



Circuit breaker 3VA5 UL Frame 250 Breaking capacity class H 65kA @ 480 V 2-pole, line protection TM210, FTFM, In=50A Overload protection Ir=50A fixed Short-circuit protection Ii=10 x In Without connection

Model	
product brand name	SETRON
product designation	Molded-case circuit breaker
product designation / according to UL file	HFAS
Product version	System protection
design of the load switch / acc. to UL 489 / Heating, Air Conditioning, and Refrigeration circuit breaker (HACR Type)	Yes
design of the load switch / acc. to UL 489 / High-Intensity-Discharge circuit breaker (HID Type)	Yes
design of the overcurrent release	TM210
protection function of the overcurrent release	LI
number of poles	2
General technical data	
rated insulation voltage Ui	800 V
Max. rated operational voltage Ue with DC	500 V
power loss [W] / maximum	12 W
Active power loss / for rated value of the current / at AC / in hot operating state / per pole	5.8 W
mechanical service life (switching cycles) / typical	20 000
Electrical endurance (switching cycles) / at AC-1 / at 380/415 V 50/60 Hz	8 000
Electrical endurance (switching cycles) / at AC-1 / at 690 V 50/60 Hz	4 000
electrical endurance (switching cycles) / at 480 V	8 000
electrical endurance (switching cycles) / at 600 V	4 000
Neutral conductors / upgradeable/retrofitable	No
product function	
• communication function	No
• other measurement function	No
Current	
marking / acc. to UL 489 / 100%-rated breaker	No
Switching capacity according to IEC 60947	
switching capacity class of the circuit breaker	H
breaking capacity maximum short-circuit current (Icu)	
• at 240 V	100 kA
• at 415 V	70 kA
• at 690 V	10 kA
breaking capacity operating short-circuit current (Ics)	

• at 240 V • at 415 V • at 690 V	100 kA 70 kA 10 kA
short-circuit current making capacity (I _{cm}) • at 240 V • at 415 V • at 690 V	220 kA 154 kA 17 kA
design of short-circuit protection	For switching power values in DC networks, see the 3VA molded case circuit breaker device manual; link to be found under Service & Support in the last chapter

Switching capacity according to UL 489

breaking capacity current • at 240 V • at 480 V • at 600 Y/347 V	100 kA 65 kA 25 kA
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Adjustable parameters

Adjustable response value current / I _g min.	50 A
Adjustable response value current / I _g min.	50 A
Ground fault protection / tripping switchable / I _{2t} =ON/OFF	No

Mechanical Design

height [in]	7.28 in
Height	185 mm
width [in]	4.13 in
Width	105 mm
depth [in]	3.27 in
depth	83 mm

Connections

arrangement of electrical connectors / for main current circuit	Without connection
type of electrical connection / for main current circuit	Without

Auxiliary circuit

product component • undervoltage release • voltage trigger • trip indicator	No No No
number of CO contacts / for auxiliary contacts	0

Accessories

product extension / optional / motor drive	Yes
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Environmental conditions

protection class IP / on the front	IP40
ambient temperature • during operation / minimum • during operation / maximum • during storage / minimum • during storage / maximum	-25 °C 70 °C -40 °C 80 °C

Certificates

reference code / acc. to IEC 81346-2	Q
certificate of suitability / as approval for NAVAL (no combat vessels) / supplement SB	No

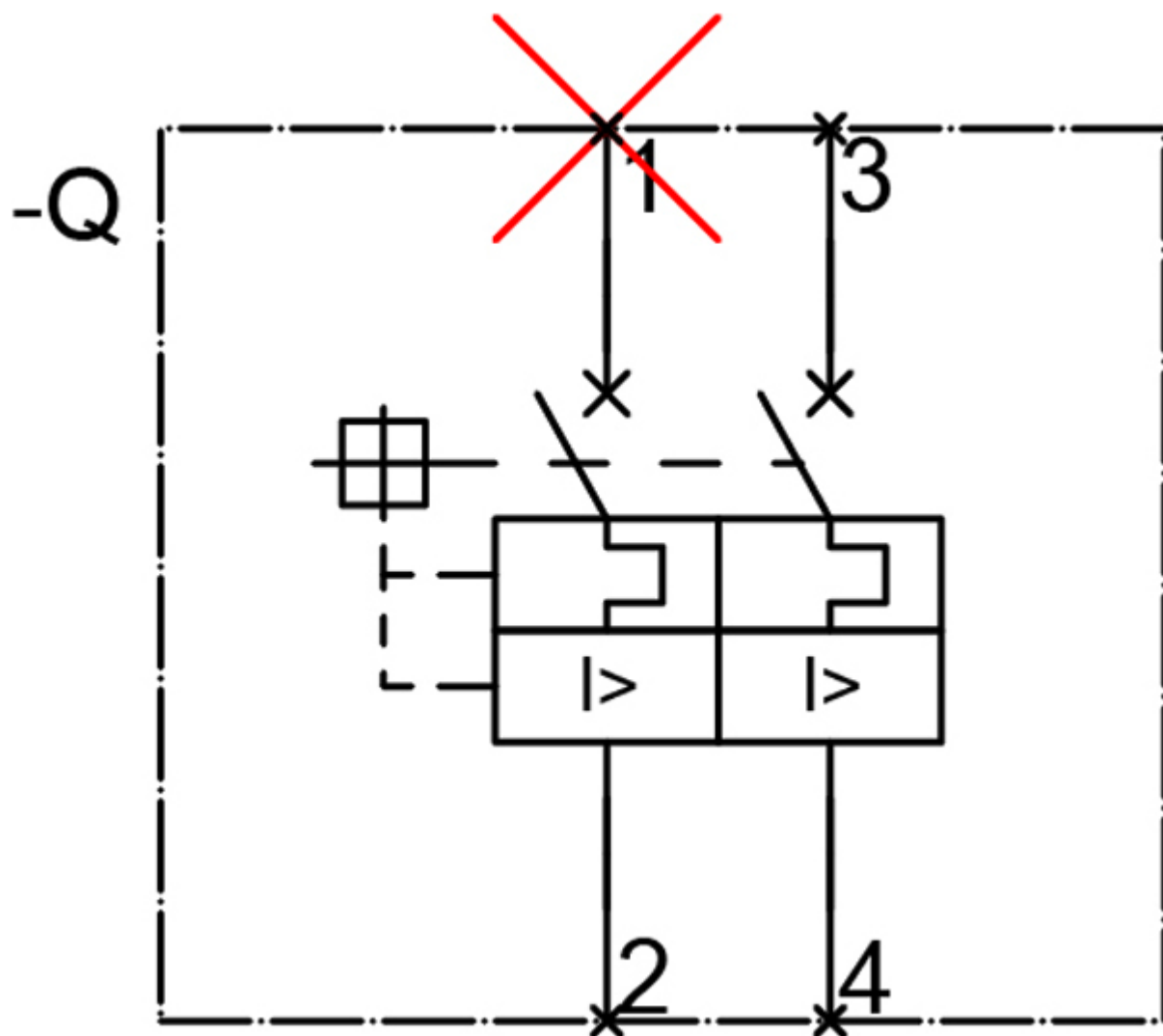
General Product Approval	EMC
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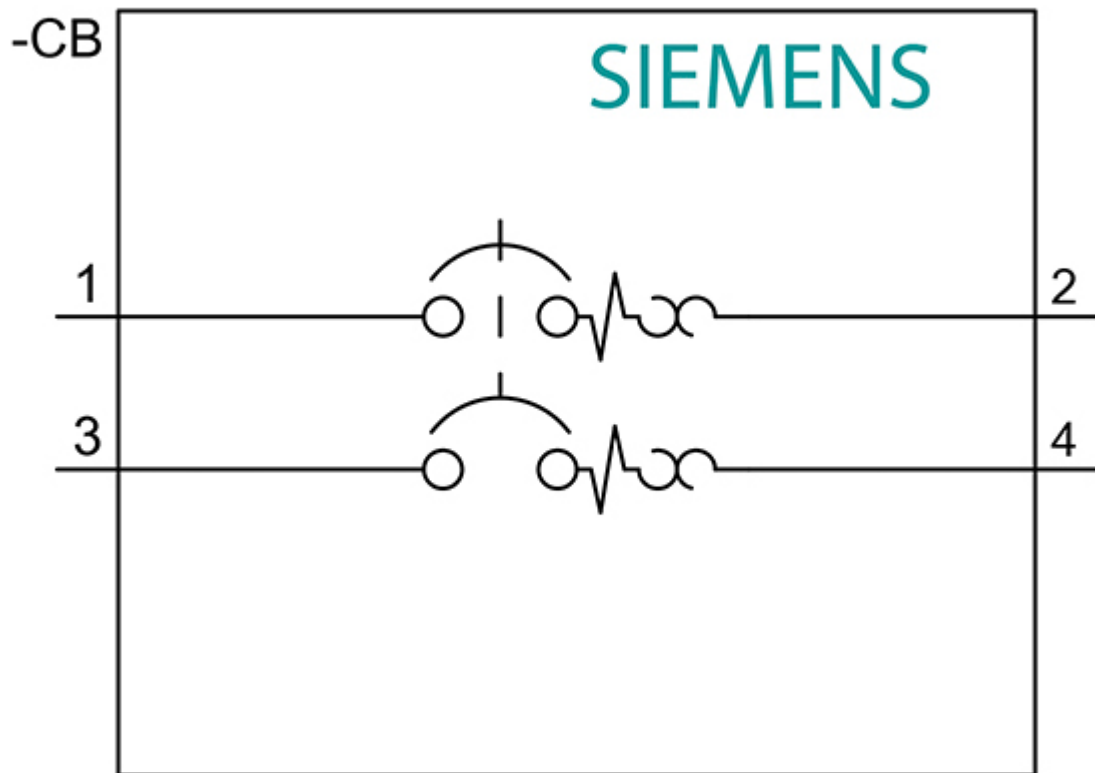


[Miscellaneous](#)



Declaration of Conformity	Marine / Shipping	other
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