SIEMENS

Data sheet

3RA2324-8XB30-1AP6



reversing contactor assembly, AC-3e/AC-3, 12 A, 5.5 kW / 400 V, 3-pole, 220 V AC, 50 Hz / 240 V, 60 Hz, screw terminal, electrical and mechanical interlock, auxiliary contacts: 2 x 1 NO

product brand name	SIRIUS		
product designation	Reversing contactor assembly		
product type designation	3RA23		
manufacturer's article number			
 1 of the supplied contactor 	<u>3RT2024-1AP60</u>		
 2 of the supplied contactor 	<u>3RT2024-1AP60</u>		
 of the supplied RH assembly kit 	<u>3RA2923-2AA1</u>		
General technical data			
size of contactor	SO		
product extension auxiliary switch	Yes		
shock resistance at rectangular impulse			
• at AC	7,5g / 5 ms, 4,7g / 10 ms		
• at DC	10g / 5 ms, 7,5g / 10 ms		
shock resistance with sine pulse			
• at AC	11,8g / 5 ms, 7,4g / 10 ms		
• at DC	15g / 5 ms, 10g / 10 ms		
mechanical service life (operating cycles)			
 of contactor typical 	10 000 000		
 of the contactor with added auxiliary switch block typical 	10 000 000		
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			
during operation	-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			
oporating voltage			
at AC-3 rated value maximum	690 V		
	690 V 690 V		
• at AC-3 rated value maximum			
at AC-3 rated value maximumat AC-3e rated value maximum			
at AC-3 rated value maximum at AC-3e rated value maximum operational current			
at AC-3 rated value maximum at AC-3e rated value maximum operational current at AC-3	690 V		
at AC-3 rated value maximum at AC-3e rated value maximum operational current at AC-3 — at 400 V rated value	690 V 12 A		
at AC-3 rated value maximum at AC-3e rated value maximum operational current at AC-3 — at 400 V rated value — at 500 V rated value	690 V 12 A 12 A		

— at 500 V rated value	12 A
— at 690 V rated value	9 A
operating power	
• at AC-3	
— at 400 V rated value	5.5 kW
— at 500 V rated value	5.5 kW
— at 690 V rated value	7.5 kW
• at AC-3e	
— at 400 V rated value	5.5 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	1 000 1/h
• at AC-3e maximum	1 000 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	220 V
at 60 Hz rated value	240 V
operating range factor control supply voltage rated value of	
magnet coil at AC	
• at 50 Hz	0.8 1.1
• at 60 Hz	0.8 1.1
apparent pick-up power of magnet coil at AC	
• at 50 Hz	65 VA
inductive power factor with closing power of the coil	
• at 50 Hz	0.82
apparent holding power of magnet coil at AC	0.02
• at 50 Hz	8.5 VA
inductive power factor with the holding power of the coil	0.5 1
at 50 Hz	0.25
	0.25
Auxiliary circuit	
Auxiliary circuit number of NO contacts for auxiliary contacts	
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation	1
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact	1 2
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts	1
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings	1 2
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor	1 2 < 1 error per 100 million operating cycles
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value	1 2 < 1 error per 100 million operating cycles 11 A
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value	1 2 < 1 error per 100 million operating cycles
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor	1 2 < 1 error per 100 million operating cycles 11 A 11 A
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value	1 2 < 1 error per 100 million operating cycles 11 A 11 A 3 hp
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor	1 2 < 1 error per 100 million operating cycles 11 A 11 A
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value	1 2 < 1 error per 100 million operating cycles 11 A 11 A 3 hp
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value	1 2 < 1 error per 100 million operating cycles 11 A 11 A 11 A 3 hp 7.5 hp
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value • at 575/600 V rated value	1 2 < 1 error per 100 million operating cycles 11 A 11 A 3 hp 7.5 hp 10 hp
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value • at 575/600 V rated value • at 575/600 V rated value	1 2 < 1 error per 100 million operating cycles 11 A 11 A 3 hp 7.5 hp 10 hp
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value vielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection	1 2 < 1 error per 100 million operating cycles 11 A 11 A 3 hp 7.5 hp 10 hp
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection design of the fuse link	1 2 < 1 error per 100 million operating cycles 11 A 11 A 3 hp 7.5 hp 10 hp
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection design of the fuse link • for short-circuit protection of the main circuit	1 2 < 1 error per 100 million operating cycles 11 A 11 A 11 A 3 hp 7.5 hp 10 hp A600 / Q600
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection design of the fuse link • for short-circuit protection of the main circuit — with type of coordination 1 required	1 2 < 1 error per 100 million operating cycles 11 A 11 A 11 A 3 hp 7.5 hp 10 hp A600 / Q600 gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 63 A
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value • at 600 V rated value • at 480 V rated value • at 480 V rated value • at 460/480 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection design of the fuse link • for short-circuit protection of the main circuit — with type of coordination 1 required — with type of assignment 2 required	1 2 < 1 error per 100 million operating cycles 11 A 11 A 11 A 3 hp 7.5 hp 10 hp A600 / Q600 gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 63 A gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 25 A
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value • at 600 V rated value • at 480 V rated value • at 600 V rated value • at 460/480 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection design of the fuse link • for short-circuit protection of the main circuit — with type of coordination 1 required — with type of assignment 2 required • for short-circuit protection of the auxiliary switch required	1 2 < 1 error per 100 million operating cycles 11 A 11 A 11 A 3 hp 7.5 hp 10 hp A600 / Q600 gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 63 A gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 25 A
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection design of the fuse link • for short-circuit protection of the main circuit — with type of coordination 1 required — with type of assignment 2 required • for short-circuit protection of the auxiliary switch required	1 2 < 1 error per 100 million operating cycles 11 A 11 A 11 A 3 hp 7.5 hp 10 hp A600 / Q600 gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 63 A gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 25 A fuse gG: 10 A +/-180° rotation possible on vertical mounting surface; can be tilted forward and
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value vielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection design of the fuse link • for short-circuit protection of the main circuit — with type of coordination 1 required — with type of assignment 2 required • for short-circuit protection of the auxiliary switch required Installation/ mounting/ dimensions mounting position	1 2 < 1 error per 100 million operating cycles 11 A 11 A 11 A 3 hp 7.5 hp 10 hp A600 / Q600
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection design of the fuse link • for short-circuit protection of the main circuit — with type of coordination 1 required — with type of assignment 2 required • for short-circuit protection of the auxiliary switch required Installation/ mounting/ dimensions mounting position	1 2 < 1 error per 100 million operating cycles 11 A 11 A 11 A 3 hp 7.5 hp 10 hp A600 / Q600 gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 63 A gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 25 A fuse gG: 10 A +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm DIN rail
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value • at 575/600 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection design of the fuse link • for short-circuit protection of the main circuit — with type of coordination 1 required — with type of assignment 2 required • for short-circuit protection of the auxiliary switch required Installation/ mounting/ dimensions mounting position fastening method height width	1 2 < 1 error per 100 million operating cycles 11 A 11 A 11 A 3 hp 7.5 hp 10 hp A600 / Q600 gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 63 A gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 25 A fuse gG: 10 A +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm DIN rail 101 mm
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection design of the fuse link • for short-circuit protection of the main circuit — with type of coordination 1 required — with type of assignment 2 required • for short-circuit protection of the auxiliary switch required Installation/ mounting/ dimensions mounting position fastening method height width depth	1 2 1 error per 100 million operating cycles 11 A 11 A 11 A 11 A 3 hp 7.5 hp 10 hp A600 / Q600 gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 63 A gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 25 A fuse gG: 10 A +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm DIN rail 101 mm 90 mm
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value • at 460/480 V rated value • at 460/480 V rated value • at 575/600 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection design of the fuse link • for short-circuit protection of the main circuit — with type of coordination 1 required — with type of assignment 2 required • for short-circuit protection of the auxiliary switch required Installation/ mounting/ dimensions mounting position fastening method height width depth required spacing	1 2 1 error per 100 million operating cycles 11 A 11 A 11 A 11 A 3 hp 7.5 hp 10 hp A600 / Q600 gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 63 A gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 25 A fuse gG: 10 A +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm DIN rail 101 mm 90 mm
Auxiliary circuit number of NO contacts for auxiliary contacts • per direction of rotation • instantaneous contact contact reliability of auxiliary contacts UL/CSA ratings full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value yielded mechanical performance [hp] for 3-phase AC motor • at 220/230 V rated value • at 460/480 V rated value • at 575/600 V rated value contact rating of auxiliary contacts according to UL Short-circuit protection design of the fuse link • for short-circuit protection of the main circuit — with type of coordination 1 required — with type of assignment 2 required • for short-circuit protection of the auxiliary switch required Installation/ mounting/ dimensions mounting position fastening method height width depth	1 2 < 1 error per 100 million operating cycles 11 A 11 A 11 A 3 hp 7.5 hp 10 hp A600 / Q600 gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 63 A gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 25 A fuse gG: 10 A +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm DIN rail 101 mm 90 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	
— at the side	6 mm	
— downwards	6 mm	
 for live parts 		
— forwards	6 mm	
— backwards	0 mm	
— upwards	6 mm	
— downwards	6 mm	
— at the side	6 mm	
Connections/ Terminals		
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 for main contacts		
• solid	2x (1 2.5 mm²), 2x (2.5 10 mm²)	
 solid or 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	
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)	
 for 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 a	
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	Test Certificates
		Special Test Certific- ate
Marine / Shipping		
	Lloyds LRS PRS	RINA

7/10/2023

Subject to change without notice © Copyright Siemens other



Confirmation Vibration and Shock

Further information

Siemens has decided to exit the Russian market (see here).

https://press.siemens.com/global/en/pressrelease/siemens-wind-down-russian-business

Siemens is working on the renewal of the current EAC certificates.

Please contact your local Siemens office on the status of validity of the EAC certification if you intend to import or offer to supply these products to an EAC relevant market (other than the sanctioned EAEU member states Russia or Belarus).

Information on the packaging

https://support.industry.siemens.com/cs/ww/en/view/109813875

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=3RA2324-8XB30-1AP6

Cax online generator

 $\underline{http://support.automation.siemens.com/WW/CAX order/default.aspx?lang=en\&mlfb=3RA2324-8XB30-1AP6$

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

https://support.industry.siemens.com/cs/ww/en/ps/3RA2324-8XB30-1AP6

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

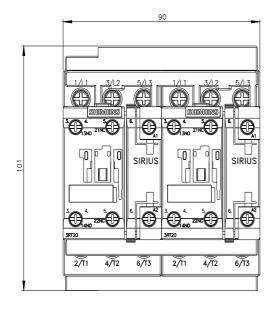
http://www.automation.siemens.com/bilddb/cax_de.aspx?mlfb=3RA2324-8XB30-1AP6&lang=en

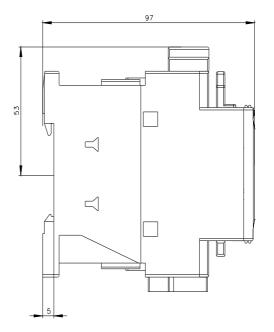
Characteristic: Tripping characteristics, I²t, Let-through current

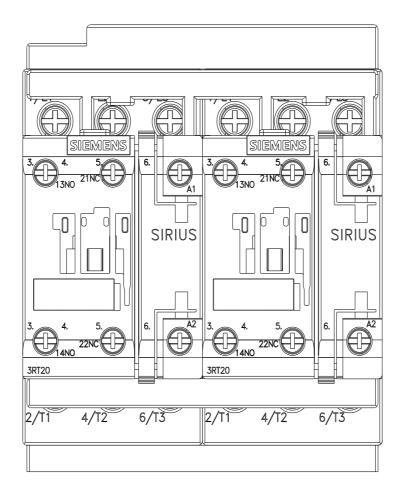
https://support.industry.siemens.com/cs/ww/en/ps/3RA2324-8XB30-1AP6/char

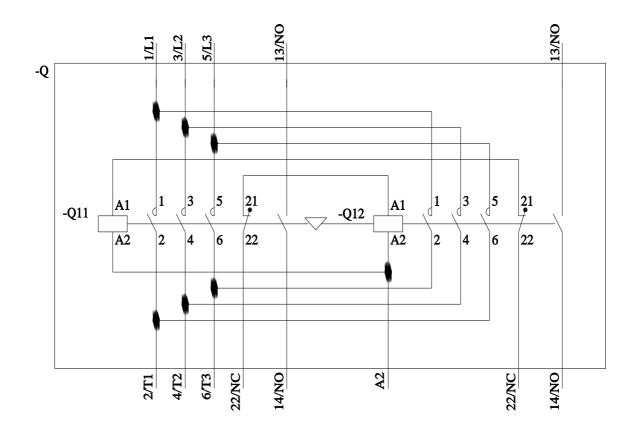
Further characteristics (e.g. electrical endurance, switching frequency)

http://www.automation.siemens.com/bilddb/index.aspx?view=Search&mlfb=3RA2324-8XB30-1AP6&objecttype=14&gridview=view1









last modified:

11/21/2022 🖸