

CONTACTOR, 90KW/400V/AC-3,
AC(40...60HZ)/DC OPERATION UC 200...277V
AUX.CONT.2NO+2NC SOLID-ST.COMP. 3-POLE,
SIZE S6 BAR CONNECTIONS ELECTRONIC OPERATING
MECHANISM WITH 24V DC PLC INTERFACE

General technical data:

product brand name		SIRIUS
Size of the contactor		S6
Protection class IP / on the front		IP00
Degree of pollution		3
Installation altitude / at a height over sea level / maximum	m	2,000
Ambient temperature / during operating	°C	-25 ... +60
Mechanical operating cycles as operating time		
• of the contactor / typical		10,000,000
• of the contactor with added auxiliary switch block / typical		10,000,000
• of the contactor with added electronics-compatible auxiliary switch block / typical		5,000,000

Main circuit:

Number of NC contacts / for main contacts		0
Number of NO contacts / for main contacts		3
Operational current		
• at AC-1 / at 400 V		
• at 40 °C ambient temperature / rated value	A	215
• at 60 °C ambient temperature / rated value	A	185
• at AC-3 / at 400 V / rated value	A	185
• at AC-4 / at 400 V / rated value	A	160
• with 1 current path / at DC-1		
• at 24 V / rated value	A	160
• at 110 V / rated value	A	18
• with 2 current paths in series / at DC-1		
• at 24 V / rated value	A	160
• at 110 V / rated value	A	160
• with 3 current paths in series / at DC-1		
• at 24 V / rated value	A	160
• at 110 V / rated value	A	160

<ul style="list-style-type: none"> • with 1 current path / at DC-3 / at DC-5 <ul style="list-style-type: none"> • at 24 V / rated value • at 110 V / rated value • with 2 current paths in series / at DC-3 / at DC-5 <ul style="list-style-type: none"> • at 24 V / rated value • at 110 V / rated value • with 3 current paths in series / at DC-3 / at DC-5 <ul style="list-style-type: none"> • at 24 V / rated value • at 110 V / rated value 	A	160
	A	2.5
	A	160
	A	160
	A	160
	A	160
Service power		
<ul style="list-style-type: none"> • at AC-2 / at 400 V / rated value 	kW	104
<ul style="list-style-type: none"> • at AC-3 / at 400 V / rated value 	kW	104
<ul style="list-style-type: none"> • at AC-4 / at 400 V / rated value 	W	90,000

Control circuit:		
Design of the surge suppressor		with varistor
Type of voltage / of the controlled supply voltage		AC/DC
Operating range factor control supply voltage rated value / of the magnet coil		
<ul style="list-style-type: none"> • at 50 Hz <ul style="list-style-type: none"> • for AC • at 60 Hz <ul style="list-style-type: none"> • for AC • for DC 		0.8 ... 1.1
		0.8 ... 1.1
		0.8 ... 1.1
Apparent pull-in power / of the solenoid / for AC	V·A	280
Apparent holding power / of the solenoid / for AC	V·A	4.4
Inductive power factor / with the pull-in power of the coil		0.8
Inductive power factor / with the pull-in power of the coil		0.4
Pull-in power / of the solenoid / for DC	W	320
Holding power / of the solenoid / for DC	W	2.8

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		
<ul style="list-style-type: none"> • at AC-12 / maximum 	A	10
<ul style="list-style-type: none"> • at AC-15 • at 230 V 	A	6

- at 400 V
- at DC-12
 - at 60 V
 - at 110 V
 - at 220 V
- at DC-13
 - at 24 V
 - at 60 V
 - at 110 V
 - at 220 V

A	3
A	6
A	3
A	1
A	10
A	2
A	1
A	0.3

Short-circuit:

Design of the fuse link

- for short-circuit protection of the auxiliary switch / required
- for short-circuit protection of the main circuit
 - with type of assignment 1 / required
 - at type of coordination 2 / required

fuse gL/gG: 10 A

fuse gL/gG: 355 A

fuse gL/gG: 315 A

Installation/mounting/dimensions:

Type of mounting

screw fixing

series installation

Yes

Width

mm 120

Height

mm 172

Depth

mm 180

Distance, to be maintained, to earthed part / sideways

mm 10

Connection type:

Design of the electrical connection

- for main current circuit
- for auxiliary and control current circuit

screw-type terminals

screw-type terminals

Type of the connectable conductor cross-section

- for AWG conductors / for main contacts
- for auxiliary contacts
 - solid
 - finely stranded
 - with conductor end processing
- for AWG conductors / for auxiliary contacts









4 ... 250 kcmil

2x (0.5 ... 1.5 mm²), 2x (0.75 ... 2.5 mm²), max. 2x (0.75 ... 4 mm²)

2x (0.5 ... 1.5 mm²), 2x (0.75 ... 2.5 mm²)

2x (20 ... 16), 2x (18 ... 14), 1x 12

Certificates/approvals:

General Product Approval				Functional Safety / Safety of Machinery	Declaration of Conformity					
 CCC	 CSA	 GOST	 UL	Type Examination	 EG-Konf.					
Test Certificates		Shipping Approval								
Special Test Certificate		 ABS	 GL	 RMRS						
other										
Confirmation		other	Environmental Confirmations							
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/3RT1056-6NP38-0PA5/all										
Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, ...) http://www.automation.siemens.com/bilddb/cax_en.aspx?mlfb=3RT1056-6NP38-0PA5										

last change:

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