## **SIEMENS**

## Data sheet 3RA2125-1JD24-0AK6

	FUSELESS MOTOR STARTER DIRECT START 600V AC SZ S0 7-10A 110/120V
	AC 50/60HZ SCREW CONNECTION FOR SNAPPING ONTO 60 MM BUSBAR SYSTEMS TYPE OF COORDINATION 2 IQ = 150 KA ALSO FULFILLS TYPE OF
	COORDINATION 1 1NO+1NC (MSP) 1NO+1NC (CONTACTOR)
product brand name	SIRIUS
product designation	non-fused motor starter 3RA2
design of the product	direct starter
manufacturer's article number	
<ul> <li>of the supplied contactor</li> </ul>	3RT2024-1AK60
<ul> <li>of the supplied circuit-breakers</li> </ul>	3RV2011-1JA15
<ul> <li>of the supplied busbar adapter</li> </ul>	<u>8US1251-5NT10</u>
<ul> <li>of the supplied link module</li> </ul>	3RA2921-1AA00
General technical data	
size of the circuit-breaker	S00
size of load feeder	S0
product extension auxiliary switch	Yes
insulation voltage with degree of pollution 3 at AC rated value	690 V
degree of pollution	3
surge voltage resistance rated value	6 kV
shock resistance according to IEC 60068-2-27	6g / 11 ms
mechanical service life (operating cycles) of contactor typical	10 000 000
type of assignment	2
Ambient conditions	
ambient temperature	
during operation	-20 +60 °C
during storage	-50 +80 °C
during transport	-55 +80 °C
Main circuit	
Main circuit number of poles for main current circuit	3
	3 electromechanical
number of poles for main current circuit	•
number of poles for main current circuit design of the switching contact adjustable current response value current of the current-	electromechanical
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release	electromechanical
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage	electromechanical 7 10 A
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value	electromechanical 7 10 A  690 V
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage  • rated value • at AC-3 rated value maximum	electromechanical 7 10 A  690 V 690 V
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value • at AC-3 rated value maximum operating frequency rated value	electromechanical 7 10 A  690 V  690 V  50 60 Hz
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value • at AC-3 rated value maximum operating frequency rated value operational current at AC-3 at 400 V rated value	electromechanical 7 10 A  690 V  690 V  50 60 Hz
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value • at AC-3 rated value maximum operating frequency rated value operational current at AC-3 at 400 V rated value operating power at AC-3	electromechanical 7 10 A  690 V  690 V  50 60 Hz  8.5 A
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value • at AC-3 rated value maximum operating frequency rated value operational current at AC-3 at 400 V rated value operating power at AC-3 • at 400 V rated value	electromechanical 7 10 A  690 V  690 V  50 60 Hz  8.5 A  4 000 W
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage	electromechanical 7 10 A  690 V  690 V  50 60 Hz  8.5 A  4 000 W
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage	electromechanical 7 10 A  690 V  690 V  50 60 Hz  8.5 A  4 000 W
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value • at AC-3 rated value maximum operating frequency rated value operational current at AC-3 at 400 V rated value operating power at AC-3 • at 400 V rated value • at 500 V rated value Control circuit/ Control control supply voltage at AC	electromechanical 7 10 A  690 V  690 V  50 60 Hz  8.5 A  4 000 W  5 500 W
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value • at AC-3 rated value maximum operating frequency rated value operational current at AC-3 at 400 V rated value operating power at AC-3 • at 400 V rated value • at 500 V rated value Control circuit/ Control control supply voltage at AC • at 50 Hz rated value	electromechanical 7 10 A  690 V 690 V 50 60 Hz 8.5 A  4 000 W 5 500 W
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value • at AC-3 rated value maximum operating frequency rated value operational current at AC-3 at 400 V rated value operating power at AC-3 • at 400 V rated value • at 500 V rated value Control circuit/ Control control supply voltage at AC • at 50 Hz rated value • at 50 Hz rated value	electromechanical 7 10 A  690 V  690 V  50 60 Hz  8.5 A  4 000 W  5 500 W
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value • at AC-3 rated value maximum operating frequency rated value operational current at AC-3 at 400 V rated value operating power at AC-3 • at 400 V rated value • at 500 V rated value Control circuit/ Control control supply voltage at AC • at 50 Hz rated value • at 50 Hz rated value • at 60 Hz rated value	electromechanical 7 10 A  690 V  690 V  50 60 Hz  8.5 A  4 000 W  5 500 W
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value • at AC-3 rated value maximum operating frequency rated value operational current at AC-3 at 400 V rated value operating power at AC-3 • at 400 V rated value • at 500 V rated value  Control circuit/ Control  control supply voltage at AC • at 50 Hz rated value • at 50 Hz rated value • at 60 Hz rated value • at 60 Hz rated value • at 60 Hz rated value	electromechanical 7 10 A  690 V  690 V  50 60 Hz  8.5 A  4 000 W  5 500 W  110 V  88 121 V  120 V  96 132 V
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value • at AC-3 rated value maximum operating frequency rated value operational current at AC-3 at 400 V rated value operating power at AC-3 • at 400 V rated value • at 500 V rated value  Control circuit/ Control control supply voltage at AC • at 50 Hz rated value • at 50 Hz rated value • at 60 Hz rated value • at 60 Hz rated value apparent holding power of magnet coil at AC	electromechanical 7 10 A  690 V  690 V  50 60 Hz  8.5 A  4 000 W  5 500 W  110 V  88 121 V  120 V  96 132 V  7.2 VA
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value • at AC-3 rated value maximum operating frequency rated value operational current at AC-3 at 400 V rated value operating power at AC-3 • at 400 V rated value • at 500 V rated value  Control circuit/ Control control supply voltage at AC • at 50 Hz rated value • at 50 Hz rated value • at 60 Hz rated value • at 60 Hz rated value apparent holding power of magnet coil at AC inductive power factor with the holding power of the coil	electromechanical 7 10 A  690 V  690 V  50 60 Hz  8.5 A  4 000 W  5 500 W  110 V  88 121 V  120 V  96 132 V  7.2 VA
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage • rated value • at AC-3 rated value maximum operating frequency rated value operational current at AC-3 at 400 V rated value operating power at AC-3 • at 400 V rated value • at 500 V rated value  Control circuit/ Control  control supply voltage at AC • at 50 Hz rated value • at 50 Hz rated value • at 60 Hz rated value • at 60 Hz rated value apparent holding power of magnet coil at AC inductive power factor with the holding power of the coil  Auxiliary circuit	electromechanical 7 10 A  690 V  690 V  50 60 Hz  8.5 A  4 000 W  5 500 W  110 V  88 121 V  120 V  96 132 V  7.2 VA  0.28
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage	electromechanical 7 10 A  690 V 690 V 50 60 Hz 8.5 A  4 000 W 5 500 W  110 V 88 121 V 120 V 96 132 V 7.2 VA 0.28
number of poles for main current circuit design of the switching contact adjustable current response value current of the current- dependent overload release operating voltage	electromechanical 7 10 A  690 V 690 V 50 60 Hz 8.5 A  4 000 W 5 500 W  110 V 88 121 V 120 V 96 132 V 7.2 VA 0.28

response value current of instantaneous short-circuit trip unit	130 A
UL/CSA ratings	
full-load current (FLA) for 3-phase AC motor	
at 480 V rated value	7.92 A
at 600 V rated value	9.19 A
yielded mechanical performance [hp]	
• for single-phase AC motor	
— at 110/120 V rated value	0.5 hp
— at 230 V rated value	1.5 hp
• for 3-phase AC motor	
— at 200/208 V rated value	2 hp
— at 220/230 V rated value	3 hp
— at 460/480 V rated value	5 hp
— at 575/600 V rated value	7.5 hp
Short-circuit protection	7.0 Hp
product function short circuit protection	Yes
<u> </u>	
design of the short-circuit trip	magnetic
conditional short-circuit current (Iq)  • at 400 V according to IEC 60947-4-1 rated value	153 000 A
-	100 000 A
Installation/ mounting/ dimensions	vertical
mounting position	vertical
fastening method	for snapping onto 60 mm busbar systems
height	260 mm
width	45 mm
depth	155 mm
required spacing	
• for grounded parts	40
— forwards	10 mm
— backwards	0 mm
— upwards	30 mm
— at the side	9 mm
— downwards	10 mm
for live parts	
— forwards	10 mm
— backwards	0 mm
— upwards	30 mm
— downwards	10 mm
— at the side	9 mm
Connections/ Terminals	
type of electrical connection for main current circuit	screw-type terminals
type of connectable conductor cross-sections for main contacts stranded	1 10 mm², 2x (2.5 6 mm²)
connectable conductor cross-section for main contacts finely stranded with core end processing	1 6 mm²
Safety related data	
B10 value with high demand rate according to SN 31920	1 000 000
proportion of dangerous failures with high demand rate according to SN 31920	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
Certificates/ approvals	
General Product Approval	For use in hazard- ous locations  Declaration of Conformity
Confirmation	











Test Certificates Marine / Shipping

Type Test Certificates/Test Report

Special Test Certificate









Marine / Shipping other Railway







Confirmation

Vibration and Shock

## **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=3RA2125-1JD24-0AK6

Cax online generator

http://support.automation.siemens.com/WW/CAXorder/default.aspx?lang=en&mlfb=3RA2125-1JD24-0AK6

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

https://support.industry.siemens.com/cs/ww/en/ps/3RA2125-1JD24-0AK6

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

http://www.automation.siemens.com/bilddb/cax\_de.aspx?mlfb=3RA2125-1JD24-0AK6&lang=en

Characteristic: Tripping characteristics, I2t, Let-through current

https://support.industry.siemens.com/cs/ww/en/ps/3RA2125-1JD24-0AK6/char

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

http://www.automation.siemens.com/bilddb/index.aspx?view=Search&mlfb=3RA2125-1JD24-0AK6&objecttype=14&gridview=view1