SIEMENS

Datasheet

3VA1116-5FE46-0AA0



CIRCUIT BREAKER 3VA1 IEC FRAME 160 BREAKING CAPACITY CLASS M ICU=55KA @ 415 V 4-POLE, LINE PROTECTION TM220, ATFM, IN=160A OVERLOAD PROTECTION IR=112A ...160A SHORT CIRCUIT PROTECTION II=10 X IN NEUTRAL PROTECTION 50% CABLE CONNECTION

Figure similar

Model		
product brand name	SENTRO	N
Product designation	Molded o	case circuit breaker
Design of the product	Line prot	tection
Product variations	General	Applications
Ground fault monitoring version	Without	
Design of the auxiliary release	Without a	auxiliary release
Design of the auxiliary switch	Without	
Design of the operating mechanism	toggle ha	andle
Type of the driving mechanism / motor drive	No	
Design of the overcurrent release	TM220	

General technical data				
Number of poles		4		
Trip class / of the L-trip / with I2t characteristic / initial value		1		
Trip class / of the L-trip / with I2t characteristic / Full-scale value		1		
Electrical endurance (switching cycles)				
• at AC-1 / at 380/415 V / at 50/60 Hz		8 000		
circuit-breaker / Design		3VA		
Mechanical service life (switching cycles) / typical		15 000		

Voltage		
Insulation voltage		
Rated value	V	800

Protection class		
Protective function of the overcurrent release		LI
Switching capacity		
Switching capacity class of the circuit breaker		M
Dissipation		
Active power loss	147	20
• maximum	W	38
Electricity		
Operating current / at 45 °C / Rated value	Α	160
Continuous current / Rated value / maximum	Α	160
Continuous current		
Rated value	Α	160
Adjustable response value current		
 of the current-dependent overload release / Full-scale value 	А	1
• of the instantaneous short-circuit release / initial value	Α	10
Net weight	g	1 200
Main circuit		
Operating voltage		
• with AC / at 50/60 Hz / Rated value	V	690
• for DC / Rated value	V	600
Operating current	_	
• at 40 °C / Rated value	Α	160
• at 50 °C / Rated value	Α	160
● at 55 °C / Rated value	Α	158
• at 60 °C / Rated value	Α	155
• at 65 °C / Rated value	Α	153
• at 70 °C / Rated value	Α	150
Auxiliary circuit		
Number of CO contacts		
• for auxiliary contacts		0
Suitability		
Suitability for use		system protection
Adjustable parameters		
Adjustable response value current		
of I-trip / Full-scale value	Α	10
• for N-conductor protection / initial value	Α	0.5
• for N-conductor protection / Full-scale value	Α	0.5

Adjustable response value current / of the current- dependent overload release / initial value	А	0.7
Appearance		
Product details		
Product component		
Trip indicator		No
● display		No
 Voltage trigger 		No
 undervoltage release 		No
 undervoltage release with leading contact 		No
Product property		
 for neutral conductors / upgradeable/retrofittable / Short-circuit and overload proof 		No
Product expansion		
optional		
— motor drive		Yes
Product function		
Product function		
 Intrinsic device protection 		Yes
communication function		No
Phase failure detection		No
other measurement function		No
Accessories		
Manufacturer article number / of the supplied basic switch		3VA1116-5FE46-0AA0
Short circuit		
Operational short-circuit current breaking capacity		
(Ics)		
● at 240 V / Rated value	kA	85
● at 415 V / Rated value	kA	55
• at 440 V / Rated value	kA	30
• at 500 V / Rated value	kA	15
• at 690 V / Rated value	kA	5
Maximum short-circuit current breaking capacity (Icu)		
• at 240 V / Rated value	kA	85
• at 415 V / Rated value	kA	55
• at 440 V / Rated value	kA	30
• at 500 V / Rated value	kA	20
• at 690 V / Rated value	kA	10
Short-circuit current making capacity (Icm)		

• at 240 V / Rated value	kA	187
• at 415 V / Rated value	kA	121
• at 690 V / Rated value	kA	17

Connections	
Arrangement of electrical connectors	
• for main current circuit	Front terminal
Type of connectable conductor cross-section	
 of the round conductor terminal / stranded 	1 x (1.5 - 70 mm²)
Design of the electrical connection	
• for main current circuit	Box terminal

Mechanical Design				
Height	mm	130		
Width	mm	101.6		
Depth	mm	70		
Mounting type		fixed mounting		

Environmental conditions			
Ambient temperature			
during operation / minimum	°C	-25	
during operation / maximum	°C	70	
during storage / minimum	°C	-40	
during storage / maximum	°C	80	

	Certificates		
•	Reference code		
	• acc. to DIN EN 61346-2	Q	
	• acc. to DIN EN 81346-2	Q	

General	EMC	Declaration of	Shipping	other
Product		Conformity	Approval	
Approval				



other





other

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/3VA11165FE460AA0

Service&Support (Manuals, Certificates, Characteristics, FAQs,...) http://support.automation.siemens.com/WW/view/en/3VA11165FE460AA0/all

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

http://www.automation.siemens.com/bilddb/cax_en.aspx?mlfb=3VA11165FE460AA0

Tender specifications http://ausschreibungstexte.siemens.com/tiplv

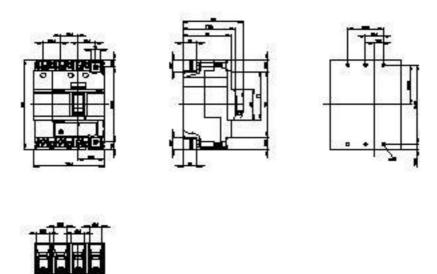


Figure similar

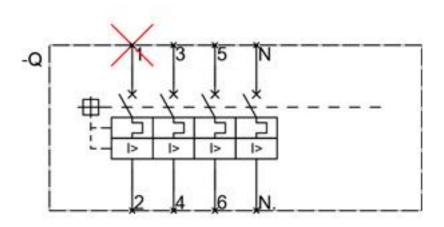


Figure similar

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