](#)



[Confirmation](#)

General Product Approval	other
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[Confirmation](#)



### Further information

Information on the packaging

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

Information for data generation and storage

<https://support.industry.siemens.com/cs/ww/en/view/109995012>

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

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

Industry Mall (Online ordering system)

<https://mall.industry.siemens.com/mall/en/en/Catalog/product?mfb=5SL6250-Z>

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

<https://support.industry.siemens.com/cs/ww/en/ps/5SL6250-7>

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

[https://www.automation.siemens.com/bilddb/cax\\_en.aspx?mlfb=5SL6250-7](https://www.automation.siemens.com/bilddb/cax_en.aspx?mlfb=5SL6250-7)

CAx-Online-Generator

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

Tender specifications

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

Characteristic curves

[https://curves.simaris.siemens.com/curves/<mmp\\_prod\\_noCOMP="HAUPT"></mmp\\_prod\\_no>](https://curves.simaris.siemens.com/curves/<mmp_prod_noCOMP=)





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