**Data sheet** 

## 3RT2036-1NB30-1AA0



power contactor, AC-3e/AC-3, 51 A, 22 kW / 400 V, 3-pole, 20-33 V AC/DC, 50/60 Hz, with integrated varistor, auxiliary contacts: 1 NO + 1 NC, screw terminal, size: S2, upright mounting position

product brand name	SIRIUS
product designation	Power contactor
product type designation	3RT2
General technical data	
size of contactor	S2
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>	12 W
<ul> <li>at AC in hot operating state per pole</li> </ul>	4 W
<ul> <li>without load current share typical</li> </ul>	1 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 protective separation between coil and main contacts according to EN 60947-1	400 V
shock resistance at rectangular impulse	
• at AC	7.7g / 5 ms, 4.5g / 10 ms
• at DC	7.7g / 5 ms, 4.5g / 10 ms
shock resistance with sine pulse	
• at AC	12g / 5 ms, 7g / 10 ms
• at DC	12g / 5 ms, 7g / 10 ms
mechanical service life (operating cycles)	
<ul> <li>of contactor typical</li> </ul>	10 000 000
<ul> <li>of the contactor with added electronically optimized auxiliary switch block typical</li> </ul>	5 000 000
of the contactor with added auxiliary switch block typical	10 000 000
reference code according to IEC 81346-2	Q
Substance Prohibitance (Date)	10/01/2014
SVHC substance name	Blei - 7439-92-1 Bleimonoxid (Bleioxid) - 1317-36-8 2-Methyl-1-(4-methylthiophenyl)-2-morpho - 71868-10-5
Ambient conditions	
installation altitude at height above sea level maximum	2 000 m
ambient temperature	
during operation	-25 +60 °C
during storage	-55 +80 °C

— 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 60 V rated value	6 A
— at 220 V rated value	1 A
— at 440 V rated value	0.1 A
— at 600 V rated value	0.06 A
<ul> <li>with 2 current paths in series at DC-3 at DC-5</li> </ul>	
— at 24 V rated value	55 A
— at 60 V rated value	45 A
— at 110 V rated value	25 A
— at 220 V rated value	5 A
— at 440 V rated value	0.27 A
— at 600 V rated value	0.16 A
<ul> <li>with 3 current paths in series at DC-3 at DC-5</li> </ul>	
— at 24 V rated value	55 A
— at 60 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	
at AC-2 at 400 V rated value	22 kW
• at AC-3	
— at 230 V rated value	15 kW
— at 400 V rated value	22 kW
— at 500 V rated value	22 kW
— at 690 V rated value	22 kW
• at AC-3e	20.111
— at 400 V rated value	22 kW
— at 500 V rated value	22 kW
— at 690 V rated value  operating power for approx. 200000 operating cycles at AC-	22 kW
4	
at 400 V rated value	12.6 kW
• at 690 V rated value	18.2 kW
operating apparent power at AC-6a	
• up to 230 V for current peak value n=20 rated value	17.2 kVA
• up to 400 V for current peak value n=20 rated value	29.9 kVA
• up to 500 V for current peak value n=20 rated value	37.4 kVA
• up to 690 V for current peak value n=20 rated value	28.6 kVA
operating apparent power at AC-6a	
• up to 230 V for current peak value n=30 rated value	11.4 kVA
• up to 400 V for current peak value n=30 rated value	19.9 kVA
• up to 500 V for current peak value n=30 rated value	24.9 kVA
up to 690 V for current peak value n=30 rated value	28.6 kVA
short-time withstand current in cold operating state up to 40 °C	
limited to 1 s switching at zero current maximum	937 A; Use minimum cross-section acc. to AC-1 rated value
limited to 7 s switching at zero current maximum	697 A; Use minimum cross-section acc. to AC-1 rated value
limited to 10 s switching at zero current maximum	468 A; Use minimum cross-section acc. to AC-1 rated value
limited to 30 s switching at zero current maximum	282 A; Use minimum cross-section acc. to AC-1 rated value
limited to 60 s switching at zero current maximum	229 A; Use minimum cross-section acc. to AC-1 rated value
no-load switching frequency	, , , , , , , , , , , , , , , , , , , ,
• at AC	1 500 1/h
• at DC	1 500 1/h
operating frequency	
• at AC-1 maximum	1 000 1/h

• at AC-2 maximum	600 1/h
• at AC-3 maximum	800 1/h
• at AC-3e maximum	800 1/h
at AC-4 maximum	250 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>	20 33 V
at 60 Hz rated value	20 33 V
control supply voltage at DC	
rated value	20 33 V
operating range factor control supply voltage rated value of	
magnet coil at DC	
• initial value	0.8
• full-scale value	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	3 A
duration of inrush current peak	50 μs
locked-rotor current mean value	1 A
locked-rotor current peak	2.6 A
duration of locked-rotor current	230 ms
holding current mean value	40 mA
apparent pick-up power of magnet coil at AC	
• at 50 Hz	40 VA
• at 60 Hz	40 VA
apparent holding power	
<ul> <li>at minimum rated control supply voltage at DC</li> </ul>	2 VA
at maximum rated control supply voltage at DC	2 VA
apparent holding power	
<ul> <li>at minimum rated control supply voltage at AC</li> </ul>	
— at 50 Hz	2 VA
— at 60 Hz	2 VA
<ul> <li>at maximum rated control supply voltage at AC</li> </ul>	
— at 50 Hz	2 VA
— at 60 Hz	2 VA
apparent holding power of magnet coil at AC	
• at 50 Hz	2 VA
● at 60 Hz	2 VA
inductive power factor with the holding power of the coil	
• at 50 Hz	0.95
• at 60 Hz	0.95
closing power of magnet coil at DC	23 W
holding power of magnet coil at DC	1 W
closing delay	05 440
• at AC	35 110 ms
• at DC	35 110 ms
opening delay	00 55
• at AC	30 55 ms
• at DC	30 55 ms
arcing time	10 20 ms
control version of the switch operating mechanism	Standard A1 - A2
Auxiliary circuit	
number of NC contacts for auxiliary contacts instantaneous contact	1
and a state of NO contracts for a william and a to instant and a second	1
number of NO contacts for auxiliary contacts instantaneous contact	
	10 A
contact	10 A

• at 230 V rated value	10 A
<ul> <li>at 400 V rated value</li> </ul>	3 A
<ul> <li>at 500 V rated value</li> </ul>	2 A
at 690 V rated value	1 A
operational current at DC-12	
at 24 V rated value	10 A
• at 48 V rated value	6 A
• at 60 V rated value	6 A
<ul> <li>at 110 V rated value</li> </ul>	3 A
at 125 V rated value	2 A
<ul> <li>at 220 V rated value</li> </ul>	1 A
<ul> <li>at 600 V rated value</li> </ul>	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	2 A
at 110 V rated value	1 A
• at 125 V rated value	0.9 A
at 220 V rated value	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	52 A
• at 600 V rated value	52 A
yielded mechanical performance [hp]	
for single-phase AC motor	
— at 110/120 V rated value	3 hp
— at 230 V rated value	10 hp
• for 3-phase AC motor	'
— at 200/208 V rated value	15 hp
— at 220/230 V rated value	15 hp
— at 460/480 V rated value	40 hp
— at 575/600 V rated value	50 hp
contact rating of auxiliary contacts according to UL	A600 / P600
Short-circuit protection	
design of the fuse link	
for short-circuit protection of the main circuit	
— with type of coordination 1 required	gG: 160 A (690 V, 100 kA), aM: 80 A (690 V, 100 kA), BS88: 125 A (415 V, 80 kA)
— with type of assignment 2 required	gG: 80A (690V,100kA), aM: 50A (690V,100kA), BS88: 63A (415V,80kA)
<ul> <li>for short-circuit protection of the auxiliary switch required</li> </ul>	gG: 10 A (500 V, 1 kA)
Installation/ mounting/ dimensions	
mounting position	standing, on horizontal mounting surface
fastening method	screw and snap-on mounting onto 35 mm DIN rail according to DIN EN 60715
• side-by-side mounting	Yes
height	114 mm
width	55 mm
depth	130 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	

— pywards — downwards — at the side  Connections/Terminals  type of electrical connection  • for main current circuit • for auxiliary and control circuit • for auxiliary and control circuit • for auxiliary and control circuit • at contactor for auxiliary contacts • of magnet coil  ype of connectable conductor cross-sections for main contacts • solid or stranded • finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts • solid or stranded • finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts • solid or stranded • finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts • solid or stranded • finely stranded with core end processing • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for AWG cables for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for AWG cables for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  - solid or stranded  - finely stranded with core end process	— forwards	10 mm
- downwards — at the side 6 mm  Connections/ terminals  Type of electrical connection  • for main current circuit screw-type terminals  • of maxiliary and control circuit screw-type terminals  • of maxiliary and control cross-sections for main contacts  • of magnet coil Screw-type terminals  • solid or stranded  • finely stranded with core end processing 2x (1 35 mm²), 1x (1 35 mm²)  • finely stranded with core end processing 2x (1 25 mm²), 1x (1 35 mm²)  • finely stranded with core end processing 1 35 mm²  • for auxiliary contacts  • solid or stranded  • finely stranded with core end processing 0.5 2.5 mm²  • for auxiliary contacts  • solid or stranded  • finely stranded with core end processing 0.5 2.5 mm²  • for auxiliary contacts  • for auxiliary contacts  • for auxiliary contacts  • for for auxiliary contacts  • for auxiliary conta		
The side of mm  Connections / Terminals  Type of electrical connection  • for main current circuit • for auxiliary and control circuit • for auxiliary and control circuit • for auxiliary and control circuit • for auxiliary contacts • of magnet coil  Screw-type terminals • of magnet coil  Screw-type terminals • of magnet coil  Screw-type terminals • solid or stranded • finely stranded with core end processing  connectable conductor cross-section for main contacts • finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts • solid or stranded • finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts • solid or stranded • finely stranded with core end processing  connectable conductor cross-sections • for auxiliary contacts  • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for AVNC cables for auxiliary contacts  • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for AVNC cables for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for AVNC cables for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  - for auxiliary contacts  - solid or stranded  - finely stranded with c	·	
type of electrical connection  for main current circuit  at contactor for auxiliary and control circuit  at contactor for auxiliary and control circuit  at contactor for auxiliary contacts  of magnet coil  type of connectable conductor cross-sections for main contacts  solid or stranded  finely stranded with core end processing  connectable conductor cross-section for main contacts  finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts  solid or stranded  finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts  solid or stranded  finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts  solid or stranded  finely stranded with core end processing  consultable conductor cross-sections  for auxiliary contacts  — solid or stranded  — finely stranded with core end processing  for auxiliary contacts  — solid or stranded  — finely stranded with core end processing  for auxiliary contacts  — solid or stranded  — finely stranded with core end processing  for auxiliary contacts  — solid or stranded  — finely stranded with core end processing  for auxiliary contacts  — solid or stranded  — finely stranded with core end processing  for auxiliary contacts  — solid or stranded  — finely stranded with core end processing  for auxiliary contacts  — solid or stranded  — finely stranded with core end processing  at contacts  — solid or stranded  — finely stranded with core end processing  at contacts  — solid or stranded  — finely stranded with core end processing  at contacts  — solid or stranded  — finely stranded with core end processing  at contacts  — solid or stranded  2x (0.5 1.5 mm²), 2x (0.75 2.5 mm²)  2x (20 1.5 mm		
type of electrical connection  • for main current circuit  • for auxiliary and control circuit  • at contactor for auxiliary contacts  • of magnet coil  type of connectable conductor cross-sections for main contacts  • finely stranded with core end processing  connectable conductor cross-section for main contacts  • finely stranded with core end processing  connectable conductor cross-section for main contacts  • finely stranded with core end processing  connectable conductor cross-section for main contacts  • finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts  • solid or stranded  • finely stranded with core end processing  type of connectable conductor cross-sections  • for auxiliary contacts  — solid or stranded  — finely stranded with core end processing  • for AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross-section  • for main contacts  • for main contacts  • for or auxiliary contacts  18 1  • positively driven operation according to IEC 60947-8-1  vestively driven operation according to IEC 60947-5-1  No  suitability for use safety-related switching OFF  Bro value with high demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to IEC 60529  finger-safe, for vertical contact from the front		6 mm
• for main current circuit • for auxiliary and control circuit • at contactor for auxiliary contacts • of magnet coil  type of connectable conductor cross-sections for main contacts • solid or stranded • finely stranded with core end processing  connectable conductor cross-section for main contacts • finely stranded with core end processing  connectable conductor cross-section for main contacts • finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts • solid or stranded • finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts • solid or stranded • finely stranded with core end processing  of auxiliary contacts  - solid or stranded - finely stranded with core end processing  • for auxiliary contacts  - solid or stranded - finely stranded with core end processing  • for AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross-section  • for main contacts - for auxiliary contacts  2u (20 15, mm²), 2x (0.75 2.5 mm²)  • for auxiliary contacts  2u (20 16), 2x (18 14)  AWG number as coded connectable conductor cross-section  • for main contacts - for auxiliary contacts  2u 14  Safety related data  product function  • mirror contact according to IEC 60947-6-1 • positively driven operation according to IEC 60947-5-1 No suitability for use safety-related switching OFF  B10 value with high demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rat		
• for auxiliary and control circuit • at contactor for auxiliary contacts • of magnet coil  type of connectable conductor cross-sections for main contacts • solid or stranded • finely stranded with core end processing  connectable conductor cross-section for main contacts • finely stranded with core end processing  connectable conductor cross-section for main contacts • finely stranded with core end processing  connectable conductor cross-section for main contacts • finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts • solid or stranded • finely stranded with core end processing  type of connectable conductor cross-sections • for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  - for auxiliary contacts  - solid or stranded  - finely stranded with core end processing  - for AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross-section • for rawin contacts • for auxiliary contacts  - for auxiliary contacts		
at contactor for auxiliary contacts by of magnet coil type of connectable conductor cross-sections for main contacts solid or stranded finely stranded with core end processing connectable conductor cross-section for main contacts finely stranded with core end processing connectable conductor cross-section for maxiliary contacts solid or stranded finely stranded with core end processing connectable conductor cross-section for auxiliary contacts solid or stranded finely stranded with core end processing connectable conductor cross-section for auxiliary contacts solid or stranded finely stranded with core end processing  for auxiliary contacts  solid or stranded finely stranded with core end processing  x(0.5 1.5 mm²), 2x (0.75 2.5 mm²)  x(		
of magnet coil  type of connectable conductor cross-sections for main contacts         • solid or stranded         • finely stranded with core end processing         connectable conductor cross-section for main contacts         • finely stranded with core end processing         connectable conductor cross-section for auxiliary contacts         • solid or stranded         • finely stranded with core end processing         connectable conductor cross-section for auxiliary contacts         • solid or stranded         • finely stranded with core end processing         • for auxiliary contacts         • for auxiliary contacts         • solid or stranded         • finely stranded with core end processing         • for auxiliary contacts         • solid or stranded         • for auxiliary contacts         • solid or stranded         • for AWG cables for auxiliary contacts         • for auxiliary contacts	•	
type of connectable conductor cross-sections for main contacts  • solid or stranded  • finely stranded with core end processing  connectable conductor cross-section for main contacts  • finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts  • solid or stranded  • finely stranded with core end processing  type of connectable conductor cross-sections  • for auxiliary contacts  - solid or stranded  — finely stranded with core end processing  • for AWG cables for auxiliary contacts  • for AWG cables for auxiliary contacts  • for auxiliary contacts  — finely stranded with core end processing  • for AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross-section  • for main contacts  • for auxiliary contacts  2x (0.5 1.5 mm²), 2x (0.75 2.5 mm²)  2x (20 16), 2x (18 14)  AWG number as coded connectable conductor cross-section  • for main contacts  • for auxiliary contacts  20 14  Safety related data  product function  • mirror contact according to IEC 60947-4-1  • positively driven operation according to IEC 60947-5-1  suitability for use safety-related switching OFF  Yes  B10 value with high demand rate according to SN 31920  • with low demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to IEC 60529  finger-safe, for vertical contact from the front	·	
• solid or stranded     • finely stranded with core end processing     connectable conductor cross-section for main contacts     • finely stranded with core end processing     connectable conductor cross-section for auxiliary contacts     • solid or stranded     • finely stranded with core end processing     connectable conductor cross-section for auxiliary contacts     • solid or stranded     • finely stranded with core end processing     type of connectable conductor cross-sections     • for auxiliary contacts		Screw-type terminals
• finely stranded with core end processing connectable conductor cross-section for main contacts • finely stranded with core end processing connectable conductor cross-section for auxiliary contacts • solid or stranded • finely stranded with core end processing finely stranded with core end processing • finely stranded with core end processing • for auxiliary contacts  - solid or stranded - finely stranded with core end processing • for auxiliary contacts  - solid or stranded - finely stranded with core end processing • for AWG cables for auxiliary contacts  - solid or stranded - finely stranded with core end processing • for AWG cables for auxiliary contacts  - solid or stranded - finely stranded with core end processing • for fave stranded connectable conductor cross section • for main contacts • for auxiliary contacts - for auxiliary contacts - for auxiliary contacts - for auxiliary contacts - solid contacts - for auxiliary cont		
connectable conductor cross-section for main contacts  • finely stranded with core end processing  connectable conductor cross-section for auxiliary contacts  • solid or stranded  • finely stranded with core end processing  type of connectable conductor cross-sections  • for auxiliary contacts  — solid or stranded — finely stranded with core end processing  • for AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross-section  • for main contacts  • for auxiliary contacts  18 1  • for auxiliary contacts  • for auxiliary contacts  • for auxiliary contacts  18 1  • for auxiliary contacts  20 1.5 mm²), 2x (0.75 2.5 mm²)  2x (20 16), 2x (18 14)  AWG number as coded connectable conductor cross-section  • for main contacts  • for auxiliary contacts  20 14  Safety related data  product function  • mirror contact according to IEC 60947-4-1  • positively driven operation according to IEC 60947-5-1  No  suitability for use safety-related switching OFF  Yes  B10 value with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high 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  100 FIT  T1 value for proof test interval or service life according to IEC 60529  protection class IP on the front according to IEC 60529  finger-safe, for vertical contact from the front		
• finely stranded with core end processing     connectable conductor cross-section for auxiliary contacts     • solid or stranded     • finely stranded with core end processing     type of connectable conductor cross-sections     • for auxiliary contacts     — solid or stranded     — finely stranded with core end processing     • for AWG cables for auxiliary contacts     — solid or stranded     — finely stranded with core end processing     • for AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross section     • for main contacts     • for auxiliary contacts     • for auxiliary contacts     • for auxiliary contacts     • for auxiliary contacts     2x (20 1.5 mm²), 2x (0.75 2.5 mm²)     2x (20 1.5 mm²), 2x (0.75 2.5 mm²)     2x (20 1.5 mm²), 2x (0.75 2.5 mm²)     4x (20 16), 2x (18 14)  AWG number as coded connectable conductor cross section     • for main contacts     • for auxiliary contacts     20 14  Safety related data  product function     • mirror contact according to IEC 60947-4-1     • positively driven operation according to IEC 60947-5-1     No suitability for use safety-related switching OFF     Yes  B10 value with high demand rate according to SN 31920     • with high demand rate according to SN 31920     • with high demand rate according to SN 31920     • with high demand rate according to SN 31920     • with high demand rate according to SN 31920     100 FIT  T1 value for proof test interval or service life according to IEC 60529  protection class IP on the front according to IEC 60529  touch protection on the front according to IEC 60529  finger-safe, for vertical contact from the front	finely stranded with core end processing	2x (1 25 mm²), 1x (1 35 mm²)
connectable conductor cross-section for auxiliary contacts	connectable conductor cross-section for main contacts	
• solid or stranded • finely stranded with core end processing  type of connectable conductor cross-sections • for auxiliary contacts  — solid or stranded — finely stranded with core end processing — solid or stranded — finely stranded with core end processing — finely stranded with core end processing — for AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross section • for main contacts • for auxiliary contacts  18 1 • for auxiliary contacts 20 1.5 mm²), 2x (0.75 2.5 mm²)  2x (20 16), 2x (18 14)  AWG number as coded connectable conductor cross section • for main contacts • for auxiliary contacts 20 14  Safety related data  product function • mirror contact according to IEC 60947-4-1 • positively driven operation according to IEC 60947-5-1 No suitability for use safety-related switching OFF Yes  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 • with high demand rate according to SN 31920 • with high demand rate according to SN 31920 1 000 FIT  T1 value for proof test interval or service life according to IEC 60529  protection class IP on the front according to IEC 60529  finger-safe, for vertical contact from the front	finely stranded with core end processing	1 35 mm²
• finely stranded with core end processing  type of connectable conductor cross-sections  • for auxiliary contacts  — solid or stranded — finely stranded with core end processing  • for AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross section  • for main contacts • for auxiliary contacts  18 1  • for auxiliary contacts  20 14  Safety related data  product function  • mirror contact according to IEC 60947-4-1 • positively driven operation according to IEC 60947-5-1  No  suitability for use safety-related switching OFF  Yes  B10 value with high demand rate according to SN 31920  proportion of dangerous failures  • with low demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with low demand rate according to SN 31920  • with low demand rate according to SN 31920  100 FIT  T1 value for proof test interval or service life according to IEC 60529  protection class IP on the front according to IEC 60529  finger-safe, for vertical contact from the front	connectable conductor cross-section for auxiliary contacts	
type of connectable conductor cross-sections  • for auxiliary contacts  — solid or stranded — finely stranded with core end processing • for AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross section • for main contacts • for main contacts • for auxiliary contacts  18 1 • for auxiliary contacts  18 1 • for auxiliary contacts  • for auxiliary contacts  18 1  • for auxiliary contacts  • for auxiliary contacts  • for suitability for use afety-related switching OFF  B10 value with high demand rate according to SN 31920  proportion of dangerous failures • with low demand rate according to SN 31920 • with high demand rate according to SN 31920 • with high demand rate according to SN 31920  100 FIT  11 value for proof test interval or service life according to IEC 60529  protection class IP on the front according to IEC 60529  finger-safe, for vertical contact from the front	<ul> <li>solid or stranded</li> </ul>	0.5 2.5 mm <sup>2</sup>
• for auxiliary contacts — solid or stranded — finely stranded with core end processing • for AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross section • for main contacts • for auxiliary contacts  • for main contacts • for auxiliary contacts  20 14  Safety related data  product function • mirror contact according to IEC 60947-4-1 • positively driven operation according to IEC 60947-5-1 suitability for use safety-related switching OFF  B10 value with high demand rate according to SN 31920  proportion of dangerous failures • with low demand rate according to SN 31920 • with high demand rate according to SN 31920 • with high demand rate according to SN 31920  100 FIT  11 value for proof test interval or service life according to IEC 60529  protection class IP on the front according to IEC 60529  finger-safe, for vertical contact from the front	finely stranded with core end processing	0.5 2.5 mm²
- solid or stranded - finely stranded with core end processing - finely stranded with core end processing - for AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross section - for main contacts - for auxiliary auxiliary auxiliary auxiliary auxiliary auxiliary auxilia	type of connectable conductor cross-sections	
- finely stranded with core end processing	<ul> <li>for auxiliary contacts</li> </ul>	
• for AWG cables for auxiliary contacts  AWG number as coded connectable conductor cross section      • for main contacts     • for auxiliary contacts      • for auxiliary contacts      20 14  Safety related data  product function     • mirror contact according to IEC 60947-4-1     • positively driven operation according to IEC 60947-5-1     No suitability for use safety-related switching OFF  B10 value with high demand rate according to SN 31920  proportion of dangerous failures     • with low demand rate according to SN 31920  with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  100 FIT  T1 value for proof test interval or service life according to IEC 61508  protection class IP on the front according to IEC 60529  touch protection on the front according to IEC 60529  finger-safe, for vertical contact from the front	<ul><li>— solid or stranded</li></ul>	2x (0.5 1.5 mm²), 2x (0.75 2.5 mm²)
AWG number as coded connectable conductor cross section  • for main contacts • for auxiliary contacts 20 14  Safety related data  product function • mirror contact according to IEC 60947-4-1 • positively driven operation according to IEC 60947-5-1 suitability for use safety-related switching OFF B10 value with high demand rate according to SN 31920 proportion of dangerous failures • with low demand rate according to SN 31920 • with high demand rate according to SN 31920 • with high demand rate according to SN 31920 • with high demand rate according to SN 31920 100 FIT  T1 value for proof test interval or service life according to IEC 60529 protection class IP on the front according to IEC 60529 finger-safe, for vertical contact from the front	<ul> <li>finely stranded with core end processing</li> </ul>	2x (0.5 1.5 mm²), 2x (0.75 2.5 mm²)
e for main contacts  • for auxiliary contacts  18 1  20 14  Safety related data  product function  • mirror contact according to IEC 60947-4-1  • positively driven operation according to IEC 60947-5-1  No  suitability for use safety-related switching OFF  B10 value with high demand rate according to SN 31920  proportion of dangerous failures  • with low demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with high demand rate according to SN 31920  • with pigh demand rate according to SN 31920  •	for AWG cables for auxiliary contacts	2x (20 16), 2x (18 14)
for auxiliary contacts     20 14  Safety related data  product function     mirror contact according to IEC 60947-4-1     positively driven operation according to IEC 60947-5-1     No suitability for use safety-related switching OFF     Yes B10 value with high demand rate according to SN 31920     proportion of dangerous failures     with low demand rate according to SN 31920     with high demand rate according to SN 31920     with high demand rate according to SN 31920     indicate the first service life according to IEC 60529  protection class IP on the front according to IEC 60529  finger-safe, for vertical contact from the front		
product function	• for main contacts	18 1
product function  • mirror contact according to IEC 60947-4-1  • positively driven operation according to IEC 60947-5-1  suitability for use safety-related switching OFF  B10 value with high demand rate according to SN 31920  proportion of dangerous failures  • with low demand rate according to SN 31920  • with high 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  failure rate [FIT] with low demand rate according to IEC 61508  protection class IP on the front according to IEC 60529  finger-safe, for vertical contact from the front	<ul> <li>for auxiliary contacts</li> </ul>	20 14
<ul> <li>mirror contact according to IEC 60947-4-1</li> <li>positively driven operation according to IEC 60947-5-1</li> <li>suitability for use safety-related switching OFF</li> <li>B10 value with high demand rate according to SN 31920</li> <li>proportion of dangerous failures</li> <li>with low demand rate according to SN 31920</li> <li>with high demand rate according to SN 31920</li> <li>with high demand rate according to SN 31920</li> <li>failure rate [FIT] with low demand rate according to SN 31920</li> <li>100 FIT</li> <li>T1 value for proof test interval or service life according to IEC 61508</li> <li>protection class IP on the front according to IEC 60529</li> <li>finger-safe, for vertical contact from the front</li> </ul>	Safety related data	
<ul> <li>positively driven operation according to IEC 60947-5-1</li> <li>suitability for use safety-related switching OFF</li> <li>B10 value with high demand rate according to SN 31920</li> <li>proportion of dangerous failures</li> <li>with low demand rate according to SN 31920</li> <li>with high demand rate according to SN 31920</li> <li>with high demand rate according to SN 31920</li> <li>failure rate [FIT] with low demand rate according to SN 31920</li> <li>T1 value for proof test interval or service life according to IEC 61508</li> <li>protection class IP on the front according to IEC 60529</li> <li>finger-safe, for vertical contact from the front</li> </ul>	product function	
suitability for use safety-related switching OFF  B10 value with high demand rate according to SN 31920  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  T1 value for proof test interval or service life according to IEC 61508  protection class IP on the front according to IEC 60529  touch protection on the front according to IEC 60529  finger-safe, for vertical contact from the front	<ul> <li>mirror contact according to IEC 60947-4-1</li> </ul>	Yes
B10 value with high demand rate according to SN 31920  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  T1 value for proof test interval or service life according to IEC 61508  protection class IP on the front according to IEC 60529  touch protection on the front according to IEC 60529  finger-safe, for vertical contact from the front	<ul> <li>positively driven operation according to IEC 60947-5-1</li> </ul>	No
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  T1 value for proof test interval or service life according to IEC 61508  protection class IP on the front according to IEC 60529  touch protection on the front according to IEC 60529  finger-safe, for vertical contact from the front	suitability for use safety-related switching OFF	Yes
<ul> <li>with low demand rate according to SN 31920</li> <li>with high demand rate according to SN 31920</li> <li>failure rate [FIT] with low demand rate according to SN 31920</li> <li>T1 value for proof test interval or service life according to IEC 61508</li> <li>protection class IP on the front according to IEC 60529</li> <li>touch protection on the front according to IEC 60529</li> <li>finger-safe, for vertical contact from the front</li> </ul>	B10 value with high demand rate according to SN 31920	1 000 000
<ul> <li>with high demand rate according to SN 31920</li> <li>failure rate [FIT] with low demand rate according to SN 31920</li> <li>T1 value for proof test interval or service life according to IEC 61508</li> <li>protection class IP on the front according to IEC 60529</li> <li>touch protection on the front according to IEC 60529</li> <li>finger-safe, for vertical contact from the front</li> </ul>	proportion of dangerous failures	
failure rate [FIT] with low demand rate according to SN 31920  T1 value for proof test interval or service life according to IEC 61508  protection class IP on the front according to IEC 60529  touch protection on the front according to IEC 60529  finger-safe, for vertical contact from the front	<ul> <li>with low demand rate according to SN 31920</li> </ul>	40 %
T1 value for proof test interval or service life according to IEC 61508  protection class IP on the front according to IEC 60529  touch protection on the front according to IEC 60529  finger-safe, for vertical contact from the front	<ul> <li>with high demand rate according to SN 31920</li> </ul>	73 %
protection class IP on the front according to IEC 60529 IP20 touch protection on the front according to IEC 60529 finger-safe, for vertical contact from the front	failure rate [FIT] with low demand rate according to SN 31920	100 FIT
touch protection on the front according to IEC 60529 finger-safe, for vertical contact from the front		20 a
	protection class IP on the front according to IEC 60529	IP20
Certificates/ approvals	touch protection on the front according to IEC 60529	finger-safe, for vertical contact from the front
	Certificates/ approvals	

## **General Product Approval**



Confirmation





<u>KC</u>



Functional

EMC Safety/Safety of Machinery Declaration of Conformity Test Certificates



Type Examination Certificate



EG-Konf

Special Test Certificate

Type Test Certificates/Test Report

Marine / Shipping













Marine / Shipping other Railway Dangerous Good Environment



ConfirmationConfirmationVibration and ShockTransport InformationEnvironmental Confirmations

## **Further information**

Siemens has decided to exit the Russian market (see here).

https://press.siemens.com/global/en/pressrelease/siemens-wind-down-russian-business

Siemens is working on the renewal of the current EAC certificates.

Please contact your local Siemens office on the status of validity of the EAC certification if you intend to import or offer to supply these products to an EAC relevant market (other than the sanctioned EAEU member states Russia or Belarus).

Information on the packaging

https://support.industry.siemens.com/cs/ww/en/view/109813875

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=3RT2036-1NB30-1AA0

Cax online generator

http://support.automation.siemens.com/WW/CAXorder/default.aspx?lang=en&mlfb=3RT2036-1NB30-1AA0

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

https://support.industry.siemens.com/cs/ww/en/ps/3RT2036-1NB30-1AA0

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

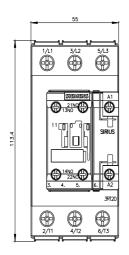
http://www.automation.siemens.com/bilddb/cax\_de.aspx?mlfb=3RT2036-1NB30-1AA0&lang=en

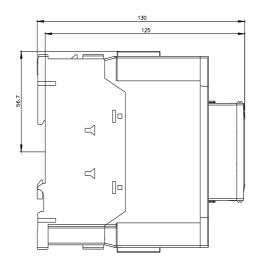
Characteristic: Tripping characteristics, I2t, Let-through current

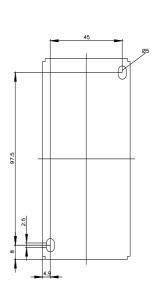
https://support.industry.siemens.com/cs/ww/en/ps/3RT2036-1NB30-1AA0/char

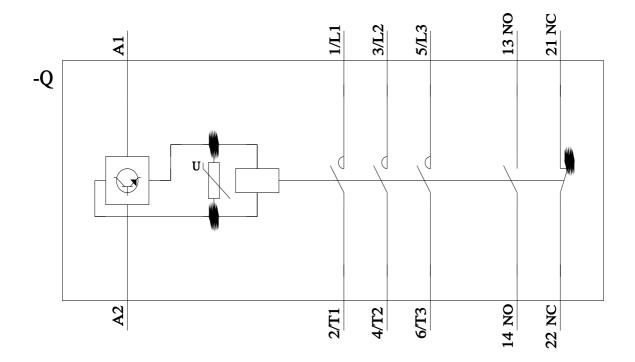
Further characteristics (e.g. electrical endurance, switching frequency)

http://www.automation.siemens.com/bilddb/index.aspx?view=Search&mlfb=3RT2036-1NB30-1AA0&objecttype=14&gridview=view1









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3RT20361NB301AA0