

Data Sheet | Item Number: 257-616

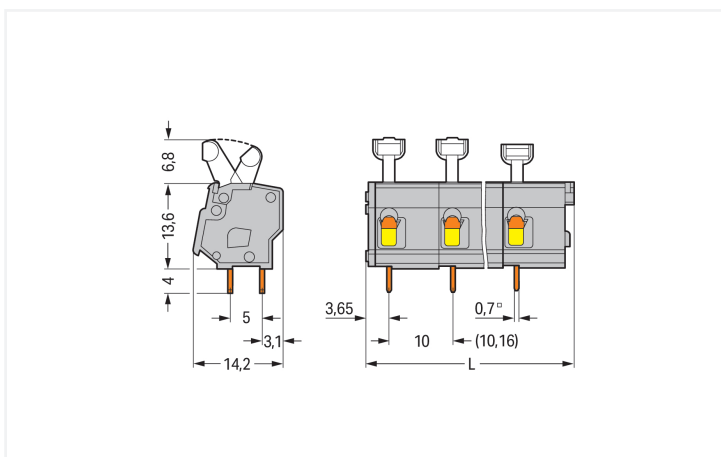
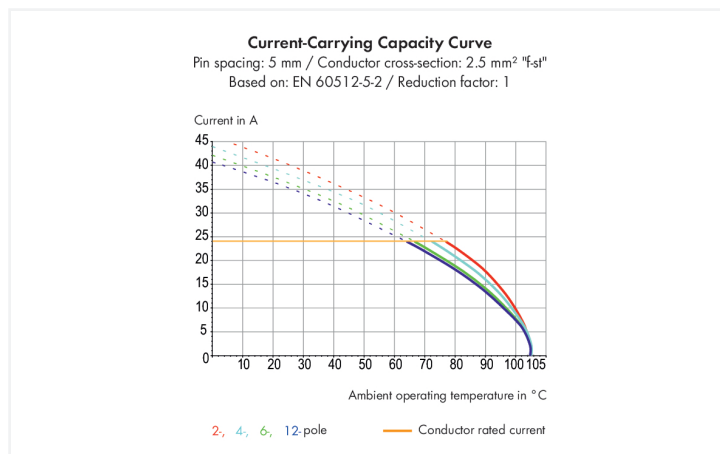
PCB terminal block; push-button; 2.5 mm²; Pin spacing 10/10.16 mm; 16-pole; CAGE CLAMP®; commoning option; gray

<https://www.wago.com/257-616>



Color: ■ gray

Similar to illustration



Dimensions in mm

L = (pole no. x pin spacing) + 2.9 mm

PCB terminal block, 257 Series, push-button

This PCB terminal block (item number 257-616) is designed for quick and easy connections. It offers the flexibility needed for different mounting types. Strip lengths must be between 5 and 6 mm when connecting conductors to this PCB terminal block. This product features one conductor terminal and utilizes CAGE CLAMP®. Our trusted universal connection known as CAGE CLAMP® is the industry standard when it comes to connection technology and electrical interconnections. Dimensions: (162.9 x 24.4 x 14.2) mm (width x height x depth). Depending on the conductor type, this PCB terminal block is suitable for conductor cross sections ranging from 0.08 mm² to 2.5 mm².

Tin is used for coating the contact surfaces. This PCB terminal block is operated with a push-button. THT is used to solder the PCB terminal block. Insert the conductor into the board at a 0° angle.

Notes

| | |
|-----------|---|
| Variants: | Other pole numbers Versions for Ex e II and Ex i Other colors Mixed-color PCB connector strips Direct marking Other versions (or variants) can be requested from WAGO Sales or configured at https://configurator.wago.com/ . |
|-----------|---|

Electrical data

| Ratings per | IEC/EN 60664-1 | | |
|---------------------------------|----------------|--------|--------|
| Overvoltage category | III | III | II |
| Pollution degree | 3 | 2 | 2 |
| Nominal voltage | 630 V | 1000 V | 1000 V |
| Rated impulse withstand voltage | 8 kV | 8 kV | 8 kV |
| Rated current | 24 A | 24 A | 24 A |

| Approvals per | UL 1059 | | |
|---------------|---------|---|-------|
| Use group | B | C | D |
| Rated voltage | 300 V | - | 300 V |
| Rated current | 15 A | - | 10 A |

| Approvals per | CSA | | |
|---------------|-------|---|-------|
| Use group | B | C | D |
| Rated voltage | 300 V | - | 300 V |
| Rated current | 15 A | - | 10 A |

Connection Data

| | |
|----------------------------|----|
| Clamping units | 16 |
| Total number of potentials | 16 |
| Number of connection types | 1 |
| Number of levels | 1 |

| Connection 1 | |
|---|--|
| Connection technology | CAGE CLAMP® |
| Actuation type | Push-button |
| Solid conductor | 0.08 ... 2.5 mm ² / 28 ... 12 AWG |
| Fine-stranded conductor | 0.08 ... 2.5 mm ² / 28 ... 12 AWG |
| Fine-stranded conductor; with insulated ferrule | 0.25 ... 1.5 mm ² |
| Fine-stranded conductor; with uninsulated ferrule | 0.25 ... 1.5 mm ² |
| Note (conductor cross-section) | 12 AWG: THHN, THWN |
| Strip length | 5 ... 6 mm / 0.2 ... 0.24 inches |
| Conductor connection direction to PCB | 0° |
| Pole number | 16 |

Physical data

| | |
|-------------------------|--------------------------------|
| Pin spacing | 10/10.16 mm / 0.394/0.4 inches |
| Width | 162.9 mm / 6.413 inches |
| Height | 24.4 mm / 0.961 inches |
| Height from the surface | 20.4 mm / 0.803 inches |
| Depth | 14.2 mm / 0.559 inches |
| Solder pin length | 4 mm |
| Solder pin dimensions | 0.7 x 0.7 mm |
| Drilled hole diameter | 1.1 ^(+0.1) mm |

PCB contact

| | |
|-------------------------------------|--|
| PCB contact | THT |
| Solder pin arrangement | over the entire terminal strip (in-line) |
| Number of solder pins per potential | 2 |

Material data

| | |
|------------------------------------|--|
| Note (material data) | Information on material specifications can be found here |
| Color | gray |
| Material group | I |
| Insulation material (main housing) | Polyamide (PA66) |
| Flammability class per UL94 | V0 |
| Clamping spring material | Chrome-nickel spring steel (CrNi) |
| Contact material | Electrolytic copper (E _{cu}) |
| Contact Plating | Tin |
| Fire load | 0.502 MJ |
| Weight | 26.3 g |

Environmental requirements

| | |
|-------------------------|-----------------|
| Limit temperature range | -60 ... +105 °C |
|-------------------------|-----------------|

Commercial data

| | |
|-----------------------|---------------|
| PU (SPU) | 20 (5) pcs |
| Packaging type | Box |
| Country of origin | CH |
| GTIN | 4044918412964 |
| Customs tariff number | 85369010000 |

Product Classification

| | |
|-------------|----------------------|
| UNSPSC | 39121409 |
| eCl@ss 10.0 | 27-44-04-01 |
| eCl@ss 9.0 | 27-44-04-01 |
| ETIM 9.0 | EC002643 |
| ETIM 10.0 | EC002643 |
| ECCN | NO US CLASSIFICATION |

Environmental Product Compliance

| | |
|------------------------|-------------------------|
| RoHS Compliance Status | Compliant, No Exemption |
|------------------------|-------------------------|

Approvals / Certificates

General approvals



| Approval | Standard | Certificate Name |
|---------------------------------|--------------|------------------|
| CCA DEKRA Certification B.V. | EN 60947 | 2160584.28 |
| CCA DEKRA Certification B.V. | EN 60947 | NTR NL-7128 |
| CCA DEKRA Certification B.V. | EN 60947-7-4 | 71-113014 |

General approvals

| | | |
|---|---------------|-------------|
| CCA DEKRA Certification B.V. | EN 60947-7-4 | NTR NL-7821 |
| CSA DEKRA Certification B.V. | C22.2 No. 158 | 70049157 |
| UR Underwriters Laboratories Inc. | UL 1059 | E45172 |

Declarations of conformity and manufacturer's declarations

| Approval | Standard | Certificate Name |
|--|----------|------------------|
| EU-Declaration of Conformity WAGO GmbH & Co. KG | - | - |
| UK-Declaration of Conformity WAGO GmbH & Co. KG | - | - |

Approvals for marine applications



| Approval | Standard | Certificate Name |
|------------------------------------|-----------|-------------------|
| ABS American Bureau of Shipping | - | 24-0095975-PDA |
| BV Bureau Veritas S.A. | IEC 60998 | 11915/E0 BV |
| DNV DNV GL SE | - | TAE000016Z |
| PRS Polski Rejestr Statków | - | TE/1095/880590/23 |

Downloads

Environmental Product Compliance

| Compliance Search | |
|--|-------------------|
| Environmental Product Compliance 257-616 | ↓ |

Documentation

| Additional Information | | | |
|--|------------|-------------------|-------------------|
| Technical Section | 03.04.2019 | pdf 2027.26 KB | ↓ |
| Gebrückte Klemmenleisten für Leiterplatten | | pdf 303.71 KB | ↓ |

CAD/CAE-Data

| CAD data | |
|----------------------|-------------------|
| 2D/3D Models 257-616 | ↓ |

| CAE data | |
|---------------------------|-------------------|
| EPLAN Data Portal 257-616 | ↓ |
| ZUKEN Portal 257-616 | ↓ |

PCB Design

| | |
|--|-------------------|
| Symbol and Footprint via SamacSys 257-616 | ↓ |
| Symbol and Footprint via Ultra Librarian 257-616 | ↓ |

1 Compatible Products

1.1 Optional Accessories

1.1.1 Ferrule

1.1.1.1 Ferrule



Item No.: 216-321

Ferrule; Sleeve for 0.25 mm² / AWG 24; insulated; electro-tin plated; yellow



Item No.: 216-151

Ferrule; Sleeve for 0.25 mm² / AWG 24; uninsulated; electro-tin plated



Item No.: 216-322

Ferrule; Sleeve for 0.34 mm² / 22 AWG; insulated; electro-tin plated; light turquoise



Item No.: 216-152

Ferrule; Sleeve for 0.34 mm² / AWG 24; uninsulated; electro-tin plated



Item No.: 216-221

Ferrule; Sleeve for 0.5 mm² / 20 AWG; insulated; electro-tin plated; white



Item No.: 216-121

Ferrule; Sleeve for 0.5 mm² / AWG 22; uninsulated; electro-tin plated; silver-colored



Item No.: 216-222

Ferrule; Sleeve for 0.75 mm² / 18 AWG; insulated; electro-tin plated; gray



Item No.: 216-122

Ferrule; Sleeve for 0.75 mm² / AWG 20; uninsulated; electro-tin plated; silver-colored



Item No.: 216-223

Ferrule; Sleeve for 1 mm² / AWG 18; insulated; electro-tin plated; red



Item No.: 216-123

Ferrule; Sleeve for 1 mm² / AWG 18; uninsulated; electro-tin plated; silver-colored



Item No.: 216-224

Ferrule; Sleeve for 1.5 mm² / AWG 16; insulated; electro-tin plated; black



Item No.: 216-124

Ferrule; Sleeve for 1.5 mm² / AWG 16; uninsulated; electro-tin plated

1.1.2 Marking

1.1.2.1 Marking strip



Item No.: 210-332/1000-202

Marking strips; as a DIN A4 sheet; MARKED; 1-16 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white



Item No.: 210-332/1016-202

Marking strips; as a DIN A4 sheet; MARKED; 1-16 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white



Item No.: 210-332/1000-204

Marking strips; as a DIN A4 sheet; MARKED; 17-31 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white



Item No.: 210-332/1016-204

Marking strips; as a DIN A4 sheet; MARKED; 17-31 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white



Item No.: 210-332/1000-206

Marking strips; as a DIN A4 sheet; MARKED; 33-48 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white



Item No.: 210-332/1016-206

Marking strips; as a DIN A4 sheet; MARKED; 33-48 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white

1.1.3 Test and measurement

1.1.3.1 Testing accessories



Item No.: 249-114

Test plug adapter; suitable for 255, 256, 257 Series PCB terminal blocks; 1-pole; Pin spacing 10 mm / 0.394 in; gray



Item No.: 249-115

Test plug adapter; suitable for 255, 256, 257 Series PCB terminal blocks; 1-pole; Pin spacing 10.16 mm / 0.4 in; orange

1.1.4 Tool

1.1.4.1 Operating tool



Item No.: 210-658

Operating tool; Blade: 3.5 x 0.5 mm; with a partially insulated shaft; angled; short; multicoloured

Item No.: 210-720

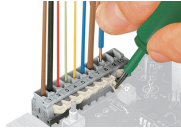
Operating tool; Blade: 3.5 x 0.5 mm; with a partially insulated shaft; multicoloured

Installation Notes

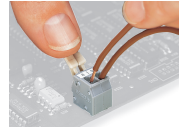
Conductor termination



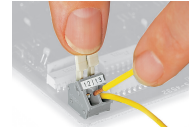
Inserting/removing a conductor – 256 Series.



Inserting/removing a conductor (255 Series)



Inserting/removing a conductor via finger-operated lever – 255 Series.



Inserting/removing a conductor via finger-operated lever – 256 Series.

Installation



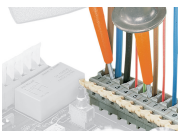
Possible conductor arrangement with terminal strips staggered (for 256 Series only).

Marking



Formation of groups using housings of different colors

Testing



Testing with test probes.



Testing with test plug modules.

Subject to changes. Please also observe the further product documentation!

Current addresses can be found at: www.wago.com