



CIRCUIT BREAKER 3VA2 IEC FRAME 250 BREAKING CAPACITY CLASS C ICU=110KA @ 415 V 3POLE, LINE PROTECTION ETU860, LSIG, IN=160A OVERLOAD PROTECTION IR=63A ...160A SHORT CIRCUIT PROTECTION ISD=0,6..10X IN, II=1,5..12X IN NEUTRAL PROTECTION OPTIONAL WITH EXT. CT,UPTO 160% GROUNDFAULT, SWITCHABLE IG=0,2... 1 X IN, TG=0,050,8S BUSBAR CONNECTION

Model	
product brandname	SENTRON
Product designation	Molded case circuit breaker
Design of the product	Line protection
Type of load switch / according to UL 489 / Heating, Air Conditioning, and Refrigeration circuit breaker (HACR Type)	Yes
Design of the overcurrent release	ETU860
Protective function of the overcurrent release	LSIG
Number of poles	3

General technical data	
Tension assignée d'isolement Ui	800 V
Max. rated operational voltage Ue with AC 50/60Hz	690 V
Active power loss / for rated value of the current / at AC / in hot operating state / per device	19.7 W
Active power loss / for rated value of the current / at AC / in hot operating state / per pole	6.57 W
Mechanical service life (switching cycles) / typical	20 000

Electrical endurance (switching cycles) / at AC-1 / at 380/415 V 50/60 Hz	10 000
Neutral conductors / upgradeable/retrofitable	Yes
Ground fault monitoring version	Summation current formation L-conductor
Product function	
• communication function	Yes
• other measurement function	Yes
Net weight	2.42 kg

### Electricity

Marking / according to UL 489 / 100%-rated breaker	No
Max. rated operational voltage of the size of the circuit-breaker	250 A
Courant permanent assigné Iu	160 A
Operating current	
• at 40 °C	160 A
• at 45 °C	160 A
• at 50 °C	160 A
• at 55 °C	160 A
• at 60 °C	160 A
• at 65 °C	160 A
• at 70 °C	160 A

### Switching capacity according to IEC 60947

Switching capacity class of the circuit breaker	C
Maximum short-circuit current breaking capacity (Icu)	
• at 240 V	150 kA
• at 415 V	110 kA
• at 440 V	110 kA
• at 500 V	85 kA
• at 690 V	3 kA
Operational short-circuit current breaking capacity (Ics)	
• at 240 V	150 kA
• at 415 V	110 kA
• at 440 V	110 kA
• at 500 V	85 kA
• at 690 V	3 kA
Short-circuit current making capacity (Icm)	
• at 240 V	330 kA
• at 415 V	242 kA
• at 440 V	242 kA
• at 500 V	187 kA
• at 690 V	4.5 kA

Adjustable parameters	
Adjustable response value current / I <sub>g</sub> min.	63 A
Adjustable response value current / I <sub>g</sub> min.	160 A
Adjustable response value current / I <sub>g</sub> min.	0.5
Adjustable response value current / I <sub>g</sub> min.	25
Adjustable response value current / I <sub>g</sub> min.	96 A
Adjustable response value current / I <sub>g</sub> min.	1 600 A
Short-term delayed / tripping switchable / I <sub>2t</sub> =ON/OFF	Yes
Adjustable response value current / I <sub>g</sub> min.	0.05 s
Adjustable response value current / I <sub>g</sub> min.	0.5 s
Adjustable response value current / I <sub>g</sub> min.	0.05 s
Adjustable response value current / I <sub>g</sub> min.	0.5 s
Adjustable response value current / I <sub>i</sub> min.	240 A
Adjustable response value current / I <sub>i</sub> max.	1 920 A
Design of the N-conductor protection	Without
Ground fault protection can be switched ON/OFF	Yes
Ground fault protection / tripping switchable / I <sub>2t</sub> =ON/OFF	Yes
Adjustable response value current / I <sub>g</sub> min.	32 A
Adjustable response value current / I <sub>g</sub> max.	160 A
Adjustable response value current / t <sub>g</sub> min.	0.05 s
Adjustable response value current / I <sub>g</sub> min.	0.8 s
Adjustable response value current / for G-tripping / with I <sub>2t</sub> characteristic / min.	0.2 A
Adjustable response value current / for G-tripping / with I <sub>2t</sub> characteristic / max.	1 A
Mechanical Design	
Height [in]	7.1 in
Height	181 mm
Width [in]	4.1 in
Width	105 mm
Depth [in]	4.2 in
Depth	107 mm
Connections	
Arrangement of electrical connectors / for main current circuit	Front terminal
Type of electrical connection / for main current circuit	Lug terminal
Type of connectable conductor cross-section, connection screw, width x thickness , min.	13 x 1 mm
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

## Certificates

Equipment marking / acc. to DIN EN 81346-2 Q

Certificate of suitability / as approval for NAVAL (no combat vessels) / Supplement SB No

### General Product Approval

### EMC

### Declaration of Conformity



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### Test Certificates

### Shipping Approval

[Typprüfbescheinigung/Werkszeugnis](#)

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### Shipping Approval

other

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## 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/3VA2216-7KQ32-0AA0>

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

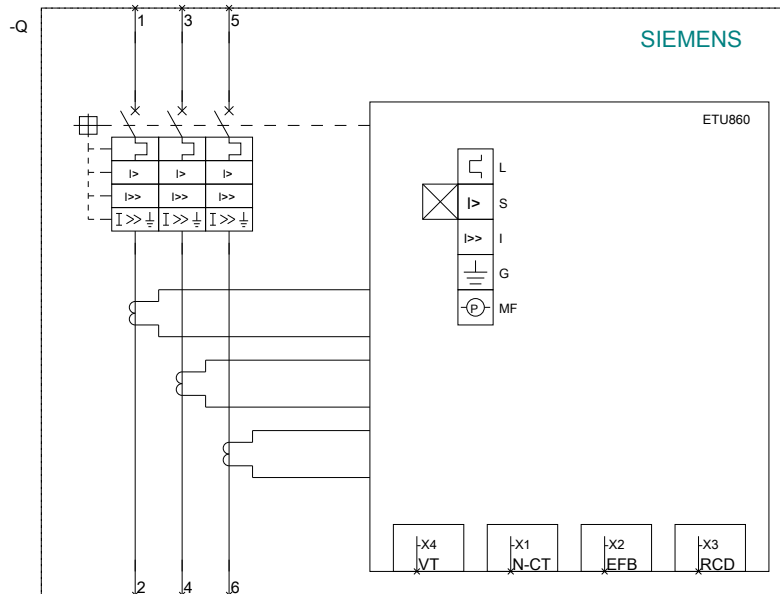
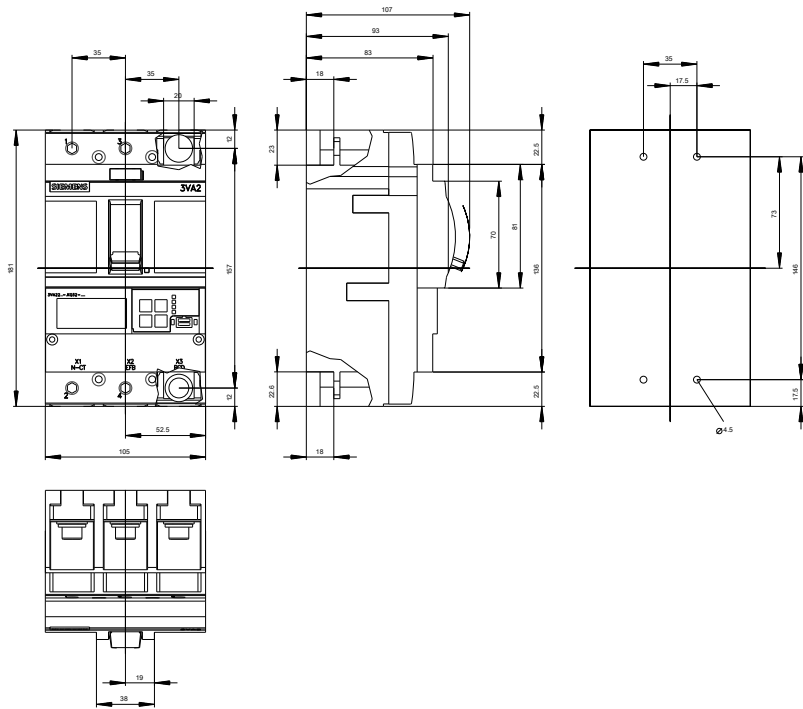
<http://support.automation.siemens.com/WW/view/en/3VA2216-7KQ32-0AA0/all>

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

[http://www.automation.siemens.com/bilddb/cax\\_en.aspx?mfb=3VA2216-7KQ32-0AA0](http://www.automation.siemens.com/bilddb/cax_en.aspx?mfb=3VA2216-7KQ32-0AA0)

**Cx-Online-Generator**

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



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