# **SIEMENS**

## Data sheet 3RT2016-2LJ82-0LA0



Traction contactor, AC-3 9 A, 4 kW / 400 V 72 V DC 0.7-1.25\* US, with varistor integrated, 3-pole, Size S00, Spring-type terminal

product brand name	SIRIUS	
product designation	Contactor	
design of the product	With extended operating range	
product type designation	3RT2	
General technical data		
size of contactor	S00	
product extension		
<ul> <li>function module for communication</li> </ul>	No	
auxiliary switch	Yes	
power loss [W] for rated value of the current		
<ul> <li>at AC in hot operating state</li> </ul>	2.1 W	
<ul> <li>at AC in hot operating state per pole</li> </ul>	0.7 W	
without load current share typical	4 W	
insulation voltage		
<ul> <li>of main circuit with degree of pollution 3 rated value</li> </ul>	690 V	
<ul> <li>of auxiliary circuit with degree of pollution 3 rated value</li> </ul>	690 V	
surge voltage resistance		
<ul> <li>of main circuit rated value</li> </ul>	6 kV	
of auxiliary circuit rated value	6 kV	
maximum permissible voltage for safe isolation between coil and main contacts according to EN 60947-1	400 V	
shock resistance at rectangular impulse		
• at DC	6,7g / 5 ms, 4,2g / 10 ms	
shock resistance with sine pulse		
• at DC	10,5g / 5 ms, 6,6g / 10 ms	
mechanical service life (switching cycles)		
of contactor typical	30 000 000	
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		
<ul> <li>during operation</li> </ul>	-40 +70 °C	
during storage	-55 +80 °C	
relative humidity minimum	10 %	
relative humidity at 55 °C according to IEC 60068-2-30 maximum	95 %	
Main circuit		
number of poles for main current circuit	3	

number of NO contacts for main contacts	3
operating voltage	
at AC-3 rated value maximum	690 V
at AC-3 rated value maximum     at AC-3e rated value maximum	690 V
operational current	
at AC-1 at 400 V at ambient temperature 40 °C rated value     at AC-1	22 A
— up to 690 V at ambient temperature 40 °C rated value	22 A
<ul> <li>up to 690 V at ambient temperature 60 °C rated value</li> </ul>	20 A
<ul> <li>at AC-2 at 400 V rated value</li> </ul>	9 A
• at AC-3	
— at 400 V rated value	9 A
— at 500 V rated value	7.7 A
— at 690 V rated value	6.7 A
• at AC-3e	
— at 400 V rated value	9 A
— at 500 V rated value	7.7 A
— at 690 V rated value	6.7 A
at AC-4 at 400 V rated value	8.5 A
minimum cross-section in main circuit	
at maximum AC-1 rated value	4 mm <sup>2</sup>
operational current for approx. 200000 operating cycles at AC-4	
at 400 V rated value	4.1 A
• at 690 V rated value	3.3 A
operating power	4 kW
<ul><li>at AC-2 at 400 V rated value</li><li>at AC-3</li></ul>	4 KVV
— at 230 V rated value	2.2 kW
— at 400 V rated value	4 kW
— at 500 V rated value	4 kW
— at 690 V rated value	5.5 kW
• at AC-3e	0.0 KVV
— at 230 V rated value	2.2 kW
— at 400 V rated value	4 kW
— at 500 V rated value	4 kW
— at 690 V rated value	5.5 kW
operating power for approx. 200000 operating cycles at AC-4	
• at 400 V rated value	2 kW
• at 690 V rated value	2.5 kW
short-time withstand current in cold operating state up to 40 $^{\circ}\text{C}$	
limited to 1 s switching at zero current maximum	155 A; Use minimum cross-section acc. to AC-1 rated value
limited to 5 s switching at zero current maximum	104 A; Use minimum cross-section acc. to AC-1 rated value
limited to 10 s switching at zero current maximum	82 A; Use minimum cross-section acc. to AC-1 rated value
limited to 30 s switching at zero current maximum	63 A; Use minimum cross-section acc. to AC-1 rated value
Ilimited to 60 s switching at zero current maximum	53 A; Use minimum cross-section acc. to AC-1 rated value
no-load switching frequency	1.500.1/b
at DC     congrating fraguency	1 500 1/h
operating frequency	750 1/h
<ul> <li>at AC-2 at AC-3e maximum</li> <li>at AC-4 maximum</li> </ul>	750 1/h 250 1/h
Control circuit/ Control	200 1/11
	DC
type of voltage type of voltage of the control supply voltage	DC DC
control supply voltage at DC	
• rated value	72 V
- rated value	1 L V

operating range factor control supply voltage rated value of magnet coil at DC		_	
• Ubliscate value   1.25			
design of the surge suppressor			
Closing power of magnet coil at DC			
A W   Closing belay			
closing delay			
• all DC • arting time control version of the switch operating mechanism Control version of the switch operating mechanism E1-A2 Auxillary circuit • instantaneous contact • instantaneous contact • instantaneous contact • instantaneous contact • art 230 V rated value • at 230 V rated value • at 800 V rated value • at 80 V rated		4 W	
a to DC   arcing time			
arcing time		25 130 ms	
arcing time			
Control version of the switch operating mechanism   E1 - A2		7 111 = 2 1112	
Auxiliary circuit   number of NC contacts for auxiliary contacts   1			
number of NC contacts for auxiliary contacts   1   1   1   1   1   1   1   1   1		E1 - A2	
• instantaneous contact   1			
Operational current at AC-12 maximum   10 A   Operational current at AC-15			
Departational current at AC-15     et at 230 V rated value   3 A     et 350 V rated value   2 A     et 690 V rated value   1 A     operational current at DC-12     et 48 V rated value   6 A     et 41 10 V rated value   6 A     et 41 10 V rated value   2 A     et 42 V rated value   2 A     et 42 V rated value   2 A     et 41 10 V rated value   2 A     et 41 10 V rated value   2 A     et 45 V rated value   1 A     et 45 V rated value   2 A     et 46 V rated value   2 A     et 48 V rated value   2 A     et 41 10 V rated value   2 A     et 41 10 V rated value   0.9 A     et 220 V rated value   0.1 A     et 480 V rated value   0.3 A     et 480 V rated value   0.4 A     et 480 V rated value   0.5 A     et 480 V rated value   0.6 A     et 480 V rated value   0.7 A     et 480 V rated value   0.7 A     et 480 V rated value   0.8 A     et 480 V rated val			
at 230 V rated value		10 A	
• at 400 V rated value • at 500 V rated value • at 600 V rated value • at 600 V rated value • at 24 V rated value • at 40 V rated value • at 40 V rated value • at 60 V rated value • at 60 V rated value • at 110 V rated value • at 125 V rated value • at 220 V rated value • at 220 V rated value • at 600 V rated value • at 100 V rated value • at 48 V rated value • at 110 V rated value • at 10 V rated value • at 110 V rated value • at 100 V rated value • at 220 V rated value • at 220 V rated value • at 200 V rated value • at 200 V rated value • at 480 V rated value • at 575/600 V rated value • at 200/200 V rated value • at 450/400 V rated value • at 200/200 V rated value • at 575/600 V rated val		40.4	
• at 500 V rated value • at 690 V rated value • at 690 V rated value • at 24 V rated value • at 24 V rated value • at 48 V rated value • at 48 V rated value • at 48 V rated value • at 110 V rated value • at 110 V rated value • at 125 V rated value • at 125 V rated value • at 125 V rated value • at 600 V rated value • at 125 V rated value • at 126 V rated value • at 126 V rated value • at 127 V rated value • at 128 V rated value • at 128 V rated value • at 129 V rated value • at 120 V rated value • at 600 V rated value • at 140 V rated value • at 150 V rated value • at 200 V rated value • at			
• at 690 V rated value			
Operational current at DC-12			
** at 24 V rated value		I A	
• at 48 V rated value • at 60 V rated value • at 110 V rated value • at 125 V rated value • at 220 V rated value • at 220 V rated value • at 600 V rated value  operational current at DC-13 • at 24 V rated value • at 80 V rated value • at 60 V rated value • at 110 V rated value • at 110 V rated value • at 110 V rated value • at 125 V rated value • at 120 V rated value • at 120 V rated value • at 120 V rated value • at 200 V rated value • at 200 V rated value • at 600 V rated value • at 80 V rated value • at 480 V rated value • at 140 V rated value • at 220 V rated value • at 220 V rated value • at 230 V rated value • at 600 V rated value • at 600 V rated value • at 600 V rated value • at 110 V rated value • at 600 V rated value • at 600 V rated value • at 500 V rated value • at 600 V rated value • at 500 V rated value • for 3-phase AC motor • at 480 V rated value • for 3-phase AC motor • at 480/480 V rated value • for 3-phase AC motor • at 480/480 V rated value • for 3-phase AC motor • at 480/480 V rated value • for 3-phase AC motor • at 575/600 V rated value • for 5 hp	•	10.4	
e at 125 V rated value 2 A e at 220 V rated value 0.15 A  operational current at DC-13  e at 24 V rated value 10 A e at 48 V rated value 2 A e at 48 V rated value 2 A e at 110 V rated value 2 A e at 110 V rated value 2 A e at 110 V rated value 0.9 A e at 220 V rated value 0.3 A e at 25 V rated value 0.3 A e at 260 V rated value 0.3 A e at 260 V rated value 0.3 A e at 27 V rated value 0.3 A e at 28 V rated value 0.3 A e at 28 V rated value 0.3 A e at 600 V rated value 0.1 A  UL/CSA ratings  full-load current (FLA) for 3-phase AC motor e at 48 V rated value 9 A  yielded mechanical performance [hp] e for single-phase AC motor — at 110/120 V rated value 9 A  yielded mechanical performance [hp] e for 3-phase AC motor — at 230 V rated value 1 hp e for 3-phase AC motor — at 200/208 V rated value 2 hp — at 220/230 V rated value 2 hp — at 220/230 V rated value 3 hp — at 460/480 V rated value 5 hp — at 446/480 V rated value 5 hp contact rating of auxiliary contacts according to UL  Short-circuit protection product function short circuit protection design of the fuse link e for short-circuit protection of the main circuit — with type of coordination 1 required — with type of assignment 2 required gG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA) gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)			
• at 220 V rated value			
• at 600 V rated value 0.15 A  operational current at DC-13  • at 24 V rated value 10 A • at 48 V rated value 2 A • at 60 V rated value 1 A • at 110 V rated value 1 A • at 125 V rated value 0.3 A • at 220 V rated value 0.3 A • at 600 V rated value 0.1 A  UL/CSA ratings  full-load current (FLA) for 3-phase AC motor • at 480 V rated value 9 A • at 600 V rated value 9 A  yielded mechanical performance [hp] • for single-phase AC motor — at 110/120 V rated value 9 A  yielded mechanical performance [hp] • for 3-phase AC motor — at 200/208 V rated value 1 hp • for 3-phase AC motor — at 200/208 V rated value 2 hp — at 220/230 V rated value 3 hp — at 460/480 V rated value 5 hp — at 575/600 V rated value 5 hp — at 575/600 V rated value 7.5 hp  contact rating of auxiliary contacts according to UL  Short-circuit protection  product function 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 9G: 25A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  gG: 20A (690V,100kA), aM: 20A (690V,100kA), BS88: 20A (415V,80kA)			
Operational current at DC-13   • at 24 V rated value			
		0.13 A	
• at 48 V rated value • at 60 V rated value • at 110 V rated value • at 1125 V rated value • at 1220 V rated value • at 220 V rated value • at 600 V rated value • at 600 V rated value • at 220 V rated value • at 800 V rated value • at 600 V rated value • at 600 V rated value	•	10 Δ	
• at 60 V rated value • at 110 V rated value • at 125 V rated value • at 220 V rated value • at 220 V rated value • at 600 V rated value • at 600 V rated value • at 80 V rated value • at 480 V rated value • at 480 V rated value • at 600 V rated value • brown single-phase AC motor • at 110/120 V rated value • at 230 V rated value • for 3-phase AC motor • at 220/230 V rated value • at 220/230 V rated value • at 220/230 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 • brown single-phase AC motor • at 600 V 6600  Short-circuit protection  product function short circuit protection  design of the fuse link • for short-circuit protection of the main circuit • with type of coordination 1 required • GG: 20A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)			
• at 110 V rated value • at 125 V rated value • at 220 V rated value • at 220 V rated value • at 600 V rated value • at 600 V rated value • at 600 V rated value  UL/CSA ratings  full-load current (FLA) for 3-phase AC motor • at 480 V rated value • at 600 V rated value  9 A  yielded mechanical performance [hp] • for single-phase AC motor — at 110/120 V rated value 1 hp • for 3-phase AC motor — at 230 V rated value 1 hp • for 3-phase AC motor — at 200/208 V rated value 1 hp • for 3-phase AC motor — at 220/230 V rated value 3 hp — at 220/230 V rated value — at 240/480 V rated value 5 hp — at 575/600 V rated value — at 460/480 V rated value — at 460/480 V rated value 7.5 hp  contact rating of auxiliary contacts according to UL  Short-circuit protection  product function 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  9.3 A 9.4 9.4 9.4 9.4 9.4 9.4 9.4 9.4 9.4 9.6 9.6 9.6 9.6 9.6 9.6 9.6 9.6 9.6 9.6			
• at 125 V rated value • at 220 V rated value • at 600 V rated value • at 600 V rated value  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 600 V rated value • for single-phase AC motor — at 110/120 V rated value • for 3-phase AC motor — at 230 V rated value • for 3-phase AC motor — at 200/208 V rated value • for 3-phase AC motor — at 200/208 V rated value • at 200/208 V rated value — at 200/208 V rated value — at 575/600 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  product function 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  GG: 20A (690V,100kA), aM: 20A (690V, 100kA), BS88: 35A (415V,80kA)  gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)			
at 220 V rated value at 600 V rated value  UL/CSA ratings  full-load current (FLA) for 3-phase AC motor at 480 V rated value at 600 V rated value 7.6 A at 600 V rated value  yielded mechanical performance [hp] for single-phase AC motor - at 110/120 V rated value - at 230 V rated value for 3-phase AC motor - at 200/208 V rated value - at 460/480 V rated value - at 460/480 V rated value - at 4575/600 V rated value - at 575/600 V rated value - at 575/600 V rated value - at 675/600 V rated value - with type of coordination 1 required - with type of coordination 1 required - with type of assignment 2 required  gG: 20A (690V,100kA), aM: 20A (690V, 100kA), BS88: 35A (415V,80kA) - gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)			
● at 600 V rated value  UL/CSA ratings  full-load current (FLA) for 3-phase AC motor  ● at 480 V rated value  ● at 600 V rated value  9 A  yielded mechanical performance [hp]  ● for single-phase AC motor  — at 110/120 V rated value  1 hp  ● for 3-phase AC motor  — at 230 V rated value  ● for 3-phase AC motor  — at 200/208 V rated value  1 hp  ● for 3-phase AC motor  — at 200/208 V rated value  2 hp  — at 220/230 V rated value  3 hp  — at 460/480 V rated value  — at 575/600 V rated value  — at 575/600 V rated value  T.5 hp  contact rating of auxiliary contacts according to UL  Short-circuit protection  product function 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  gG: 20A (690V,100kA), aM: 20A (690V, 100kA), BS88: 35A (415V,80kA)  at 600 V (100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)			
full-load current (FLA) for 3-phase AC motor			
full-load current (FLA) for 3-phase AC motor  • at 480 V rated value  • at 600 V rated value  9 A  yielded mechanical performance [hp]  • for single-phase AC motor  — at 110/120 V rated value  • for 3-phase AC motor  — at 230 V rated value  • for 3-phase AC motor  — at 200/208 V rated value  — at 220/230 V rated value  — at 460/480 V rated value  — at 575/600 V rated value  5 hp  — at 575/600 V rated value  7.5 hp  contact rating of auxiliary contacts according to UL  Short-circuit protection  product function 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  9G: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  80kA)			
• at 480 V rated value  • at 600 V rated value  9 A  yielded mechanical performance [hp]  • for single-phase AC motor  — at 110/120 V rated value — at 230 V rated value — at 200/208 V rated value — at 220/230 V rated value — at 220/230 V rated value — at 460/480 V rated value — at 460/480 V rated value — at 575/600 V rated value — with type of coordination 1 required — with type of assignment 2 required — with type of assignment 2 required  9 A  9 A  9 A  9 A  9 A  9 A  9 A  9			
in the state of the state		7.6 A	
yielded mechanical performance [hp]  • for single-phase AC motor  — at 110/120 V rated value — at 230 V rated value — at 200/208 V rated value — at 220/230 V rated value — 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  product function 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  gG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)			
for single-phase AC motor         — at 110/120 V rated value         — at 230 V rated value         — at 230 V rated value         • for 3-phase AC motor         — at 200/208 V rated value         — at 220/230 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         — at 575/600 V rated value         — at 600 / Q600  Short-circuit protection  product function 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			
- at 110/120 V rated value - at 230 V rated value 1 hp  ● for 3-phase AC motor - at 200/208 V rated value 2 hp - at 220/230 V rated value 3 hp - at 460/480 V rated value 5 hp - at 575/600 V rated value 7.5 hp  contact rating of auxiliary contacts according to UL  Short-circuit protection  product function 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  G: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)  80kA)			
- at 230 V rated value  • for 3-phase AC motor  — at 200/208 V rated value — at 220/230 V rated value — at 460/480 V rated value — at 575/600 V rated value — at 575/600 V rated value  To the contact rating of auxiliary contacts according to UL  Short-circuit protection  product function 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  GG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)  80kA)	-	0.33 hp	
<ul> <li>for 3-phase AC motor  — at 200/208 V rated value  — at 220/230 V rated value  — at 460/480 V rated value  — at 575/600 V rated value  — at 575/600 V rated value  — at 575/600 V rated value  T.5 hp  contact rating of auxiliary contacts according to UL  Short-circuit protection  product function 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  gG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)  80kA)</li> </ul>		,	
- at 200/208 V rated value - at 220/230 V rated value 3 hp - at 460/480 V rated value 5 hp - at 575/600 V rated value 7.5 hp  contact rating of auxiliary contacts according to UL  Short-circuit protection  product function 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  GG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  GG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)			
- at 220/230 V rated value - at 460/480 V rated value 5 hp - at 575/600 V rated value 7.5 hp  contact rating of auxiliary contacts according to UL  Short-circuit protection product function 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  GG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  GG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)	·	2 hp	
- at 460/480 V rated value - at 575/600 V rated value 7.5 hp  contact rating of auxiliary contacts according to UL  Short-circuit protection  product function 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  GG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)	— at 220/230 V rated value	3 hp	
contact rating of auxiliary contacts according to UL  Short-circuit protection  product function 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  GG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V, 80kA)	— at 460/480 V rated value		
Product function 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  GG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)	— at 575/600 V rated value	7.5 hp	
product function 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  GG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)	contact rating of auxiliary contacts according to UL	A600 / Q600	
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  GG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)  gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V, 80kA)	Short-circuit protection		
<ul> <li>◆ for short-circuit protection of the main circuit</li> <li>— with type of coordination 1 required</li> <li>— with type of assignment 2 required</li> <li>gG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)</li> <li>gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V,80kA)</li> </ul>	product function short circuit protection	No	
<ul> <li>with type of coordination 1 required</li> <li>gG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)</li> <li>with type of assignment 2 required</li> <li>gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V, 80kA)</li> </ul>	design of the fuse link		
— with type of assignment 2 required gG: 20A (690V,100kA), aM: 16A (690V, 100kA), BS88: 20A (415V, 80kA)	• for short-circuit protection of the main circuit		
80kA)	<ul> <li>— with type of coordination 1 required</li> </ul>	gG: 35A (690V,100kA), aM: 20A (690V,100kA), BS88: 35A (415V,80kA)	
,	<ul> <li>— with type of assignment 2 required</li> </ul>		
• for short-circuit protection of the auxiliary switch gG: 10 A (500 V, 1 KA)	for about simplify and a district of the second simplify and a second simplify a second simplify a second simplify and a second simplify a second simplify a second simplifies a second simplication simplifies a second simplifies a second simplifie	·	
	for snort-circuit protection of the auxiliary switch	gG: 10 A (500 V, 1 KA)	

required		
nstallation/ mounting/ dimensions		
mounting position	+/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface	
fastening method	screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715	
side-by-side mounting	Yes	
height	70 mm	
width	45 mm	
depth	121 mm	
required spacing		
<ul><li>with side-by-side mounting</li></ul>		
— forwards	10 mm	
— upwards	10 mm	
— downwards	10 mm	
— at the side	0 mm	
for grounded parts		
— forwards	10 mm	
— upwards	10 mm	
— at the side	6 mm	
— downwards	10 mm	
for live parts		
— forwards	10 mm	
— upwards	10 mm	
— downwards	10 mm	
— at the side	6 mm	
onnections/ Terminals		
type of electrical connection		
for main current circuit	spring-loaded terminals	
for auxiliary and control circuit	spring-loaded terminals	
at contactor for auxiliary contacts	Spring-type terminals	
of magnet coil	Spring-type terminals	
type of connectable conductor cross-sections		
• for main contacts	0 (0 5 4 5 3) 0 (0 75 0 5 3) 0 4 3	
— solid	2x (0.5 1.5 mm²), 2x (0.75 2.5 mm²), 2x 4 mm²	
— solid or stranded	2x (0,5 4 mm²)	
finely stranded with core end processing	2x (0.5 2.5 mm²)	
— finely stranded without core end processing	2x (0.5 2.5 mm²)	
at AWG cables for main contacts	2x (20 12)	
type of connectable conductor cross-sections		
for auxiliary contacts	0(0.5	
— solid or stranded	2x (0,5 4 mm²)	
— finely stranded with core end processing	2x (0.5 2.5 mm²)	
— finely stranded without core end processing	2x (0.5 2.5 mm²)	
at AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross	2x (20 12)	
AWG number as coded connectable conductor cross section		
for main contacts	20 12	
• for auxiliary contacts	20 12	
afety related data		
product function		
mirror contact according to IEC 60947-4-1	Yes	
<ul> <li>positively driven operation according to IEC 60947- 5-1</li> </ul>	No	
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 %	
<ul> <li>with high demand rate according to SN 31920</li> </ul>	73 %	
failure rate [FIT] with low demand rate according to SN 31920	100 FIT	
T1 value for proof test interval or service life according to	20 y	

IP20		
finger-safe, for vertical contact from the front		
Communication/ Protocol		
No		
Certificates/ approvals		

#### **General Product Approval**





Confirmation



<u>KC</u>



Functional EMC Safety/Safe Machinery	ety of Declaration of Conformity	Test Certificates
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Type Examination Certificate





Special Test Certificate

Type Test Certificates/Test Report

#### Marine / Shipping













Marine / Shipping other Railway Dangerous Good



Confirmation



Special Test Certific- Vibra

Vibration and Shock

Transport Information

### Further information

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=3RT2016-2LJ82-0LA0

Cax online generator

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

https://support.industry.siemens.com/cs/ww/en/ps/3RT2016-2LJ82-0LA0

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

http://www.automation.siemens.com/bilddb/cax\_de.aspx?mlfb=3RT2016-2LJ82-0LA0&lang=en

Characteristic: Tripping characteristics, I2t, Let-through current

https://support.industry.siemens.com/cs/ww/en/ps/3RT2016-2LJ82-0LA0/char

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

http://www.automation.siemens.com/bilddb/index.aspx?view=Search&mlfb=3RT2016-2LJ82-0LA0&objecttype=14&gridview=view1

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