



CONTACTOR,AC3:30KW/400V, 1NO+1NC,110VAC
50HZ/120V 60HZ, 3-POLE, SIZE S2, SCREW
TERMINAL

Figure similar

product brand name	SIRIUS
Product designation	3RT2 contactor

General technical data:

Insulation voltage		
• Rated value	V	690
Degree of pollution		3
Surge voltage resistance Rated value	kV	6
Mechanical service life (switching cycles)		
• of the contactor typical		10 000 000
• of the contactor with added electronics-compatible auxiliary switch block typical		5 000 000
• of the contactor with added auxiliary switch block typical		10 000 000
Thermal short-time current restricted to 10 s	A	520
Protection class IP		
• on the front		IP20
• of the terminal		IP00
Equipment marking		
• acc. to DIN EN 61346-2		Q
• acc. to DIN EN 81346-2		Q

Main circuit:

Number of poles for main current circuit		3
Number of NC contacts for main contacts		0
Number of NO contacts for main contacts		3
Operating voltage		

<ul style="list-style-type: none"> • at AC-3 Rated value maximum 	V	690
Operating current		
<ul style="list-style-type: none"> • at AC-1 <ul style="list-style-type: none"> — at 400 V at ambient temperature 40 °C Rated value — up to 690 V at ambient temperature 40 °C Rated value — up to 690 V at ambient temperature 60 °C Rated value • at AC-2 at 400 V Rated value • at AC-3 <ul style="list-style-type: none"> — at 400 V Rated value — at 500 V Rated value — at 690 V Rated value • at AC-4 at 400 V Rated value 	A	80 80 70 65 65 47 55
Operating current with 1 current path		
<ul style="list-style-type: none"> • at DC-1 <ul style="list-style-type: none"> — at 24 V Rated value — at 110 V Rated value — at 220 V Rated value — at 440 V Rated value — at 600 V Rated value • at DC-3 at DC-5 <ul style="list-style-type: none"> — at 24 V Rated value — at 110 V Rated value — at 220 V Rated value — at 440 V Rated value — at 600 V Rated value 	A	70 4.5 2 0.4 0.25 35 2.5 2 0.1 0.06
Operating current with 2 current paths in series		
<ul style="list-style-type: none"> • at DC-1 <ul style="list-style-type: none"> — at 24 V Rated value — at 110 V Rated value — at 220 V Rated value — at 440 V Rated value — at 600 V Rated value • at DC-3 at DC-5 <ul style="list-style-type: none"> — at 110 V Rated value — at 220 V Rated value — at 24 V Rated value — at 440 V Rated value — at 600 V Rated value 	A	70 45 5 1 0.8 25 5 55 0.27 0.16
Operating current with 3 current paths in series		

<ul style="list-style-type: none"> • at DC-1 <ul style="list-style-type: none"> — at 24 V Rated value — at 110 V Rated value — at 220 V Rated value — at 440 V Rated value — at 600 V Rated value • at DC-3 at DC-5 <ul style="list-style-type: none"> — at 110 V Rated value — at 220 V Rated value — at 24 V Rated value — at 440 V Rated value — at 600 V Rated value 	A	55
	A	45
	A	45
	A	2.9
	A	1.4
	A	45
	A	25
	A	55
	A	0.6
	A	0.6
Operating power		
<ul style="list-style-type: none"> • at AC-1 at 400 V Rated value • at AC-2 at 400 V Rated value • at AC-4 at 400 V Rated value 	kW	53
	kW	30
	kW	30
Operating power		
<ul style="list-style-type: none"> • at AC-1 <ul style="list-style-type: none"> — at 230 V at 60 °C Rated value — at 230 V Rated value — at 400 V at 60 °C Rated value — at 690 V at 60 °C Rated value — at 690 V Rated value • at AC-3 <ul style="list-style-type: none"> — at 230 V Rated value — at 400 V Rated value — at 500 V Rated value — at 690 V Rated value 	kW	26
	kW	30
	kW	46
	kW	79
	kW	91
	kW	18.5
	kW	30
	kW	37
	kW	37
Operating power for ≥ 200000 operating cycles at AC-4		
<ul style="list-style-type: none"> • at 400 V Rated value • at 690 V Rated value 	kW	14.7
	kW	20
Operating frequency		
<ul style="list-style-type: none"> • at AC-3 maximum 	1/h	700
Control circuit/ Control:		
Type of voltage of the control supply voltage		AC
Control supply voltage with AC		
<ul style="list-style-type: none"> • at 50 Hz Rated value • at 60 Hz Rated value 	V	110
	V	120
Operating range factor control supply voltage rated value of the magnet coil with AC		

- at 50 Hz
- at 60 Hz

0.8 ... 1.1

0.8 ... 1.1

Auxiliary circuit:

Number of NC contacts		
<ul style="list-style-type: none"> • for auxiliary contacts <ul style="list-style-type: none"> — instantaneous contact 		1
Number of NO contacts		
<ul style="list-style-type: none"> • for auxiliary contacts <ul style="list-style-type: none"> — instantaneous contact 		1
Product expansion Auxiliary switch		Yes
Operating current at AC-15		
<ul style="list-style-type: none"> • at 230 V Rated value 	A	10
<ul style="list-style-type: none"> • at 400 V Rated value 	A	3
<ul style="list-style-type: none"> • at 690 V Rated value 	A	1
Operating current		
<ul style="list-style-type: none"> • at DC-12 at 125 V Rated value 	A	2
<ul style="list-style-type: none"> • at DC-12 at 220 V Rated value 	A	1
<ul style="list-style-type: none"> • at DC-12 at 600 V Rated value 	A	0.15
<ul style="list-style-type: none"> • at DC-13 at 125 V Rated value 	A	0.9
<ul style="list-style-type: none"> • at DC-13 at 220 V Rated value 	A	0.3
<ul style="list-style-type: none"> • at DC-13 at 600 V Rated value 	A	0.1
Operating current		
<ul style="list-style-type: none"> • at DC-12 <ul style="list-style-type: none"> — at 60 V Rated value — at 110 V Rated value 	A	6
	A	3
<ul style="list-style-type: none"> • at DC-13 <ul style="list-style-type: none"> — at 24 V Rated value — at 60 V Rated value — at 110 V Rated value 	A	10
	A	2
	A	1
Contact reliability of the auxiliary contacts		1 faulty switching per 100 million (17 V, 1 mA)

UL/CSA ratings:

Full-load current (FLA) for three-phase AC motor		
<ul style="list-style-type: none"> • at 480 V Rated value 	A	65
<ul style="list-style-type: none"> • at 600 V Rated value 	A	52
yielded mechanical performance [hp]		
<ul style="list-style-type: none"> • for single-phase AC motor at 110/120 V Rated value 	metric hp	5
<ul style="list-style-type: none"> • for single-phase AC motor at 230 V Rated value 	metric hp	10
<ul style="list-style-type: none"> • for three-phase AC motor at 200/208 V Rated value 	metric hp	20

<ul style="list-style-type: none"> • for three-phase AC motor at 220/230 V Rated value 	metric hp	20
<ul style="list-style-type: none"> • for three-phase AC motor at 460/480 V Rated value 	metric hp	50
<ul style="list-style-type: none"> • for three-phase AC motor at 575/600 V Rated value 	metric hp	50
Contact rating of the auxiliary contacts acc. to UL		A600 / P600

Short-circuit:

Design of the fuse link <ul style="list-style-type: none"> • for short-circuit protection of the main circuit <ul style="list-style-type: none"> — with type of assignment 1 required — with type of assignment 2 required • for short-circuit protection of the auxiliary switch required 		gL/gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 250 A gL/gG NH 3NA, DIAZED 5SB, NEOZED 5SE: 125 A fuse gL/gG: 10 A
--	--	--

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
Mounting type <ul style="list-style-type: none"> • Side-by-side mounting 		screw and snap-on mounting onto 35 mm standard mounting rail according to DIN EN 50022 Yes
Height	mm	113.4
Width	mm	55
Depth	mm	130
Required spacing <ul style="list-style-type: none"> • with side-by-side mounting <ul style="list-style-type: none"> — forwards — Backwards — upwards — downwards — at the side • for grounded parts <ul style="list-style-type: none"> — forwards — Backwards — upwards — at the side — downwards • for live parts <ul style="list-style-type: none"> — forwards — Backwards — upwards — downwards 	mm	0 0 0 0 0 0 0 0 50 6 50 0 0 50 50

— at the side

mm 6

Connections/ Terminals:

Type of electrical connection		
• for main current circuit		screw-type terminals
• for auxiliary and control current circuit		screw-type terminals
Type of connectable conductor cross-section		
• for main contacts		2x (1 ... 35 mm ²), 1x (1 ... 50 mm ²)
— single or multi-stranded		2x (1 ... 25 mm ²), 1x (1 ... 35 mm ²)
— finely stranded with core end processing		2x (18 ... 2), 1x (18 ... 1)
• for AWG conductors for main contacts		
• for auxiliary contacts		2x (0,5 ... 1,5 mm ²), 2x (0,75 ... 2,5 mm ²)
— single or multi-stranded		2x (0.5 ... 1.5 mm ²), 2x (0.75 ... 2.5 mm ²)
— finely stranded with core end processing		2x (20 ... 16), 2x (18 ... 14)
• for AWG conductors for auxiliary contacts		
Apparent pick-up power of the magnet coil with AC		
• at 50 Hz	V·A	212
• at 60 Hz	V·A	188

Safety related data:

Proportion of dangerous failures		
• with low demand rate acc. to SN 31920	%	40
• with high demand rate acc. to SN 31920	%	73
Product function Mirror contact acc. to IEC 60947-4-1		
		Yes
Protection against electrical shock		
		finger-safe when touched vertically from front acc. to IEC 60529

Mechanical data:

Size of contactor		S2
--------------------------	--	----

Ambient conditions:

Installation altitude at height above sea level maximum	m	2 000
Ambient temperature		
• during operation	°C	-25 ... +60
• during storage	°C	-55 ... +80

Certificates/ approvals:

General Product Approval

other



[Confirmation](#)

[Environmental Confirmations](#)

Further information

Information- and Downloadcenter (Catalogs, Brochures,...)

<http://www.siemens.com/industrial-controls/catalogs>

Industry Mall (Online ordering system)

<http://www.siemens.com/industrymall>

Cax online generator

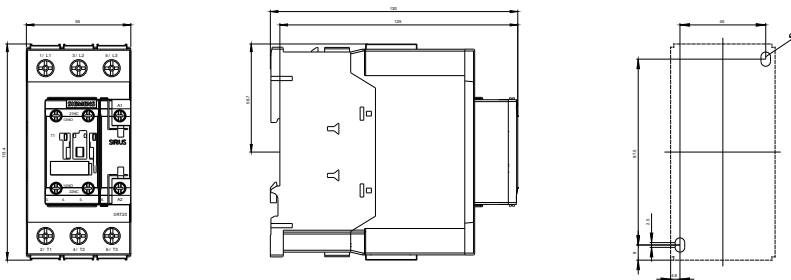
<http://support.automation.siemens.com/WW/CAXorder/default.aspx?lang=en&mfb=3RT20371AK60>

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

<http://support.automation.siemens.com/WW/view/en/3RT20371AK60/all>

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

http://www.automation.siemens.com/bilddb/cax_de.aspx?mfb=3RT20371AK60&lang=en





last modified:

11.03.2015