



CIRCUIT BREAKER 3VT1 STANDARD BREAKING CAPACITY ICU=25KA, 415V AC 3-POLE, SYSTEM PROTECTION OVERCURRENT RELEASE TM, LI IN= 160A RATED CURRENT IR= 125... 160A OVERLOAD PROT. II= 800... 1600A, SHORT-CIRCUIT PROTECTION W/O AUXILIARY TRIP UNIT W/O AUXILIARY/ALARM SWITCH WITHOUT AUXILIARY RELEASE WITHOUT AUXILIARY/ALARM SWITCH

Model		
product brand name		SENTRON
Product designation		3VT1_5 molded case circuit breakers
Design of the operating mechanism		toggle handle
Type of the driving mechanism / motor drive		No
Design of the overcurrent release		TM

General technical data		
Number of poles		3
Size of the circuit-breaker		3VT1
Electrical endurance (switching cycles) / typical		6 000
Usage category		A
Performance class for circuit breaker		N
Mechanical service life (switching cycles) / typical		20 000
Operating frequency / maximum	1/h	120

Voltage		
Insulation voltage / Rated value	V	690
Surge voltage resistance / Rated value	kV	8

Protection class		
Protection class IP		IP40
Protective function of the overcurrent release		LI

Dissipation		
Active power loss		
• maximum	W	15

Electricity		
Continuous current / Rated value	A	160
Derating temperature / for the rated value of the continuous current	°C	40
<b>Adjustable response value current</b>		
• of the current-dependent overload release / Full-scale value	A	160
• of the instantaneous short-circuit release / initial value	A	800
• of the instantaneous short-circuit release / Full-scale value	A	1 600
Main circuit		
<b>Operating frequency</b>		
• 1 / Rated value	Hz	50
• 2 / Rated value	Hz	60
<b>Operating voltage</b>		
• Rated value / maximum	V	690
• for main current circuit / with AC / at 50 Hz / maximum	V	690
• for main current circuit / with AC / at 60 Hz / maximum	V	690
• for main current circuit / for DC / maximum	V	250
<b>Operating current</b>		
• at 40 °C / Rated value	A	160
• at 50 °C / Rated value	A	145
Auxiliary circuit		
Number of CO contacts / for auxiliary contacts		0
Number of NC contacts / for auxiliary contacts		0
Number of NO contacts / for auxiliary contacts		0
Suitability		
<b>Suitability for use</b>		system protection
• Disconnecting means		Yes
Adjustable parameters		
<b>Adjustable response value current / of the current-dependent overload release / initial value</b>	A	125
Product details		
<b>Product component</b>		
• Trip indicator		No
• Auxiliary switch		No
• Voltage trigger		No
• undervoltage release		No

• undervoltage release with leading contact		No
Product expansion / optional / motor drive		Yes

### Product function

<b>Product function</b>		
• of the thermal overload release		adjustable
• Ground fault protection		No
• for neutral conductors / Short-circuit and overload proof		No
• Phase failure detection		No
• overload protection		Yes

### Short circuit

<b>Operational short-circuit current breaking capacity (Ics)</b>		
• at 240 V / Rated value	kA	20
• at 415 V / Rated value	kA	13
• at 500 V / Rated value	kA	6
• at 690 V / Rated value	kA	3
<b>Maximum short-circuit current breaking capacity (Icu)</b>		
• at 240 V / Rated value	kA	40
• at 415 V / Rated value	kA	25
• at 500 V / Rated value	kA	12
• at 690 V / Rated value	kA	6
<b>Short-circuit current making capacity (Icm)</b>		
• at 415 V / Rated value	kA	52

### Connections

Arrangement of electrical connectors / for main current circuit		front side
Type of electrical connection / for main current circuit		box terminals

### Mechanical Design

<b>Height</b>	mm	130
<b>Width</b>	mm	75
<b>Depth</b>	mm	80
<b>mounting position</b>		with vertical mounting surface +/-180° rotatable, with vertical mounting surface +/- 30° tiltable to the front and back
<b>Mounting type</b>		fixed mounting
<b>Net weight</b>	kg	1.083

### Environmental conditions

<b>Ambient temperature</b>		
• during operation / minimum	°C	-40
• during operation / maximum	°C	55

- during storage / minimum
- during storage / maximum

°C	-40
°C	55

### Certificates

<b>Equipment marking</b>	
• acc. to DIN EN 61346-2	Q
• acc. to DIN EN 81346-2	Q

<b>General Product Approval</b>	<b>Declaration of Conformity</b>	<b>Test Certificates</b>	<b>other</b>
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CCC



GOST



EG-Konf.

[Type Test Certificates/Test Report](#)

[other](#)

### other

[Environmental Confirmations](#)

### 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/3VT17162DC360AA0>

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

<http://support.automation.siemens.com/WW/view/en/3VT17162DC360AA0/all>

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

[http://www.automation.siemens.com/bilddb/cax\\_en.aspx?mfb=3VT17162DC360AA0](http://www.automation.siemens.com/bilddb/cax_en.aspx?mfb=3VT17162DC360AA0)

**CAX-Online-Generator**

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

**Tender specifications**

<http://ausschreibungstexte.siemens.com/tiplv>

**last modified:**

27.04.2015