Product data sheet



COUPLING CONTACTOR RELAY, 2NO+2NC, DC 24V, 0.85..1.85*US, SZ S00, SPRING-LOADED TERMINAL

General technical data:				
Product brand name		SIRIUS		
Size of the contactor		S00		
Identification number and letter for switching elements		22 E		
Product extension / auxiliary switch		No		
Protection class IP / on the front		IP20		
Protection against electrical shock		finger-safe		
Degree of pollution		3		
Insulation voltage / with degree of pollution 3 / rated value	V	690		
Installation altitude / at a height over sea level / maximum	m	2,000		
Ambient temperature / during storage	°C	-55 80		
Ambient temperature / during operating	°C	-25 40		
Shock resistance				
at rectangular impulse				
• at DC		10g / 5 ms, 5g / 10 ms		
at sine pulse				
• at DC		15g / 5 ms, 8g / 10 ms		
Impulse voltage resistance / rated value	kV	6		
Mechanical operating cycles as operating time				
of the contactor / typical		30,000,000		

Control circuit:		
Type of voltage / of the controlled supply voltage		DC
Control supply voltage / 1		
• for DC / rated value	V	24
Operating range factor control supply voltage rated value / of the solenoid		
• for DC		0.85 2.15
Holding power / of the solenoid / for DC	W	1.6
Pull-in power / of the solenoid / for DC	W	1.6
Closing delay		
• at DC	ms	30 100
Opening delay		
• at DC	ms	25 90
Arcing time	S	10 15

Auxiliary circuit:		
Contact reliability / of the auxiliary contacts		1 faulty switching per 100 million (17 V, 1 mA)
Number of NC contacts / for auxiliary contacts / instantaneous switching		2
Number of NO contacts / for auxiliary contacts / instantaneous switching		2
Operating current / of the auxiliary contacts / at AC-12 / maximum	Α	10
Operating current / of the auxiliary contacts / at AC-15		
• at 230 V	Α	6
• at 400 V	Α	3
• at 500 V	Α	2
• at 690 V	Α	1
Operating current		
• of the auxiliary contacts / with 1 current path / at DC-12		
• at 24 V	Α	6
• at 110 V	Α	3
• at 220 V	Α	1
• with 2 current paths in series / at DC-12		
• at 24 V / rated value	Α	10
• at 60 V / rated value	Α	10
• at 110 V / rated value	Α	4
• at 220 V / rated value	Α	2
• at 440 V / rated value	Α	1.3
• at 600 V / rated value	Α	0.65
• with 3 current paths in series / at DC-12		

• at 24 V / rated value	Α	10
• at 60 V / rated value	Α	10
• at 110 V / rated value	Α	10
• at 220 V / rated value	Α	3.6
• at 440 V / rated value	Α	2.5
• at 600 V / rated value	Α	1.8
Operating current		
• of the auxiliary contacts / with 1 current path / at DC-13		
• at 24 V	Α	6
• at 110 V	Α	1
• at 220 V	Α	0.3
• with 2 current paths in series / at DC-13		
• at 24 V / rated value	Α	10
• at 60 V / rated value	Α	3.5
• at 110 V / rated value	Α	1.3
• at 220 V / rated value	Α	0.9
• at 440 V / rated value	Α	0.2
• at 600 V / rated value	Α	0.1
 with 3 current paths in series / at DC-13 		
• at 24 V / rated value	Α	10
• at 60 V / rated value	Α	4.7
• at 110 V / rated value	Α	3
• at 220 V / rated value	Α	1.2
• at 440 V / rated value	Α	0.5
• at 600 V / rated value	Α	0.26
Off-load operating frequency		
• at AC	1/h	10,000
• at DC	1/h	10,000
Frequency of operation		
• at AC-12 / maximum	1/h	1,000
• at AC-14 / maximum	1/h	1,000
• at AC-15 / maximum	1/h	1,000
• at DC-12 / maximum	1/h	1,000
• at DC-13 / maximum	1/h	1,000
Short-circuit		

Short-circuit:	
Design of the fuse link / for short-circuit protection of the auxiliary switch	
• required	Fuse gL/gG: 10 A, miniature circuit breaker C 6 A (short-circuit current lk < 400 A)

Installation/mounting/dimensions:			
Built in orientation		vertical	
Type of mounting		screw and snap-on mounting onto 35 mm standard mounting rail	
Width	mm	45	
Height	mm	70	
Depth	mm	73	
Distance, to be maintained, to the ranks assembly / sidewards	mm	0	

Connections:	
Design of the electrical connection	
for auxiliary and control current circuit	spring-loaded terminals
Type of the connectable conductor cross-section	
for auxiliary contacts	
• solid	2x (0.5 4 mm²)
• finely stranded	
 with conductor end processing 	2x (0.5 2.5 mm²)
 without conductor final cutting 	2x (0.5 2.5 mm²)
• for AWG conductors / for auxiliary contacts	2x (20 12)

Certificates/approvals:

General Product Approval







ROSTEST



Manufacturer

Shipping Approval













Shipping Approval







UL/CSA ratings:				
Contact rating designation / for auxiliary contacts / according to UL		A600 / Q600		
Safety:related Parameter:				
B10 value / with high demand rate				
• according to SN 31920		1,000,000		
T1 value / for proof test interval or service life				

according to IEC 61508	а	10
Proportion of dangerous failures		
• with low demand rate / according to SN 31920	%	40
• with high demand rate / according to SN 31920	%	73
Failure rate (FIT value) / with low demand rate		
according to SN 31920	FIT	100
Product function / positively driven operation to IEC 60947-5-1		Yes

Further information:

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

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

Industry Mall (Online ordering system)

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

Cax online generator:

http://www.siemens.com/cax

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

http://support.automation.siemens.com/WW/view/en/3RH2122-2MB40-0KT0/all

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

 $\underline{\text{http://www.automation.siemens.com/bilddb/cax_en.aspx?mlfb=3RH2122-2MB40-0KT0}}$



