



load monitoring basis current range 20 A / 40 °C control voltage 24 V DC output NO for semiconductor relay / contactor

product brand name	SIRIUS
product designation	load monitoring, basis
product type designation	3RF29
manufacturer's article number	
<ul style="list-style-type: none"> • _1 of the accessories that can be ordered 	3RF2900-0RA88
product designation	
<ul style="list-style-type: none"> • _1 of the accessories that can be ordered 	sealable end cover
General technical data	
product function	for 3RF21/23 solid-state relays/solid-state contactors
power loss [W] for rated value of the current	
<ul style="list-style-type: none"> • without load current share typical 	0.6 W
insulation voltage rated value	600 V
degree of pollution	3
protection class IP	IP20
protection class IP on the front according to IEC 60529	IP20
shock resistance according to IEC 60068-2-27	15g / 11 ms
vibration resistance according to IEC 60068-2-6	2g
reference code according to IEC 81346-2	B
Substance Prohibitance (Date)	05/01/2012
SVHC substance name	Lead - 7439-92-1 Lead monoxide (lead oxide) - 1317-36-8 2-methyl-1-(4-methylthiophenyl)-2-morpholinopropan-1-one - 71868-10-5 Melamine - 108-78-1
Net Weight	71 g
Switching Function	
design of the switching function	transistor
Main circuit	
number of poles for main current circuit	0
number of NO contacts for main contacts	0
number of NC contacts for main contacts	0
type of voltage	DC
operating frequency rated value	50 ... 60 Hz
relative symmetrical tolerance of the operating frequency	10 %
operational current	
<ul style="list-style-type: none"> • at AC-51 rated value 	20 A
derating temperature	40 °C
Control circuit/ Control	
type of voltage	DC
control supply voltage at DC rated value	18 ... 30 V
control supply voltage 1 at DC rated value	24 V

control supply voltage 1 at DC final rated value	24 V
control supply voltage at DC full-scale value for signal<0> recognition	5 V
control current at minimum control supply voltage	
• at DC	2 mA
control current at DC rated value	25 mA
Auxiliary circuit	
number of NC contacts for auxiliary contacts	0
number of NO contacts for auxiliary contacts	0
number of CO contacts for auxiliary contacts	0
Installation/ mounting/ dimensions	
fastening method side-by-side mounting	Yes
fastening method	clip-on
height	101.5 mm
width	22.5 mm
depth	67 mm
Connections/ Terminals	
type of electrical connection	
• for auxiliary and control circuit	screw-type terminals
type of connectable conductor cross-sections	
• for auxiliary and control contacts	
— solid	1x (0.5 ... 2.5 mm ²), 2x (0.5 ... 1 mm ²)
— finely stranded with core end processing	1x (0.5 ... 2.5 mm ²), 2x (0.5 ... 1 mm ²)
— finely stranded without core end processing	1x (0.5 ... 2.5 mm ²), 2x (0.5 ... 1 mm ²)
• for AWG cables for auxiliary and control contacts	1x (20 ... 12)
tightening torque for auxiliary and control contacts with screw-type terminals	0.5 ... 0.6 N·m
tightening torque [lbf·in] for auxiliary and control contacts with screw-type terminals	4.5 ... 5.3 lbf·in
design of the thread of the connection screw of the auxiliary and control contacts	M3
stripped length of the cable for auxiliary and control contacts	7 mm
Electrical Safety	
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
Ambient conditions	
installation altitude at height above sea level maximum	1 000 m
ambient temperature	
• during operation	-25 ... +60 °C
• during storage	-55 ... +80 °C
Electromagnetic compatibility	
conducted interference	
• due to burst according to IEC 61000-4-4	2 kV / 5 kHz, behavior criterion 2
• due to conductor-earth surge according to IEC 61000-4-5	2 kV, behavior criterion 2
• due to conductor-conductor surge according to IEC 61000-4-5	1 kV, behavior criterion 2
• due to high-frequency radiation according to IEC 61000-4-6	140 dBuV in the frequency range 0.15 ... 80 MHz, behavior criterion 1
electrostatic discharge according to IEC 61000-4-2	4 kV contact discharging / 8 kV air discharging, behavior criterion 2
conducted HF interference emissions according to CISPR11	Class A for industrial environment
field-bound HF interference emission according to CISPR11	Class B for the domestic, business and commercial environments
Approvals Certificates	
Environment	General Product Approval



[Environmental Confirmations](#)





[Type Test Certificates/Test Report](#)



[Confirmation](#)

Further information

Information on the packaging

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

Information for data generation and storage

<https://support.industry.siemens.com/cs/ww/en/view/109995012>

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=3RF2920-0FA08>

Cax online generator

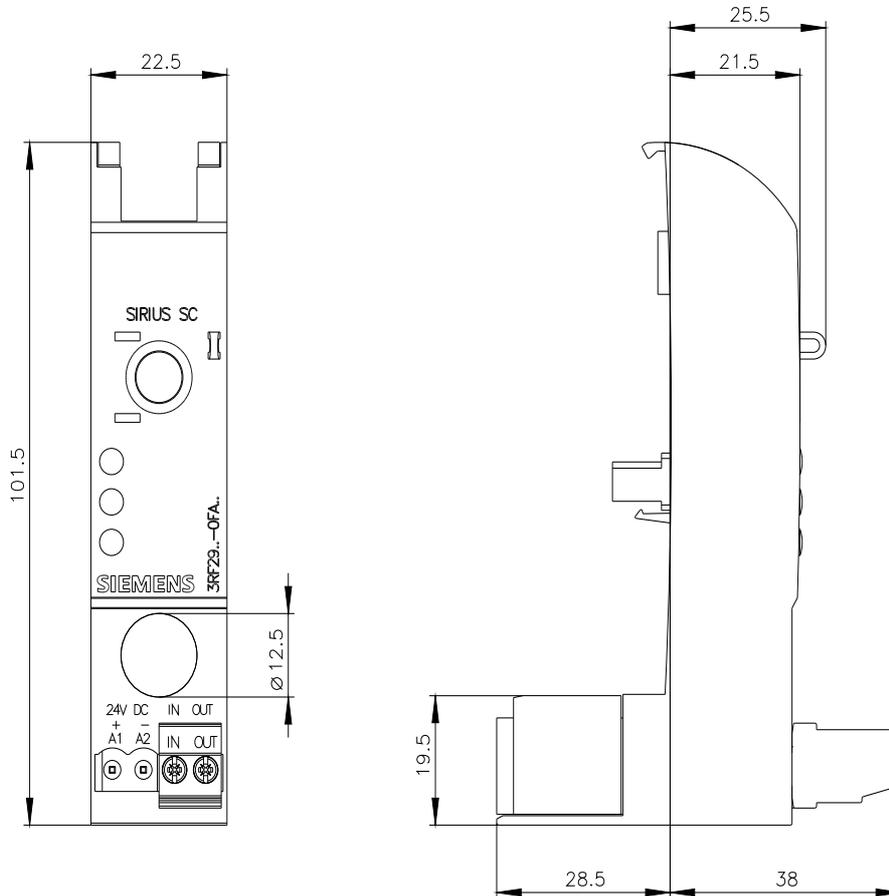
<https://support.automation.siemens.com/WW/CAXorder/default.aspx?lang=en&mlfb=3RF2920-0FA08>

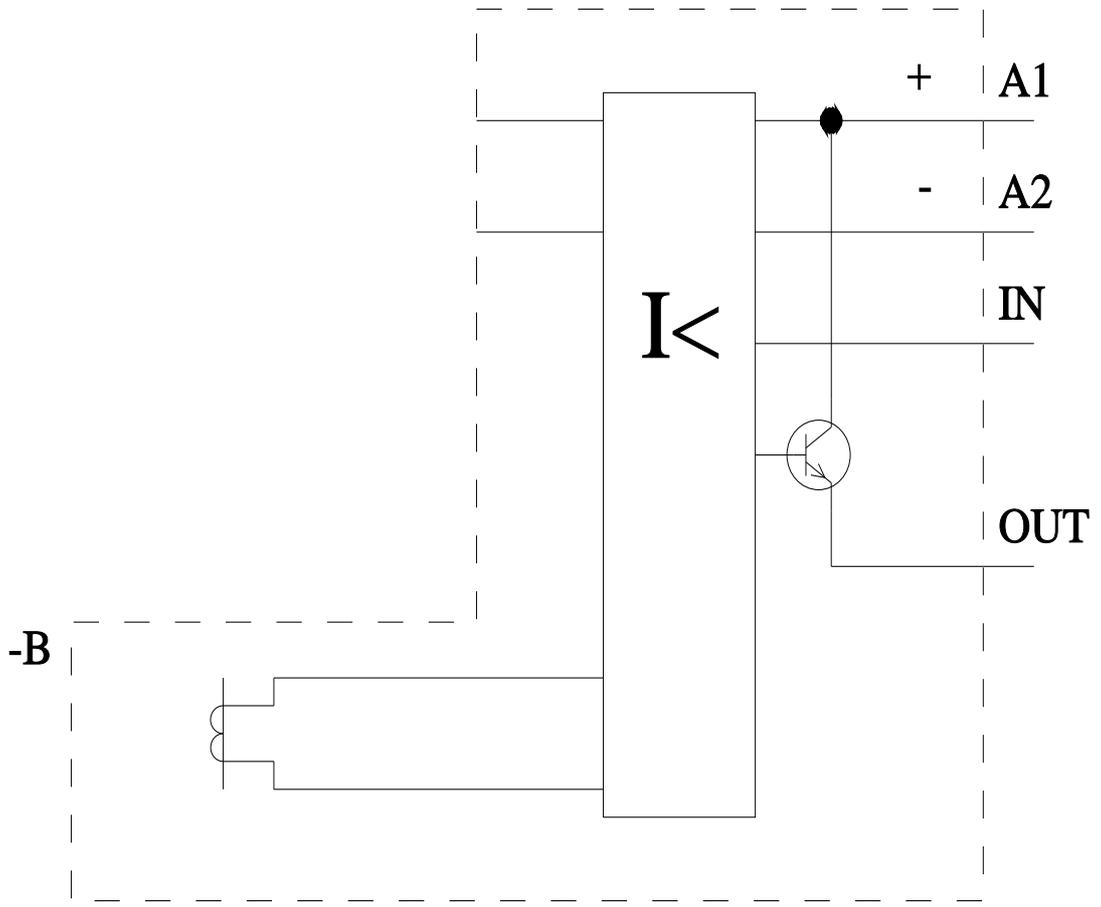
Service&Support (Manuals, Certificates, Characteristics, FAQs,...)

<https://support.industry.siemens.com/cs/ww/en/ps/3RF2920-0FA08>

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

https://www.automation.siemens.com/bilddb/cax_de.aspx?mlfb=3RF2920-0FA08&lang=en





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