

OMNIMATE Signal - series BL/SL 3.50
BL 3.50/16/180 SN OR BX**Weidmüller Interface GmbH & Co. KG**

Klingenbergstraße 16

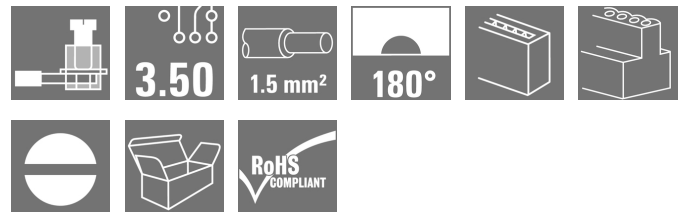
D-32758 Detmold

Germany

Fon: +49 5231 14-0

Fax: +49 5231 14-292083

www.weidmueller.com



Female connectors with clamping yoke screw system for connecting conductors at 3.50 mm pitch. They provide space for labelling and can be coded.

General ordering data

Type	BL 3.50/16/180 SN OR BX
Order No.	1597500000
Version	PCB plug-in connector, female plug, 3.50 mm, No. of poles: 16, 180°, Clamping yoke connection, Clamping range, max. : 1.5 mm², Box
GTIN (EAN)	4008190025786
Qty.	30 pc(s).
Product data	IEC: 320 V / 17 A / 0.2 - 1.5 mm² UL: 300 V / 10 A / AWG 28 - AWG 14
Packaging	Box

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Technical data

Dimensions and weights

Net weight	14.05 g
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System parameters

Product family	OMNIMATE Signal - series BL/SL 3.50	Type of connection	Field connection
Wire connection method	Clamping yoke connection	Pitch in mm (P)	3.5 mm
Pitch in inches (P)	0.138 inch	Conductor outlet direction	180°
No. of poles	16	L1 in mm	52.5 mm
L1 in inches	2.067 inch	Number of rows	1
Pin series quantity	1	Rated cross-section	1.5 mm ²
Touch-safe protection acc. to DIN VDE 57 106	Safe from finger touch	Touch-safe protection acc. to DIN VDE 0470	IP 20
Can be coded	Yes	Stripping length	6 mm
Tightening torque, min.	0.2 Nm	Tightening torque, max.	0.25 Nm
Clamping screw	M 2	Screwdriver blade	0.4 x 2.5
Screwdriver blade standard	DIN 5264	Plugging cycles	25
push-in force/pole	10 N	Withdrawal force per pole	8 N
Packaging	Box		

Material data

Insulating material	PBT	Colour	Orange
Colour chart (similar)	RAL 2000	Insulating material group	IIIa
CTI	≥ 200	Insulation resistance	≥ 10 ⁸ Ω
UL 94 flammability rating	V-0	Contact material	Copper alloy
Contact surface	tinned	Layer structure of plug contact	4-8 µm Sn hot-dip tinned
Storage temperature, min.	-25 °C	Storage temperature, max.	55 °C
Max. relative humidity during storage	80 %	Operating temperature, min.	-50 °C
Operating temperature, max.	100 °C	Temperature range, installation, min.	-30 °C
Temperature range, installation, max.	100 °C		

Conductors suitable for connection

Clamping range, min.	0.08 mm ²	Clamping range, max.	1.5 mm ²
Wire connection cross section AWG, min.	AWG 28	Wire connection cross section AWG, max.	AWG 14
Solid, min. H05(07) V-U	0.2 mm ²	Solid, max. H05(07) V-U	1.5 mm ²
Flexible, min. H05(07) V-K	0.2 mm ²	Flexible, max. H05(07) V-K	1.5 mm ²
w. plastic collar ferrule, DIN 46228 pt 4, min.	0.2 mm ²	w. plastic collar ferrule, DIN 46228 pt 4, max.	1.5 mm ²
w. wire end ferrule, DIN 46228 pt 1, min.	0.2 mm ²	w. wire end ferrule, DIN 46228 pt 1, max.	1.5 mm ²
Plug gauge acc. to EN 60999 a x b; Ø	2.4 mm x 1.5 mm		

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Technical data
Rated data acc. to IEC

tested acc. to standard

IEC 60664-1, IEC 61984

 Rated current, max. no. of poles
 (Tu=20°C)

12 A

 Rated current, max. no. of poles
 (Tu=40°C)

10 A

 Rated voltage for surge voltage class /
 pollution degree III/2

160 V

 Rated impulse voltage for surge voltage
 class/ pollution degree II/2

2.5 kV

 Rated impulse voltage for surge voltage
 class/ contamination degree III/3

2.5 kV

 Rated current, min. no. of poles
 (Tu=20°C)

17 A

 Rated current, min. no. of poles
 (Tu=40°C)

14.5 A

 Rated voltage for surge voltage class /
 pollution degree II/2

320 V

 Rated voltage for surge voltage class /
 pollution degree III/3

160 V

 Rated impulse voltage for surge voltage
 class/ pollution degree III/2

2.5 kV

Short-time withstand current resistance

3 x 1s with 100 A

Rated data acc. to CSA

Institute (CSA)



Certificate No. (CSA)

154685-1318353

Rated voltage (Use group B)

300 V

Rated current (use group B)

10 A

Wire cross-section, AWG, min.

AWG 28

Reference to approval values

 Specifications are
 maximum values, details -
 see approval certificate.

Rated voltage (use group D)

300 V

Rated current (use group D)

10 A

Wire cross-section, AWG, max.

AWG 14

Rated data acc. to UL 1059

Institute (UR)



Certificate No. (UR)

E60693

Rated voltage (use group B)

300 V

Rated current (use group B)

10 A

Wire cross-section, AWG, min.

AWG 28

Reference to approval values

 Specifications are
 maximum values, details -
 see approval certificate.

Rated voltage (use group D)

300 V

Rated current (use group D)

10 A

Wire cross-section, AWG, max.

AWG 14

Classifications

ETIM 3.0

EC001284

ETIM 5.0

EC002637

UNSPSC

30-21-18-10

eClass 6.2

27-26-07-04

eClass 8.1

27-44-04-02

eClass 9.1

27-44-04-02

ETIM 4.0

EC002637

ETIM 6.0

EC002637

eClass 5.1

27-26-07-04

eClass 7.1

27-44-04-02

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Technical data

Notes

Notes

- Additional colours on request
- Gold-plated contact surfaces on request
- Rated current related to rated cross-section & min. No. of poles.
- Max. outer diameter of the conductor: 2.9 mm
- Wire end ferrule without plastic collar to DIN 46228/1
- Wire end ferrule with plastic collar to DIN 46228/4
- P on drawing = pitch
- Rated data refer only to the component itself. Clearance and creepage distances to other components are to be designed in accordance with the relevant application standards.

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.

Approvals

Approvals



ROHS

Conform

Downloads

Approval/Certificate/Document of Conformity

[Declaration of the Manufacturer](#)

Brochure/Catalogue

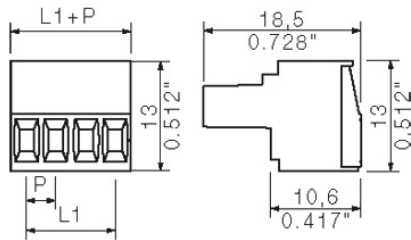
[FL DRIVES EN](#)
[MB DEVICE MANUF. EN](#)
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[FL ELEVATOR EN](#)
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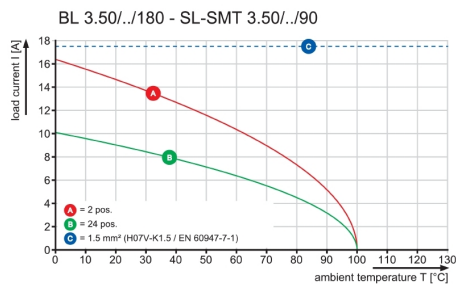
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Drawings

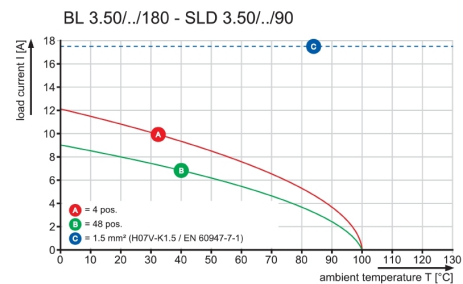
Dimensional drawing



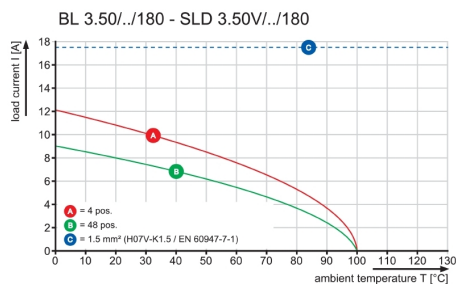
Graph



Graph



Graph



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