# **SIEMENS**

### Data sheet

## 3RT1054-6AR36



CONTACTOR, 55KW/400V/AC-3, AC(40...60HZ)/DC OPERATION UC 440...480V AUXIL. CONTACTS 2NO+2NC 3-POLE, SIZE S6 BAR CONNECTIONS CONVENTIONAL OPERATING MECHAN. SCREW TERMINAL

Figure similar		
product brand name		SIRIUS
Product designation		power contactor
General technical data:		
Insulation voltage		
Rated value	V	1 000
Degree of pollution		3
Surge voltage resistance Rated value	kV	8
Mechanical service life (switching cycles)		
<ul> <li>of the contactor typical</li> </ul>		10 000 000
<ul> <li>of the contactor with added electronics- compatible auxiliary switch block typical</li> </ul>		5 000 000
<ul> <li>of the contactor with added auxiliary switch block typical</li> </ul>		10 000 000
Thermal short-time current restricted to 10 s	А	1 100
Protection class IP		
• on the front		IP00
• of the terminal		IP00
Equipment marking	_	
• acc. to DIN EN 61346-2		Q
• acc. to DIN EN 81346-2		Q
Main circuit:		
Number of poles for main current circuit		3
Number of NC contacts for main contacts		0
Number of NO contacts for main contacts		3
Operating current		

	● at AC-1		
Rated valueA- up to 690 V at ambient temperature 60 °CA140Rated valueA140- up to 690 V at ambient temperature 60 °CA140Rated valueA115- at 400 V Rated valueA115- at 400 V Rated valueA97Operating current with 1 current pathA180- at 24 V Rated valueA180- at 24 V Rated valueA180- at 100 V Rated valueA25Operating current with 2 current pathA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated value <td< td=""><td>— at 400 V at ambient temperature 40 °C</td><td>А</td><td>160</td></td<>	— at 400 V at ambient temperature 40 °C	А	160
Rated valueA140- up to 680 V at ambient temperature 60 °CA140Rated valueA115- at 400 V Rated valueA115- at 660 V Rated valueA115- at 640 V Rated valueA97Operating current with 1 current pathA160- at 10 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA16			
	— up to 690 V at ambient temperature 40 °C	А	160
Rated valueAInstrument exponents of a bit	Rated value		
• at AC-3         Image: Constraint of the second of t		А	140
- at 400 V Rated value         A         115           - at 690 V Rated value         A         97           Operating current with 1 current path         A         160           - at 24 V Rated value         A         18           - at 10 V Rated value         A         18           - at 10 V Rated value         A         160           - at 110 V Rated value         A         160           - at 124 V Rated value         A         160           - at 10 V Rated value         A         160           - at 24 V Rated value         A         160           - at 10 V Rated value         A         160           - at 10 V Rated value         A         160           - at 24 V Rated value         A         160           - at 24 V Rated value         A         160           - at 24 V Rated value         A         160           - at 10 V Rated value         A         160           - at 24 V Rated value         A	Rated value		
	• at AC-3		
at AC-4 at 400 V Rated valueA97Operating current with 1 current path • at DC-1A160- at 24 V Rated valueA18• at DC-3 at DC-5A160- at 24 V Rated valueA2.5Operating current with 2 current paths in seriesA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 10 V Rated valueA160- at 24 V Rated valueA160- at 10 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rat	— at 400 V Rated value	A	115
Operating current with 1 current path • at DC-1         Image: Constant of the second seco	— at 690 V Rated value	А	115
• at DC-1       A       160         - at 24 V Rated value       A       18         • at DC-3 at DC-5       -       -         - at 24 V Rated value       A       160         - at 110 V Rated value       A       2.5         Operating current with 2 current paths in series       -       -         • at DC-1       -       -       -         - at 24 V Rated value       A       160       -         - at 24 V Rated value       A       160       -         - at 24 V Rated value       A       160       -         - at 10 V Rated value       A       160       -         - at 110 V Rated value       A       160       -         - at 24 V Rated value       A       160       -         - at 24 V Rated value       A       160       -         - at 24 V Rated value       A       160       -       -         - at 10 V Rated value       A       160       -	• at AC-4 at 400 V Rated value	А	97
- at 24 V Rated valueA160- at 110 V Rated valueA18• at DC-3 at DC-5 at 24 V Rated valueA160- at 110 V Rated valueA2.5Operating current with 2 current paths in series • at DC-1-160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueKW92- at 24 V Rated valueKW64- at 240 V Rated valueKW64- at 240 V Rated valueKW64- at 240 V Rated valueKW53- at 240 V Rated valueKW159	Operating current with 1 current path		
at 110 V Rated value         A         18           at 24 V Rated value         A         160           at 24 V Rated value         A         2.5           Operating current with 2 current paths in series         -         -           - at 24 V Rated value         A         160           - at 10 V Rated value         A         160           - at 24 V Rated value         A         160           - at 10 V Rated value         A         160           - at 110 V Rated value         A         160           - at 110 V Rated value         A         160           - at 110 V Rated value         A         160           - at 24 V Rated value         A         160           - at 110 V Rated value         A         160           - at 110 V Rated value         A         160           - at 24 V Rated value         A         160           - at 24 V Rated value         A         160           - at 24 V Rated value         KW         92           - at AC-1 at 400 V Rated value	● at DC-1		
• at DC-3 at DC-5I- at 24 V Rated valueA160- at 110 V Rated valueA2.5Operating current with 2 current paths in seriesI• at DC-1 at 24 V Rated valueA160- at 110 V Rated valueA160• at DC-3 at DC-5 at 110 V Rated valueA160• at DC-3 at DC-5 at 110 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160- at DC-1 at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueKW92• at AC-1 at 400 V Rated valueW55 000Operating power• at AC-1• at AC-1 at 690 V at 60 °C Rated value <td< td=""><td>— at 24 V Rated value</td><td>А</td><td>160</td></td<>	— at 24 V Rated value	А	160
- at 24 V Rated valueA160- at 110 V Rated valueA2.5Operating current with 2 current paths in series • at DC-1 at 24 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 100 V Rated valueA160- at 24 V Rated valueKW92- at 24 V Rated valueKW55 000Operating power at 230 V at 60 °C Rated valueKW53- at 690 V at 60 °C Rated valueKW53- at 690 V Rated valueKW159- at 690 V Rated valueKW159	— at 110 V Rated value	А	18
	● at DC-3 at DC-5		
Operating current with 2 current paths in series         Image: current with 2 current paths in series           • at DC-1         -           - at 24 V Rated value         A           - at 24 V Rated value         A           - at 10 V Rated value         A           - at 10 V Rated value         A           - at 10 V Rated value         A           - at 110 V Rated value         A           - at 24 V Rated value         A           - at 10 V Rated value         A           - at 10 V Rated value         A           - at 10 V Rated value         A           - at 24 V Rated value         A           - at 24 V Rated value         A           - at 24 V Rated value         A           - at 10 V Rated value         A           - at 24 V Rated value         A           - at 24 V Rated value         B           - at AC-1 at 400 V Rated value	— at 24 V Rated value	А	160
• at DC-1       A       160         - at 24 V Rated value       A       160         - at 110 V Rated value       A       160         • at DC-3 at DC-5       -       -         - at 110 V Rated value       A       160         - at 24 V Rated value       A       160         - at 10 V Rated value       A       160         - at 10 V Rated value       A       160         - at 10 V Rated value       A       160         - at 24 V Rated value       KW       92         • at AC-1 at 400 V Rated value       KW       64         • at AC-2 at 400 V Rated value       KW       55 000         Operating power       -       -	— at 110 V Rated value	А	2.5
A160- at 24 V Rated valueA160- at 10 V Rated valueA160- at 10 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160Operating current with 3 current paths in series at 24 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueKW92- at 44 V Rated valueKW55 000Operating power at 230 V at 60 °C Rated valueKW53- at 690 V Rated valueKW159- at 690 V Rated valueKW159- at 690 V Rated valueKW159	Operating current with 2 current paths in series		
A the function functionA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160Operating current with 3 current paths in series at 24 V Rated valueA160- at 24 V Rated valueA160- at 10 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueKW92- at AC-1 at 400 V Rated valueKW55 000Operating power at 230 V at 60 °C Rated valueKW53- at 690 V at 60 °C Rated valueKW159- at 690 V Rated valueKW159	● at DC-1		
at DC-3 at DC-5A160- at 110 V Rated valueA160- at 24 V Rated valueA160Operating current with 3 current paths in series at 24 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueKW92• at AC-1 at 400 V Rated valueKW55 000Operating power• at AC-4 at 400 V Rated valueKW55 000Operating power• at AC-1 at 230 V at 60 °C Rated valueKW53- at 690 V at 60 °C Rated valueKW159- at 690 V Rated valueKW159	— at 24 V Rated value	А	160
- at 110 V Rated valueA160- at 24 V Rated valueA160Operating current with 3 current paths in series • at DC-1 at 24 V Rated valueA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueKW92- at 24 V Rated valueKW64- at 400 V Rated valueW55 000Operating power at 230 V at 60 °C Rated valueKW53- at 690 V at 60 °C Rated valueKW159	— at 110 V Rated value	А	160
at 24 V Rated valueA160Operating current with 3 current paths in series • at DC-1 - at 24 V Rated valueA160 at 24 V Rated valueA160 at 110 V Rated valueA160 at 24 V Rated valueA160 at 24 V Rated valueA160 at 24 V Rated valueA160Operating power• at AC-1 at 400 V Rated valueKW92• at AC-2 at 400 V Rated valueKW64• at AC-2 at 400 V Rated valueW55 000Operating power• at AC-1 at 230 V at 60 °C Rated valueKW53 at 690 V Rated valueKW159 at 690 V Rated valueKW159	• at DC-3 at DC-5		
Operating current with 3 current paths in seriesA160- at 24 V Rated valueA160- at 110 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160- at 24 V Rated valueA160Operating power• at AC-1 at 400 V Rated valueKW92• at AC-2 at 400 V Rated valueKW64• at AC-4 at 400 V Rated valueW55 000Operating power• at AC-1 at 230 V at 60 °C Rated valueKW53- at 690 V at 60 °C Rated valueKW159- at 690 V Rated valueKW159	— at 110 V Rated value	А	160
• at DC-1       A       160         - at 24 V Rated value       A       160         - at 110 V Rated value       A       160         • at DC-3 at DC-5       -       -         - at 110 V Rated value       A       160         - at 24 V Rated value       A       160         - at AC-1 at 400 V Rated value       KW       92         • at AC-2 at 400 V Rated value       KW       64         • at AC-4 at 400 V Rated value       W       55 000         Operating power       -       -         • at AC-1       -       -         • at AC-1       -       -         - at 230 V at 60 °C Rated value       KW       53         - at 690 V at 60 °C Rated value       KW       159         - at 690 V Rated value       KW       159	— at 24 V Rated value	А	160
at 24 V Rated valueA160 at 110 V Rated valueA160• at DC-3 at DC-5 at 110 V Rated valueA160 at 24 V Rated valueA160 at 24 V Rated valueKW92• at AC-1 at 400 V Rated valueKW92• at AC-2 at 400 V Rated valueKW64• at AC-2 at 400 V Rated valueKW55 000• at AC-155 000• at AC-1• at AC-1• at AC-153- at 230 V at 60 °C Rated valueKW53- at 690 V at 60 °C Rated valueKW159	Operating current with 3 current paths in series		
- at 110 V Rated valueA160• at DC-3 at DC-5A160- at 110 V Rated valueA160- at 24 V Rated valueA160• at 24 V Rated valueKW92• at AC-1 at 400 V Rated valueKW64• at AC-2 at 400 V Rated valueW55 000• at AC-4 at 400 V Rated valueW53• at AC-1	• at DC-1		
• at DC-3 at DC-5       -       A       160         - at 110 V Rated value       A       160         - at 24 V Rated value       A       160         - at 24 V Rated value       A       92         • at AC-1 at 400 V Rated value       KW       92         • at AC-2 at 400 V Rated value       KW       64         • at AC-2 at 400 V Rated value       W       55 000         • at AC-4 at 400 V Rated value       W       55 000         • at AC-1       -       -         - at 230 V at 60 °C Rated value       KW       53         - at 690 V Rated value       KW       159         - at 690 V Rated value       KW       159	— at 24 V Rated value	А	160
- at 110 V Rated valueA160- at 24 V Rated valueA160Operating power at AC-1 at 400 V Rated valueKW92- at AC-2 at 400 V Rated valueKW64- at AC-4 at 400 V Rated valueW55 000Operating power at AC-1 at 230 V at 60 °C Rated valueKW53- at 690 V Rated valueKW159- at 690 V Rated valueKW159	— at 110 V Rated value	А	160
at 24 V Rated valueA160Operating power• at AC-1 at 400 V Rated valuekW92• at AC-2 at 400 V Rated valuekW64• at AC-2 at 400 V Rated valueW55 000Operating power• at AC-1• at AC-1 at 230 V at 60 °C Rated valuekW53- at 690 V at 60 °C Rated valuekW159- at 690 V Rated valuekW159	• at DC-3 at DC-5		
Operating power-• at AC-1 at 400 V Rated valuekW• at AC-2 at 400 V Rated valuekW• at AC-2 at 400 V Rated valueW• at AC-4 at 400 V Rated valueW• at AC-4 at 400 V Rated valueW• at AC-1 at 230 V at 60 °C Rated valuekW- at 690 V at 60 °C Rated valuekW- at 690 V Rated valuekW at 690 V Rated valuekW	— at 110 V Rated value	А	160
• at AC-1 at 400 V Rated valuekW92• at AC-2 at 400 V Rated valuekW64• at AC-4 at 400 V Rated valueW55 000Operating power- at AC-1- at 600 °C Rated valueKW- at 690 V at 60 °C Rated valuekW53- at 690 V at 60 °C Rated valuekW159- at 690 V Rated valuekW159	— at 24 V Rated value	А	160
<ul> <li>at AC-2 at 400 V Rated value</li> <li>at AC-2 at 400 V Rated value</li> <li>W 64</li> <li>55 000</li> <li>Operating power</li> <li>at AC-1</li> <li>- at 230 V at 60 °C Rated value</li> <li>KW 53</li> <li>- at 690 V at 60 °C Rated value</li> <li>KW 159</li> <li>- at 690 V Rated value</li> <li>KW 159</li> </ul>	Operating power		
• at AC-4 at 400 V Rated valueW55 000Operating power• at AC-1 at 230 V at 60 °C Rated valuekW53- at 690 V at 60 °C Rated valuekW159- at 690 V Rated valuekW159	• at AC-1 at 400 V Rated value	kW	92
Operating powerImage: Constraint of the c	• at AC-2 at 400 V Rated value	kW	64
• at AC-1 — at 230 V at 60 °C Rated value	• at AC-4 at 400 V Rated value	W	55 000
- at 230 V at 60 °C Rated value       kW       53         - at 690 V at 60 °C Rated value       kW       159         - at 690 V Rated value       kW       159	Operating power		
at 690 V at 60 °C Rated valuekW159 at 690 V Rated valuekW159	• at AC-1		
- at 690 V Rated value kW 159	— at 230 V at 60 °C Rated value	kW	53
	— at 690 V at 60 °C Rated value	kW	159
• at AC-3	— at 690 V Rated value	kW	159
	• at AC-3		

— at 230 V Rated value	kW	37
— at 400 V Rated value	kW	64
— at 500 V Rated value	kW	81
— at 690 V Rated value	kW	113
Operating power for $\geq$ 200000 operating cycles at	_	
AC-4		
• at 400 V Rated value	kW	29
• at 690 V Rated value	kW	48
Operating frequency	_	
• at AC-3 maximum	1/h	1 000
Control circuit/ Control:		
Type of voltage of the control supply voltage		AC/DC
Control supply voltage with AC		
• at 50 Hz Rated value	V	440 480
• at 60 Hz Rated value	V	440 480
Control supply voltage for DC		
Rated value	V	440 480
Rated value	Hz	40
Control supply voltage frequency 2 Rated value	Hz	60
Operating range factor control supply voltage rated		
value of the magnet coil with AC		
• at 50 Hz		0.8 1.1
• at 60 Hz		0.8 1.1
Operating range factor control supply voltage rated		0.8 1.1
value of the magnet coil for DC	_	with varistor
Design of the surge suppressor	V·A	300
Apparent pick-up power of the magnet coil with AC		
Apparent holding power of the magnet coil with AC Closing power of the magnet coil for DC	V·A W	5.8 360
Holding power of the magnet coil for DC	W	5.2
Inductive power factor	- V V	5.2
with closing power of the coil		0.9
<ul> <li>with closing power of the coil</li> </ul>		0.8
		0.0
Auxiliary circuit:	_	
Number of NC contacts		
<ul> <li>for auxiliary contacts</li> </ul>		
— instantaneous contact		2
Number of NO contacts		
<ul> <li>for auxiliary contacts</li> </ul>		
— instantaneous contact		2
Operating current at AC-15		
• at 230 V Rated value	А	6

	٨	0
at 400 V Rated value	A	3
Operating current		
• at DC-12 at 220 V Rated value	A	1
at DC-13 at 220 V Rated value	A	0.3
Operating current		
• at DC-12		
— at 60 V Rated value	A	6
— at 110 V Rated value	А	3
• at DC-13		
— at 24 V Rated value	А	10
— at 60 V Rated value	А	2
— at 110 V Rated value	А	1
UL/CSA ratings:		
Contact rating of the auxiliary contacts acc. to UL		A600 / Q600
Short-circuit:		
Design of the fuse link		
<ul> <li>for short-circuit protection of the main circuit</li> </ul>		
— with type of assignment 1 required		fuse gL/gG: 355 A
— with type of assignment 2 required		fuse gL/gG: 315 A
<ul> <li>for short-circuit protection of the auxiliary switch</li> </ul>		fuse gL/gG: 10 A
required		
Installation/ mounting/ dimensions:		
Mounting type		screw fixing
<ul> <li>Side-by-side mounting</li> </ul>		Yes
Height	mm	172
Width	mm	120
Depth	mm	170
Required spacing		
<ul> <li>for grounded parts</li> </ul>		
— at the side	mm	10
Connections/ Terminals:		
Type of electrical connection		
<ul> <li>for main current circuit</li> </ul>		screw-type terminals
<ul> <li>for auxiliary and control current circuit</li> </ul>		screw-type terminals
Type of connectable conductor cross-section		
<ul> <li>for AWG conductors for main contacts</li> </ul>		4 250 kcmil
<ul> <li>for auxiliary contacts</li> </ul>		
— solid		2x (0.5 1.5 mm²), 2x (0.75 2.5 mm²), max. 2x (0.75 4 mm²)
— finely stranded with core end processing		2x (0.5 1.5 mm²), 2x (0.75 2.5 mm²)
<ul> <li>for AWG conductors for auxiliary contacts</li> </ul>		2x (20 16), 2x (18 14), 1x 12
		( · · · · , · · · · , · · · ·

echanical data:				00		
ize of contactor				S6		
nbient conditions:						
stallation altitude at l	height above sea	level	m	2 000		
naximum						
mbient temperature						
<ul> <li>during operation</li> </ul>			°C	-25 +60		
<ul> <li>during storage</li> </ul>			°C	-55 +80		
ertificates/ approval	S:					
General Product A	Approval				Functional	Declaration of
					Safety/Safety	Conformity
					of Machinery	
					Type Examination	
( <b>m</b> )	(SP)		(	U)		(F
$(\mathbf{m})$	(SP	EAC	(	UL)		CE
	(SP) CSA	EHC	(	UL		EG-Konf.
	(SA)	EHC	(			EG-Konf.
ccc Test Certificates	CSA	<b>EHE</b> Shipping Ar	oproval			EG-Konf.
	Special Test		oproval			EG-Konf.
Test Certificates	Special Test Certificate		oproval		GL@	EG-Konf.
Test Certificates					GL	EG-Konf.
Test Certificates						EG-Konf.
Test Certificates		Shipping Ap			GL	
Test Certificates		Shipping Ap			GL	
Test Certificates		Shipping Ap	2		GL	
Test Certificates         Type Test         Certificates/Test         Report	Certificate	Shipping Ap	- - - - -		GL	
Test Certificates         Type Test         Certificates/Test         Report	Certificate	Shipping Ap	- - - - -		GL	
Test Certificates         Type Test         Certificates/Test         Report	Certificate	Shipping Ap	- - - - -		GL	

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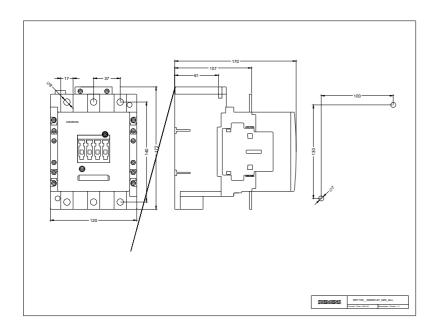
#### Industry Mall (Online ordering system) http://www.siemens.com/industrymall

Cax online generator

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