



CONTACTOR, AC-1 140 A / 400 V,
AC 230 V, 50/60 HZ, 3-POLE, SIZE S3,
SCREW CONNECTION

General technical data:		
product brand name		SIRIUS
Size of the contactor		S3
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
Operating current		
• at AC-1 / at 400 V		
• at 40 °C ambient temperature / rated value	A	140
• at AC-3 / at 400 V / rated value	A	44
• with 1 current path / at DC-1		

• at 24 V / rated value	A	130
• at 110 V / rated value	A	12
• with 2 current paths in series / at DC-1		
• at 24 V / rated value	A	130
• at 110 V / rated value	A	130
• with 3 current paths in series / at DC-1		
• at 24 V / rated value	A	130
• at 110 V / rated value	A	130
• with 1 current path / at DC-3 / at DC-5		
• at 24 V / rated value	A	6
• at 110 V / rated value	A	1.25
• with 2 current paths in series / at DC-3 / at DC-5		
• at 24 V / rated value	A	130
• at 110 V / rated value	A	130
• with 3 current paths in series / at DC-3 / at DC-5		
• at 24 V / rated value	A	130
• at 110 V / rated value	A	130
Service power		
• at AC-2 / at 400 V / rated value	kW	22
• at AC-3 / at 400 V / rated value	kW	22

Control circuit:		
Voltage type / of control feed voltage		AC
Operating range factor control supply voltage rated value / of the magnet coil		
• at 50 Hz		0.8 ... 1.1
• for AC		
• at 60 Hz		0.8 ... 1.1
• for AC		
Apparent pull-in power / of the solenoid / for AC	V·A	298
Apparent holding power / of the solenoid / for AC	V·A	27
Inductive power factor / with the pull-in power of the coil		0.7
Inductive power factor / with the pull-in power of the coil		0.29

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		0
Number of NO contacts / for auxiliary contacts / instantaneous switching		0

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: 250 A fuse gL/gG: 250 A
--	--	--

Installation/mounting/dimensions:

Mounting type		screw and snap-on mounting onto 35 mm and 75 mm standard mounting rail
series installation		Yes
Width	mm	70
Height	mm	146
Depth	mm	139
Distance, to be maintained, to earthed part / sideways	mm	6

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 main contacts • solid • stranded • finely stranded • with conductor end processing • without conductor final cutting • for AWG conductors / for main contacts • for auxiliary contacts • solid • finely stranded • with conductor end processing • for AWG conductors / for auxiliary contacts		2x (2.5 ... 16 mm ²) 2x (10 ... 50 mm ²) 2x (2.5 ... 35 mm ²) 2x (10 ... 35 mm ²) 2x (10 ... 1/0) 2x (0.5 ... 1.5 mm ²), 2x (0.75 ... 2.5 mm ²), max. 2x (0.75 ... 4 mm ²) 2x (0.5 ... 1.5 mm ²), 2x (0.75 ... 2.5 mm ²) 2x (20 ... 16), 2x (18 ... 14), 1x 12

Certificates/approvals:

General Product Approval				Functional Safety / Safety of Machinery	Declaration of Conformity
 CCC	 CSA	 EAC	 UL	Type Examination	 EG-Konf.
Test Certificates		Shipping Approval			
Special Test Certificate		 ABS	 GL	 LRS	 RINA
					 RMRS
other					
Confirmation		other	Environmental Confirmations		

Further information:

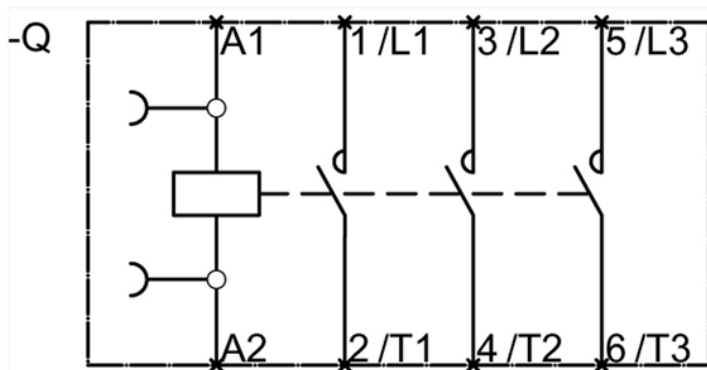
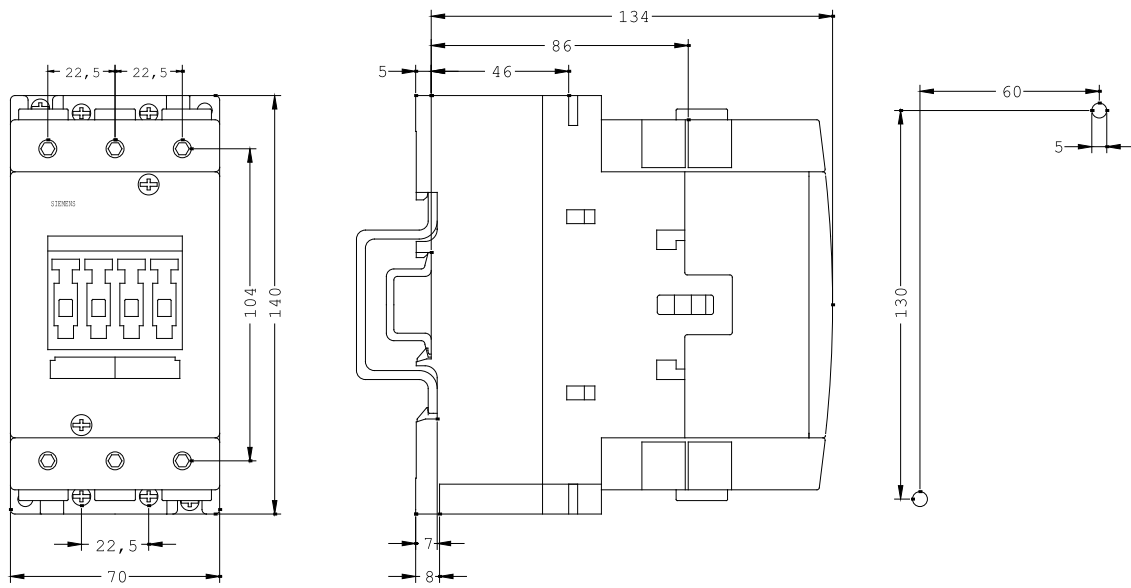
Information- and Downloadcenter (Catalogs, Brochures,...)
<http://www.siemens.com/industrial-controls/catalogs>

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/3RT1446-1AL20/all>

Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, ...)
http://www.automation.siemens.com/bilddb/cax_en.aspx?mlfb=3RT1446-1AL20



last change:

Jul 28, 2014