3RA2318-8XB30-1AF0

Data sheet

product brand name

Reversing contactor assembly AC-3, 7.5 kW/400 V,AC110V,50/60Hz 3-pole, Size S00 screw terminal electrical and mechanical interlock



size of contactor product extension auxiliary switch shock resistance at rectangular impulse • at AC • at DC shock resistance with sine pulse • at AC • at DC shock resistance with sine pulse • at AC • at DC 11,4g / 5 ms, 7,3g / 10 ms 11,4g / 5 ms, 7,3g / 10 ms mechanical service life (switching cycles) • of contactor typical • of the contactor with added auxiliary switch block typical reference code according to IEC 81346-2 Substance Prohibitance (Date) Ambient conditions installation altitude at height above sea level maximum ambient temperature • during operation • during storage 500 7,3g / 5 ms, 4,7g / 10 ms 11,4g / 5 ms, 7,3g / 10 ms 10 000 000 10 000 000 10 000 000 10 000 00	product brand name	SIKIUS
manufacturer's article number 1 of the supplied contactor 2 of the supplied contactor 3RT2018-1AF02	product designation	Reversing contactor assembly
1 of the supplied contactor 2 of the supplied contactor 3 installation altitude at height above sea level maximum ambient conditions installation altitude at height above sea level maximum ambient conditions installation altitude at height above sea level maximum ambient of NO contacts for main contacts number of NO contacts for main contacts number of NO contacts for main contacts number of NO contacts for main contacts of the Sup Axa	product type designation	3RA23
of the supplied contactor of the supplied RH assembly kit 3RA2913-2AA1 Size of contactor product extension auxiliary switch shock resistance at rectangular impulse at AC at DC at AC-3 rated value at 4C-3 rated value at 4C-3 rated value at 4CO V rated value at 4CO-3	manufacturer's article number	
of the supplied RH assembly kit General technical data size of contactor product extension auxiliary switch shock resistance at rectangular impulse	 1 of the supplied contactor 	3RT2018-1AF02
Size of contactor product extension auxiliary switch shock resistance at rectangular impulse	 2 of the supplied contactor 	3RT2018-1AF02
Size of contactor S00	 of the supplied RH assembly kit 	3RA2913-2AA1
product extension auxiliary switch shock resistance at rectangular impulse • at AC • at DC shock resistance with sine pulse • at AC • at DC shock resistance with sine pulse • at AC • at DC • at DC 11,4g / 5 ms, 7,3g / 10 ms mechanical service life (switching cycles) • of contactor typical • of the contactor with added auxiliary switch block typical • of the contactor with added auxiliary switch block typical • of the contactor with added auxiliary switch block typical • of the contactor with added auxiliary switch block typical • of the contactor with added auxiliary switch block typical • of the contactor with added auxiliary switch block typical • of the contactor with added auxiliary switch block typical • of the contactor with added auxiliary switch block typical • of the contactor with added auxiliary switch block typical • of the contactor of the contact on the contact on typical and the contact on the contac	General technical data	
## at AC	size of contactor	S00
at AC at DC at AC at AC at AC at AC at AC at DC 11,4g / 5 ms, 7,3g / 10 ms at AC at DC 11,4g / 5 ms, 7,3g / 10 ms 10,000,000 a of the contactor vith added auxiliary switch block typical reference code according to IEC 81346-2 Q Substance Prohibitance (Date) 10/01/2009 Ambient conditions installation altitude at height above sea level maximum ambient temperature aduring operation aduring storage 40 during storage 40 during storage 40 during storage 40 during storage 40 during of NO contacts for main current circuit 3 number of NO contacts for main contacts 3 number of NC contacts for main contacts 40 operating voltage at AC-3 rated value maximum 690 V operational current at AC-3 at 400 V rated value at 690 V rated value at AC-3	product extension auxiliary switch	Yes
• at DC shock resistance with sine pulse • at AC • at DC • at DC mechanical service life (switching cycles) • of contactor typical • of the contactor with added auxiliary switch block typical reference code according to IEC 81346-2 Substance Prohibitance (Date) Ambient conditions installation altitude at height above sea level maximum ambient temperature • during operation • during storage during storage Ambient of NC contacts for main current circuit number of NC contacts for main contacts number of NC contacts for main contacts operating voltage at AC-3 rated value maximum • at 400 V rated value • at 690 V V rated value • at 690 V rated value	shock resistance at rectangular impulse	
shock resistance with sine pulse at AC at DC to at DC to at DC et at DC to contactor typical of contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical reference code according to IEC 81346-2 Question and titude at height above sea level maximum ambient conditions installation altitude at height above sea level maximum ambient temperature of during operation of during storage Alteria Scholars for main current circuit number of NC contacts for main contacts number of NC contacts for main contacts operating voltage at AC-3 rated value maximum at 400 V rated value at 400 V rated value at 690 V value at 690 V value at 690 V value at 690 V rated value	• at AC	7,3g / 5 ms, 4,7g / 10 ms
at AC at DC	• at DC	7.3g / 5 ms, 4.7g / 10 ms
* at DC mechanical service life (switching cycles) * of contactor typical * of the contactor with added auxiliary switch block typical reference code according to IEC 81346-2 Substance Prohibitance (Date) Ambient conditions installation altitude at height above sea level maximum * during operation * ouring operation * ouring storage Ambient of NO contacts for main current circuit number of NO contacts for main contacts number of NC contacts for main contacts operating voltage at AC-3 rated value maximum ** at 400 V rated value ** at 690 V rated value	shock resistance with sine pulse	
mechanical service life (switching cycles) of contactor typical of the contactor with added auxiliary switch block typical reference code according to IEC 81346-2 Substance Prohibitance (Date) Ambient conditions installation altitude at height above sea level maximum ambient temperature of during operation during storage -25 +60 °C -55 +80 °C Main circuit number of poles for main current circuit number of NO contacts for main contacts operating voltage at AC-3 rated value maximum of at 400 V rated value at 690 V rated value of the contacts of the contact of	• at AC	11,4g / 5 ms, 7,3g / 10 ms
of contactor typical of the contactor with added auxiliary switch block typical reference code according to IEC 81346-2 Q Substance Prohibitance (Date) Ambient conditions installation altitude at height above sea level maximum ambient temperature oduring operation during storage Auing storage Main circuit number of poles for main current circuit number of NC contacts for main contacts operating voltage at AC-3 rated value maximum at 500 V rated value at 500 V rated value at 690 V rated value operating power at AC-3 operating power at AC-3	at DC	11,4g / 5 ms, 7,3g / 10 ms
of the contactor with added auxiliary switch block typical reference code according to IEC 81346-2 Substance Prohibitance (Date) Ambient conditions installation altitude at height above sea level maximum ambient temperature ouring operation ouring storage Auring storage Auring storage Auring contacts for main current circuit number of NO contacts for main contacts number of NC contacts for main contacts operating voltage at AC-3 rated value maximum operational current at AC-3 at 400 V rated value at 500 V rated value at 690 V rated	mechanical service life (switching cycles)	
reference code according to IEC 81346-2 Q Substance Prohibitance (Date) 10/01/2009 Ambient conditions installation altitude at height above sea level maximum 2 000 m ambient temperature	 of contactor typical 	10 000 000
Substance Prohibitance (Date) Ambient conditions installation altitude at height above sea level maximum ambient temperature • during operation • during storage • during storage -25 +60 °C • during storage -55 +80 °C Main circuit number of poles for main current circuit 3 number of NO contacts for main contacts 3 number of NC contacts for main contacts 0 operating voltage at AC-3 rated value maximum 690 V operational current at AC-3 • at 400 V rated value • at 500 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at AC-3		10 000 000
installation altitude at height above sea level maximum ambient temperature • during operation • during storage -25 +60 °C -55 +80 °C Main circuit number of poles for main current circuit number of NO contacts for main contacts 3 number of NC contacts for main contacts 0 operating voltage at AC-3 rated value maximum 690 V operational current at AC-3 • at 400 V rated value • at 500 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value	reference code according to IEC 81346-2	Q
installation altitude at height above sea level maximum ambient temperature • during operation • during storage -25 +60 °C • during storage -55 +80 °C Main circuit number of poles for main current circuit number of NO contacts for main contacts number of NC contacts for main contacts operating voltage at AC-3 rated value maximum operational current at AC-3 • at 400 V rated value • at 500 V rated value • at 690 V rated value • at AC-3	Substance Prohibitance (Date)	10/01/2009
ambient temperature	Ambient conditions	
 during operation during storage -25 +80 °C Main circuit number of poles for main current circuit number of NO contacts for main contacts number of NC contacts for main contacts operating voltage at AC-3 rated value maximum operational current at AC-3 at 400 V rated value at 500 V rated value at 690 V operating power at AC-3 operating power at AC-3 	installation altitude at height above sea level maximum	2 000 m
 during storage -55 +80 °C Main circuit number of poles for main current circuit number of NO contacts for main contacts number of NC contacts for main contacts operating voltage at AC-3 rated value maximum operational current at AC-3 at 400 V rated value at 500 V rated value at 690 V rated value at 690 V rated value at 690 V rated value at AC-3 	ambient temperature	
number of poles for main current circuit number of NO contacts for main contacts number of NC contacts for main contacts operating voltage at AC-3 rated value maximum operational current at AC-3 • at 400 V rated value • at 500 V rated value • at 690 V rated value • at 690 V rated value • at 690 V rated value • at AC-3	 during operation 	-25 +60 °C
number of poles for main current circuit 3 number of NO contacts for main contacts 3 number of NC contacts for main contacts 0 operating voltage at AC-3 rated value maximum 690 V operational current at AC-3 • at 400 V rated value • at 500 V rated value • at 690 V rated value 8.9 A operating power • at AC-3	 during storage 	-55 +80 °C
number of NO contacts for main contacts number of NC contacts for main contacts operating voltage at AC-3 rated value maximum operational current at AC-3 • at 400 V rated value • at 500 V rated value • at 690 V rated value • at 690 V rated value • at AC-3	Main circuit	
number of NC contacts for main contacts operating voltage at AC-3 rated value maximum operational current at AC-3 • at 400 V rated value • at 500 V rated value • at 690 V rated value • at 690 V rated value • at AC-3	number of poles for main current circuit	3
operating voltage at AC-3 rated value maximum operational current at AC-3 • at 400 V rated value • at 500 V rated value • at 690 V rated value • at 690 V rated value • at AC-3	number of NO contacts for main contacts	3
operational current at AC-3 • at 400 V rated value • at 500 V rated value • at 690 V rated value • at AC-3 operating power • at AC-3	number of NC contacts for main contacts	0
 at 400 V rated value at 500 V rated value at 690 V rated value at AC-3 	operating voltage at AC-3 rated value maximum	690 V
 at 500 V rated value at 690 V rated value at AC-3 12.4 A 8.9 A 	operational current at AC-3	
• at 690 V rated value operating power • at AC-3	• at 400 V rated value	16 A
operating power • at AC-3	• at 500 V rated value	12.4 A
• at AC-3	at 690 V rated value	8.9 A
	operating power	
— at 400 V rated value 7.5 kW	• at AC-3	
	— at 400 V rated value	7.5 kW
	— at 400 V rated value	7.5 kW

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— at 500 V rated value	7.5 kW
— at 690 V rated value	7.5 kW
at AC-4 at 400 V rated value	5.5 kW
operating frequency at AC-3 maximum	750 1/h
Control circuit/ Control	
type of voltage of the control supply voltage	AC
control supply voltage 1 at AC	
 at 50 Hz rated value 	110 V
at 60 Hz rated value	110 V
operating range factor control supply voltage rated value of magnet coil at AC	
● at 50 Hz	0.8 1.1
● at 60 Hz	0.85 1.1
apparent pick-up power of magnet coil at AC	
● at 50 Hz	37 VA
inductive power factor with closing power of the coil	
● at 50 Hz	0.8
apparent holding power of magnet coil at AC	
• at 50 Hz	5.7 VA
inductive power factor with the holding power of the coil	
● at 50 Hz	0.28
Auxiliary circuit	
contact reliability of auxiliary contacts	< 1 error per 100 million operating cycles
UL/CSA ratings	
full-load current (FLA) for 3-phase AC motor	
at 480 V rated value	14 A
at 600 V rated value	11 A
yielded mechanical performance [hp] for 3-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
 at 575/600 V rated value 	10 hp
contact rating of auxiliary contacts according to UL	A600 / Q600
Short-circuit protection	
design of the fuse link	
for short-circuit protection of the main circuit	
— with type of coordination 1 required	gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 50 A
with type of assignment 2 required	gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 25 A
for short-circuit protection of the auxiliary switch	fuse gG: 10 A
required	35
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
fastening method	screw and snap-on mounting onto 35 mm standard mounting rail
height	68 mm
width	90 mm
depth	73 mm
required spacing	
with side-by-side mounting	
— forwards	6 mm
— backwards	0 mm
— upwards	6 mm
— downwards	6 mm
— at the side	6 mm
for grounded parts	
— forwards	6 mm
— backwards	0 mm
— upwards	6 mm
·	6 mm
— at the side	

— downwards	6 mm
for live parts	Ollilli
— forwards	6 mm
— backwards	0 mm
— upwards	6 mm
— downwards	6 mm
— at the side	6 mm
Connections/ Terminals	O THILL
type of electrical connection	
for main current circuit	screw-type terminals
for auxiliary and control circuit	screw-type terminals
at contactor for auxiliary contacts	Screw-type terminals
of magnet coil	Screw-type terminals
type of connectable conductor cross-sections	or the comment
• for main contacts	
— solid	2x (0.5 1.5 mm²), 2x (0.75 2.5 mm²), 2x 4 mm²
— solid or 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)
at AWG cables for main contacts	2x (20 16), 2x (18 14)
type of connectable conductor cross-sections	
for auxiliary contacts	
— solid or 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)
 at AWG cables for auxiliary contacts 	2x (20 16), 2x (18 14)
Safety related data	
B10 value with high demand rate according to SN 31920	1 000 000
proportion of dangerous failures	
 with low demand rate according to SN 31920 	40 %
 with high demand rate according to SN 31920 	75 %
failure rate [FIT] with low demand rate according to SN 31920	100 FIT
T1 value for proof test interval or service life according to IEC 61508	20 y
protection class IP on the front according to IEC 60529	IP20
touch protection on the front according to IEC 60529	finger-safe, for vertical contact from the front
Communication/ Protocol	
product function bus communication	Yes
protocol is supported AS-Interface protocol	No
product function control circuit interface with IO link	No
Certificates/ approvals	

General Product Approval

Declaration of Conformity



Confirmation









Test Certificates

Marine / Shipping

Type Test Certificates/Test Report

Special Test Certificate









Marine / Shipping other Railway







Further information

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

https://www.siemens.com/ic10

Industry Mall (Online ordering system)

https://mall.industry.siemens.com/mall/en/en/Catalog/product?mlfb=3RA2318-8XB30-1AF0

Cax online generator

 $\underline{\text{http://support.automation.siemens.com/WW/CAXorder/default.aspx?lang=en\&mlfb=3RA2318-8XB30-1AF0}$

Service&Support (Manuals, Certificates, Characteristics, FAQs,...)

https://support.industry.siemens.com/cs/ww/en/ps/3RA2318-8XB30-1AF0

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

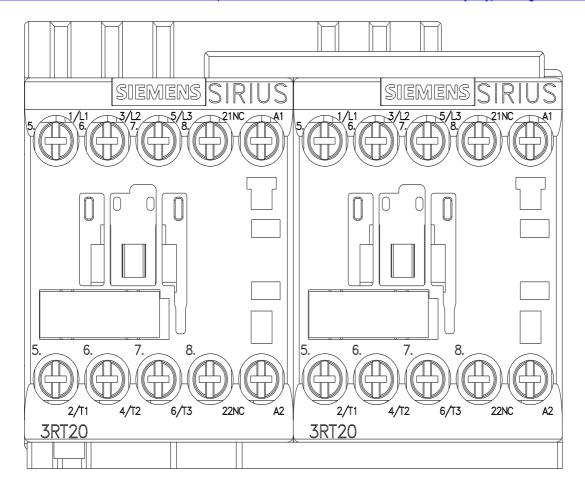
http://www.automation.siemens.com/bilddb/cax_de.aspx?mlfb=3RA2318-8XB30-1AF0&lang=en

Characteristic: Tripping characteristics, I2t, Let-through current

https://support.industry.siemens.com/cs/ww/en/ps/3RA2318-8XB30-1AF0/char

Further characteristics (e.g. electrical endurance, switching frequency)

http://www.automation.siemens.com/bilddb/index.aspx?view=Search&mlfb=3RA2318-8XB30-1AF0&objecttype=14&gridview=view1



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