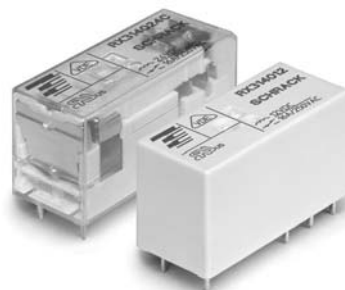


## Power PCB Relay RX1

- 1 pole 12 or 16 A, 1 CO or 1 NO
- DC- or AC-coil
- Reinforced insulation
- Transparent cover optional

### Applications

Domestic appliances, heating control, emergency lighting, automatic doors



S0271-A

### Approvals

VDE REG.-Nr. A651, cULus E214025  
Technical data of approved types on request

### Contact data

Contact configuration	1 CO or 1 NO	
Contact set	single contact	
Type of interruption	micro disconnection	
Rated voltage / max. switching voltage AC	250 / 400 VAC	
Rated current	12 A	16 A
Maximum breaking capacity AC	3000 VA	4000 VA
Limiting making capacity, max 4 s, duty factor 10%	25 A	
Contact material	AgNi 90/10	
Rated frequency of operation with / without load	6 / 600 min <sup>-1</sup>	
Operate- / release time DC coil	max 8 / 6 ms	
Bounce time DC coil, NO / NC contact	max 4 / 6 ms	

### Contact ratings

Type	Contact	Load	Ambient temp. [°C]	Cycles
<b>IEC 61810</b>				
RX114 DC coil	CO	12 A, 250 VAC, cosφ=1	85°C	30x10 <sup>3</sup>
RX134 DC coil	NO	12 A, 250 VAC, cosφ=1	85°C	100x10 <sup>3</sup>
RX114 AC coil	CO	12 A, 250 VAC, cosφ=1	70°C	30x10 <sup>3</sup>
RX134 AC coil	NO	12 A, 250 VAC, cosφ=1	70°C	100x10 <sup>3</sup>
RX334	NO	16 A, 250 VAC, cosφ=1	70°C	50x10 <sup>3</sup>
<b>UL 508</b>				
RX114	NO / NC	12 A, 250 VAC, general purpose	85°C	30x10 <sup>3</sup>
RX314	NC	16 A, 250 VAC, resistive	85°C	25x10 <sup>3</sup>

### Coil data

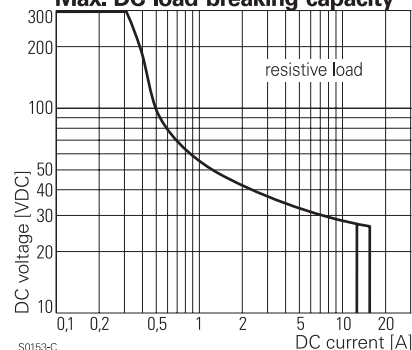
Rated coil voltage range DC coil	5...110 VDC
AC coil	24...230 VAC
Operative range to IEC 61810	2
Coil insulation system according UL1446	class F

### Coil versions, DC-coil

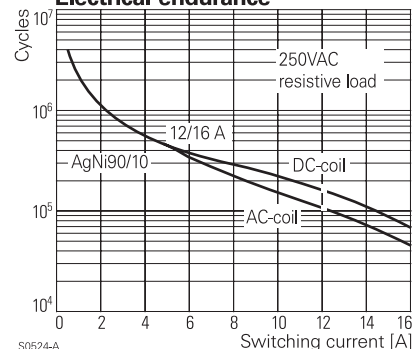
Coil code	Rated voltage VDC	Operate voltage VDC	Release voltage VDC	Coil resistance Ohm	Rated coil power mW
005	5	3.5	0.5	50±10%	500
006	6	4.2	0.6	68±10%	529
012	12	8.4	1.2	274±10%	526
024	24	16.8	2.4	1095±10%	526
048	48	33.6	4.8	4380±10%	526
060	60	42.0	6.0	6845±10%	526
110	110	77.0	11.0	23010±10%	526

All figures are given for coil without preenergization, at ambient temperature +23°C

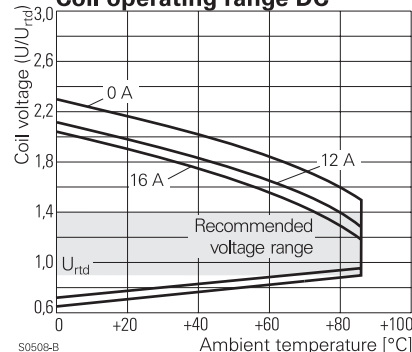
### Max. DC load breaking capacity



### Electrical endurance



### Coil operating range DC



## Power PCB Relay RX1 (Continued)

### Coil versions, AC-coil 50Hz

Coil code	Rated voltage	Operate voltage 50 Hz	Release voltage 50 Hz	Coil resistance	Rated coil power 50 Hz
	VAC	VAC	VAC	Ohm	VA
524	24	18.0	3.6	350±10%	0.76
615	115	86.3	17.3	8100±15%	0.76
730	230	172.5	34.5	32500±15%	0.74

All figures are given for coil without preenergization, at ambient temperature +23°C

### Insulation

Dielectric strength coil-contact circuit	4000 V <sub>rms</sub>
open contact circuit	1000 V <sub>rms</sub>
Clearance / creepage coil-contact circuit	≥ 8 / 8 mm
Material group of insulation parts	IIIa
Tracking index of relay base	PTI 250 V
Insulation to IEC 61810-1	
Type of insulation coil-contact circuit	reinforced
open contact circuit	micro disconnection
Rated insulation voltage	250 V
Pollution degree 12 A version	3
16 A version	3
Rated voltage system	240 V
Overvoltage category	III

### Other data

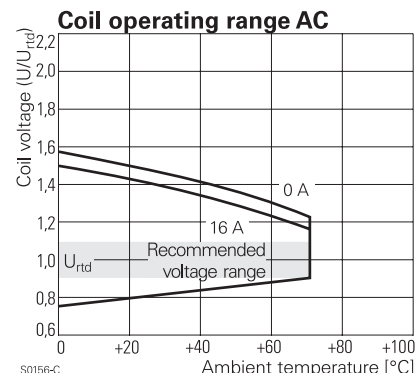
Mechanical endurance DC coil	> 5 x 10 <sup>6</sup> cycles
AC coil	> 1 x 10 <sup>6</sup> cycles
Material	
RoHS - Directive 2002/95/EC	compliant as per product date code 0413
Environment	
Ambient temperature range DC coil	-40...+85°C <sup>1)</sup>
AC coil	-40...+70°C
Vibration resistance (function) NO / NC contact	20 / 4 g, 10 ... 150 Hz
Shock resistance (destruction)	100 g
Category of protection	RTII - flux proof
Processing	
Mounting standard version (white cover)	pcb or on socket
transparent version	pcb
Mounting distance	≥ 2,5 mm <sup>2)</sup>
Resistance to soldering heat flux-proof version	270 °C / 10 s
Relay weight	14 g
Packaging unit	500 pcs

<sup>1)</sup> Version with transparent cover: -40...+70°C

<sup>2)</sup> Version with transparent cover: 5 mm

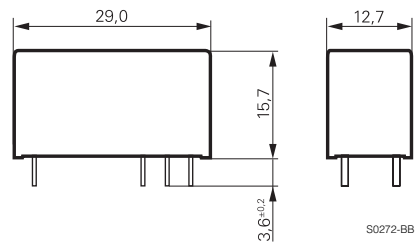
### Accessories

For standard version (white cover), details see datasheet accessories RT



## Power PCB Relay RX1 (Continued)

### Dimensions

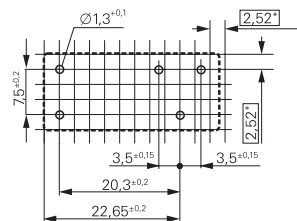


### PCB layout / terminal assignment

Bottom view on solder pins

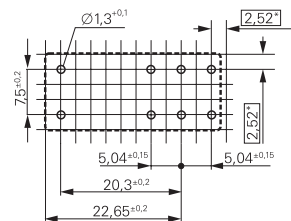
\*) With the recommended PCB hole sizes a grid pattern from 2.5 mm to 2.54 mm can be used.

12 A, pinning 3.5 mm



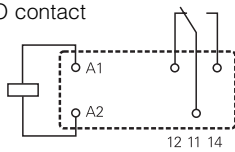
S0418-CB

16 A, pinning 5 mm



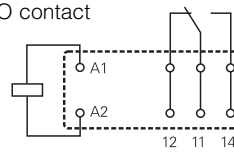
S0418-CA

1 CO contact



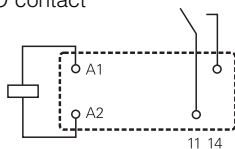
S0163-BG

1 CO contact



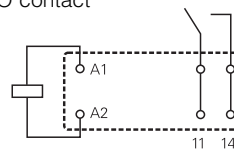
S0163-BE

1 NO contact



S0163-BH

1 NO contact



S0163-BF

### Product key

Typical product key

**RX**

**3**

**1**

**4**

**024**

#### Type

**RX** Power PCB Relay RX1

#### Version

- 1** 12 A, pinning 3.5 mm, flux proof
- 3** 16 A, pinning 5 mm, flux proof

#### Contact configuration

- 1** 1 CO contact (1 form C)
- 3** 1 NO contact (1 form A)

#### Contact material

- 4** AgNi 90/10

#### Coil

Coil code: please refer to coil versions table

#### Cover

- Blank** standard cover (white)
- C** transparent cover (clear)

**Power PCB Relay RX1** (Continued)

Product key	Version	Contacts	Cont. material	Coil	Cover	Part number
RX114012	12 A	1 CO contact	AgNi 90/10	12 VDC	white	6-1415502-1
RX114012C	pinning 3.5mm				transparent	1-1415503-1
RX114024	flux proof			24 VDC	white	7-1415502-1
RX114024C					transparent	2-1415503-1
RX114730				230 VAC	white	8-1415502-1
RX114730C					transparent	5-1415503-1
RX134012		1 NO contact		12 VDC	white	9-1415502-1
RX134024				24 VDC		1415503-1
RX314012	16 A	1 CO contact		12 VDC		1-1415502-1
RX314012C	pinning 5mm				transparent	3-1415503-1
RX314024	flux proof			24 VDC	white	2-1415502-1
RX314024C					transparent	4-1415503-1
RX314730				230 VAC	white	3-1415502-1
RX314730C					transparent	6-1415503-1
RX334012		1 NO contact		12 VDC	white	4-1415502-1
RX334024				24 VDC		5-1415502-1