SIEMENS

Data sheet

3RV2321-4AC10

CIRCUIT-BREAKER SZ S0, FOR STARTER COMBINATION, RATED CURRENT 16A, N-RELEASE 208A, SCREW CONNECTION, STANDARD SW. CAPACITY



product brandname	SIRIUS			
Product designation	Circuit breaker			
Design of the product	For starter combinations			
Product type designation	3RV2			
General technical data				
Size of the circuit-breaker	S0			
Size of contactor can be combined company-specific	S00, S0			
Product extension				
 Auxiliary switch 	Yes			
Power loss [W] total typical	7 W			
Insulation voltage with degree of pollution 3 rated value	690 V			
Surge voltage resistance rated value	6 kV			
maximum permissible voltage for safe isolation				
 in networks with grounded star point between main and auxiliary circuit 	400 V			
 in networks with grounded star point between main and auxiliary circuit 	400 ∨			
Protection class IP				

• on the front IP20 • of the terminal IP20 Mechanical service life (switching cycles) 00 000 • of the main contacts typical 100 000 Electrical endurance (switching cycles) 100 000 Protection against electrical shock finger-safe Equipment marking acc. to DIN EN 81346-2 Q Ambient temperature -20 +60 °C • during operation -20 +60 °C • during transport -50 +80 °C Mether of poles for main current circuit 3 Operating transport 690 V • at AC-3 rated value 690 V • at AC-3 -at 400 V rated value • at AC-3 -at 400 V rated value • at AC-3		
Mechanical service life (switching cycles) 100 000 • of the main contacts typical 100 000 Electrical endurance (switching cycles) 100 000 • typical 100 000 Protection against electrical shock finger-safe Equipment marking acc. to DIN EN 81346-2 Q Ambient conditions - Ambient conditions - Autig storage -50 +60 °C • during operation -20 +60 °C • during transport -50 +80 °C • rated value 690 V • at AC-3 rated value 690 V • at AC-3 rated value 50 60 Hz Operating current -at 400 V rated value • at AC-3 -at 400 V rated value • at AC-3 -at 230 V rated value - at 400 V rated value 7500 W - at 400 V rated value	• on the front	IP20
 of the main contacts typical 100 000 of auxiliary contacts typical 100 000 Electrical endurance (switching cycles) typical 100 000 Protection against electrical shock finger-safe Equipment marking acc. to DIN EN 81346-2 Q Ambient conditions Ambient temperature during operation -20 +60 °C during storage -50 +80 °C during transport -50 +80 °C Mumber of poles for main current circuit 3 Operating requency rated value 690 V etated value 690 V ournent rated value 690 V ournent rated value at AC-3 rated value at AC-3 - at 400 V rated value AC-3 - at 230 V rated value AC-3 - at 230 V rated value 7500 W - at 500 V rated value 7500 W - at 600 V rated value 11000 W 	• of the terminal	IP20
or of auxiliary contacts typical100 000Electrical endurance (switching cycles) • typical100 000Protection against electrical shockfinger-safeEquipment marking acc. to DIN EN 81346-2QAmbient temperature • during operation-20 +60 °C• during storage • during transport-50 +80 °CMumber of poles for main current circuit3Operating requery rated value • at AC-3 • at AC-3690 V• at AC-3 • at AC-3690 V• at AC-3 • at AC-316 AOperating power • at AC-37500 W- at 900 V rated value7500 W- at 600 V rated value7500 W- at 600 V rated value11 000 W	Mechanical service life (switching cycles)	
Electrical endurance (switching cycles) • typical 100 000 Protection against electrical shock finger-safe Equipment marking acc. to DIN EN 81346-2 Q Ambient temperature • during operation -20 +60 °C • during storage -50 +80 °C • during transport -50 +80 °C Main circuit Number of poles for main current circuit 3 Operating voltage • rated value 690 V • at AC-3 rated value maximum 690 V Operating frequency rated value 50 60 Hz Operating current • at AC-3 — at 400 V rated value 16 A Operating power • at AC-3 — at 400 V rated value 16 A Operating power • at AC-3 — at 230 V rated value 7 500 W — at 500 V rated value 7 500 W — at 690 V vated value 7 500 W — at 690 V vated value 11 000 W	 of the main contacts typical 	100 000
• typical100 000Protection against electrical shockfinger-safeEquipment marking acc. to DIN EN 81346-2QAmbient conditionsQAmbient temperature	 of auxiliary contacts typical 	100 000
Operation Finder-safe Equipment marking acc. to DIN EN 81346-2 Q Ambient conditions Q Ambient temperature -20 +60 °C • during operation -20 +60 °C • during storage -50 +80 °C • during transport -50 +80 °C Main circuit 3 Number of poles for main current circuit 3 Operating voltage -690 V • at AC-3 rated value 690 V • at AC-3 rated value 690 V Operating current rated value 16 A Operating current -at 400 V rated value • at AC-3 -at 200 V rated value • at AC-3 -at 400 V rated value • at AC-3 -at 400 V rated value • at AC-3 -at 400 V rated value • a	Electrical endurance (switching cycles)	
Equipment marking acc. to DIN EN 81346-2 Q Ambient conditions -Ambient temperature • during operation -20 +60 °C • during storage -50 +80 °C • during transport -50 +80 °C Main circuit Mumber of poles for main current circuit 3 Operating voltage 690 V • rated value 690 V • at AC-3 rated value 690 V • at AC-3 16 A operating current 16 A Operating power at AC-3 - at 400 V rated value 16 A Operating power at AC-3 - at 230 V rated value 7 500 W - at 500 V rated value 7 500 W - at 690 V rated value 1000 W	• typical	100 000
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• during operation-20 +60 °C• during storage-50 +80 °C• during transport-50 +80 °CMain circuit3Number of poles for main current circuit3Operating voltage690 V• rated value690 V• at AC-3 rated value maximum690 VOperating frequency rated value50 60 HzOperating current rated value16 AOperating power-• at AC-316 AOperating power-• at AC-3 at 230 V rated value4 000 W- at 400 V rated value7 500 W- at 500 V rated value7 500 W- at 690 V rated value11 000 W		
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 during transport -50 +80 °C Main circuit Number of poles for main current circuit Operating voltage rated value 690 V at AC-3 rated value maximum 690 V Operating frequency rated value 50 60 Hz Operating current rated value 16 A Operating power at 400 V rated value 16 A Operating power at AC-3 at 400 V rated value 7 500 W at 400 V rated value 7 500 W at 500 V rated value 11 000 W 	 during operation 	
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Operating voltage• rated value690 V• at AC-3 rated value maximum690 VOperating frequency rated value50 60 HzOperating current rated value16 AOperating current	Main circuit	
• rated value690 V• at AC-3 rated value maximum690 VOperating frequency rated value50 60 HzOperating current rated value16 A• at AC-3- at 400 V rated value- at 400 V rated value16 AOperating power- at 230 V rated value- at 230 V rated value4 000 W- at 400 V rated value7 500 W- at 690 V rated value11 000 W		3
• at AC-3 rated value maximum690 VOperating frequency rated value50 60 HzOperating current rated value16 AOperating current	Operating voltage	
Operating frequency rated value50 60 HzOperating current rated value16 AOperating current	• rated value	690 V
Operating current rated value16 AOperating current16 A• at AC-316 A— at 400 V rated value16 AOperating power400 V• at AC-316 A• at AC-317 O0 W• at 400 V rated value7 500 W• at 500 V rated value11 000 W	 at AC-3 rated value maximum 	690 V
Operating current• at AC-3- at 400 V rated value16 AOperating power• at AC-3- at 230 V rated value4 000 W- at 400 V rated value7 500 W- at 500 V rated value7 500 W- at 690 V rated value11 000 W	Operating frequency rated value	50 60 Hz
• at AC-3 16 A - at 400 V rated value 16 A Operating power - • at AC-3 - - at 230 V rated value 4 000 W - at 400 V rated value 7 500 W - at 500 V rated value 7 500 W - at 690 V rated value 11 000 W	Operating current rated value	16 A
- at 400 V rated value 16 A Operating power - • at AC-3 - - at 230 V rated value 4 000 W - at 400 V rated value 7 500 W - at 500 V rated value 7 500 W - at 690 V rated value 11 000 W	Operating current	
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• at AC-3 4 000 W - at 230 V rated value 7 500 W - at 400 V rated value 7 500 W - at 500 V rated value 7 500 W - at 690 V rated value 11 000 W	— at 400 V rated value	16 A
	Operating power	
	● at AC-3	
	— at 230 V rated value	4 000 W
— at 690 V rated value 11 000 W	— at 400 V rated value	7 500 W
	— at 500 V rated value	7 500 W
Operating frequency	— at 690 V rated value	11 000 W
	Operating frequency	
• at AC-3 maximum 15 1/h	● at AC-3 maximum	15 1/h
Auxiliary circuit		
Number of NC contacts	Number of NC contacts	
• for auxiliary contacts 0	-	0
Number of NO contacts	Number of NO contacts	
• for auxiliary contacts 0	-	0
Number of CO contacts	Number of CO contacts	
• for auxiliary contacts 0	 for auxiliary contacts 	0
Protective and monitoring functions	Protective and monitoring functions	

Product function	
 Ground fault detection 	No
Phase failure detection	No
Operational short-circuit current breaking capacity	
(Ics) at AC	
• at 240 V rated value	100 kA
• at 400 V rated value	25 kA
• at 500 V rated value	5 kA
● at 690 V rated value	2 kA
Maximum short-circuit current breaking capacity (Icu)	
 at AC at 240 V rated value 	100 kA
 at AC at 400 V rated value 	55 kA
 at AC at 500 V rated value 	10 kA
• at AC at 690 V rated value	4 kA
Breaking capacity short-circuit current (Icn)	
 at 1 current path at DC at 150 V rated value 	10 kA
 with 2 current paths in series at DC at 300 V rated value 	10 kA
 with 3 current paths in series at DC at 450 V rated value 	10 kA
UL/CSA ratings	
Full-load current (FLA) for three-phase AC motor	
• at 480 V rated value	16 A
● at 600 V rated value	16 A
Yielded mechanical performance [hp]	
 for single-phase AC motor 	
— at 110/120 V rated value	1 hp
— at 230 V rated value	2 hp
 for three-phase AC motor 	
— at 200/208 V rated value	3 hp
— at 220/230 V rated value	5 hp
— at 460/480 V rated value	10 hp
Short-circuit protection	
Product function Short circuit protection	Yes
Design of the short-circuit trip	magnetic
Design of the fuse link for IT network for short-circuit	
protection of the main circuit	
• at 400 V	gL/gG 63 A
• at 500 V	gL/gG 50 A
• at 690 V	gL/gG 40 A
Installation/ mounting/ dimensions	

Mounting position	any	
Mounting type	screw and snap-on mounting onto 35 mm standard mounting rail	
	according to DIN EN 60715	
Height	97 mm	
Width	45 mm	
Depth	96 mm	
Required spacing		
 with side-by-side mounting 		
— forwards	0 mm	
— Backwards	0 mm	
— upwards	50 mm	
— downwards	50 mm	
— at the side	0 mm	
 for grounded parts 		
— forwards	0 mm	
— Backwards	0 mm	
— upwards	50 mm	
— at the side	30 mm	
— downwards	50 mm	
• for live parts		
— forwards	0 mm	
— Backwards	0 mm	
— upwards	50 mm	
— downwards	50 mm	
— at the side	30 mm	
Connections/Terminals		
Product function		
 removable terminal for auxiliary and control 	No	
Type of electrical connection		
• for main current circuit	screw-type terminals	
Arrangement of electrical connectors for main current circuit	Top and bottom	
Type of connectable conductor cross-sections		
 for main contacts 		
— single or multi-stranded	2x (1 2,5 mm²), 2x (2,5 10 mm²)	
— finely stranded with core end processing	2x (1 2.5 mm²), 2x (2.5 6 mm²), 1x 10 mm²	
 at AWG conductors for main contacts 	2x (16 12), 2x (14 8)	
Tightening torque		
 for main contacts with screw-type terminals 	2 2.5 N·m	
Design of screwdriver shaft	Diameter 5 to 6 mm	
Safety related data		

Safety related data

c. to SN 31920	5 000			
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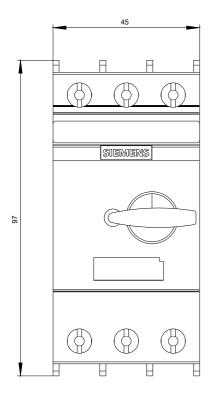
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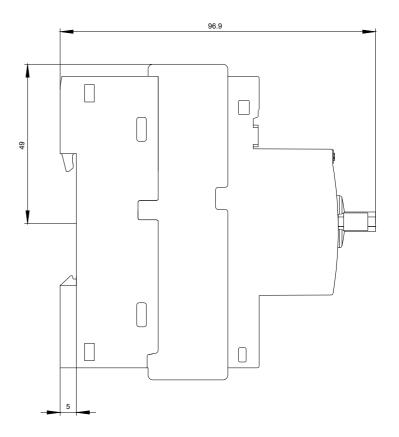
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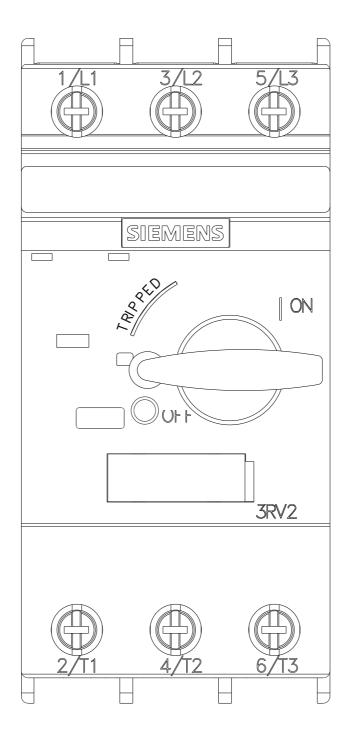
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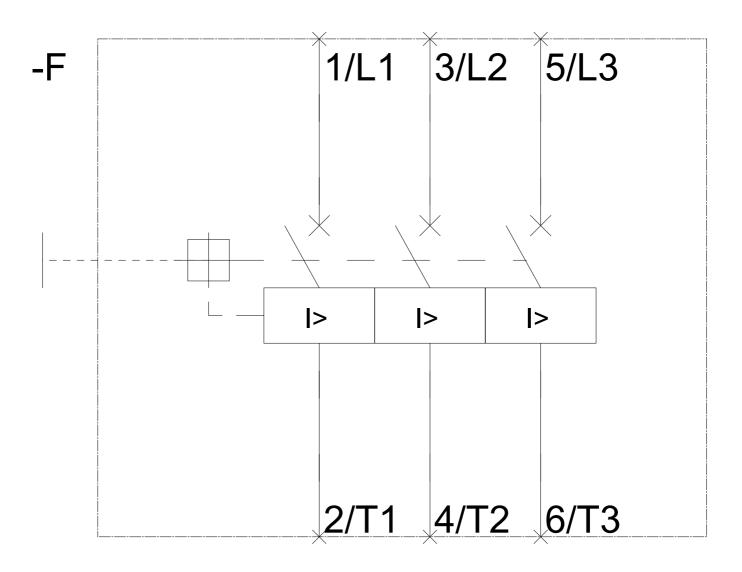
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