

Technical specifications

Type		3RF29 ...E...	3RF29 ...F...	3RF29 ...G...	3RF29 ...H...	3RF29 ...J...	3RF29 ...K...
General data							
Ambient temperature							
• During operation, derating from 40 °C	°C	-25 ... +60					
• During storage	°C	-55 ... +80					
Installation altitude	m	0 ... 1000; derating from 1000					
Shock resistance acc. to IEC 60068-2-27	g/ms	15/11					
Vibration resistance acc. to IEC 60068-2-6	g	2					
Degree of protection		IP20					
Electromagnetic compatibility (EMC)							
• Emitted interference							
- Conducted interference voltage acc. to IEC 60947-4-3		Class A for industrial applications ¹⁾					
- Emitted, high-frequency interference voltage acc. to IEC 60947-4-3		Class A for industrial applications					
• Interference immunity							
- Electrostatic discharge acc. to IEC 61000-4-2 (corresponds to degree of severity 3)	kV	Contact discharge 4; air discharge 8; behavior criterion 2					
- Induced RF fields acc. to IEC 61000-4-6	MHz	0.15 ... 80; 140 dB μ V; behavior criterion 1					
- Burst acc. to IEC 61000-4-4		2 kV/5.0 kHz; behavior criterion 1					
- Surge acc. to IEC 61000-4-5	kV	Conductor - ground 2; conductor - conductor 1; behavior criterion 2					
Connection, auxiliary/control contacts, screw terminals							
• Conductor cross-section	mm ²	1 x (0.5 ... 2.5), 2 x (0.5 ... 1.0), 1 x (AWG 20 ... 12)					
• Stripped length	mm	7					
• Terminal screw		M3					
• Tightening torque	Nm lb.in	0.5 ... 0.6 4.5 ... 5.3					
Converter, feed-through opening							
• Diameter	mm	--	7	17			

¹⁾ Note limitations for power controller function modules. These modules were built as Class A devices. The use of these devices in residential areas could result in lead in radio interference. In this case these may be required to introduce additional interference suppression measures.

Solid-State Switching Devices for Resistive Loads

3RF29 Function Modules

General data

Type		3RF29 ...-E..8	3RF29 ...-F..8	3RF29 ...-G..3	3RF29 ...-G..6
Main circuit					
Rated operational voltage U_e	V	-- 1)		110 ... 230	400 ... 600
• Operating range	V	--		93.5 ... 253	340 ... 660
• Rated frequency	Hz	--		50/60	
Rated insulation voltage U_i	V	--		600	
Voltage measuring					
• Measuring range	V	--		93.5 ... 253	340 ... 660
Mains voltage, fluctuation compensation	%	--		20	

1) Versions are independent of the main circuit.

Type		3RF29 ...-H..3 3RF29 ...-K..3	3RF29 ...-H..6 3RF29 ...-K..6	3RF29 ...-J..3	3RF29 ...-J..6
Main circuit					
Rated operational voltage U_e	V	110 ... 230	400 ... 600	110 ... 230	400 ... 600
• Operating range	V	93.5 ... 253	340 ... 660	93.5 ... 253	340 ... 660
• Rated frequency	Hz	50/60			
Rated insulation voltage U_i	V	600			
Voltage measuring					
• Measuring range	V	93.5 ... 253	340 ... 660	93.5 ... 253	340 ... 660
Mains voltage, fluctuation compensation	%	20			

Type		3RF29 ...-...0.	3RF29 ...-...1.	3RF29 ...-...3.
Control circuit				
Method of operation		DC operation	AC/DC operation	AC operation
Rated control supply voltage U_s	V	24	24	110
Rated control current	mA	15	15	15
Rated frequency of the control supply voltage	Hz	--	50/60	50/60
Actuating voltage, max.	V	30	30	121
Rated control current At maximum voltage	mA	15	15	15
Response voltage	V	15	15	90
• For operating current	mA	2	2	2
Drop-out voltage	V	5	5	15

Type		3RF29 06-0FA08	3RF29 20-0FA08	3RF29 20-0GA..	3RF29 50-0GA..	3RF29 90-0GA..
Current measurement						
Rated operational current I_e	A	6	20	20	50	90
Current measurement						
• Teach range	A	0.25 ... 6	0.65 ... 20	0.56 ... 20	1.62 ... 50	2.93 ... 90
• Measuring range	A	0 ... 6.6	0 ... 22	0 ... 22	0 ... 55	0 ... 99
• Minimum partial load current	A	0.25	0.65	0.65	1.6	2.9
Number of partial loads		1 ... 6	1 ... 6	1 ... 12		

Type		3RF29 20-0HA..	3RF29 50-0HA..	3RF29 90-0HA..	3RF29 16-0JA..	3RF29 32-0JA..
Current measurement						
Rated operational current I_e	A	20	50	90	16	32
Current measurement						
• Teach range	A	4 ... 20	10 ... 50	18 ... 90	0.42 ... 16	0.8 ... 32
• Measuring range	A	0 ... 22	0 ... 55	4 ... 99	0 ... 16	0 ... 32
• Minimum partial load current	A	--			0.42	0.8
Number of partial loads		--			1 ... 6	

Type		3RF29 04-0KA..	3RF29 20-0KA..	3RF29 50-0KA..	3RF29 90-0KA..
Current measurement					
Rated operational current I_e	A	4	20	50	90
Current measurement					
• Teach range	A	0.15 ... 4	0.65 ... 20	1.6 ... 50	2.9 ... 90
• Measuring range	A	0 ... 4	0 ... 22	0 ... 55	0 ... 99
• Minimum partial load current	A	--	0.65	1.6	2.9
Number of partial loads			1 ... 6		