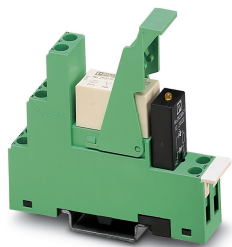


# Relay Module - PR1-RSC3-LV-120AC/2X21AU - 2834546

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Pre-assembled relay modules with screw connection, consisting of: relay base, multi-layer contact relay, plug-in display/interference suppression module, and retaining bracket. Input voltage: 120 V AC, 2 changeover contacts, 8 A

## Your advantages

- ✓ Safe isolation between coil and contact side
- ✓ Logical contact arrangement thanks to 1/3-level relay base
- ✓ Operational reliability thanks to sealed relay



## Key Commercial Data

Packing unit	5 pc
Minimum order quantity	5 pc
GTIN	 4 046356 044431
GTIN	4046356044431

## Technical data

### Ambient conditions

Ambient temperature (operation)	-25 °C ... 60 °C
Ambient temperature (storage/transport)	-25 °C ... 85 °C

### Coil side

Nominal input voltage $U_N$	120 V AC
Typical input current at $U_N$	9 mA (at 50 Hz) 7 mA (At 60 Hz)
Typical response time	3 ms ... 12 ms
Typical release time range	1.5 ms ... 16 ms
Protective circuit	Varistor
Operating voltage display	Yellow LED
Power dissipation for nominal condition	1.08 W

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## Technical data

### Contact side

Contact type	2 changeover contacts
Type of switch contact	Single contact
Contact material	AgNi, hard gold-plated
Maximum switching voltage	30 V AC
	36 V DC
Minimum switching voltage	100 mV (at 10 mA)
Min. switching current	1 mA (at 24 V)
Maximum inrush current	50 mA
Limiting continuous current	50 mA
Interrupting rating (ohmic load) max.	1.2 W (at 24 V DC)

### Contact side (with destroyed gold layer)

Contact material	AgNi
Note	the following values are applicable if a gold layer is destroyed
Maximum switching voltage	250 V AC/DC
Minimum switching voltage	5 V
Limiting continuous current	8 A
Maximum inrush current	15 A (300 ms)
Min. switching current	10 mA
Interrupting rating (ohmic load) max.	2000 VA (for 250 V AC)
Switching capacity	2 A (at 24 V, DC13)
	0.2 A (at 110 V, DC13)
	0.2 A (at 250 V, DC13)
	2 A (at 24 V, AC15)
	2 A (at 120 V, AC15)
	2 A (at 250 V, AC15)

### General

Test voltage	4 kV (50 Hz, 1 min., winding/contact)
	2.5 kV (50 Hz, 1 min., contact/contact)
Operating mode	100% operating factor
Mechanical service life	3x 10 <sup>7</sup> cycles
Service life, electrical	see diagram
Mounting position	any
Assembly instructions	In rows with zero spacing

### Connection data input side

Connection name	Coil side
Connection method	Screw connection
Stripping length	8 mm
Screw thread	M3
Conductor cross section solid	0.14 mm <sup>2</sup> ... 2.5 mm <sup>2</sup>

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## Technical data

### Connection data input side

Conductor cross section flexible	0.14 mm <sup>2</sup> ... 2.5 mm <sup>2</sup>
Conductor cross section AWG	26 ... 14

### Connection data output side

Connection name	Contact side
Connection method	Screw connection
Stripping length	8 mm
Screw thread	M3
Conductor cross section solid	0.14 mm <sup>2</sup> ... 2.5 mm <sup>2</sup>
Conductor cross section flexible	0.14 mm <sup>2</sup> ... 2.5 mm <sup>2</sup>
Conductor cross section AWG	26 ... 14

### Standards and Regulations

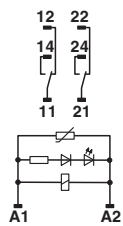
Standards/regulations	IEC 60664
	EN 50178
Pollution degree	3
Overvoltage category	III

### Environmental Product Compliance

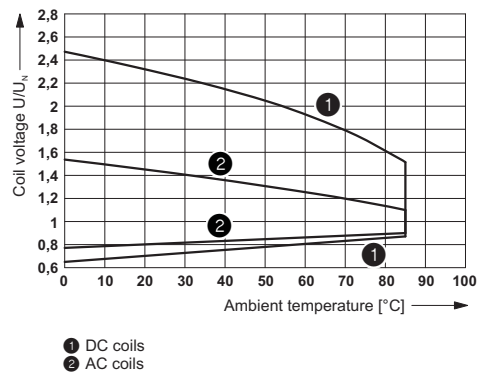
China RoHS	Environmentally friendly use period: unlimited = EFUP-e
	No hazardous substances above threshold values

## Drawings

Circuit diagram



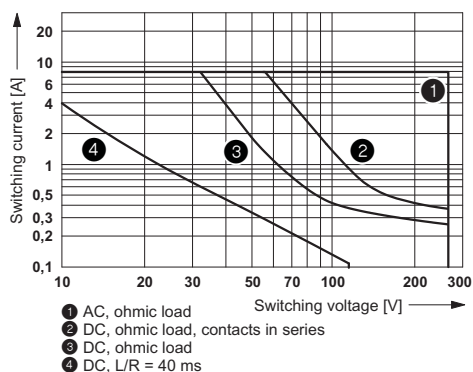
Diagram



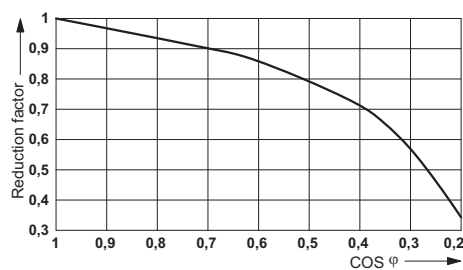
Operating voltage range of the relay

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Diagram



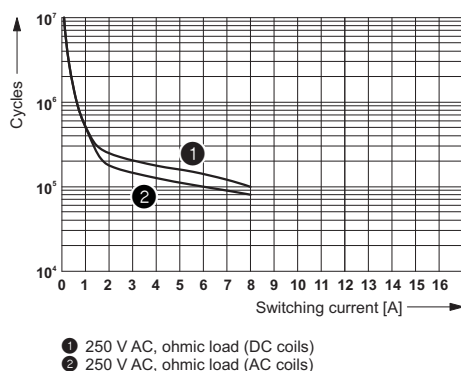
Diagram



Interrupting rating

Service life reduction factor with various cos phi

Diagram



Electrical service life

## Articles in set

Relay base - PR1-BSC3/2X21 - 2833521



PR1... relay base, for miniature power relays or miniature switching relays with 1 or 2 changeover contacts or solid-state relays of the same design, 1/3-level version, screw connections, plug-in option for input/interference suppression modules

Single relay - REL-MR-120AC/21-21AU - 2961477



Plug-in miniature power relay, with multi-layer gold contact, 2 changeover contacts, input voltage 120 V AC

# Relay Module - PR1-RSC3-LV-120AC/2X21AU - 2834546

## Articles in set

Plug-in module - LV-120-230AC/110DC - 2833738



Plug-in module, with varistor and yellow LED, input voltage: 120 ... 230 V AC / 110 V DC  $\pm 20\%$

Retaining bracket - EL1-P16 - 2833547



Relay retaining bracket, with eject function and integrated equipment marking area (7.5 x 15 mm), to suit relay base PR1, for 16 mm high miniature power relay and solid-state relay

Marker labels - MP 1 - 2833631



Equipment marker, labeling surface 6 x 15 mm

## Classifications

### eCl@ss

eCl@ss 4.0	27371100
eCl@ss 4.1	27371100
eCl@ss 5.0	27371600
eCl@ss 5.1	27371600
eCl@ss 6.0	27371600
eCl@ss 7.0	27371601
eCl@ss 9.0	27371601

### ETIM

ETIM 2.0	EC001437
ETIM 3.0	EC001437
ETIM 4.0	EC001437
ETIM 6.0	EC001437
ETIM 7.0	EC001437

### UNSPSC

UNSPSC 6.01	30211916
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## Classifications

### UNSPSC

UNSPSC 7.0901	39121515
UNSPSC 11	39121515
UNSPSC 12.01	39121515
UNSPSC 13.2	39122334
UNSPSC 18.0	39122334
UNSPSC 19.0	39122334
UNSPSC 20.0	39122334
UNSPSC 21.0	39122334

## Accessories

### Accessories

#### Device marking

Label - EML (15X6) R YE - 0819288



Label, Roll, yellow, unlabeled, can be labeled with: THERMOMARK ROLLMASTER 300/600, THERMOMARK X1.2, THERMOMARK ROLL X1, THERMOMARK ROLL 2.0, THERMOMARK ROLL, mounting type: adhesive, lettering field size: 15 x 6 mm, Number of individual labels: 2500

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### Loop bridge

Wire bridge - DB 50- 90 BU - 2821180

Flexible wire loop bridge, 50-pos., conductor cross-section: 0.5 mm<sup>2</sup>, loop length: 90 mm, ferrule length: 8 mm, color: blue



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Wire bridge - DB 50- 90 BK - 2820916

Flexible wire loop bridge, 50-pos., conductor cross-section: 0.5 mm<sup>2</sup>, loop length: 90 mm, ferrule length: 8 mm, color: black



## Relay Module - PR1-RSC3-LV-120AC/2X21AU - 2834546

### Accessories

Wire bridge - DB 50- 90 GY - 2820929

Flexible wire loop bridge, 50-pos., conductor cross-section: 0.5 mm<sup>2</sup>, loop length: 90 mm, ferrule length: 8 mm, color: gray



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### Marking material

Marker labels - MP 1 - 2833631



Equipment marker, labeling surface 6 x 15 mm

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