

## Data Sheet | Item Number: 286-312

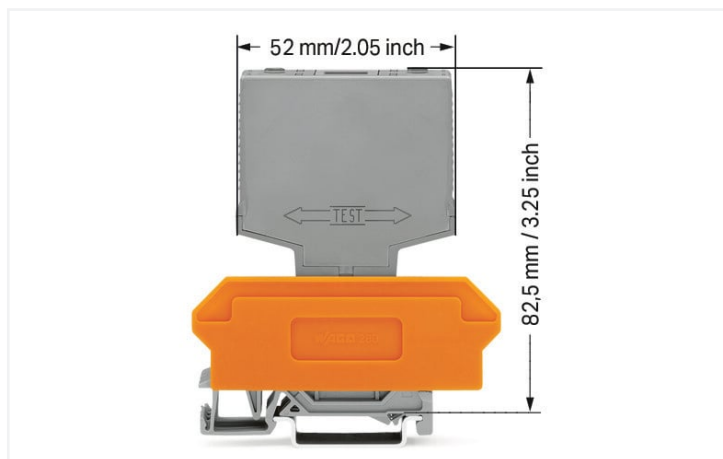
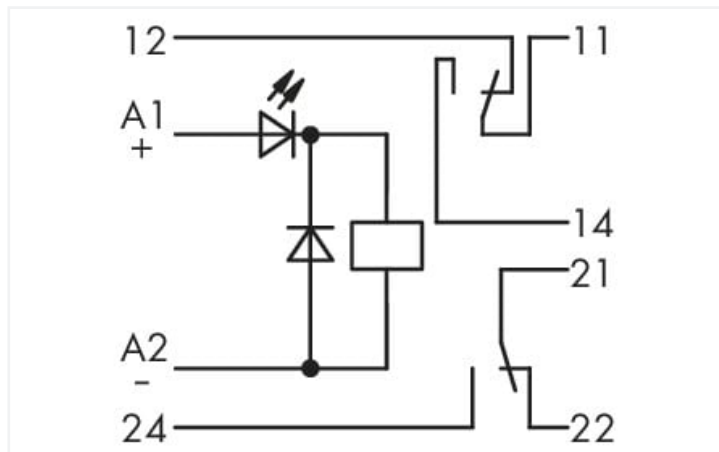
Relay module; Nominal input voltage: 24 VDC; 2 changeover contacts; Limiting continuous current: 7 A; Red status indicator; Module width: 20 mm; gray

<https://www.wago.com/286-312>



Color: ■ gray

Similar to illustration



### Technical data

#### Control circuit

|                                |            |
|--------------------------------|------------|
| Nominal input voltage $U_N$    | DC 24 V    |
| Input voltage range            | $\pm 10\%$ |
| Nominal input current at $U_N$ | 22 mA      |

#### Load circuit

|                                             |                                            |
|---------------------------------------------|--------------------------------------------|
| Number of changeover/switchover contacts    | 2                                          |
| Contact material (relay)                    | AgNi 0.15                                  |
| Limiting continuous current                 | 7 A                                        |
| Switching voltage (max.)                    | AC 250 V                                   |
| Switching power (resistive) max.            | AC 1750 VA                                 |
| Pull-in time (typ.)                         | 18 ms                                      |
| Drop-out time (typ.)                        | 3 ms                                       |
| Bounce time (typ.)                          | 2 ms                                       |
| Electrical life (NO; resistive load; 23 °C) | 100 x 10 <sup>3</sup> switching operations |
| Mechanical life                             | 30 x 10 <sup>6</sup> switching operations  |

### Signaling

|                  |         |
|------------------|---------|
| Status indicator | Red LED |
|------------------|---------|

### Safety and protection

|                                                        |           |
|--------------------------------------------------------|-----------|
| Rated voltage                                          | 250 V     |
| Rated surge voltage                                    | 4 kV      |
| Pollution degree                                       | 2         |
| Dielectric strength (control/load circuit) (AC, 1 min) | 2 kVrms   |
| Dielectric strength (open contact) (AC, 1 min)         | 1 kVrms   |
| Dielectric strength (load/load circuit) (AC, 1 min)    | 1.5 kVrms |
| Protection type                                        | IP20      |

### Physical data

|                                    |                        |
|------------------------------------|------------------------|
| Width                              | 20 mm / 0.787 inches   |
| Height from upper-edge of DIN-rail | 82.5 mm / 3.248 inches |
| Depth                              | 52 mm / 2.047 inches   |

### Mechanical data

|               |                                                 |
|---------------|-------------------------------------------------|
| Mounting type | Pluggable module for receptacle terminal blocks |
|---------------|-------------------------------------------------|

### Material data

|           |          |
|-----------|----------|
| Color     | gray     |
| Fire load | 0.412 MJ |
| Weight    | 39.6 g   |

### Environmental requirements

|                                           |                                          |
|-------------------------------------------|------------------------------------------|
| Ambient temperature (operation at $U_N$ ) | -25 ... +40 °C                           |
| Ambient temperature (storage)             | -25 ... +70 °C                           |
| Processing temperature                    | -25 ... +50 °C                           |
| Relative humidity                         | 5 ... 85 % (no condensation permissible) |
| Operating altitude (max.)                 | 2000 m                                   |

### Standards and specifications

|                          |            |
|--------------------------|------------|
| Standards/specifications | EN 60664-1 |
|--------------------------|------------|

### Commercial data

|                       |                          |
|-----------------------|--------------------------|
| Product Group         | 6 (INTERFACE ELECTRONIC) |
| eCl@ss 10.0           | 27-37-16-01              |
| eCl@ss 9.0            | 27-37-16-01              |
| ETIM 8.0              | EC001437                 |
| ETIM 7.0              | EC001437                 |
| PU (SPU)              | 10 (1) pcs               |
| Packaging type        | Box                      |
| Country of origin     | DE                       |
| GTIN                  | 4045454427986            |
| Customs tariff number | 85364900990              |

## Environmental Product Compliance

|                                           |                                                          |
|-------------------------------------------|----------------------------------------------------------|
| CAS-No.                                   | 7439-92-1<br>79-94-7                                     |
| REACH Candidate List Substance            | 2,2',6,6'-tetrabromo-4,4'-isopropylidenediphenol<br>Lead |
| RoHS Compliance Status                    | Compliant,With Exemption                                 |
| RoHS Exemption                            | 7(a)<br>7(c)-I                                           |
| SCIP notification number (Austria)        | 86f44f9f-82f0-41d6-a503-1729fec3d12a                     |
| SCIP notification number (Belgium)        | 30e73ea9-bf79-47c9-a626-fc7dd71d79ba                     |
| SCIP notification number (Bulgaria)       | 0d888b10-ba7a-4daf-ac6b-166d44106eec                     |
| SCIP notification number (Czech Republic) | 9faccd2a-6838-4858-a016-bcadfda0ed36                     |
| SCIP notification number (Denmark)        | 4b519ec2-d88f-4923-ba21-66526dab623c                     |
| SCIP notification number (Finland)        | 5cd13514-e0d7-479f-a4d5-ea086b01e171                     |
| SCIP notification number (France)         | 0f7b5fb5-bc85-40e4-9d2b-a3bf1f9b010f                     |
| SCIP notification number (Germany)        | 80af79bc-86fa-4967-8977-b6c49aa70477                     |
| SCIP notification number (Hungary)        | cfda50cc-840a-4960-8d5f-af8605dd8d77                     |
| SCIP notification number (Italy)          | 18a7a23c-effd-473f-9622-fa1b516e1644                     |
| SCIP notification number (Netherlands)    | d65ed1dd-f77b-4fd6-88f5-4048d144b645                     |
| SCIP notification number (Poland)         | 116def87-268a-4a2c-a4c1-035eef1217d1                     |
| SCIP notification number (Romania)        | 7f60db94-8363-4912-a302-fbfa4a2baa38                     |
| SCIP notification number (Sweden)         | b388c426-10b0-42a5-ace5-18897e258763                     |

## Approvals / Certificates

### General approvals



| Approval                                    | Standard       | Certificate Name                |
|---------------------------------------------|----------------|---------------------------------|
| EAC<br>Brjansker Zertifizierungs-<br>stelle | TP TC 004/2011 | EAC RU C-DE.AM02.<br>B.00122/19 |

## Downloads

### Documentation

| Bid Text |            |                 |                   | Instruction Leaflet |                   |
|----------|------------|-----------------|-------------------|---------------------|-------------------|
| 286-312  | 19.02.2019 | xml<br>3.80 KB  | <a href="#">↓</a> | pdf<br>1246.19 KB   | <a href="#">↓</a> |
| 286-312  | 22.03.2018 | doc<br>27.00 KB | <a href="#">↓</a> |                     |                   |

## CAD/CAE-Data

|                      |   |
|----------------------|---|
| CAD data             |   |
| 2D/3D Models 286-312 | ↓ |

|                        |   |
|------------------------|---|
| CAE data               |   |
| WSCAD Universe 286-312 | ↓ |
| ZUKEN Portal 286-312   | ↓ |

## 1 Compatible Products

### 1.1 Optional Accessories

#### 1.1.1 Marking

##### 1.1.1.1 Marker



**Item No.: 209-701**  
 WSB marking card; as card; not stretchable; plain; snap-on type; white

### 1.1.2 Terminal blocks

#### 1.1.2.1 Terminal block for pluggable modules



**Item No.: 280-638**  
 Terminal block for pluggable modules; 8-pole; with 2-conductor terminal blocks; with orange separator; for DIN-rail 35 x 15 and 35 x 7.5; 2.5 mm<sup>2</sup>; CAGE CLAMP®; 2,50 mm<sup>2</sup>; gray



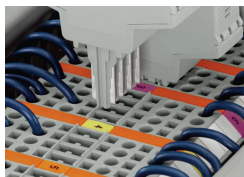
**Item No.: 280-764**  
 Terminal block for pluggable modules; 8-pole; with 4-conductor terminal blocks; with marker carrier; with orange separator; for DIN-rail 35 x 15 and 35 x 7.5; 2.5 mm<sup>2</sup>; CAGE CLAMP®; 2,50 mm<sup>2</sup>; gray



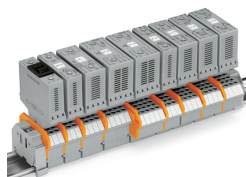
**Item No.: 280-628**  
 Terminal block for pluggable modules; 8-pole; with 4-conductor terminal blocks; with orange separator; for DIN-rail 35 x 15 and 35 x 7.5; 2.5 mm<sup>2</sup>; CAGE CLAMP®; 2,50 mm<sup>2</sup>; gray

## Installation Notes

### Installation



Coding ensures correct polarity.



Pluggable electronic modules on 2- or 4-conductor carrier terminal blocks

## Marking



Marking via WMB Multi Marking System.

Testing



Function testing via touch-proof test slots