# 3RH2140-2XB40-0LA2

**Data sheet** 



Contactor relay for railway 4 NO DC 24-34V, 0,7...1,25\*US, with integrated varistor Size S00, Spring-type terminal suitable for PLC outputs

product designation Contactor relay for railway applications product type designation SRH2  Size of contactor SO0 product extension auxiliary switch Personer Insulation voltage with degree of pollution 3 at AC rated value 6 kV surge voltage resistance rated value 6 kV shock resistance at rectangular impulse at DC 10g / 5 ms, 5g / 10 ms shock resistance at rectangular impulse of the contactor vipical 30 000 000 15g / 5 ms, 8g / 10 ms shock resistance at rectangular impulse of the contactor vipical 30 000 000 000 000 000 000 000 000 000	product brand name	SIRIUS
Size of contactor S00 product extension auxiliary switch Yes power loss [W] for rated value of the current without load current share typical insulation voltage with degree of pollution 3 at AC rated value 680 V surge voltage resistance rated value 6kV shock resistance at rectangular impulse at DC 10g / 5 ms, 5g / 10 ms shock resistance with sine pulse of the contactor typical 10g / 5 ms, 8g / 10 ms  mechanical service life (operating cycles) of orthactor 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 substance Prohibitance (Date) 1001/2009  SVHC substance name 8lei-r A39-92-1 Bleimonoxad (Bleioxid) - 1317-36-8 2, 2, 6, 6'-Tetrabrom-4, 4'-Isopropylidendi - 79-94-7  Ambient conditions 10d auxiliary switch block typical of uring storage 55 w. +80 °C relative humidity minimum 10 % relative humidity minimum 10 % relative humidity prinimum 10 % Fortionmental Footuri Declaration(EPD) Yes Global Warming Potential [CO2 eq] during operation 4.0 w	product designation	Contactor relay for railway applications
Size of contactor   S00	product type designation	3RH2
product extension auxiliary switch power loss [M] for rate value of the current without load current share typical insulation voltage with degree of pollution 3 at AC rated value surge voltage resistance rated value stock resistance at rectangular impulse at DC 10g / 5 ms, 5g / 10 ms shock resistance at rectangular impulse at DC 15g / 5 ms, 8g / 10 ms shock resistance at rectangular impulse at DC 15g / 5 ms, 8g / 10 ms shock resistance with sine pulse of 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 level for the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical of the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the contactor with added auxiliary switch block typical level for the co	General technical data	
power loss [W] for rated value of the current without load current share typical insulation voltage with degree of poliution 3 at AC rated value 690 V  surge voltage resistance rated value 6k V  shock resistance at rectangular impulse e at DC 10g / 5 ms, 5g / 10 ms  shock resistance with sine pulse e at DC 15g / 5 ms, 8g / 10 ms  shock resistance with sine pulse e at DC 15g / 5 ms, 8g / 10 ms  mechanical service life (operating cycles) of contactor typical 30 000 000 000 000 000 000 000 000 000	size of contactor	S00
share typical insulation voltage with degree of pollution 3 at AC rated value surge voltage resistance rated value shock resistance at rectangular impulse • at DC 10g / 5 ms, 5g / 10 ms shock resistance with sine pulse • at DC 15g / 5 ms, 8g / 10 ms  mechanical service life (operating 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 • of the contactor with added auxiliary switch block typical • of the contactor with added auxiliary switch block typical  Freference code according to IEC 81346-2  Substance Prohibitance (Date)  SVHC substance name  Biei - 7439-92-1 Bieinonoxid (Bieloxid) - 1317-36-8 2,2'5,6'-Tetrabrom-4,4'-isopropylidendi - 79-94-7  Ambient conditions  Installation altitude at height above sea level maximum • during operation • during storage - 55 +80 °C  relative humidity minimum relative humidity at 55 °C according to IEC 60068-2-30 maximum  Environmental Footprint  Environmental Product Declaration(EPD)  Global Warming Potential [CO2 eq] during manufacturing 1.3 kg Global Warming Potential [CO2 eq] during manufacturing global warming potential [CO2 eq] after end of life - 0-227 kg  Main circuit  no-load switching frequency	product extension auxiliary switch	Yes
surge voltage resistance rated value  shock resistance at rectangular impulse  • at DC  10g / 5 ms, 5g / 10 ms  shock resistance with sine pulse  • at DC  15g / 5 ms, 8g / 10 ms  mechanical service life (operating 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  • 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 electronically optimized  auxiliary switch block typical  • of the contactor with added auxiliary switch block typical  • of the contactor with added electronically optimized  auxiliary switch block typical  • of the contactor with added auxiliary switch block typical  10 000 000  K  K  Substance Prohibitance (bate)  SWHC substance name  Blein-7439-92-1  Blein-74		0.95 W
shock resistance at rectangular impulse	insulation voltage with degree of pollution 3 at AC rated value	690 V
• at DC  shock resistance with sine pulse • at DC  shock resistance with sine pulse • at DC  shock resistance with sine pulse • at DC  story of contactor typical • 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 • 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 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 t	surge voltage resistance rated value	6 kV
shock resistance with sine pulse	shock resistance at rectangular impulse	
at DC  mechanical service life (operating 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  K  Substance Prohibitance (Date)  SVHC substance name  Beli - 7439-92-1 Belimonoxid (Bleioxid) - 1317-36-8 2,2'6,6'-Tetrabrom-4,4'-isopropylidendi - 79-94-7  Ambient conditions  installation altitude at height above sea level maximum  during operation  during operation  during storage  relative humidity minimum  10 %  relative humidity at 55 °C according to IEC 60068-2-30 maximum  Environmental Footprint  Environmental Footprint  Environmental Product Declaration(EPD)  Yes Global Warming Potential [CO2 eq] total  Global Warming Potential [CO2 eq] during manufacturing  1,3 kg Global Warming Potential [CO2 eq] during operation  1,32 kg global warming potential [CO2 eq] after end of life  -0.227 kg  Main circuit  no-load switching frequency	• at DC	10g / 5 ms, 5g / 10 ms
mechanical service life (operating 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  • 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 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 the property and the property and the property and the property	shock resistance with sine pulse	
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     of the contactor with added auxiliary switch block typical     of the contactor with added auxiliary switch block typical     interference code according to IEC 81346-2     K Substance Prohibitance (Date)  SVHC substance name  Blei - 7439-92-1 Bleimonoxid (Bleioxid) - 1317-36-8 2.2',6,6'-Tetrabrom-4,4'-isopropylidendi - 79-94-7  Ambient conditions  Installation altitude at height above sea level maximum 2 000 m  ambient temperature     oduring operation     oduring storage     -55 +80 °C  relative humidity minimum 10 %  relative humidity at 55 °C according to IEC 60068-2-30 maximum  Environmental footprint  Environmental Froduct Declaration(EPD) Yes Global Warming Potential [CO2 eq] total 133 kg Global Warming Potential [CO2 eq] during operation 132 kg global warming potential [CO2 eq] during operation 132 kg global warming potential [CO2 eq] after end of life -0.227 kg  Main circuit no-load switching frequency	• at DC	15g / 5 ms, 8g / 10 ms
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     K Substance Prohibitance (Date)  SVHC substance name  Blei - 7439-92-1 Bleimonoxid (Bleioxid) - 1317-36-8 2,2'6,6'-Tetrabrom-4,4'-isopropylidendi - 79-94-7  Ambient conditions  installation altitude at height above sea level maximum 2 000 m  ambient temperature     oduring operation     during storage     -55 +80 °C relative humidity minimum relative humidity at 55 °C according to IEC 60068-2-30 maximum  Environmental Froduct Declaration(EPD)     Yes Global Warming Potential [CO2 eq] during manufacturing Global Warming Potential [CO2 eq] during operation 132 kg global warming potential [CO2 eq] after end of life -0.227 kg  Main circuit no-load switching frequency	mechanical service life (operating cycles)	
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  K Substance Prohibitance (Date)  SVHC substance name  Blei - 7439-92-1 Bleimonoxid (Bleioxid) - 1317-36-8 2,2°,6,6°-Tetrabrom-4,4°-isopropylidendi - 79-94-7  Ambient conditions  installation altitude at height above sea level maximum 2 000 m  ambient temperature of during operation of during storage -55 +80 °C  relative humidity minimum 10 %  relative humidity at 55 °C according to IEC 60068-2-30 maximum  Environmental footprint  Environmental footprint  Environmental Product Declaration(EPD) Yes Global Warming Potential [CO2 eq] total Global Warming Potential [CO2 eq] during manufacturing 1.3 kg Global Warming Potential [CO2 eq] during operation 132 kg global warming potential [CO2 eq] after end of life -0.227 kg  Main circuit no-load switching frequency	<ul> <li>of contactor typical</li> </ul>	30 000 000
reference code according to IEC 81346-2  Substance Prohibitance (Date)  SVHC substance name  Blei - 7439-92-1 Bleimonoxid (Bleioxid) - 1317-36-8 2,2',6,6'-Tetrabrom-4,4'-isopropylidendi - 79-94-7  Ambient conditions  installation altitude at height above sea level maximum  ambient temperature  during operation during storage relative humidity minimum  relative humidity minimum  relative humidity at 55 °C according to IEC 60068-2-30 maximum  Environmental Product Declaration(EPD)  Global Warming Potential [CO2 eq] total  Global Warming Potential [CO2 eq] during manufacturing  Global Warming Potential [CO2 eq] during operation  132 kg  global warming potential [CO2 eq] after end of life  -0.227 kg  Main circuit  no-load switching frequency		5 000 000
Substance Prohibitance (Date)  SVHC substance name  Blei - 7439-92-1 Bleimonoxid (Bleioxid) - 1317-36-8 2,2',6,6'-Tetrabrom-4,4'-isopropylidendi - 79-94-7  Ambient conditions  installation altitude at height above sea level maximum  ambient temperature  • during operation  • during storage  -55 +80 °C  relative humidity minimum  10 %  relative humidity at 55 °C according to IEC 60068-2-30 maximum  Environmental Fooduct Declaration (EPD)  Global Warming Potential [CO2 eq] total  Global Warming Potential [CO2 eq] during manufacturing  1.3 kg  Global Warming Potential [CO2 eq] after end of life  -0.227 kg  Main circuit  no-load switching frequency	<ul> <li>of the contactor with added auxiliary switch block typical</li> </ul>	10 000 000
Blei - 7439-92-1 Bleimonoxid (Bleioxid) - 1317-36-8 2,2',6,6'-Tetrabrom-4,4'-isopropylidendi - 79-94-7  Ambient conditions  installation altitude at height above sea level maximum  ambient temperature  • during operation  • during storage  -55 +80 °C  relative humidity minimum  relative humidity at 55 °C according to IEC 60068-2-30 maximum  Environmental footprint  Environmental Product Declaration(EPD)  Global Warming Potential [CO2 eq] total  Global Warming Potential [CO2 eq] during manufacturing global Warming Potential [CO2 eq] during operation global warming potential [CO2 eq] after end of life  -0.227 kg  Main circuit  no-load switching frequency	reference code according to IEC 81346-2	K
Bleimonoxid (Bleioxid) - 1317-36-8 2,2',6,6'-Tetrabrom-4,4'-isopropylidendi - 79-94-7  Ambient conditions  installation altitude at height above sea level maximum  ambient temperature	Substance Prohibitance (Date)	10/01/2009
installation altitude at height above sea level maximum  ambient temperature  • during operation  • during storage  relative humidity minimum  relative humidity at 55 °C according to IEC 60068-2-30 maximum  Environmental footprint  Environmental Product Declaration(EPD)  Global Warming Potential [CO2 eq] total  Global Warming Potential [CO2 eq] during manufacturing  Global Warming Potential [CO2 eq] during operation  132 kg  global warming potential [CO2 eq] after end of life  -0.227 kg  Main circuit  no-load switching frequency	SVHC substance name	Bleimonoxid (Bleioxid) - 1317-36-8
ambient temperature  • during operation  • during storage  -55 +80 °C  relative humidity minimum  10 %  relative humidity at 55 °C according to IEC 60068-2-30 gs %  maximum  Environmental footprint  Environmental Product Declaration(EPD)  Global Warming Potential [CO2 eq] total  Global Warming Potential [CO2 eq] during manufacturing  Global Warming Potential [CO2 eq] during operation  global warming Potential [CO2 eq] after end of life  -0.227 kg  Main circuit  no-load switching frequency	Ambient conditions	
<ul> <li>during operation         <ul> <li>during storage</li> <li>-55 +80 °C</li> </ul> </li> <li>relative humidity minimum         <ul> <li>10 %</li> </ul> </li> <li>relative humidity at 55 °C according to IEC 60068-2-30 maximum</li> <li>Environmental footprint</li> </ul> <li>Environmental Product Declaration(EPD)         <ul> <li>Yes</li> </ul> </li> <li>Global Warming Potential [CO2 eq] total</li> <li>133 kg</li> <li>Global Warming Potential [CO2 eq] during manufacturing</li> <li>1.3 kg</li> <li>Global Warming Potential [CO2 eq] during operation</li> <li>132 kg</li> <li>global warming potential [CO2 eq] after end of life</li> <li>-0.227 kg</li> <li>Main circuit</li> <li>no-load switching frequency</li>	installation altitude at height above sea level maximum	2 000 m
● during storage  relative humidity minimum  10 %  relative humidity at 55 °C according to IEC 60068-2-30 maximum  Environmental footprint  Environmental Product Declaration(EPD)  Global Warming Potential [CO2 eq] total  Global Warming Potential [CO2 eq] during manufacturing  Global Warming Potential [CO2 eq] during operation  Global Warming Potential [CO2 eq] during operation  global warming potential [CO2 eq] after end of life  -0.227 kg  Main circuit  no-load switching frequency	ambient temperature	
relative humidity minimum  relative humidity at 55 °C according to IEC 60068-2-30 maximum  Environmental footprint  Environmental Product Declaration(EPD) Yes  Global Warming Potential [CO2 eq] total 133 kg  Global Warming Potential [CO2 eq] during manufacturing 1.3 kg  Global Warming Potential [CO2 eq] during operation 132 kg  global warming potential [CO2 eq] after end of life -0.227 kg  Main circuit  no-load switching frequency	during operation	-40 +70 °C
relative humidity at 55 °C according to IEC 60068-2-30 maximum  Environmental footprint  Environmental Product Declaration(EPD) Yes  Global Warming Potential [CO2 eq] total 133 kg  Global Warming Potential [CO2 eq] during manufacturing 1.3 kg  Global Warming Potential [CO2 eq] during operation global warming potential [CO2 eq] after end of life -0.227 kg  Main circuit no-load switching frequency	during storage	-55 +80 °C
Environmental Froduct Declaration(EPD)  Environmental Product Declaration(EPD)  Global Warming Potential [CO2 eq] total  Global Warming Potential [CO2 eq] during manufacturing  Global Warming Potential [CO2 eq] during operation  132 kg  global warming potential [CO2 eq] after end of life  -0.227 kg  Main circuit  no-load switching frequency	relative humidity minimum	10 %
Environmental Product Declaration(EPD) Yes Global Warming Potential [CO2 eq] total 133 kg Global Warming Potential [CO2 eq] during manufacturing 1.3 kg Global Warming Potential [CO2 eq] during operation 132 kg global warming potential [CO2 eq] after end of life -0.227 kg  Main circuit no-load switching frequency		95 %
Global Warming Potential [CO2 eq] total  Global Warming Potential [CO2 eq] during manufacturing  1.3 kg  Global Warming Potential [CO2 eq] during operation  132 kg  global warming potential [CO2 eq] after end of life  -0.227 kg  Main circuit  no-load switching frequency	Environmental footprint	
Global Warming Potential [CO2 eq] during manufacturing  Global Warming Potential [CO2 eq] during operation  global warming potential [CO2 eq] after end of life  -0.227 kg  Main circuit  no-load switching frequency	Environmental Product Declaration(EPD)	Yes
Global Warming Potential [CO2 eq] during operation 132 kg global warming potential [CO2 eq] after end of life -0.227 kg  Main circuit  no-load switching frequency	Global Warming Potential [CO2 eq] total	133 kg
global warming potential [CO2 eq] after end of life -0.227 kg  Main circuit  no-load switching frequency	Global Warming Potential [CO2 eq] during manufacturing	1.3 kg
Main circuit no-load switching frequency	Global Warming Potential [CO2 eq] during operation	132 kg
no-load switching frequency	global warming potential [CO2 eq] after end of life	-0.227 kg
	Main circuit	
• at DC 1 500 1/h	no-load switching frequency	
	• at DC	1 500 1/h

Control circuit/ Control	
type of voltage of the control supply voltage	DC
control supply voltage at DC	
• rated value	24 34 V
operating range factor control supply voltage rated value of magnet coil at DC	
initial value	0.7
full-scale value	1.25
design of the surge suppressor	Varistor
inrush current peak	2.3 A
duration of inrush current peak	50 μs
locked-rotor current mean value	0.18 A
locked-rotor current peak	0.18 A
duration of locked-rotor current	250 ms
holding current mean value	40 mA
closing power of magnet coil at DC	4 W
holding power of magnet coil at DC	0.95 W
closing delay	
• at DC	30 70 ms
opening delay	
• at DC	25 45 ms
arcing time	10 15 ms
residual current of the electronics for control with signal <0> at	10 mA
DC at 24 V maximum permissible	
Auxiliary circuit	
number of NO contacts for auxiliary contacts	4
instantaneous contact	4
identification number and letter for switching elements	40 E
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	2 A
at 690 V rated value	1 A
operational current at 1 current path at DC-12	40.4
at 24 V rated value	10 A
at 110 V rated value	3 A
at 220 V rated value	1 A
at 440 V rated value	0.3 A
at 600 V rated value	0.15 A
operational current with 2 current paths in series at DC-12	40.4
at 24 V rated value	10 A
at 60 V rated value	10 A
at 110 V rated value	4 A
at 220 V rated value	2 A
at 440 V rated value     at 600 V rated value	1.3 A
at 600 V rated value  An artificial of a company with 2 company mathe in conice at DC 42.	0.65 A
operational current with 3 current paths in series at DC-12	40.4
at 24 V rated value	10 A
at 60 V rated value	10 A
at 110 V rated value     at 220 V rated value	10 A
at 220 V rated value	3.6 A
at 440 V rated value     at 600 V rated value	2.5 A
at 600 V rated value  A position for your average ADC 42 may inverse.	1.8 A
operating frequency at DC-12 maximum	1 000 1/h
operational current at 1 current path at DC-13	40.4
at 24 V rated value	10 A
at 110 V rated value	1 A
at 220 V rated value	0.3 A
• at 440 V rated value	0.14 A
<ul> <li>at 600 V rated value</li> </ul>	0.1 A

operational current with 2 current paths in series at DC-13	
• at 24 V rated value	10 A
<ul> <li>at 60 V rated value</li> </ul>	3.5 A
<ul><li>at 110 V rated value</li></ul>	1.3 A
• at 220 V rated value	0.9 A
<ul> <li>at 440 V rated value</li> </ul>	0.2 A
at 600 V rated value	0.1 A
operational current with 3 current paths in series at DC-13	
at 24 V rated value	10 A
at 60 V rated value	4.7 A
at 110 V rated value	3 A
at 220 V rated value	1.2 A
<ul> <li>at 440 V rated value</li> </ul>	0.5 A
● at 600 V rated value	0.26 A
operating frequency at DC-13 maximum	1 000 1/h
design of the miniature circuit breaker for short-circuit protection of the auxiliary circuit up to 230 V	C characteristic: 6 A; 0.4 kA
contact reliability of auxiliary contacts	1 faulty switching per 100 million (17 V, 1 mA)
UL/CSA ratings	
contact rating of auxiliary contacts according to UL	A600 / Q600
Short-circuit protection	
design of the fuse link for short-circuit protection of the auxiliary	fuse gL/gG: 10 A
switch required	
Installation/ mounting/ dimensions	
mounting position	+/-180° rotation possible on vertical mounting surface, can be tilted forward and backward by +/- 22.5° on vertical mounting surface, standing, on horizontal mounting surface
fastening method	screw and snap-on mounting onto 35 mm DIN rail
<ul><li>side-by-side mounting</li></ul>	Yes
height	70 mm
width	45 mm
depth	73 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
<ul> <li>for grounded parts</li> </ul>	
— forwards	10 mm
— upwards	10 mm
— at the side	6 mm
— downwards	10 mm
for live parts	40
— forwards	10 mm
— upwards	10 mm
— downwards	10 mm
— at the side Connections/ Terminals	6 mm
type of electrical connection for auxiliary and control circuit	spring-loaded terminals
connectable conductor cross-section for auxiliary contacts	oping loaded terrinials
solid or stranded	0.5 4 mm²
finely stranded with core end processing	0.5 2.5 mm <sup>2</sup>
finely stranded without core end processing	0.5 2.5 mm²
type of connectable conductor cross-sections	
type of confidentable conductor cross-sections	
for auxiliary contacts     — solid or stranded	2x (0,5 4 mm²)
for auxiliary contacts	2x (0,5 4 mm²) 2x (0.5 2.5 mm²)
for auxiliary contacts     — solid or stranded	
<ul> <li>for auxiliary contacts</li> <li>— solid or stranded</li> <li>— finely stranded with core end processing</li> </ul>	2x (0.5 2.5 mm²)
<ul> <li>for auxiliary contacts</li> <li>— solid or stranded</li> <li>— finely stranded with core end processing</li> <li>— finely stranded without core end processing</li> </ul>	2x (0.5 2.5 mm²) 2x (0.5 2.5 mm²)

Safety related data	
product function positively driven operation according to IEC 60947-5-1	Yes
B10 value with high demand rate according to SN 31920	1 000 000
proportion of dangerous failures	
<ul> <li>with low demand rate according to SN 31920</li> </ul>	40 %
<ul> <li>with high demand rate according to SN 31920</li> </ul>	73 %
T1 value for proof test interval or service life according to IEC 61508	20 a
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

**Approvals Certificates** 

**General Product Approval EMC** 





Confirmation

**KC** 





**Functional** Safety/Safety of Machinery

**Declaration of Conformity** 

**Test Certificates** 

Marine / Shipping

Type Examination Certificate





Special Test Certificate

Type Test Certificates/Test Report



### Marine / Shipping













other Railway **Dangerous Good Environment** 

Household and similar appliances

Confirmation

Vibration and Shock

Special Test Certificate

**Transport Information** 

**Environmental 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=3RH2140-2XB40-0LA2

### Cax online generator

http://support.automation.siemens.com/WW/CAXorder/default.aspx?lang=en&mlfb=3RH2140-2XB40-0LA2

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

https://support.industry.siemens.com/cs/ww/en/ps/3RH2140-2XB40-0LA2

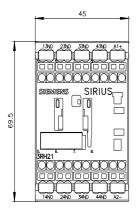
Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, EPLAN macros, ...)

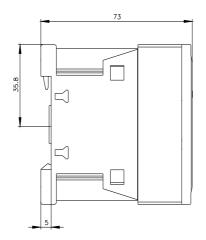
http://www.automation.siemens.com/bilddb/cax\_de.aspx?mlfb=3RH2140-2XB40-0LA2&lang=en

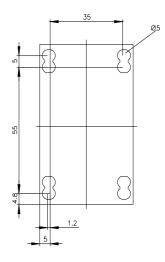
Characteristic: Tripping characteristics, I2t, Let-through current

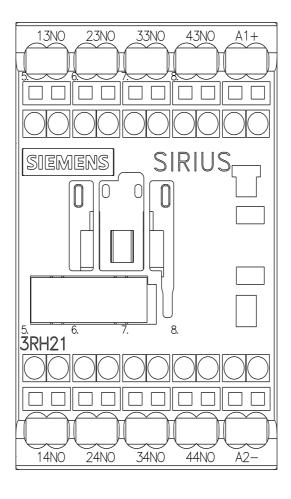
https://support.industry.siemens.com/cs/ww/en/ps/3RH2140-2XB40-0LA2/char

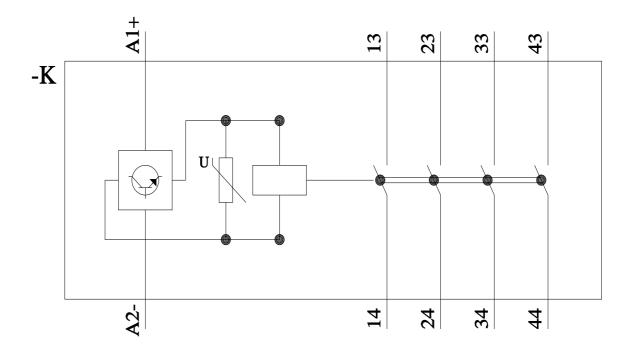
Further characteristics (e.g. electrical endurance, switching frequency)
http://www.automation.siemens.com/bilddb/index.aspx?view=Search&mlfb=3RH2140-2XB40-0LA2&objecttype=14&gridview=view1











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