

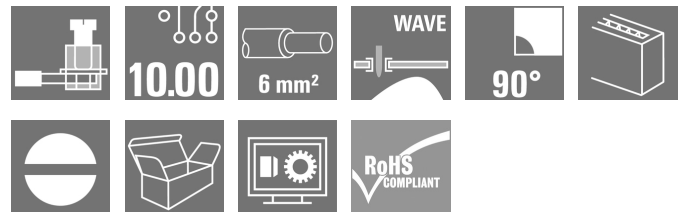
LL 10.00/02/90 3.2SN OR BX**Weidmüller Interface GmbH & Co. KG**

Klingenbergstraße 26

D-32758 Detmold

Germany

www.weidmueller.com

Product image

PCB terminal with proven clamping-yoke connection in 10 and 10.16 mm pitches, with 90° wire outlet angle. Suitable for conductor cross-sections up to 6.0 mm².

General ordering data

| | |
|--------------|--|
| Version | Printed circuit board terminals, 10.00 mm, Number of poles: 2, 90°, Solder pin length (l): 3.2 mm, tinned, orange, Clamping yoke connection, Clamping range, max. : 6 mm², Box |
| Order No. | 2613390000 |
| Type | LL 10.00/02/90 3.2SN OR BX |
| GTIN (EAN) | 4050118674750 |
| Qty. | 100 pc(s). |
| Product data | IEC: 1000 V / 32 A / 0.5 - 6 mm² UL: 300 V / 30 A / AWG 26 - AWG 10 |
| Packaging | Box |

Creation date June 1, 2024 9:54:59 AM CEST

LL 10.00/02/90 3.2SN OR BX

Weidmüller Interface GmbH & Co. KG

Klingenbergstraße 26

D-32758 Detmold

Germany

www.weidmueller.com

Technical data

Dimensions and weights

| | | | |
|--------------------------|------------|-----------------|------------|
| Depth | 11 mm | Depth (inches) | 0.433 inch |
| Height | 20.3 mm | Height (inches) | 0.799 inch |
| Height of lowest version | 17.1 mm | Width | 15 mm |
| Width (inches) | 0.591 inch | Net weight | 0.008 g |

System parameters

| | | | |
|---------------------------------|-----------------------------|---|--------------------------|
| Product family | OMNIMATE Signal - series LL | Wire connection method | Clamping yoke connection |
| Property, clamping point | WireReady | Mounting onto the PCB | THT solder connection |
| Conductor outlet direction | 90° | Pitch in mm (P) | 10 mm |
| Pitch in inches (P) | 0.394 " | Number of poles | 2 |
| Pin series quantity | 1 | Fitted by customer | Yes |
| Number of rows | 1 | Max. adjacent poles per row | 12 |
| Solder pin length (l) | 3.2 mm | Solder pin dimensions | 0.75 x 0.9 mm |
| Solder eyelet hole diameter (D) | 1.3 mm | Solder eyelet hole diameter tolerance (D)+ 0,1 mm | |
| Number of solder pins per pole | 1 | Screwdriver blade | 0.6 x 3.5 |
| Screwdriver blade standard | DIN 5264 | Tightening torque, min. | 0.5 Nm |
| Tightening torque, max. | 0.6 Nm | Clamping screw | M 3 |
| Stripping length | 6 mm | L1 in mm | 10 mm |
| L1 in inches | 0.394 " | Protection degree | IP20 |

Material data

| | | | |
|---------------------------------------|---------------------------|---------------------------------------|--------|
| Insulating material | Wemid (PA) | Colour | orange |
| Colour chart (similar) | RAL 2000 | Insulating material group | I |
| Comparative Tracking Index (CTI) | ≥ 600 | UL 94 flammability rating | V-0 |
| Contact material | Cu-alloy | Contact surface | tinned |
| Coating | 4-6 µm SN | Tinning type | matt |
| Layer structure of solder connection | 2...4 µm Ni / 4...6 µm Sn | Storage temperature, min. | -40 °C |
| Storage temperature, max. | 70 °C | Operating temperature, min. | -50 °C |
| Operating temperature, max. | 120 °C | Temperature range, installation, min. | -25 °C |
| Temperature range, installation, max. | 120 °C | | |

Conductors suitable for connection

| | | | |
|---|-------------------------|---|---|
| Clamping range, min. | 0.13 mm ² | Clamping range, max. | 6 mm ² |
| Wire connection cross section AWG, min. | AWG 26 | Wire connection cross section AWG, max. | AWG 10 |
| Solid, min. H05(07) V-U | 0.5 mm ² | Solid, max. H05(07) V-U | 6 mm ² |
| Flexible, min. H05(07) V-K | 0.5 mm ² | Flexible, max. H05(07) V-K | 4 mm ² |
| w. plastic collar ferrule, DIN 46228 pt 4, min. | 0.5 mm ² | w. plastic collar ferrule, DIN 46228 pt 4, max. | 2.5 mm ² |
| w. wire end ferrule, DIN 46228 pt 1, min. | 0.5 mm ² | w. wire end ferrule, DIN 46228 pt 1, max. | 2.5 mm ² |
| Plug gauge in accordance with EN 60999 a x b; ø | | Reference text | Length of ferrules is to be chosen depending on the product and the rated voltage. The outside diameter of the plastic collar should not be larger than the pitch (P) |
| | 2.8 mm x 2.4 mm; 3.0 mm | | |

LL 10.00/02/90 3.2SN OR BX

Weidmüller Interface GmbH & Co. KG

Klingenbergstraße 26

D-32758 Detmold

Germany


www.weidmueller.com

Technical data


Rated data acc. to IEC

| | | | |
|---|------------------------|---|-------------------|
| tested acc. to standard | IEC 60664-1, IEC 61984 | Rated current, min. number of poles (Tu=20°C) | 32 A |
| Rated current, max. number of poles (Tu=20°C) | 32 A | Rated current, min. number of poles (Tu=40°C) | 32 A |
| Rated current, max. number of poles (Tu=40°C) | 30.5 A | Rated voltage for surge voltage class / pollution degree II/2 | 1,000 V |
| Rated voltage for surge voltage class / pollution degree III/2 | 630 V | Rated voltage for surge voltage class / pollution degree III/3 | 630 V |
| Rated impulse voltage for surge voltage class/ pollution degree II/2 | 1,000 V | Rated impulse voltage for surge voltage class/ pollution degree III/2 | 8 kV |
| Rated impulse voltage for surge voltage class/ contamination degree III/3 | 8 kV | Short-time withstand current resistance | 3 x 1s with 120 A |

Rated data acc. to CSA

| | | | |
|-----------------------------------|---|-----------------------------------|----------------|
| Institute (CSA) |  | Certificate No. (CSA) | 200039-1202191 |
| Rated voltage (Use group B / CSA) | 300 V | Rated voltage (Use group D / CSA) | 300 V |
| Rated current (Use group B / CSA) | 30 A | Rated current (Use group D / CSA) | 10 A |
| Wire cross-section, AWG, min. | AWG 26 | Wire cross-section, AWG, max. | AWG 10 |
| Reference to approval values | Specifications are maximum values, details - see approval certificate. | | |

Rated data acc. to UL 1059

| | | | |
|---------------------------------------|---|---------------------------------------|--|
| Institute (UR) |  | Certificate No. (UR) | E60693 |
| Rated voltage (Use group B / UL 1059) | 300 V | Rated voltage (Use group C / UL 1059) | 150 V |
| Rated voltage (Use group D / UL 1059) | 300 V | Rated current (Use group B / UL 1059) | 30 A |
| Rated current (Use group D / UL 1059) | 10 A | Wire cross-section, AWG, min. | AWG 26 |
| Wire cross-section, AWG, max. | AWG 10 | Reference to approval values | Specifications are maximum values, details - see approval certificate. |

Packing

| | | | |
|-----------|--------|------------|--------|
| Packaging | Box | VPE length | 338 mm |
| VPE width | 130 mm | VPE height | 27 mm |

Type tests

| | | |
|------------------------------|------|--|
| Test: Durability of markings | Test | mark of origin, type identification, type of material, approval marking UL, approval marking CSA, durability |
|------------------------------|------|--|

LL 10.00/02/90 3.2SN OR BX

Weidmüller Interface GmbH & Co. KG

Klingenbergstraße 26

D-32758 Detmold

Germany

www.weidmueller.com

Technical data

| | | |
|---|----------------|--|
| Test: Clampable cross section | Standard | IEC 60999-1 section 7 and 9.1 / 11.99, IEC 60947-1 section 8.2.4.5.1 / 03.11 |
| | Conductor type | Type of conductor and AWG 26/1 conductor cross-section |
| | | Type of conductor and AWG 26/19 conductor cross-section |
| | | Type of conductor and AWG 12/1 conductor cross-section |
| | | Type of conductor and AWG 12/19 conductor cross-section |
| | Evaluation | passed |
| Test for damage to and accidental loosening of conductors | Standard | IEC 60999-1 section 9.4 / 11.99 |
| | Requirement | 0.2 kg |
| | Conductor type | Type of conductor and AWG 26/1 conductor cross-section |
| | | Type of conductor and AWG 26/19 conductor cross-section |
| | Evaluation | passed |
| | Requirement | 0.3 kg |
| | Conductor type | Type of conductor and H05V-U0.5 conductor cross-section |
| | | Type of conductor and H05V-K0.5 conductor cross-section |
| | Evaluation | passed |
| | Requirement | 0.9 kg |
| | Conductor type | Type of conductor and H07V-U4.0 conductor cross-section |
| | | Type of conductor and H07V-K4 conductor cross-section |
| | | Type of conductor and AWG 12/1 conductor cross-section |
| | | Type of conductor and AWG 12/19 conductor cross-section |
| | Evaluation | passed |

LL 10.00/02/90 3.2SN OR BX

Weidmüller Interface GmbH & Co. KG

Klingenbergstraße 26

D-32758 Detmold

Germany

www.weidmueller.com

Technical data

| | | |
|---------------|----------------|---|
| Pull-out test | Standard | IEC 60999-1 section 9.5 / 11.99 |
| | Requirement | ≥10 N |
| | Conductor type | Type of conductor and AWG 26/1 conductor cross-section |
| | | Type of conductor and AWG 26/19 conductor cross-section |
| | Evaluation | passed |
| | Requirement | ≥20 N |
| | Conductor type | Type of conductor and H05V-U0.5 conductor cross-section |
| | | Type of conductor and H05V-K0.5 conductor cross-section |
| | Evaluation | passed |
| | Requirement | ≥60 N |
| | Conductor type | Type of conductor and H07V-U4.0 conductor cross-section |
| | | Type of conductor and H07V-K4.0 conductor cross-section |
| | | Type of conductor and AWG 12/1 conductor cross-section |
| | | Type of conductor and AWG 12/19 conductor cross-section |
| | Evaluation | passed |

Classifications

| | | | |
|-------------|-------------|-------------|-------------|
| ETIM 6.0 | EC002643 | ETIM 7.0 | EC002643 |
| ETIM 8.0 | EC002643 | ETIM 9.0 | EC002643 |
| ECLASS 9.0 | 27-44-04-01 | ECLASS 9.1 | 27-44-04-01 |
| ECLASS 10.0 | 27-44-04-01 | ECLASS 11.0 | 27-46-01-01 |
| ECLASS 12.0 | 27-46-01-01 | ECLASS 13.0 | 27-46-01-01 |

Important note

| | |
|----------------|--|
| IPC conformity | Conformity: The products are developed, manufactured and delivered according international recognized standards and norms and comply with the assured properties in the data sheet resp. fulfill decorative properties in accordance with IPC-A-610 "Class 2". Further claims on the products can be evaluated on request. |
| Notes | <ul style="list-style-type: none"> Long term storage of the product with average temperature of 50 °C and maximum humidity 70%, 36 months |

Approvals

Approvals



| | |
|-----------------------|------------|
| UL File Number Search | UL Website |
| Certificate No. (UR) | E60693 |

LL 10.00/02/90 3.2SN OR BX

Weidmüller Interface GmbH & Co. KG

Klingenbergstraße 26

D-32758 Detmold

Germany

www.weidmueller.com

Technical data

Downloads

Engineering Data

[CAD data – STEP](#)

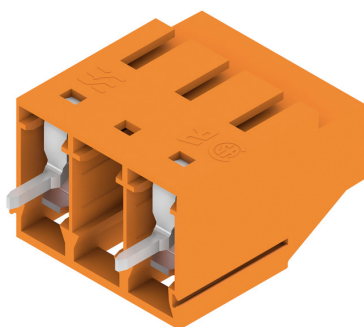
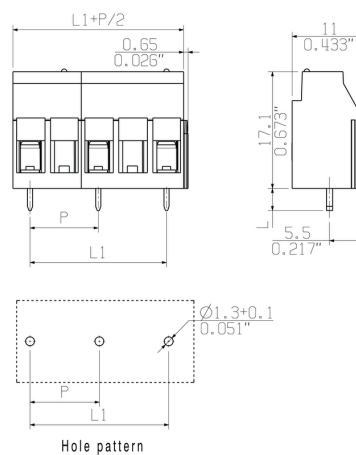
Catalogues

[Catalogues in PDF-format](#)

LL 10.00/02/90 3.2SN OR BX

Weidmüller Interface GmbH & Co. KG
Klingenbergstraße 26
D-32758 Detmold
Germany

www.weidmueller.com

Drawings**Product image****Dimensional drawing**

LL 10.00/02/90 3.2SN OR BX**Weidmüller Interface GmbH & Co. KG**

Klingenbergstraße 26

D-32758 Detmold

Germany

www.weidmueller.com**Accessories****Slotted screwdriver**

Slotted screwdriver with rounded blade SD DIN 5265, ISO 2380/2, output to DIN 5264, ISO 2380/1. ChromTop tip, SoftFinish grip

General ordering data

| | | |
|------------|----------------------------|--------------------------|
| Type | SDS 0.6X3.5X200 | Version |
| Order No. | 9010110000 | Screwdriver, Screwdriver |
| GTIN (EAN) | 4032248300754 | |
| Qty. | 1 pc(s). | |
| Type | SDS 0.6X3.5X100 | Version |
| Order No. | 9008330000 | Screwdriver, Screwdriver |
| GTIN (EAN) | 4032248056286 | |
| Qty. | 1 pc(s). | |

Slotted screwdriver

VDE insulated slot-head screwdriver, SDI DIN 7437, ISO 2380/2, drive output acc. to DIN 5264, ISO 2380/1. SoftFinish grip

General ordering data

| | | |
|------------|----------------------------|--------------------------|
| Type | SDIS 0.6X3.5X100 | Version |
| Order No. | 9008390000 | Screwdriver, Screwdriver |
| GTIN (EAN) | 4032248056354 | |
| Qty. | 1 pc(s). | |

Recommended wave soldering profiles

Weidmüller Interface GmbH & Co. KG
Klingenbergstraße 16
D-32758 Detmold
Germany
Fon: +49 5231 14-0
Fax: +49 5231 14-292083
www.weidmueller.com

Single Wave:



Double Wave:



Wave soldering profiles

Wired connection elements should be processed in accordance with the DIN EN 61760-1 standard. We have included two recommendations for practical wave soldering profiles, with which Weidmüller PCB terminals and connectors are qualified.

When choosing a suitable profile for your application, the following factors also need to be considered:

- PCB thickness
- Proportion of Cu in the layers
- Single/double-sided assembly
- Product range
- Heating and cooling rates

The single and double wave profiles each indicate the recommended operating range, including the maximum soldering temperature of 260°C. In practice, the maximum soldering temperature is quite often well below the above maximum profile.

We reserve the right to make technical changes.