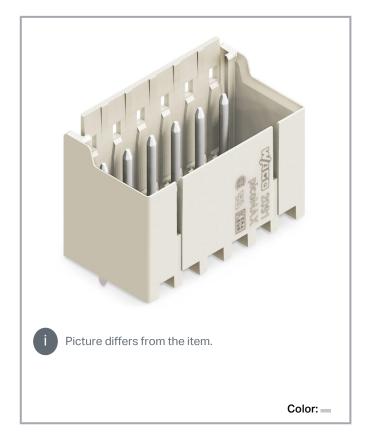
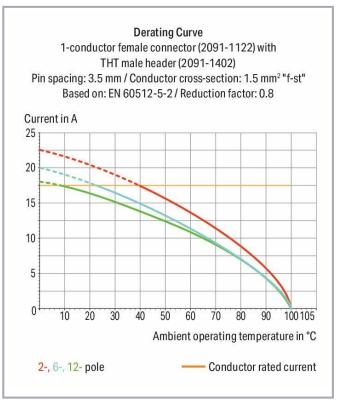
THT male header; 1.0 mm Ø solder pin; straight; Pin spacing 3.5 mm; 10-

pole; light gray

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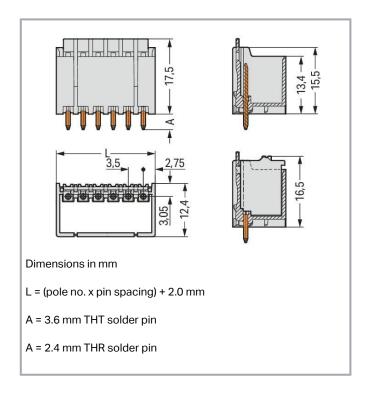




 $\label{thm:continuity} \textbf{Subject to changes. Please also observe the further product documentation!}$ 

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# Item description

- Assembly of female connectors without loss of poles, allowing different functions to be divided within one male header (≥ 4 poles)
- Coding pins inserted into the header interface prevent mismating, allowing subsequent coding in panel feedthrough applications
- The female connector is fully shrouded by the male header's housing, providing vibration resistance up to 20 g

# Data Notes

| Safety information | The picoMAX® Pluggable Connection System includes connectors without breaking capacity in accordance with DIN EN 61984. When used as intended, these connectors must not be connected /disconnected when live or under load. The circuit design should ensure header pins, which can be touched, are not live when unmated. |
|--------------------|---|
| Variants:          | Direct marking Other versions (or variants) can be requested from WAGO Sales or configured at https://configurator.wago.com/.   |

### Electrical data

 $\label{thm:continuity} \textbf{Subject to changes. Please also observe the further product documentation!}$ 

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# Ratings per IEC/EN

| Ratings per                   | IEC/EN 60664-1  |
|-------------------------------|---|
| Nominal voltage (III/3)       | 160 V   |
| Rated impulse voltage (III/3) | 2.5 kV  |
| Rated voltage (III/2)         | 160 V   |
| Rated impulse voltage (III/2) | 2.5 kV  |
| Nominal voltage (II/2)        | 320 V   |
| Rated surge voltage (II/2)    | 2.5 kV  |
| Rated current                 | 10 A  |
| Legend (ratings)              | (III / 2) ≙ Overvoltage category III / Pollution degree 2 |

# Ratings per UL 1059

| Approvals per                  | UL 1059 |
|--------------------------------|---------|
| Rated voltage UL (Use Group B) | 300 V   |
| Rated current UL (Use Group B) | 10 A    |
| Rated voltage UL (Use Group D) | 300 V   |
| Rated current UL (Use Group D) | 10 A    |

## Connection data

| Total number of potentials | 10 |
|----------------------------|----|
| Number of connection types | 1  |
| Number of levels           | 1  |

### Connection 1

| Pole number 10 |
|----------------|
|----------------|

# Physical data

| Pin spacing                          | 3.5 mm / 0.138 inches    |
|--------------------------------------|--------------------------|
| Width                                | 37 mm / 1.457 inches     |
| Height                               | 21.1 mm / 0.831 inches   |
| Height from the surface              | 17.5 mm / 0.689 inches   |
| Depth                                | 12.4 mm / 0.488 inches   |
| Solder pin length                    | 3.6 mm                   |
| Solder pin diameter                  | 1 mm                     |
| Drilled hole diameter with tolerance | 1.2 <sup>(+0.1)</sup> mm |

 $\label{thm:condition} \textbf{Subject to changes. Please also observe the further product documentation!}$ 

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#### **Mechanical Data**

| Variable coding          | Yes |
|--------------------------|-----|
| Anti-rotation protection | Yes |

# Plug-in connection

| Contact type (pluggable connector)   | Male connector/plug |
|--------------------------------------|---------------------|
| Connector (connection type)          | for PCB             |
| Mismating protection                 | No                  |
| Plugging without loss of pin spacing | Yes                 |
| Mating direction to the PCB          | 90 °                |
| Locking of plug-in connection        | Locking latch       |

### PCB contact

| PCB contact THT |  |
|-----------------|--|
|-----------------|--|

### **Material Data**

Note (material data)

Information on material specifications can be found here

| Color                       | light gray                             |
|-----------------------------|--|
| Material group              | I                                      |
| Insulation material         | Polyphthalamide (PPA GF)               |
| Flammability class per UL94 | V0                                     |
| Contact material            | Electrolytic copper (E <sub>Cu</sub> ) |
| Contact plating             | Tin                                    |
| Fire load                   | 0.07 MJ                                |
| Weight                      | 3.3 g                                  |
|                             |  |

# **Environmental requirements**

| Limit temperature range | -60 +100 °C |
|-------------------------|-------------|
| Processing temperature  | -35 +60 °C  |

## Commercial data

| Product Group | 26 (picoMAX Connectors) |
|---------------|-------------------------|
| eCl@ss 10.0   | 27-44-04-02             |
| eCl@ss 9.0    | 27-44-04-02             |

 $\label{thm:condition} \textbf{Subject to changes. Please also observe the further product documentation!}$ 

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| ETIM 8.0              | EC002637      |
|-----------------------|---------------|
| ETIM 7.0              | EC002637      |
| PU (SPU)              | 100 pcs       |
| Packaging type        | box           |
| Country of origin     | DE            |
| GTIN                  | 4050821161059 |
| Customs tariff number | 85366990990   |

## **Environmental Product Compliance**

RoHS Compliance Status Compliant,No Exemption

## Approvals / Certificates

#### General approvals

|              |                              |                          | Certificate |
|--------------|------------------------------|--------------------------|-------------|
| Logo         | Approval                     | Additional Approval Text | name        |
|              | СВ                           | IEC 61984                | NL-49736    |
|              | DEKRA Certification B.V.     |                          | /A1         |
|              | CSA                          | C22.2 No. 158            | 2362521     |
|              | DEKRA Certification B.V.     |                          |             |
|              | CSA DEKRA Certification B.V. | C22.2                    | 2362521     |
|              | KEMA/KEUR                    | EN 61984                 | 71-         |
| <b>K</b> EMA | DEKRA Certification B.V.     |                          | 102260      |
| NEUR         | 2                            |                          | REV.1       |

UL 1977

## Counterpart



### Item no.2091-1130

Underwriters Laboratories Inc.

1-conductor female connector; push-button; Push-in CAGE CLAMP®; 1.5 mm²; Pin spacing 3.5 mm; 10-pole; 1,50 mm²; light gray

www.wago.com/2091-1130

E45171

200

Item no.2091-1110

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|  | 1-conductor female connector; push-button; Push-in CAGE CLAMP®; 1.5 mm²; Pin spacing 3.5 mm; 10-pole; Gripping plate; 1,50 mm²; light gray  | www.wago.com/2091-<br>1110          |
|--|---|-------------------------------------|
|  | Item no.2091-1110/000-1000  1-conductor female connector; push-button; Push-in CAGE CLAMP®; 1.5 mm²; Pin spacing 3.5 mm; 10-pole; Gripping plate; direct marking; 1,50 mm²; light gray                          | www.wago.com/2091-<br>1110/000-1000 |
|  | Item no.2091-1110/000-5000  1-conductor female connector; push-button; Push-in CAGE CLAMP®; 1.5 mm²; Pin spacing 3.5 mm; 10-pole; Gripping plate; direct marking; 1,50 mm²; light gray                          | www.wago.com/2091-<br>1110/000-5000 |
| THE STATE OF THE S | Item no.2091-1110/002-000 1-conductor female connector; push-button; Push-in CAGE CLAMP®; 1.5 mm²; Pin spacing 3.5 mm; 10-pole; Gripping plate sliding connector release; 1,50 mm²; light gray                  | www.wago.com/2091-<br>1110/002-000  |
| ±  | Item no.2091-1110/002-1000 1-conductor female connector; push-button; Push-in CAGE CLAMP®; 1.5 mm²; Pin spacing 3.5 mm; 10-pole; Gripping plate sliding connector release; direct marking; 1,50 mm²; light gray | www.wago.com/2091-<br>1110/002-1000 |

### Optional accessories

### Coding

Coding

×

Item no.: 2091-1610
Coding key carrier; suitable for 3.5 mm pin spacing; orange

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# **Downloads**

## Documentation

### Additional Information

| Technical Section      | 2019 Apr 3 | pdf    | Download |
|------------------------|------------|--------|----------|
| Technical explanations |            | 2.0 MB |          |

## CAD/CAE-Data

CAD data

2D/3D Models 2091-1410 URL Download

## PCB Design

Symbol and Footprint 2091-1410

URL

Download

CAx data for your PCB design, consisting of "schematic symbols and PCB footprints", allow easy integration of the WAGO component into your development environment.

## Supported formats:

Accel EDA 14 & 15

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- Altium 6 to current version
- Cadence Allegro
- DesignSpark
- Eagle Libraries
- KiCad
- Mentor Graphics BoardStation
- Mentor Graphics Design Architect
- Mentor Graphics Design Expedition 99 and 2000
- OrCAD 9.X PCB and Capture
- PADS PowerPCB 3, 3.5, 4.X, and 5.X
- PADS PowerPCB and PowerLogic 3.0
- PCAD 2000, 2001, 2002, 2004, and 2006
- Pulsonix 8.5 or newer
- STL
- 3D STEP
- TARGET 3001!
- View Logic ViewDraw
- Quadcept
- Zuken CadStar 3 and 4
- Zuken CR-5000 and CR-8000

PCB Component Libraries (EDA), PCB CAD Library Ultra Librarian

### CAE data

ZUKEN Portal 2091-1410 URL Download

## **Environmental Product Compliance**

#### Compliance Search

Environmental Product Compliance 2091-1410 THT male header; 1.0 mm Ø solder pin; straight; Pin spacing 3.5 mm; 10-pole; light gray URL Download

#### **Installation Notes**

Coding

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

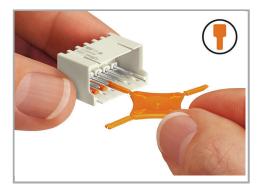
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Coding a male header (via coding key carrier and two keys for male header, see symbol).

 $\label{lem:condition} \textbf{Subject to changes. Please also observe the further product documentation!}$ 

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