

Power PCB Relay RZH 105°C 16A

- 1 pole 16A, 1 form C (CO) or 1 form A (NO) contact
- DC coil 400mW
- 5kV/10mm coil-contact, reinforced insulation
- Ambient temperature 105°C
- Product in accordance to IEC 60335-1

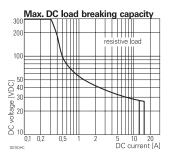
Typical applications	
Oven control, cooking plate control	

Approvals

VDE Cert. No. 40023970, cULus E214025, CQC Technical data of approved types on request

Contact Data	
Contact arrangement 1 f	form C (CO) or 1 form A (NO)
Rated voltage	250VAC
Max. switching voltage	400VAC
Rated current	16A ¹⁾
Limiting making current,	
form A contact, max. 4 s, duty factor 1	0 % 30A
Breaking capacity max.	4000VA
Contact material	AgNi 90/10 or AgSnO ₂
Frequency of operation, with/without load	360/72000h-1
Operate/release time max.	8/6ms
Bounce time max., form A/form B	4/6ms

Туре	Contact	Load	Cycles
IEC 61810			
RZH3-1C4	A/C (NO/NC)	16 A, 250 VAC, resistive, 105°C	10x10 ³
RZH3-1A3	A (NO)	16 A, 250 VAC, resistive, 85°C	40x10 ³
RZH3-1A3	A (NO)	12 A, 250 VAC, resistive, 105°C	20x 10 ³
RZH1A4	A (NO)	10 A, 250 VAC, resistive, 105°C	150x10 ³
RZHH-1A4	A (NO)	12 A, 250 VAC, resistive, 85°C	150x10 ³
RZHH-1A4	A (NO)	18 A, 250 VAC, resistive, 85°C	30x10 ³
RZHH-1A4	A (NO)	12 A, 250 VAC, resistive, 105°C	100x10 ³
RZHH-1A4	A (NO)	10 A, 250 VAC, resistive, 105°C	300x10 ³
RZHH-1A4	A (NO)	16 A, 250 VAC, resistive, 105°C	30x10 ³
RZH1A4	A (NO)	16 A, 250 VAC, resistive, 85°C	50x10 ³
UL 508			
RZH3-1A4	A (NO)	10 A, 250 VAC, resistive, 105°C	150x10 ³
RZH3-1C4	A/C (NO/NC)	16 A, 250 VAC, resistive, 105°C	10x10 ³
RZHH-1A4	A (NO)	10 A, 250 VAC, resistive, 105°C	300x10 ³
RZHH-1A4	A (NO)	12 A, 250 VAC, resistive, 105°C	150x10 ³
RZHH-1A4	A (NO)	12 A, 250 VAC, resistive, 85°C	150x10 ³
RZHH-1A4	A (NO)	16 A, 250 VAC, resistive, 105°C	30x10 ³
RZHH-1A4	A (NO)	16 A, 250 VAC, resistive, 85°C	50x10 ³



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Datasheets and product specification according to IEC 61810-1 and to be used only together with the 'Definitions' section.



F0305-A



Contact Data (continued)

Mechanical endurance >10x10⁶ operations 1) Continuous thermal load >10A at 105°C requires reduction of coil power to 49% of

rated power after 100ms.

Coil Data

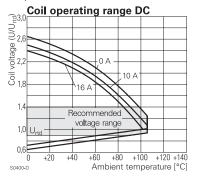
Coil voltage range	3 to 48VDC
Operative range, IEC 61810	90110% U _{RTD}
Coil insulation system according UL1446	class F

Coil versions DC coil

Coil	Rated	Operate	Release	Coil	Rated coil		
code	voltage	voltage	voltage	resistance	power		
	VDC	VDC	VDC	Ω±10%	mW ¹⁾		
D003	3	2.1	0.3	22	410		
D005	5	3.5	0.5	60	420		
D006	6	4.2	0.6	90	400		
D009	9	6.3	0.9	200	400		
D012	12	8.4	1.2	360	400		
D024	24	16.8	2.4	1440	400		
D048	48	33.6	4.8	5730	400		
1) Continuous thermal load > 10 A at 105°C requires reduction of coil power to 49% of							

rated power after 100 ms.

All figures are given for coil without pre-energization, at ambient temperature +23°C. Other coil voltages on request



Insulation Data

Initial dielectric strength	
between open contacts	1000V _{ms}
between contact and coil	5000V _{ms}
Clearance/creepage	
between contact and coil	≥10/10mm
Material group of insulation parts	Illa
Tracking index of relay base	PTI250V

Datasheets and product data is subject to the terms of the disclaimer and all chapters of the 'Definitions' section, available at http://relays.te.com/definitions

Datasheets, product data, 'Definitions' section, application notes and all specifications are subject to change.

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Power PCB Relay RZH 105°C 16A (Continued)

Other Data

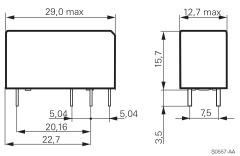
Material compliance: EU RoHS/ELV, China RoHS, REACH, Halogen content refer to the Product Compliance Support Center at www.te.com/customersupport/rohssupportcenter

Resistance to heat and fire	
standard cover version	according EN 60335-1, par.30
Ambient temperature	-40 to 105°C
Category of environmental protection	
IEC 61810	RTII - flux proof
Vibration resistance (functional), 30 to	500Hz
closing form A contact	>15g
opening form A contact	>20g
opening form B contact	>5g
Shock resistance (destructive)	100g
Terminal type	PCB-THT
Mounting distance	≥2mm
Weight	10g
Resistance to soldering heat THT	
IEC 60068-2-20	270°C/10s ²⁾
Packaging/unit	tube/20 pcs., box/500 pcs.
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The use of foaming flux is not permitted.

Dimensions

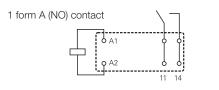
16 A, pinning 5 mm



PCB layout / terminal assignment

Bottom view on solder pins

16A, pinning 5mm



1 form C (CO) contact



S0163-BE

S0163-BF

Recommended pcb hole for manual mounting: Ø1.3mm

For automated mounting please ask for detailed drawing.

Product	code structure	Typical product code	RZ	н	3	-1A	4	-D012
Туре								
	Power PCB Relay RZ							
Version								
н	Hot version 105°C							
Version								
3	double pinning 5mm, 16A (1 form A or 1 form C)							
н	double pinning 5mm, 16A High performance (1 form A)							
Contact C	Configuration							
1A	1 form A (1 NO) contact							
1C	1 form C (1 CO) contact							
Contact n	naterial							
4	AgNi 90/10							
3	AgSnO ₂							
Coil versi	on							-
Со	il code: please refer to coil versions table							

Product code	Version	Contacts	Contact material	Coil	Part number
RZH3-1C4-D012	16A, 105°C	1 form C (CO)	AgNi 90/10	12VDC	2-1415899-5
RZH3-1C4-D024	pinning 5mm			24VDC	2-1415899-6
RZH3-1A4-D009		1 form A (NO)		9VDC	2-1415899-7
RZH3-1A4-D012				12VDC	2-1415899-8
RZH3-1A4-D024				24VDC	2-1415899-9
RZHH-1A4-D009	16A, 105°C			9VDC	6-1415899-2
RZHH-1A4-D012	pinning 5mm			12VDC	6-1415899-6
RZHH-1A4-D024	High performance			24VDC	6-1415899-7
RZH3-1A3-D012	16A, 105°C, pinning 5mm	1 form A (NO)	AgSnO ₂	12VDC	9-1415899-0

[16A, 105°C, pinning 5mm] 1 form A (NO) KZH3-1A3-D012

This list represents the most common types and does not show all variants covered by this datasheet. Other types on request

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