## **SIEMENS**

Data sheet 3RT2035-3SB30



contactor, AC-3, 40 A/400 V/60  $^{\circ}\text{C}$  S2, 3-pole, 21-33 V AC/DC, F-PLC-IN, with varistor, 1 NC, spring-loaded terminal

product type designation product type designation general technical data  size of contactor product extension  • function module for communication • auxillary switch power loss [W] for rated value of the current • at AC in hot operating state per pole • without load current share typical insulation voltage • of main circuit with degree of pollution 3 rated value • of auxillary circuit with degree of pollution 3 rated value • of auxillary circuit with degree of pollution 3 rated value • of auxillary circuit with degree of pollution 3 rated value • of auxillary circuit with degree of pollution 3 rated value • of auxillary circuit rated value  a to a value of the contactor with sine pulse • at AC • at DC  mechanical service life (switching cycles) • of contactor typical • of the contactor with added electronically optimized auxillary switch block typical • of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical  of the contactor with added auxillary switch block typical	product brand name	SIRIUS
Size of contactor	product designation	Power contactor
size of contactor product extension • function module for communication • function module for communication • auxiliary switch power loss [W] for rated value of the current • at AC in hot operating state per pole • at AC in hot operating state per pole • without load current share typical insulation voltage • of main circuit with degree of pollution 3 rated value • of auxiliary circuit with degree of pollution 3 rated value • of auxiliary circuit with degree of pollution 3 rated value • of auxiliary circuit rated value • of auxiliary oblique for safe isolation between coll and main contacts according to EN 60947-1  shock resistance at rectangular impulse • at AC • at DC  shock resistance with sine pulse • at AC • at DC  shock resistance with sine pulse • at AC • at DC  contactor typical • of the contactor with added electronically optimized auxiliary switch block typical • of the contactor with added auxiliary switch block typical • of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch bloc	product type designation	3RT2
product extension • function module for communication • auxillary switch  power loss [W] for rated value of the current • at AC in hot operating state • at AC in hot operating state per pole • without load current share typical • of main circuit with degree of pollution 3 rated value • of auxiliary circuit with degree of pollution 3 rated value • of auxiliary circuit tated value • of auxiliary circuit rated value • of main circuit rated value • of auxiliary circuit rated value • of x, 7g / 5 ms, 4.5g / 10 ms • at AC • at DC  shock resistance at rectangular impulse • at AC • at DC  shock resistance with sine pulse • at AC • at DC  shock re	General technical data	
• function module for communication • auxiliary switch  power loss [W] for rated value of the current • at AC in hot operating state   6.6 W • without load current share typical   2 W  insulation voltage • of main circuit with degree of pollution 3 rated value • of auxiliary circuit with degree of pollution 3 rated value • of main circuit with degree of pollution 3 rated value • of main circuit rated value   6 kV • of auxiliary circuit rated value   6 kV • of contactor with sine pulse • at AC   7.7g / 5 ms, 4.5g / 10 ms • at DC   12g / 5 ms, 7g / 10 ms • at DC   12g / 5 ms, 7g / 10 ms • of contactor typical   5 000 000 • of contactor with added electronically optimized auxiliary switch block typical   5 000 000 • of the contactor with added auxiliary switch block typical   5 000 000 • of the contactor with added auxiliary switch block typical   5 000 000 • of the contactor with added auxiliary switch block typical   5 000 000 • of the contactor with added auxiliary switch block typical   5 000 000 • of the contactor with added auxiliary switch block typical   5 000 000 • of the contactor with added auxiliary switch block typical   5 000 000 • of the contactor with added auxiliary switch block typical   5 000 000 • of the contactor with added auxiliary switch block typical   5 000 000 • of the contactor with ad	size of contactor	S2
auxiliary switch     power loss [W] for rated value of the current	product extension	
power loss [W] for rated value of the current  at AC in hot operating state at AC in hot operating state per pole without load current share typical of main circuit with degree of pollution 3 rated value of auxiliary circuit with degree of pollution 3 rated value of auxiliary circuit with degree of pollution 3 rated value surge voltage resistance of main circuit rated value of auxiliary circuit rated value foliand main contacts according to EN 60947-1 shock resistance at rectangular impulse of at AC of the cristance with sine pulse of at AC of the cristance with sine pulse of at AC of the cristance with sine pulse of at AC of the contactor typical of the contactor with added electronically optimized auxiliary switch block typical of the contactor with added auxiliary switch block typical reference code according to IEC 81346-2 Qusustance Prohibitance (Date)  Ambient conditions installation altitude at height above sea level maximum ambient temperature of during operation  - 6.6 W  - 690 V  - 690 V  - 690 V  - 600 V  - 600 V  - 600 V  - 400 V  - 600	<ul> <li>function module for communication</li> </ul>	No
at AC in hot operating state eprole at AC in hot operating state per pole without load current share typical  insulation voltage of main circuit with degree of pollution 3 rated value of auxiliary circuit with degree of pollution 3 rated value of auxiliary circuit rated value of a kV  maximum permissible voltage for safe isolation between coil and main contacts according to EN 60947-1  shock resistance at rectangular impulse of at AC of at DC  shock resistance with sine pulse of the Contactor with sine pulse of the contactor lypical of othe contactor with added electronically optimized auxiliary switch block typical of the contactor with added duxiliary switch block typical of the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical reference code according to IEC 81346-2  Question of the contactor with added auxiliary switch block typical reference code according to IEC 81346-2  Question of the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical of the contactor with added auxil	auxiliary switch	Yes
at AC in hot operating state per pole  without load current share typical  insulation voltage  of main circuit with degree of pollution 3 rated value of auxiliary circuit with degree of pollution 3 rated value  foso V  of auxiliary circuit with degree of pollution 3 rated value of auxiliary circuit rated value of avxiliary circuit rated value of auxiliary circuit rated value of avxiliary sible voltage for safe isolation between coil and main contacts according to EN 60947-1  shock resistance at rectangular impulse of at AC of contactor with sine pulse of the contactor with added electronically optimized auxiliary switch block typical of the contactor with added electronically optimized auxiliary switch block typical of the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical reference code according to IEC 81346-2  Substance Prohibitance (Date)  Ambient conditions installation altitude at height above sea level maximum ambient temperature of during operation  2 000 m	power loss [W] for rated value of the current	
insulation voltage  of main circuit with degree of pollution 3 rated value of auxiliary circuit with degree of pollution 3 rated value of auxiliary circuit with degree of pollution 3 rated value of auxiliary circuit rated value of main circuit rated value of auxiliary circuit rated value of the contactor with sine pulse of the contactor with added electronically optimized auxiliary switch block typical of the contactor with added auxiliary switch block typical	<ul> <li>at AC in hot operating state</li> </ul>	6.6 W
insulation voltage	<ul> <li>at AC in hot operating state per pole</li> </ul>	2.2 W
of main circuit with degree of pollution 3 rated value     of auxiliary circuit with degree of pollution 3 rated value  surge voltage resistance     of main circuit rated value     of auxiliary circuit rated value     active at rectangular impulse     of at AC     of of contactor with sine pulse     of the Contactor with added electronically optimized auxiliary switch block typical     of the contactor with added delectronically optimized auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary	<ul> <li>without load current share typical</li> </ul>	2 W
of auxiliary circuit with degree of pollution 3 rated value  surge voltage resistance     of main circuit rated value     of auxiliary circuit rated value     of the Contacts according to EN 60947-1  shock resistance at rectangular impulse     of at AC     of C     of C     of T,7g / 5 ms, 4.5g / 10 ms     of the C     of the contactor with sine pulse     of the contactor typical     of the contactor with added electronically optimized auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical  reference code according to IEC 81346-2     Q  Substance Prohibitance (Date)  installation altitude at height above sea level maximum  ambient temperature     oduring operation  -25 +60 °C	insulation voltage	
surge voltage resistance  of main circuit rated value  of auxiliary circuit rated value  of auxiliary circuit rated value  maximum permissible voltage for safe isolation between coil and main contacts according to EN 60947-1  shock resistance at rectangular impulse  ot at AC  at DC  7.7g / 5 ms, 4.5g / 10 ms  shock resistance with sine pulse  ot at AC  at DC  12g / 5 ms, 7g / 10 ms  at DC  12g / 5 ms, 7g / 10 ms  mechanical service life (switching cycles)  of contactor typical  of the contactor typical  of the contactor with added electronically optimized auxiliary switch block typical  of the contactor with added auxiliary switch block typical  of the contactor with added auxiliary switch block typical  reference code according to IEC 81346-2  Q  Substance Prohibitance (Date)  installation altitude at height above sea level maximum  ambient temperature  of during operation  -25 +60 °C	<ul> <li>of main circuit with degree of pollution 3 rated value</li> </ul>	690 V
of main circuit rated value     of auxiliary circuit rated value     of auxiliary circuit rated value     adwind permissible voltage for safe isolation between coil and main contacts according to EN 60947-1      shock resistance at rectangular impulse     ot at AC     ot at DC     ot contactor with added electronically optimized auxiliary switch block typical     of the contactor with added electronically optimized auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block     typical     of the contactor with added auxiliary switch block     typical     of the contactor with added auxiliary switch block     typical     of the contactor with added auxiliary switch block     typical     of the contactor with added auxiliary switch block     typical     of the contactor with added auxiliary switch block     typical     of the contactor with added auxiliary switch block     of the conta		690 V
of auxiliary circuit rated value     maximum permissible voltage for safe isolation between coil and main contacts according to EN 60947-1  shock resistance at rectangular impulse     oat AC     oat DC     at DC     at DC     of contactor typical     of the contactor with added electronically optimized auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     reference code according to IEC 81346-2     Substance Prohibitance (Date)  Ambient conditions  installation altitude at height above sea level maximum  ambient temperature     oduring operation      dat OV      7.7g / 5 ms, 4.5g / 10 ms     7.7g / 5 ms, 7g / 10 ms     12g / 5 ms,	surge voltage resistance	
maximum permissible voltage for safe isolation between coil and main contacts according to EN 60947-1  shock resistance at rectangular impulse  • at AC • at DC  shock resistance with sine pulse • at AC • at DC  shock resistance with sine pulse • at AC • at DC  at AC • at DC  12g / 5 ms, 4.5g / 10 ms  12g / 5 ms, 7g / 10 ms  12g / 5 ms, 7g / 10 ms  mechanical service life (switching cycles) • of contactor typical • of the contactor with added electronically optimized auxiliary switch block typical • of the contactor with added auxiliary switch block typical • of the contactor with added auxiliary switch block typical  reference code according to IEC 81346-2  Substance Prohibitance (Date)  Ambient conditions  installation altitude at height above sea level maximum  ambient temperature • during operation  400 V  7.7g / 5 ms, 4.5g / 10 ms  7.7g / 5 ms, 4.5g / 10 ms  12g / 5 ms, 7g / 10 ms  5 000 000  5 000 000  5 000 000  5 000 000	<ul> <li>of main circuit rated value</li> </ul>	6 kV
shock resistance at rectangular impulse  • at AC  • at DC  shock resistance with sine pulse  • at AC  • at DC  • of contactor life (switching cycles)  • of contactor typical  • of the contactor with added electronically optimized auxiliary switch block typical  • of the contactor with added auxiliary switch block typical  • of the c	of auxiliary circuit rated value	6 kV
<ul> <li>at AC</li> <li>at DC</li> <li>7.7g / 5 ms, 4.5g / 10 ms</li> <li>shock resistance with sine pulse</li> <li>at AC</li> <li>at DC</li> <li>12g / 5 ms, 7g / 10 ms</li> <li>at DC</li> <li>12g / 5 ms, 7g / 10 ms</li> <li>of contactor typical</li> <li>of the contactor with added electronically optimized auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor typical</li> <l< td=""><td></td><td>400 V</td></l<></ul>		400 V
at DC      shock resistance with sine pulse     at AC     at DC      at	shock resistance at rectangular impulse	
shock resistance with sine pulse  • at AC  • at DC  12g / 5 ms, 7g / 10 ms  mechanical service life (switching cycles)  • of contactor typical  • of the contactor with added electronically optimized auxiliary switch block typical  • of the contactor with added auxiliary switch block typical  reference code according to IEC 81346-2  Substance Prohibitance (Date)  Ambient conditions  installation altitude at height above sea level maximum  ambient temperature  • during operation  12g / 5 ms, 7g / 10 ms  5 000 000  5 000 000  5 000 000  5 000 000	• at AC	7.7g / 5 ms, 4.5g / 10 ms
<ul> <li>at AC</li> <li>at DC</li> <li>12g / 5 ms, 7g / 10 ms</li> <li>mechanical service life (switching cycles)</li> <li>of contactor typical</li> <li>of the contactor with added electronically optimized auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>reference code according to IEC 81346-2</li> <li>Substance Prohibitance (Date)</li> <li>Ambient conditions</li> <li>installation altitude at height above sea level maximum</li> <li>ambient temperature</li> <li>oduring operation</li> <li>-25 +60 °C</li> </ul>	• at DC	7.7g / 5 ms, 4.5g / 10 ms
at DC  mechanical service life (switching cycles)     of contactor typical     of the contactor with added electronically optimized auxiliary switch block typical     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical  reference code according to IEC 81346-2  Substance Prohibitance (Date)  Ambient conditions  installation altitude at height above sea level maximum  ambient temperature     oduring operation  12g / 5 ms, 7g / 10 ms  5 000 000  5 000 000  5 000 000  5 000 000	shock resistance with sine pulse	
mechanical service life (switching cycles)  of contactor typical of the contactor with added electronically optimized auxiliary switch block typical of the contactor with added auxiliary switch block typical  reference code according to IEC 81346-2  Substance Prohibitance (Date)  Ambient conditions installation altitude at height above sea level maximum ambient temperature of during operation  5 000 000  5 000 000  5 000 000  5 000 000	• at AC	12g / 5 ms, 7g / 10 ms
<ul> <li>of contactor typical</li> <li>of the contactor with added electronically optimized auxiliary switch block typical</li> <li>of the contactor with added auxiliary switch block typical</li> <li>reference code according to IEC 81346-2</li> <li>Substance Prohibitance (Date)</li> <li>Ambient conditions         <ul> <li>installation altitude at height above sea level maximum</li> <li>ambient temperature</li> <li>during operation</li> <li>5 000 000</li> </ul> </li> <li>5 000 000</li> <li>6 000 000</li> <li>7 000 000</li> <li>7 000 000</li> <li>7 000 000</li> </ul> <li>-25 +60 °C</li>	• at DC	12g / 5 ms, 7g / 10 ms
of the contactor with added electronically optimized auxiliary switch block typical     of the contactor with added auxiliary switch block typical      reference code according to IEC 81346-2  Substance Prohibitance (Date)  Ambient conditions  installation altitude at height above sea level maximum  ambient temperature     oduring operation      5 000 000      000	mechanical service life (switching cycles)	
auxiliary switch block typical  of the contactor with added auxiliary switch block typical  reference code according to IEC 81346-2  Substance Prohibitance (Date)  Ambient conditions installation altitude at height above sea level maximum  ambient temperature of during operation  of the contactor with added auxiliary switch block to 5 000 000  01/29/2021  Q  2 00/2021	<ul> <li>of contactor typical</li> </ul>	5 000 000
reference code according to IEC 81346-2 Q Substance Prohibitance (Date) 01/29/2021  Ambient conditions installation altitude at height above sea level maximum 2 000 m  ambient temperature  • during operation -25 +60 °C		5 000 000
Substance Prohibitance (Date)  Ambient conditions  installation altitude at height above sea level maximum  ambient temperature  • during operation  01/29/2021  2 000 m  -25 +60 °C		5 000 000
Ambient conditions  installation altitude at height above sea level maximum 2 000 m  ambient temperature  • during operation -25 +60 °C	reference code according to IEC 81346-2	Q
installation altitude at height above sea level maximum  ambient temperature  • during operation  -25 +60 °C	Substance Prohibitance (Date)	01/29/2021
ambient temperature         ● during operation         -25 +60 °C	Ambient conditions	
• during operation -25 +60 °C	installation altitude at height above sea level maximum	2 000 m
	ambient temperature	
• during storage -55 +80 °C	<ul> <li>during operation</li> </ul>	-25 +60 °C
	during storage	-55 +80 °C

relative humidity minimum	10 %
relative humidity at 55 °C according to IEC 60068-2-30 maximum	95 %
ain circuit	
number of poles for main current circuit	3
number of NO contacts for main contacts	3
operating voltage	
<ul> <li>at AC-3 rated value maximum</li> </ul>	690 V
<ul> <li>at AC-3e rated value maximum</li> </ul>	690 V
operational current	
<ul> <li>at AC-1 at 400 V at ambient temperature 40 °C rated value</li> <li>at AC-1</li> </ul>	60 A
— up to 690 V at ambient temperature 40 $^{\circ}\text{C}$ rated value	60 A
— up to 690 V at ambient temperature 60 $^{\circ}\text{C}$ rated value	55 A
• at AC-3	
— at 400 V rated value	41 A
— at 500 V rated value	41 A
— at 690 V rated value	24 A
• at AC-3e	
— at 400 V rated value	41 A
— at 500 V rated value	41 A
— at 690 V rated value	24 A
at AC-4 at 400 V rated value	35 A
at AC-5a up to 690 V rated value	52.8 A
at AC-5b up to 400 V rated value	33.2 A
• at AC-6a	00.27
up to 230 V for current peak value n=20 rated value	36.5 A
<ul> <li>up to 400 V for current peak value n=20 rated value</li> </ul>	36.5 A
<ul> <li>up to 500 V for current peak value n=20 rated value</li> </ul>	36.5 A
— up to 690 V for current peak value n=20 rated value	24 A
• at AC-6a	
— up to 230 V for current peak value n=30 rated value	24.2 A
<ul> <li>up to 400 V for current peak value n=30 rated value</li> <li>up to 500 V for current peak value n=30 rated</li> </ul>	24.2 A 24.2 A
value  — up to 690 V for current peak value n=30 rated  — up to 690 V for current peak value n=30 rated	24 A
value value minimum cross-section in main circuit at maximum AC-1	16 mm <sup>2</sup>
operational current for approx. 200000 operating	
cycles at AC-4	
at 400 V rated value	22 A
at 690 V rated value	18.5 A
operational current	
at 1 current path at DC-1	
— at 24 V rated value	55 A
— at 110 V rated value	4.5 A
— at 220 V rated value	1 A
— at 440 V rated value	0.4 A
— at 600 V rated value	0.25 A
<ul> <li>with 2 current paths in series at DC-1</li> </ul>	
— at 24 V rated value	55 A
— at 110 V rated value	45 A
— at 220 V rated value	5 A

— at 440 V rated value	1 A
— at 600 V rated value	0.8 A
<ul> <li>with 3 current paths in series at DC-1</li> </ul>	
— at 24 V rated value	55 A
— at 110 V rated value	55 A
— at 220 V rated value	45 A
— at 440 V rated value	2.9 A
— at 600 V rated value	1.4 A
• at 1 current path at DC-3 at DC-5	
— at 24 V rated value	35 A
— at 110 V rated value	2.5 A
— at 220 V rated value	1 A
— at 440 V rated value	0.1 A
— at 600 V rated value	0.06 A
with 2 current paths in series at DC-3 at DC-5	0.5571
— at 24 V rated value	55 A
— at 110 V rated value	25 A
— at 220 V rated value	5 A
— at 440 V rated value	0.27 A
— at 440 V rated value  — at 600 V rated value	0.16 A
	0.10 A
with 3 current paths in series at DC-3 at DC-5     at 24 V rated value.	55 A
— at 24 V rated value	55 A
— at 110 V rated value	55 A
— at 220 V rated value	25 A
— at 440 V rated value	0.6 A
— at 600 V rated value	0.35 A
operating power	40.5111/
at AC-2 at 400 V rated value	18.5 kW
• at AC-3	
— at 230 V rated value	11 kW
— at 400 V rated value	18.5 kW
— at 500 V rated value	22 kW
— at 690 V rated value	22 kW
• at AC-3e	
— at 230 V rated value	11 kW
— at 400 V rated value	18.5 kW
— at 500 V rated value	22 kW
— at 690 V rated value	22 kW
operating power for approx. 200000 operating cycles	
at AC-4	44.01114
• at 400 V rated value	11.6 kW
at 690 V rated value	16.8 kW
operating apparent power at AC-6a	
• up to 400 V for current peak value n=20 rated value	25 200 VA
<ul> <li>up to 500 V for current peak value n=20 rated value</li> </ul>	31 600 VA
up to 690 V for current peak value n=20 rated value	28 600 VA
operating apparent power at AC-6a	
<ul> <li>up to 230 V for current peak value n=30 rated value</li> </ul>	9 600 VA
<ul> <li>up to 400 V for current peak value n=30 rated value</li> </ul>	16 800 VA
<ul> <li>up to 500 V for current peak value n=30 rated value</li> </ul>	21 000 VA
• up to 690 V for current peak value n=30 rated value	28 600 VA
short-time withstand current in cold operating state up to 40 °C	
<ul> <li>limited to 1 s switching at zero current maximum</li> </ul>	843 A; Use minimum cross-section acc. to AC-1 rated value
<ul> <li>limited to 5 s switching at zero current maximum</li> </ul>	596 A; Use minimum cross-section acc. to AC-1 rated value
<ul> <li>limited to 10 s switching at zero current maximum</li> </ul>	400 A; Use minimum cross-section acc. to AC-1 rated value
<ul> <li>limited to 30 s switching at zero current maximum</li> </ul>	241 A; Use minimum cross-section acc. to AC-1 rated value
limited to 60 s switching at zero current maximum	196 A; Use minimum cross-section acc. to AC-1 rated value
no-load switching frequency	
• at AC	1 000 1/h
• at DC	1 000 1/h

operating frequency	
<ul><li>at AC-1 maximum</li></ul>	1 000 1/h
<ul><li>at AC-2 maximum</li></ul>	750 1/h
<ul><li>at AC-3 maximum</li></ul>	1 000 1/h
<ul><li>at AC-3e maximum</li></ul>	1 000 1/h
at AC-4 maximum	300 1/h
Control circuit/ Control	
type of voltage of the control supply voltage	AC/DC
control supply voltage at AC	
<ul> <li>at 50 Hz rated value</li> </ul>	21 33 V
<ul> <li>at 60 Hz rated value</li> </ul>	21 33 V
control supply voltage at DC	
rated value	21 33 V
type of PLC-control input according to IEC 60947-1	Type 1
consumed current at PLC-control input according to	11 mA
IEC 60947-1 maximum	
voltage at PLC-control input rated value	24 V
operating range factor of the voltage at PLC-control	0.8 1.1
input	
operating range factor control supply voltage rated value of magnet coil at DC	
initial value	0.8
Initial value     full-scale value	0.8
	1.1
operating range factor control supply voltage rated value of magnet coil at AC	
• at 50 Hz	0.8 1.1
• at 60 Hz	0.8 1.1
design of the surge suppressor	with varistor
inrush current peak	2.2 A
duration of inrush current peak	100 µs
locked-rotor current mean value	1.6 A
locked-rotor current peak	2.6 A
duration of locked-rotor current	230 ms
holding current mean value	0.075 A
apparent pick-up power of magnet coil at AC	0.07071
• at 50 Hz	40 VA
• at 60 Hz	40 VA
apparent holding power of magnet coil at AC	
• at 50 Hz	2 VA
• at 60 Hz	2 VA
closing power of magnet coil at DC	40 W
holding power of magnet coil at DC	1.6 W
closing delay	
• at AC	35 110 ms
• at DC	35 110 ms
opening delay	
• at AC	30 55 ms
• at DC	30 55 ms
recovery time after power failure typical	2.1 s
arcing time	10 20 ms
control version of the switch operating mechanism	Fail-safe PLC input (F-PLC-IN)
Auxiliary circuit	
number of NC contacts for auxiliary contacts instantaneous contact	1
number of NO contacts for auxiliary contacts instantaneous contact	0
operational current at AC-12 maximum	10 A
operational current at AC-15	
at 230 V rated value	10 A
at 400 V rated value	3 A
at 500 V rated value     at 500 V rated value	2 A
■ at Juu v Tateu Value	41

at 690 V rated value	1 A
operational current at DC-12	
at 24 V rated value	10 A
<ul><li>at 48 V rated value</li></ul>	6 A
<ul> <li>at 60 V rated value</li> </ul>	6 A
<ul> <li>at 110 V rated value</li> </ul>	3 A
<ul> <li>at 125 V rated value</li> </ul>	2 A
<ul> <li>at 220 V rated value</li> </ul>	1 A
at 600 V rated value	0.15 A
operational current at DC-13	
<ul> <li>at 24 V rated value</li> </ul>	10 A
<ul> <li>at 48 V rated value</li> </ul>	2 A
<ul> <li>at 60 V rated value</li> </ul>	2 A
<ul> <li>at 110 V rated value</li> </ul>	1 A
<ul> <li>at 125 V rated value</li> </ul>	0.9 A
<ul> <li>at 220 V rated value</li> </ul>	0.3 A
at 600 V rated value	0.1 A
contact reliability of auxiliary contacts	1 faulty switching per 100 million (17 V, 1 mA)
UL/CSA ratings	
full-load current (FLA) for 3-phase AC motor	
at 480 V rated value	40 A
• at 600 V rated value	41 A
yielded mechanical performance [hp]	
for single-phase AC motor	
— at 110/120 V rated value	3 hp
— at 230 V rated value	7.5 hp
<ul> <li>for 3-phase AC motor</li> </ul>	·
— at 200/208 V rated value	10 hp
<ul> <li>at 220/230 V rated value</li> </ul>	15 hp
<ul> <li>at 460/480 V rated value</li> </ul>	30 np
<ul><li>— at 460/480 V rated value</li><li>— at 575/600 V rated value</li></ul>	30 hp 40 hp
— at 575/600 V rated value	40 hp
— at 575/600 V rated value contact rating of auxiliary contacts according to UL	
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  Short-circuit protection	40 hp
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  Short-circuit protection  design of the fuse link	40 hp
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  Short-circuit protection  design of the fuse link  • for short-circuit protection of the main circuit	40 hp A600 / P600
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  Short-circuit protection  design of the fuse link	40 hp
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  Short-circuit protection  design of the fuse link  • for short-circuit protection of the main circuit	40 hp A600 / P600 gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  Short-circuit protection  design of the fuse link  • for short-circuit protection of the main circuit  — with type of coordination 1 required	40 hp A600 / P600 gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA)
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA)
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA)
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715 Yes
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting height	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715 Yes 114 mm
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715  Yes 114 mm 55 mm
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width  depth	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715 Yes 114 mm
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width  depth  required spacing	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715  Yes 114 mm 55 mm
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width  depth  required spacing  • with side-by-side mounting	gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715 Yes 114 mm 55 mm 130 mm
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width  depth  required spacing  • with side-by-side mounting  — forwards	gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715  Yes  114 mm  55 mm  130 mm
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width  depth  required spacing  • with side-by-side mounting  — forwards  — upwards	gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715 Yes 114 mm 55 mm 130 mm
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  Short-circuit protection  design of the fuse link  • for short-circuit protection of the main circuit  — with type of coordination 1 required  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width  depth  required spacing  • with side-by-side mounting  — forwards  — upwards  — downwards	gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715 Yes  114 mm 55 mm 130 mm  10 mm 10 mm 10 mm
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  Short-circuit protection  design of the fuse link  • for short-circuit protection of the main circuit  — with type of coordination 1 required  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width  depth  required spacing  • with side-by-side mounting  — forwards  — upwards  — downwards  — at the side	gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715 Yes 114 mm 55 mm 130 mm
contact rating of auxiliary contacts according to UL  Short-circuit protection  design of the fuse link  • for short-circuit protection of the main circuit  — with type of coordination 1 required  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width  depth  required spacing  • with side-by-side mounting  — forwards  — upwards  — downwards  — at the side  • for grounded parts	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715 Yes 114 mm 55 mm 130 mm  10 mm 10 mm 0 mm
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width  depth  required spacing  • with side-by-side mounting  — forwards  — upwards  — downwards  — at the side  • for grounded parts  — forwards	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715  Yes 114 mm 55 mm 130 mm  10 mm 10 mm 10 mm 10 mm
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width  depth  required spacing  • with side-by-side mounting  — forwards  — upwards  — downwards  — at the side  • for grounded parts  — forwards  — upwards  — forwards  — upwards  — torwards  — upwards  — torwards  — upwards  — upwards	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715  Yes 114 mm 55 mm 130 mm  10 mm 10 mm 10 mm 10 mm
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  Short-circuit protection  design of the fuse link  • for short-circuit protection of the main circuit  — with type of coordination 1 required  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width  depth  required spacing  • with side-by-side mounting  — forwards  — upwards  — at the side  • for grounded parts  — forwards  — upwards  — upwards  — at the side  • for grounded parts  — forwards  — upwards  — upwards  — at the side	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715  Yes  114 mm 55 mm 130 mm  10 mm 10 mm 10 mm 10 mm 10 mm 10 mm 10 mm
— at 575/600 V rated value  contact rating of auxiliary contacts according to UL  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  • for short-circuit protection of the auxiliary switch required  Installation/ mounting/ dimensions  mounting position  fastening method  • side-by-side mounting  height  width  depth  required spacing  • with side-by-side mounting  — forwards  — upwards  — downwards  — at the side  • for grounded parts  — forwards  — upwards  — forwards  — upwards  — torwards  — upwards  — torwards  — upwards  — upwards	40 hp A600 / P600  gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA) gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA) gG: 10 A (500 V, 1 kA)  +/-180° rotation possible on vertical mounting surface; can be tilted forward and backward by +/- 22.5° on vertical mounting surface screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 60715  Yes 114 mm 55 mm 130 mm  10 mm 10 mm 10 mm 10 mm

forwards	10 mm
— forwards	10 mm 10 mm
— upwards — downwards	10 mm 10 mm
— downwards — at the side	6 mm
Connections/ Terminals	
type of electrical connection	
for main current circuit	screw-type 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	1 0 71
• for main contacts	
— solid or stranded	2x (1 35 mm²), 1x (1 50 mm²)
<ul> <li>finely stranded with core end processing</li> </ul>	2x (1 25 mm²), 1x (1 35 mm²)
<ul> <li>at AWG cables for main contacts</li> </ul>	2x (18 2), 1x (18 1)
connectable conductor cross-section for main	
contacts	4 05 2
finely stranded with core end processing	1 35 mm²
connectable conductor cross-section for auxiliary contacts	
solid or stranded	0.5 2.5 mm²
finely stranded with core end processing	0.5 1.5 mm²
finely stranded with core end processing     finely stranded without core end processing	0.5 2.5 mm²
type of connectable conductor cross-sections	
for auxiliary contacts	
— solid or stranded	2x (0.5 2.5 mm²)
<ul> <li>finely stranded with core end processing</li> </ul>	2x (0.5 1.5 mm²)
finely stranded without core end processing	2x (0.5 2.5 mm²)
at AWG cables for auxiliary contacts	2x (20 14)
AWG number as coded connectable conductor cross	
section	
• for main contacts	18 1
for auxiliary contacts	18 1 20 14
• for auxiliary contacts Safety related data	
for auxiliary contacts  Safety related data  product function	20 14
for auxiliary contacts  Safety related data  product function      mirror contact according to IEC 60947-4-1	20 14 Yes
for auxiliary contacts  Safety related data  product function	20 14
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1	20 14  Yes No
<ul> <li>for auxiliary contacts</li> <li>Safety related data</li> <li>product function</li> <li>mirror contact according to IEC 60947-4-1</li> <li>positively driven operation according to IEC 60947-</li> </ul>	20 14 Yes
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2	20 14  Yes No Type B
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920	20 14  Yes No  Type B 1 000 000
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508	20 14  Yes No  Type B 1 000 000 2
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061	20 14  Yes No  Type B 1 000 000 2 2
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1	20 14  Yes No  Type B 1 000 000 2 2 c
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1  category according to EN ISO 13849-1	20 14  Yes No  Type B 1 000 000 2 2 C 2
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1  category according to EN ISO 13849-1  stop category according to EN 60204-1	20 14  Yes No  Type B 1 000 000 2 2 C C 0
<ul> <li>for auxiliary contacts</li> <li>Safety related data</li> <li>product function         <ul> <li>mirror contact according to IEC 60947-4-1</li> <li>positively driven operation according to IEC 60947-5-1</li> </ul> </li> <li>safety device type according to IEC 61508-2         <ul> <li>B10 value with high demand rate according to SN 31920</li> <li>Safety Integrity Level (SIL) according to IEC 61508</li> </ul> </li> <li>SIL Claim Limit (subsystem) according to EN 62061         <ul> <li>performance level (PL) according to EN ISO 13849-1</li> <li>category according to EN ISO 13849-1</li> </ul> </li> <li>stop category according to EN 60204-1</li> <li>Safe failure fraction (SFF)</li> <li>diagnostics test interval by internal test function</li> </ul>	Yes No Type B 1 000 000 2 2 C 2 0 96 %
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1  category according to EN ISO 13849-1  stop category according to EN 60204-1  Safe failure fraction (SFF)  diagnostics test interval by internal test function maximum	Yes No Type B 1 000 000 2 2 C 2 0 96 %
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1  category according to EN ISO 13849-1  stop category according to EN 60204-1  Safe failure fraction (SFF)  diagnostics test interval by internal test function maximum  proportion of dangerous failures	Yes No  Type B 1 000 000 2 2 C 2 0 96 % 28 800 s
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1  category according to EN ISO 13849-1  stop category according to EN 60204-1  Safe failure fraction (SFF)  diagnostics test interval by internal test function maximum  proportion of dangerous failures     with low demand rate according to SN 31920	Yes No  Type B 1 000 000 2 2 2 0 96 % 28 800 s
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1  category according to EN ISO 13849-1  stop category according to EN 60204-1  Safe failure fraction (SFF)  diagnostics test interval by internal test function maximum  proportion of dangerous failures     with low demand rate according to SN 31920     with high demand rate according to SN 31920 failure rate [FIT] with low demand rate according to SN	Yes No Type B 1 000 000 2 2 2 C C 2 0 96 % 28 800 s
for auxiliary contacts  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1  category according to EN ISO 13849-1  stop category according to EN 60204-1  Safe failure fraction (SFF)  diagnostics test interval by internal test function maximum  proportion of dangerous failures     with low demand rate according to SN 31920  with high demand rate according to SN 31920  failure rate [FIT] with low demand rate according to SN 31920	Yes No Type B 1 000 000 2 2 2 C C 2 0 96 % 28 800 s
• for auxiliary contacts  Safety related data  product function  • mirror contact according to IEC 60947-4-1  • positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1  category according to EN ISO 13849-1  stop category according to EN 60204-1  Safe failure fraction (SFF)  diagnostics test interval by internal test function maximum  proportion of dangerous failures  • with low demand rate according to SN 31920  • with high demand rate according to SN 31920  failure rate [FIT] with low demand rate according to SN 31920  PFHD with high demand rate according to EN 62061	Yes No  Type B 1 000 000 2 2 2 C 2 0 96 % 28 800 s  40 % 73 % 100 FIT
• for auxiliary contacts  Safety related data  product function  • mirror contact according to IEC 60947-4-1  • positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1  category according to EN ISO 13849-1  stop category according to EN 60204-1  Safe failure fraction (SFF)  diagnostics test interval by internal test function maximum  proportion of dangerous failures  • with low demand rate according to SN 31920  • with high demand rate according to SN 31920  failure rate [FIT] with low demand rate according to SN 31920  PFHD with high demand rate according to EN 62061  PFDavg with low demand rate according to IEC 61508	Yes No  Type B 1 000 000 2 2 c 2 0 96 % 28 800 s  40 % 73 % 100 FIT  0.000000077 1/h 0.0067
• for auxiliary contacts  Safety related data  product function  • mirror contact according to IEC 60947-4-1  • positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1  category according to EN ISO 13849-1  stop category according to EN 60204-1  Safe failure fraction (SFF)  diagnostics test interval by internal test function maximum  proportion of dangerous failures  • with low demand rate according to SN 31920  • with high demand rate according to SN 31920  failure rate [FIT] with low demand rate according to SN 31920  PFHD with high demand rate according to EN 62061  PFDavg with low demand rate according to IEC 61508  MTBF  hardware fault tolerance according to IEC 61508  T1 value for proof test interval or service life according to	Yes No  Type B 1 000 000 2 2 2 0 96 % 28 800 s  40 % 73 % 100 FIT  0.000000077 1/h 0.0067 52 y
• for auxiliary contacts  Safety related data  product function  • mirror contact according to IEC 60947-4-1  • positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1  category according to EN ISO 13849-1  stop category according to EN 60204-1  Safe failure fraction (SFF)  diagnostics test interval by internal test function maximum  proportion of dangerous failures  • with low demand rate according to SN 31920  • with high demand rate according to SN 31920  failure rate [FIT] with low demand rate according to SN 31920  PFHD with high demand rate according to EN 62061  PFDavg with low demand rate according to IEC 61508  MTBF  hardware fault tolerance according to IEC 61508  T1 value for proof test interval or service life according to IEC 61508	Yes No  Type B 1 000 000 2 2 2 0 96 % 28 800 s  40 % 73 % 100 FIT  0.000000077 1/h 0.0067 52 y 0 20 y
• for auxiliary contacts  Safety related data  product function  • mirror contact according to IEC 60947-4-1  • positively driven operation according to IEC 60947-5-1  safety device type according to IEC 61508-2  B10 value with high demand rate according to SN 31920  Safety Integrity Level (SIL) according to IEC 61508  SIL Claim Limit (subsystem) according to EN 62061  performance level (PL) according to EN ISO 13849-1  category according to EN ISO 13849-1  stop category according to EN 60204-1  Safe failure fraction (SFF)  diagnostics test interval by internal test function maximum  proportion of dangerous failures  • with low demand rate according to SN 31920  • with high demand rate according to SN 31920  failure rate [FIT] with low demand rate according to SN 31920  PFHD with high demand rate according to EN 62061  PFDavg with low demand rate according to IEC 61508  MTBF  hardware fault tolerance according to IEC 61508  T1 value for proof test interval or service life according to	Yes No Type B 1 000 000 2 2 2 C 2 0 96 % 28 800 s  40 % 73 % 100 FIT  0.000000077 1/h 0.0067 52 y 0

## suitability for use

- safety-related switching on
- safety-related switching OFF

No Yes

Certificates/ approvals

## **General Product Approval**





Confirmation



KC



**EMC** 

**Functional** Safety/Safety of Machinery

**Declaration of** Conformity

**Test Certificates** 

Marine / Shipping



Type Examination Certificate



Type Test Certificates/Test Report





Marine / Shipping







Confirmation

other

Vibration and Shock

Railway

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=3RT2035-3SB30

Cax online generator

http://support.automation.siemens.com/WW/CAXorder/default.aspx?lang=en&mlfb=3RT2035-3SB30

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

https://support.industry.siemens.com/cs/ww/en/ps/3RT2035-3SB30

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

http://www.automation.siemens.com/bilddb/cax\_de.aspx?mlfb=3RT2035-3SB30&lang=en

Characteristic: Tripping characteristics, I2t, Let-through current

https://support.industry.siemens.com/cs/ww/en/ps/3RT2035-3SB30/char

Further characteristics (e.g. electrical endurance, switching frequency) <a href="http://www.automation.siemens.com/bilddb/index.aspx?view=Search&mlfb=3RT2035-3SB30&objecttype=14&gridview=view1">http://www.automation.siemens.com/bilddb/index.aspx?view=Search&mlfb=3RT2035-3SB30&objecttype=14&gridview=view1</a>

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