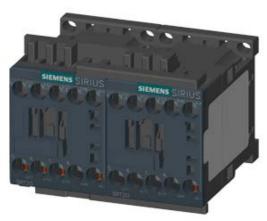
SIEMENS

Data sheet

3RA2317-8XB30-1BB4

REV. COMB., AC3, 5.5KW/ 400V DC24V 3-POLE, SZ S00 SCREW TERMINAL ELECTR. AND MECH. INTERLOCK



product brand name	SIRIUS
Product designation	reversing contactor assembly 3RA23
Manufacturer article number	
 1 of the supplied contactor 	3RT2017-1BB42
 2 of the supplied contactor 	3RT2017-1BB42
 of the supplied RH assembly kit 	3RA2913-2AA1

General technical data:		
Insulation voltage		
 with degree of pollution 3 Rated value 	V	690
Degree of pollution		3
Shock resistance		9.8g / 5 ms and 5.9g / 10 ms
Surge voltage resistance Rated value	kV	6
Mechanical service life (switching cycles)		
 of the contactor typical 		10 000 000
 of the contactor with added auxiliary switch 		10 000 000
block typical		
Protection class IP		
• on the front		IP20
Equipment marking		
● acc. to DIN EN 81346-2		Q

Main circuit:	
Number of poles for main current circuit	3
Number of NC contacts for main contacts	0
Number of NO contacts for main contacts	3
Operating voltage	

a at AC 2 Data dividuo magginarum	V	690
at AC-3 Rated value maximum	V	690
Operating current		
• at AC-1	^	22
— at 400 V at ambient temperature 40 °CRated value	Α	22
— at 400 V at ambient temperature 60 °CRated value	Α	20
• at AC-2 at 400 V Rated value	Α	7
● at AC-3		
— at 400 V Rated value	Α	12
• at AC-4 at 400 V Rated value	Α	8.5
Operating current with 1 current path		
• at DC-1		
— at 24 V Rated value	Α	20
— at 110 V Rated value	Α	2.1
• at DC-3 at DC-5		
— at 24 V Rated value	Α	20
— at 110 V Rated value	Α	0.15
Operating current with 2 current paths in series		
• at DC-1		
— at 24 V Rated value	Α	20
— at 110 V Rated value	Α	12
• at DC-3 at DC-5		
— at 110 V Rated value	Α	0.35
— at 24 V Rated value	Α	20
Operating current with 3 current paths in series		
• at DC-1		
— at 24 V Rated value	Α	20
— at 110 V Rated value	Α	20
• at DC-3 at DC-5		
— at 110 V Rated value	Α	20
— at 24 V Rated value	Α	20
Operating power		
• at AC-2 at 400 V Rated value	kW	5.5
● at AC-4 at 400 V Rated value	kW	4
Operating power		
● at AC-3		
— at 400 V Rated value	kW	5.5
— at 500 V Rated value	kW	5.5
— at 690 V Rated value	kW	5.5
Operating frequency		
at AC-3 maximum	1/h	750

Control circuit/ Control: Type of voltage of the control supply voltage Control supply voltage 1 • for DC Rated value Operating range factor control supply voltage rated value of the magnet coil for DC Closing power of the magnet coil for DC W 4 Auxiliary circuit: Number of NC contacts • for auxiliary contacts — per direction of rotation — instantaneous contact — lagging switching Number of NC contacts • for auxiliary contacts — per direction of rotation — instantaneous contact — leading contact — leading contact Product expansion Auxiliary switch Operating current of the auxiliary contacts at AC-12 maximum Operating current of the auxiliary contacts at AC-15 • at 230 V • at 400 V Operating current of the auxiliary contacts at DC-13 • at 24 V • at 60 V • at 110 V • at 120 V Contact reliability of the auxiliary contacts Contact reliability of the auxiliary contacts Contact reliability of the auxiliary c	No-load switching frequency	1/h	1 500
Control supply voltage 1 • for DC Rated value Operating range factor control supply voltage rated value of the magnet coil for DC Closing power of the magnet coil for DC W 4 Auxiliary circuit: Number of NC contacts • for auxiliary contacts — per direction of rotation — instantaneous contact — lagging switching Number of NC contacts • for auxiliary contacts • for auxiliary contacts — per direction of rotation — instantaneous contact — lagging switching Number of NC contacts • for auxiliary contacts • for auxiliary contacts — per direction of rotation — instantaneous contact — leading contact — leading contact Product expansion Auxiliary switch Operating current of the auxiliary contacts at AC-12 maximum Operating current of the auxiliary contacts at AC-15 • at 230 V • at 400 V • at 400 V • at 60 V • at 110 V • at 60 V • at 110 V • at 220 V Contact reliability of the auxiliary contacts	ontrol circuit/ Control:		
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Closing power of the magnet coil for DC W 4 Holding power of the magnet coil for DC W 4 Auxiliary circuit: Number of NC contacts • for auxiliary contacts — per direction of rotation — instantaneous contact — lagging switching 0 Number of NO contacts • for auxiliary contacts • for auxiliary contacts — per direction of rotation — instantaneous contact — leading contact — leading contact Product expansion Auxiliary switch Operating current of the auxiliary contacts at AC-12 maximum Operating current of the auxiliary contacts at AC-15 • at 230 V A G A 3 Operating current of the auxiliary contacts at DC-13 • at 400 V A 3 Operating current of the auxiliary contacts at DC-13 • at 24 V A 10 • at 60 V A 2 • at 110 V A 1 • at 220 V C A 0.3 Contact reliability of the auxiliary contacts Contact reliability of the auxiliary contacts Contact reliability of the auxiliary contacts Contact reliability of the auxiliary contacts Contact reliability of the auxiliary contacts Contact reliability of the auxiliary contacts Contact reliability of the auxiliary contacts Contact reliability of the auxiliary contacts Contact reliability of the auxiliary contacts			0.85 1.1
Holding power of the magnet coil for DC Auxiliary circuit: Number of NC contacts • for auxiliary contacts — per direction of rotation — instantaneous contact — lagging switching Number of NO contacts • for auxiliary contacts • for auxiliary contacts — per direction of rotation — instantaneous contact — leading contact — leading contact Product expansion Auxiliary switch Operating current of the auxiliary contacts at AC-12 maximum Operating current of the auxiliary contacts at AC-15 • at 230 V • at 400 V Operating current of the auxiliary contacts at DC-13 • at 24 V • at 60 V • at 110 V • at 220 V Contact reliability of the auxiliary contacts - V - V - V - V - V - V - V -	-		
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— instantaneous contact — leading contact Product expansion Auxiliary switch Operating current of the auxiliary contacts at AC-12 maximum Operating current of the auxiliary contacts at AC-15 • at 230 V • at 400 V A Operating current of the auxiliary contacts at DC-13 • at 24 V • at 60 V • at 60 V • at 110 V • at 220 V Contact reliability of the auxiliary contacts	for auxiliary contacts		
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Product expansion Auxiliary switch Operating current of the auxiliary contacts at AC-12 maximum Operating current of the auxiliary contacts at AC-15 • at 230 V • at 400 V A Operating current of the auxiliary contacts at DC-13 • at 24 V • at 60 V • at 110 V • at 220 V Contact reliability of the auxiliary contacts Yes 10 A 6 A 7 10 A 6 A 7 A 10 A	 instantaneous contact 		0
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Operating current of the auxiliary contacts at AC-15 • at 230 V • at 400 V A Operating current of the auxiliary contacts at DC-13 • at 24 V • at 60 V • at 110 V • at 220 V Contact reliability of the auxiliary contacts A Operating current of the auxiliary contacts at DC-13 A 10 A 2 • at 110 V • at 220 V A O.3 Contact reliability of the auxiliary contacts	Product expansion Auxiliary switch		Yes
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 at 24 V at 60 V at 110 V at 110 V at 220 V A 0.3 Contact reliability of the auxiliary contacts A 1 error per 100 million operating cycles 		Α	3
at 60 V at 110 V at 220 V Contact reliability of the auxiliary contacts A 2 A 1 A 0.3 Contact reliability of the auxiliary contacts < 1 error per 100 million operating cycles	Operating current of the auxiliary contacts at DC-13		
 at 110 V at 220 V A 0.3 Contact reliability of the auxiliary contacts A 1 error per 100 million operating cycles 		Α	
• at 220 V Contact reliability of the auxiliary contacts A 0.3 < 1 error per 100 million operating cycles	● at 60 V	Α	2
Contact reliability of the auxiliary contacts < 1 error per 100 million operating cycles			
		Α	
UL/CSA ratings:	Contact reliability of the auxiliary contacts		< 1 error per 100 million operating cycles
	JL/CSA ratings:		
Full-load current (FLA) for three-phase AC motor	Full-load current (FLA) for three-phase AC motor		
• at 480 V Rated value A 11	● at 480 V Rated value	Α	11
• at 600 V Rated value A 11	● at 600 V Rated value	Α	11
yielded mechanical performance [hp]	yielded mechanical performance [hp]		
 • for single-phase AC motor at 110/120 V Rated value metric hp 			0.5
 for single-phase AC motor at 230 V Rated value metric hp 			2

• for three-phase AC motor at 200/208 V Rated value	metric hp	1.5
 for three-phase AC motor at 220/230 V Rated value 	metric hp	3
 for three-phase AC motor at 460/480 V Rated value 	metric hp	7.5
• for three-phase AC motor at 575/600 V Rated value	metric hp	10
Contact rating of the auxiliary contacts acc. to UL		A600 / Q600

Short-circuit:	
Design of the fuse link	
 for short-circuit protection of the main circuit 	
 with type of assignment 1 required 	gL/gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 50 A
— with type of assignment 2 required	gL/gG LV HRC 3NA, DIAZED 5SB, NEOZED 5SE: 25 A
 for short-circuit protection of the auxiliary switch required 	fuse gL/gG: 10 A

nstallation/ mounting/ dimensions:		
mounting position		+/-180° rotation possible on vertical mounting
		surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface
Married a de mar		_
Mounting type		screw and snap-on mounting onto 35 mm standard mounting rail
Height	mm	68
Width	mm	90
Depth	mm	73
Required spacing		
 with side-by-side mounting 		
— forwards	mm	6
— Backwards	mm	0
— upwards	mm	6
— downwards	mm	6
— at the side	mm	6
• for grounded parts		
— forwards	mm	6
— Backwards	mm	0
— upwards	mm	6
— at the side	mm	6
— downwards	mm	6
• for live parts		
— forwards	mm	6
— Backwards	mm	0

— upwards	mm	6
— downwards	mm	6
— at the side	mm	6

Connections/ Terminals:		
Type of electrical connection		
• for main current circuit	screw-type terminals	
 for auxiliary and control current circuit 	screw-type terminals	
Type of connectable conductor cross-section		
• for main contacts		
— single or multi-stranded	2x (0,5 1,5 mm²), 2x (0,75 2,5 mm²), 2x (0,5 4 mm²)	
 finely stranded with core end processing 	2x (0.5 1.5 mm²), 2x (0.75 2.5 mm²)	
 for AWG conductors for main contacts 	2x (20 16), 2x (18 14)	
 for auxiliary contacts 		
 single or multi-stranded 	2x (0,5 1,5 mm²), 2x (0,75 2,5 mm²)	
— finely stranded with core end processing	2x (0.5 1.5 mm²), 2x (0.75 2.5 mm²)	
• for AWG conductors for auxiliary contacts	2x (20 16), 2x (18 14)	

Safety related data:		
B10 value with high demand rate acc. to SN 31920		1 000 000
Proportion of dangerous failures		
 with low demand rate acc. to SN 31920 	%	40
 with high demand rate acc. to SN 31920 	%	75
Failure rate [FIT] with low demand rate acc. to SN 31920	FIT	100
T1 value for proof test interval or service life acc. to IEC 61508	у	20
Protection against electrical shock		finger-safe

Size of contactor	S00
Communication/ Protocol:	
Product function Bus communication	No
Protocol is supported	
AS-interface protocol	No
Product function Control circuit interface with IO link	No

Ambient conditions:		
Installation altitude at height above sea level	m	2 000
maximum		
Ambient temperature		
during operation	°C	-25 +60
during storage	°C	-55 + 80

Mechanical data:

Certificates/ approvals:

General Product Approval

Declaration of Conformity

Test Certificates









Type Test Certificates/Test Report

Special Test Certificate

Shipping Approval

















Shipping Approval

other





Environmental Confirmations other

Further information

Information- and Downloadcenter (Catalogs, Brochures,...)

http://www.siemens.com/industrial-controls/catalogs

Industry Mall (Online ordering system)

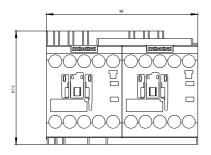
http://www.siemens.com/industrymall

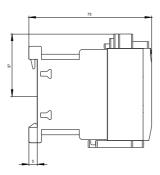
Cax online generator

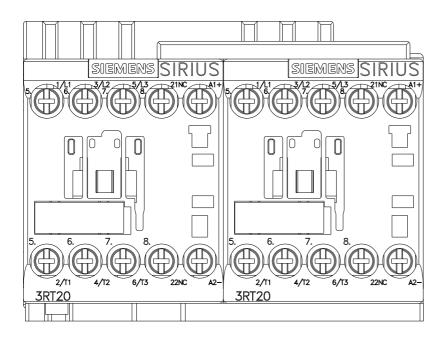
http://support.automation.siemens.com/WW/CAXorder/default.aspx?lang=en&mlfb=3RA23178XB301BB4

Service&Support (Manuals, Certificates, Characteristics, FAQs,...) http://support.automation.siemens.com/WW/view/en/3RA23178XB301BB4/all

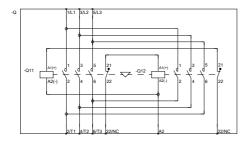
Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, EPLAN macros, ...) http://www.automation.siemens.com/bilddb/cax_de.aspx?mlfb=3RA23178XB301BB4&lang=en







WENDEKOMBINATION BGR. S00



REVERSING COMB. SZ S0

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