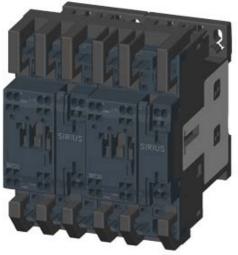
## SIEMENS

## Data sheet

## 3RA2327-8XB30-2AL2



REV. COMB., AC3, 15KW/400V AC230V, 50/60HZ, 3-POLE, SZ S0 SPRING-LOADED TERMINAL ELECTR. AND MECH. INTERLOCK 2NO INTEGR.

product brand name		SIRIUS
Product designation		star-delta (wye-delta) contactor assembly 3RA24
Manufacturer article number		
<ul> <li>1 of the supplied contactor</li> </ul>		3RT2027-2AL20
<ul> <li>2 of the supplied contactor</li> </ul>		<u>3RT2027-2AL20</u>
<ul> <li>of the supplied RH assembly kit</li> </ul>		3RA2923-2AA2
General technical data:		
Insulation voltage		
<ul> <li>with degree of pollution 3 Rated value</li> </ul>	V	690
Degree of pollution		3
Shock resistance		12.5g / 5 ms and 7.8g / 10 ms
Surge voltage resistance Rated value	kV	6
Mechanical service life (switching cycles)		
<ul> <li>of the contactor typical</li> </ul>		10 000 000

<ul> <li>of the contactor with added auxiliary switch block typical</li> </ul>	10 000 000
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	

<ul> <li>at AC-3 Rated value maximum</li> </ul>	V	690
Operating current	-	
• at AC-1		
— at 400 V at ambient temperature 40 °C	А	50
Rated value		
— at 400 V at ambient temperature 60 °C Rated value	А	45
• at AC-2 at 400 V Rated value	А	32
• at AC-3		
— at 400 V Rated value	А	32
• at AC-4 at 400 V Rated value	А	22
Operating current with 1 current path	-	
• at DC-1		
— at 24 V Rated value	А	35
— at 110 V Rated value	А	4.5
• at DC-3 at DC-5		
— at 24 V Rated value	А	20
— at 110 V Rated value	А	2.5
Operating current with 2 current paths in series	-	
• at DC-1		
— at 24 V Rated value	А	35
— at 110 V Rated value	А	35
• at DC-3 at DC-5		
— at 110 V Rated value	А	15
— at 24 V Rated value	А	35
Operating current with 3 current paths in series	-	
• at DC-1		
— at 24 V Rated value	А	35
— at 110 V Rated value	А	35
● at DC-3 at DC-5		
— at 110 V Rated value	А	35
— at 24 V Rated value	А	35
Operating power		
• at AC-2 at 400 V Rated value	kW	15
● at AC-4 at 400 V Rated value	kW	11
Operating power		
• at AC-3		
— at 400 V Rated value	kW	15
— at 500 V Rated value	kW	18.5
— at 690 V Rated value	kW	15
Operating frequency		
• at AC-3 maximum	1/h	1 000

No-load switching frequency	1/h	1 500
Control circuit/ Control:		
Type of voltage of the control supply voltage	_	AC
Control supply voltage 1 with AC	_	
● at 50 Hz Rated value	V	230
<ul> <li>at 60 Hz Rated value</li> </ul>	V	230
Operating range factor control supply voltage rated	_	
value of the magnet coil with AC		
• at 50 Hz		0.8 1.1
• at 60 Hz		0.8 1.1
Auxiliary circuit:		
Number of NC contacts		
<ul> <li>for auxiliary contacts</li> </ul>		
— per direction of rotation		0
— instantaneous contact		0
— lagging switching		0
Number of NO contacts	_	
<ul> <li>for auxiliary contacts</li> </ul>		
- per direction of rotation		0
— instantaneous contact		0
— leading contact		0
Product expansion Auxiliary switch		Yes
Operating current of the auxiliary contacts at AC-12 maximum	A	10
Operating current of the auxiliary contacts at AC-15	_	
• at 230 V	А	6
• at 400 V	А	3
Operating current of the auxiliary contacts at DC-13	_	
• at 24 V	А	10
• at 60 V	А	2
• at 110 V	А	1
• at 220 V	А	0.3
Contact reliability of the auxiliary contacts		< 1 error per 100 million operating cycles
UL/CSA ratings:		
Full-load current (FLA) for three-phase AC motor		
• at 480 V Rated value	А	27
• at 600 V Rated value	А	27
yielded mechanical performance [hp]		
<ul> <li>for single-phase AC motor at 110/120 V Rated value</li> </ul>	metric hp	2

		-		
<ul> <li>for single-phase AC motor at 230 V Rated value</li> </ul>	metric hp	5		
<ul> <li>for three-phase AC motor at 220/230 V Rated</li> </ul>	metric	10		
value	hp			
<ul> <li>for three-phase AC motor at 460/480 V Rated</li> </ul>	metric	20		
value	hp			
<ul> <li>for three-phase AC motor at 575/600 V Rated</li> </ul>	metric	25		
value	hp			
Contact rating of the auxiliary contacts acc. to UL		A600 / Q600		
Short-circuit:				
Design of the fuse link				
<ul> <li>for short-circuit protection of the main circuit</li> </ul>				
<ul> <li>— with type of assignment 1 required</li> </ul>		gL/gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 125 A		
<ul> <li>— with type of assignment 2 required</li> </ul>		gL/gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 50 A		
<ul> <li>for short-circuit protection of the auxiliary switch</li> </ul>		fuse gL/gG: 10 A		
required				
Installation/ mounting/ dimensions:				
mounting position		+/-180° rotation possible on vertical mounting		
		surface; can be tilted forward and backward by +/-		
	_	22.5° on vertical mounting surface		
Mounting type		screw and snap-on mounting onto 35 mm standard mounting rail		
Height	mm	114		
Width	mm	90		
Depth	mm	97		
Required spacing				
<ul> <li>with side-by-side mounting</li> </ul>				
— forwards	mm	6		
— Backwards	mm	0		
— upwards	mm	6		
— downwards	mm	6		
— at the side	mm	6		
<ul> <li>for grounded parts</li> </ul>				
— 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		spring-loaded terminals
<ul> <li>for auxiliary and control current circuit</li> </ul>		spring-loaded terminals
Type of connectable conductor cross-section	-	
for main contacts		
— single or multi-stranded		2x (1 10 mm²)
<ul> <li>— finely stranded with core end processing</li> </ul>		2x (1 6 mm <sup>2</sup> )
<ul> <li>— finely stranded with core end processing</li> <li>— finely stranded without core end</li> </ul>		2x (1 6 mm <sup>2</sup> )
processing		
<ul> <li>for AWG conductors for main contacts</li> </ul>		1x (18 8)
<ul> <li>for auxiliary contacts</li> </ul>		
— single or multi-stranded		2x (0,5 2,5 mm²)
<ul> <li>finely stranded with core end processing</li> </ul>		2x (0.5 1.5 mm²)
— finely stranded without core end		2x (0.5 1.5 mm²)
processing		
<ul> <li>for AWG conductors for auxiliary contacts</li> </ul>		2x (20 14)
Apparent pick-up power of the magnet coil with AC	-	
• at 50 Hz	V·A	77
Safety related data:		
B10 value with high demand rate acc. to SN 31920		1 000 000
Proportion of dangerous failures		
<ul> <li>with low demand rate acc. to SN 31920</li> </ul>	%	40
<ul> <li>with high demand rate acc. to SN 31920</li> </ul>	%	75
Failure rate [FIT] with low demand rate acc. to SN	FIT	100

Failure rate [FIT] with low demand rate acc. to SN 31920	FII	100
T1 value for proof test interval or service life acc. to IEC 61508	У	20
Protection against electrical shock		finger-safe
Mechanical data:		
Size of contactor		S0
Communication/ Protocol:		
Product function Bus communication		No
Protocol is supported		
<ul> <li>AS-interface protocol</li> </ul>		No
Product function Control circuit interface with IO link		No
Ambient conditions:		
Installation altitude at height above sea level	m	2 000
maximum		

Ambient temperat	ure					
<ul> <li>during operation</li> </ul>	ation		°C	-25 +60		
<ul> <li>during storage</li> </ul>	ge		°C	-55 +80		
Certificates/ appro	ovals:					
General Produ	uct Approval			Declaration of Conformity	Test Certificates	Shipping Approval
CSA		EHC		EG-Konf.	Special Test Certificate	ABS
Shipping Appr	roval					
B U R E A U VERITAS	DNV DNV	GL GL	ļ	Lloyd's Vegister LRS	PRS	RINA
Shipping Approval	other					
RMRS	Environmental Confirmations	<u>other</u>				

## Further information

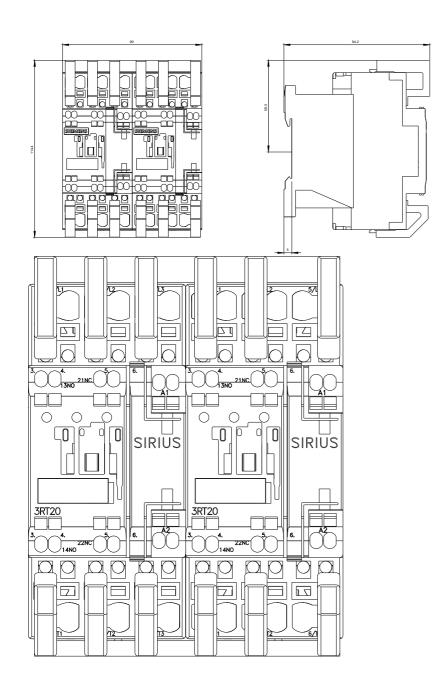
Information- and Downloadcenter (Catalogs, Brochures,...) http://www.siemens.com/industrial-controls/catalogs

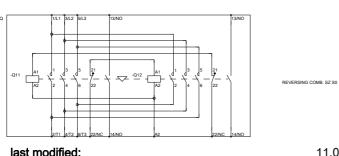
Industry Mall (Online ordering system) http://www.siemens.com/industrymall

Cax online generator http://support.automation.siemens.com/WW/CAXorder/default.aspx?lang=en&mlfb=3RA23278XB302AL2

Service&Support (Manuals, Certificates, Characteristics, FAQs,...) http://support.automation.siemens.com/WW/view/en/3RA23278XB302AL2/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=3RA23278XB302AL2&lang=en





WENDEKOMBINATION BGR. S0

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