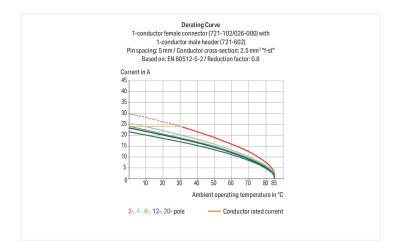
1-conductor male connector; CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating; 2,50 mm²; light gray

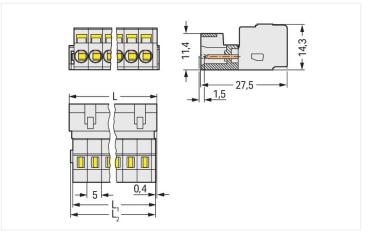


https://www.wago.com/721-610



Color: ■ light gray





Dimensions in mm L = (pole no. -1) x pin spacing + 8.2 mm L2 = L -1.7 mm L3 = L -1.2 mm

- Universal connection for all conductor types
- Easy cable pre-assembly and on-unit wiring via vertical and horizontal CAGE CLAMP® actuation
- For wire-to-wire and board-to-wire connections
- · Versions available with snap-in mounting feet or flanges for panel or through-panel mounting
- 3- to 5-pole male connectors are also available with preceding ground contact
- 100 % protected against mismating
- · With coding fingers

Variants:

Notes	
Safety information	The MCS – MULTI 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. 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.

Gold-plated or partially gold-plated contact surfaces

configurator.wago.com/.

Other versions (or variants) can be requested from WAGO Sales or configured at https://

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Electrical data			
Ratings per	IE	C/EN 60664	-1
Overvoltage category	III	III	II
Pollution degree	3	2	2
Nominal voltage	320 V	320 V	630 V
Rated surge voltage	4 kV	4 kV	4 kV
Rated current	12 A	12 A	12 A

Approvals per		UL 1059	
Use group	В	С	D
Rated voltage	300 V	-	300 V
Rated current	15 A	-	10 A

Approvals per	UL 1977
Rated voltage	600 V
Rated current	15 A

Approvals per		CSA	
Use group	В	С	D
Rated voltage	300 V	-	300 V
Rated current	15 A	-	10 A

Connection data			
Connection points	10	Connection 1	
Total number of potentials	10	Connection technology	CAGE CLAMP®
Number of connection types	1	Actuation type	Operating tool
Number of levels	1	Actuation direction 1	Operation parallel to conductor entry
	Actuation direction 2	Operation perpendicular to conductor entry	
		Solid conductor	0.08 2.5 mm² / 28 12 AWG
	Fine-stranded conductor	0.08 2.5 mm² / 28 12 AWG	
	Fine-stranded conductor; with insulated ferrule	0.25 1.5 mm <sup>2</sup>	
	Fine-stranded conductor; with uninsulated ferrule	0.25 2.5 mm <sup>2</sup>	
		Strip length	8 9 mm / 0.31 0.35 inches
	Pole number	10	
		Conductor entry direction to mating direction	0°

Physical data	
Pin spacing	5 mm / 0.197 inches
Width	53.2 mm / 2.094 inches
Height	14.3 mm / 0.563 inches
Depth	27.5 mm / 1.083 inches

Mechanical data	
Variable coding	Yes
Direct ground contact to DIN-rail/drilled hole/housing	No
Anti-rotation protection	Yes

https://www.wago.com/721-610



Plug-in connection	
Contact type (pluggable connector)	Male connector/plug
Connector (connection type)	for conductor
Mismating protection	Yes

Material data	
Note (material data)	
	<u>Information on material specifications can be found here</u>
Color	light gray
Material group	
Insulation material	Polyamide (PA66)
Flammability class per UL94	V0
Clamping spring material	Chrome-nickel spring steel (CrNi)
Contact material	Electrolytic copper (E <sub>Cu</sub> )
Contact plating	Tin
Fire load	0.28 MJ
Weight	15.5 g

Environmental requirements	
Limit temperature range	-60 +100 °C
Processing temperature	-35 +60 °C

Commercial data	
Product Group	3 (Multi Conn. System)
eCl@ss 10.0	27-44-03-09
eCl@ss 9.0	27-44-03-09
ETIM 8.0	EC002638
ETIM 7.0	EC002638
PU (SPU)	50 pcs
Packaging type	Box
Country of origin	DE
GTIN	4044918263931
Customs tariff number	85366930000

Environmental Product Compliance	
RoHS Compliance Status	Compliant,No Exemption

## Approvals / Certificates

## General approvals









Approval	Standard	Certificate Name
CB DEKRA Certification B.V.	IEC 61984	NL-39756/A1
CSA DEKRA Certification B.V.	C22.2	1466354
KEMA/KEUR DEKRA Certification B.V.	EN 61984	71-121453
UL Underwriters Laboratories Inc.	UL 1977	E45171

## General approvals

UL 1059 Underwriters Laboratories

E45172

https://www.wago.com/721-610



## Declarations of conformity and manufacturer's declarations



Approval	Standard	Certificate Name
Railway WAGO GmbH & Co. KG	-	Railway Ready

## Approvals for marine applications







Approval	Standard	Certificate Name
ABS American Bureau of Ship- ping	-	19-HG1869876-PDA
DNV DNV GL SE	-	TAE000016Z
LR Lloyds Register	IEC 61984	96/20035 (E5)

## Downloads

### **Environmental Product Compliance**

## Compliance Search

Environmental Product Compliance 721-610



### Documentation

### Additional Information

Technical Section

03.04.2019

pdf

. 2027.26 KB



### CAD/CAE-Data

### CAD data

2D/3D Models 721-610



### CAE data

EPLAN Data Portal



ZUKEN Portal 721-610



### 1 Compatible Products

## 1.1 System counterpart

## 1.1.1 Female connector/socket



1-conductor female connector, angled;

CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against



### The state of the s

Item No.: 722-210/026-000
1-conductor female connector, angled;
CAGE CLAMP®; 2.5 mm²; Pin spacing 5
mm; 10-pole; 100% protected against
mismating; 2,50 mm²; light gray



### a certain

Item No.: 721-310/031-000
1-conductor female connector, angled; CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating; clamping collar; 2,50 mm²; light gray



### Item No.: 721-310/008-000

1-conductor female connector, angled; CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating; Snap-in mounting feet; 2,50 mm²; light gray



## Item No.: 721-110/026-000

Item No.: 722-110/026-000

mismating; 2,50 mm<sup>2</sup>; light gray

1-conductor female connector; CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating; 2,50 mm²; light gray



## Item No.: 721-110/027-000

1-conductor female connector; CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10pole; 100% protected against mismating; clamping collar; 2,50 mm²; light gray



### Item No.: 721-110/031-000

1-conductor female connector; CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating; clamping collar; 2,50 mm²; light gray



## Item No.: 721-110/037-000

1-conductor female connector; CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating; Lateral locking levers; 2,50 mm²; light gray

https://www.wago.com/721-610



### 1.1.1 Female connector/socket



### Item No.: 721-110/008-000/037-000

1-conductor female connector; CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10pole; 100% protected against mismating; Lateral locking levers; Snap-in mounting feet; 2,50 mm<sup>2</sup>; light gray



### Item No.: 721-110/008-000

1-conductor female connector; CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10pole; 100% protected against mismating; Snap-in mounting feet; 2,50 mm<sup>2</sup>; light



### Item No.: 2721-1110/326-000

1-conductor female connector; lever; Push-in CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating, coding finger; 2,50 mm2; light gray



### Item No.: 2721-1110/037-000

1-conductor female connector; lever; Push-in CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating, coding finger; Lateral locking levers; 2,50 mm<sup>2</sup>; light gray



### Item No.: 2721-110/026-000

1-conductor female connector; push-button; Push-in CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating; 2,50 mm<sup>2</sup>; light gray



## Item No.: 2721-110/031-000

1-conductor female connector; pushbutton; Push-in CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating; clamping collar; 2,50 mm<sup>2</sup>; light gray



1-conductor female connector; pushbutton; Push-in CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating; Lateral locking levers; 2,50 mm²; light gray

### Item No.: 2721-110/008-000

1-conductor female connector; push-button; Push-in CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating; Snap-in mounting feet; 2,50 mm²; light gray



Item No.: 721-2110/037-000 2-conductor female connector; Push-in CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating; Lateral locking levers; 2,50 mm<sup>2</sup>; light gray



2-conductor female connector; Push-in

CAGE CLAMP®; 2.5 mm²; Pin spacing 5

mm; 10-pole; 100% protected against

mismating; with integrated end plate; 2,50

Item No.: 721-2110/026-000

mm<sup>2</sup>; light gray

## Item No.: 721-2110/026-000/135-000

2-conductor female connector; Push-in CAGE CLAMP®; 2.5 mm²; Pin spacing 5 mm; 10-pole; 100% protected against mismating; with integrated end plate; Strain relief plate; 2,50 mm2; light gray



Female connector for rail-mount terminal blocks; 0.6 x 1 mm pins; angled; 100% protected against mismating; Locking lever; Pin spacing 5 mm; 10-pole; light gray



## Item No.: 722-240/005-000

Female connector for rail-mount terminal blocks; 0.6 x 1 mm pins; angled; 100% protected against mismating; Pin spacing



## Item No.: 722-140/005-000

Female connector for rail-mount terminal blocks; 0.6 x 1 mm pins; straight; 100% protected against mismating; Pin spacing 5 mm; 10-pole; light gray



### Item No.: 722-240

THT female header; angled; Pin spacing 5 mm; 10-pole; 100% protected against mismating; 0.6 x 1.0 mm solder pin; light



5 mm; 10-pole; light gray



Female connector for rail-mount terminal

protected against mismating; Locking le-

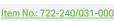
blocks; 0.6 x 1 mm pins; straight; 100%

Item No.: 722-240/047-000 THT female header; angled; Pin spacing 5 mm; 10-pole; 100% protected against mismating; Spacer flange; 0.6 x 1.0 mm



### Item No.: 722-140

THT female header; straight; Pin spacing 5 mm; 10-pole; 100% protected against mismating; 0.6 x 1.0 mm solder pin; light



THT female header; angled; Pin spacing 5 mm; 10-pole; 100% protected against mismating; clamping collar; 0.6 x 1.0 mm solder pin; light gray

### Item No.: 722-240/039-000

THT female header; angled; Pin spacing 5 mm; 10-pole; 100% protected against mismating; Locking lever; 0.6 x 1.0 mm solder pin; light gray

solder pin; light gray

Item No.: 722-140/047-000 THT female header; straight; Pin spacing 5 mm; 10-pole; 100% protected against mismating; Spacer flange; 0.6 x 1.0 mm solder pin; light gray



# THT female header; straight; Pin spacing 5

mm; 10-pole; 100% protected against mismating; clamping collar; 0.6 x 1.0 mm solder pin; light gray

## Item No.: 722-140/039-000

THT female header; straight; Pin spacing 5 mm; 10-pole; 100% protected against mismating; Locking lever; 0.6 x 1.0 mm solder pin; light gray

### 1.2 Optional Accessories

## 1.2.1 Coding

## 1.2.1.1 Coding



## Item No.: 231-129

Coding key; snap-on type; light gray

https://www.wago.com/721-610



### 1.2.2 Cover

### 1.2.2.1 Cover



### Item No.: 231-668

Lockout caps; for covering unused clamping units; gray

### 1.2.3 Ferrule 1.2.3.1 Ferrule Item No.: 216-301 Item No.: 216-321 Item No.: 216-151 Item No.: 216-131 Ferrule; Sleeve for 0.25 mm<sup>2</sup> / AWG 24; in-Ferrule; Sleeve for 0.25 mm<sup>2</sup> / AWG 24; in-Ferrule; Sleeve for 0.25 mm<sup>2</sup> / AWG 24; Ferrule; Sleeve for 0.25 mm<sup>2</sup> / AWG 24; sulated; electro-tin plated; yellow sulated; electro-tin plated; yellow uninsulated; electro-tin plated uninsulated; electro-tin plated; silver-co-Item No.: 216-302 Item No.: 216-322 Item No.: 216-132 Item No.: 216-152 Ferrule; Sleeve for 0.34 mm<sup>2</sup> / 22 AWG; in-Ferrule; Sleeve for 0.34 mm<sup>2</sup> / 22 AWG; in-Ferrule; Sleeve for 0.34 mm<sup>2</sup> / AWG 24; Ferrule; Sleeve for 0.34 mm<sup>2</sup> / AWG 24; sulated; electro-tin plated; light turquoise sulated; electro-tin plated; light turquoise uninsulated; electro-tin plated uninsulated; electro-tin plated Item No.: 216-241 Item No.: 216-201 Item No.: 216-221 Item No.: 216-141 Ferrule; Sleeve for 0.5 mm<sup>2</sup> / 20 AWG; in-Ferrule; Sleeve for 0.5 mm<sup>2</sup> / 20 AWG; in-Ferrule; Sleeve for 0.5 mm<sup>2</sup> / 20 AWG; in-Ferrule; Sleeve for 0.5 mm<sup>2</sup> / 20 AWG; unsulated; electro-tin plated; electrolytic sulated; electro-tin plated; white sulated; electro-tin plated; white insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN copper; gastight crimped; acc. to DIN 46228, Part 4/09.90; white 46228, Part 1/08.92 Item No.: 216-101 Item No.: 216-242 Item No.: 216-262 Ferrule; Sleeve for 0.5 mm<sup>2</sup> / AWG 22; un-Ferrule; Sleeve for 0.5 mm<sup>2</sup> / AWG 22; un-Ferrule; Sleeve for 0.75 mm<sup>2</sup> / 18 AWG; in-Ferrule; Sleeve for 0.75 mm<sup>2</sup> / 18 AWG; insulated; electro-tin plated; electrolytic sulated; electro-tin plated; electrolytic insulated; electro-tin plated; silver-coloinsulated; electro-tin plated; silver-colocopper; gastight crimped; acc. to DIN copper; gastight crimped; acc. to DIN red red 46228, Part 4/09.90; gray 46228, Part 4/09.90; gray Item No.: 216-102 Item No.: 216-202 Item No.: 216-222 Item No.: 216-142 Ferrule; Sleeve for 0.75 mm<sup>2</sup> / 18 AWG; in-Ferrule; Sleeve for 0.75 mm<sup>2</sup> / 18 AWG; in-Ferrule; Sleeve for 0.75 mm<sup>2</sup> / 18 AWG; Ferrule; Sleeve for 0.75 mm<sup>2</sup> / AWG 20; uninsulated; electro-tin plated; electrolyuninsulated; electro-tin plated; silver-cosulated; electro-tin plated; gray sulated; electro-tin plated; gray tic copper; gastight crimped; acc. to DIN 46228, Part 1/08.92 Item No.: 216-122 Item No.: 216-243 Item No.: 216-263 Item No.: 216-203 Ferrule; Sleeve for 0.75 mm<sup>2</sup> / AWG 20; Ferrule; Sleeve for 1 mm<sup>2</sup> / AWG 18; insu-Ferrule; Sleeve for 1 mm<sup>2</sup> / AWG 18; insu-Ferrule; Sleeve for 1 mm<sup>2</sup> / AWG 18; insuuninsulated; electro-tin plated; silver-colated; electro-tin plated; electrolytic coplated; electro-tin plated; electrolytic coplated; electro-tin plated; red lored per; gastight crimped; acc. to DIN 46228, per; gastight crimped; acc. to DIN 46228, Part 4/09.90; red Part 4/09.90; red Item No.: 216-223 Item No.: 216-103 Item No.: 216-143 Item No.: 216-123 Ferrule; Sleeve for 1 mm<sup>2</sup> / AWG 18; insu-Ferrule; Sleeve for 1 mm<sup>2</sup> / AWG 18; unin-Ferrule; Sleeve for 1 mm<sup>2</sup> / AWG 18; unin-Ferrule; Sleeve for 1 mm<sup>2</sup> / AWG 18; uninlated; electro-tin plated; red sulated; electro-tin plated; electrolytic sulated: electro-tin plated sulated: electro-tin plated: silver-colored copper; gastight crimped; acc. to DIN 46228, Part 1/08.92

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Item No.: 216-204

Ferrule; Sleeve for 1.5 mm<sup>2</sup> / AWG 16; in-

sulated; electro-tin plated; black

Item No.: 216-244

Ferrule; Sleeve for 1.5 mm2 / AWG 16; in-

sulated; electro-tin plated; electrolytic

copper; gastight crimped; acc. to DIN

46228, Part 4/09.90; black

Item No.: 216-224

Ferrule; Sleeve for 1.5 mm<sup>2</sup> / AWG 16; in-

sulated; electro-tin plated; black

Item No.: 216-264

Ferrule; Sleeve for 1.5 mm<sup>2</sup> / AWG 16; in-

sulated; electro-tin plated; electrolytic

copper; gastight crimped; acc. to DIN

46228, Part 4/09.90; black

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### 1.2.3.1 Ferrule



### Item No.: 216-284

Ferrule; Sleeve for 1.5 mm² / AWG 16; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90; black

### Item No.: 216-124

Ferrule; Sleeve for 1.5 mm<sup>2</sup> / AWG 16; uninsulated; electro-tin plated

### Item No.: 216-144

Ferrule; Sleeve for 1.5 mm<sup>2</sup> / AWG 16; uninsulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 1/08.92; silver-colored

### Item No.: 216-104

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

## Item No.: 216-106

Ferrule; Sleeve for 2.5 mm<sup>2</sup> / AWG 14; uninsulated; electro-tin plated; silver-colored

### 1.2.4 Insulation stop

### 1.2.4.1 Insulation stop







### Item No.: 231-670

Insulation stop; 0.08-0.2 mm<sup>2</sup> / 0.2 mm<sup>2</sup> "s"; white

### Item No.: 231-671

Insulation stop; 0.25 - 0.5 mm²; light gray

### Item No.: 231-672

Insulation stop; 0.75 - 1 mm<sup>2</sup>; dark gray

## 1.2.5 Jumper

### 1.2.5.1 Jumper

Item No.: 231-910

sulated; gray



Jumper; for conductor entry; 10-way; in-



Jumper; for conductor entry; 2-way; insulated; gray

### Item No.: 231-903

Jumper; for conductor entry; 3-way; insulated; gray

### Item No.: 231-905

Jumper; for conductor entry; 5-way; insulated; gray

## Item No.: 231-907

Jumper; for conductor entry; 7-way; insulated; gray

## 1.2.6 Marking

## 1.2.6.1 Marking strip

## Item No.: 210-331/500-103

Marking strips; as a DIN A4 sheet; MAR-KED; 1-12 (300x); Height of marker strip: 2.3 mm/0.091 in; Strip length 182 mm; Horizontal marking; Self-adhesive; white

## Item No.: 210-332/500-202

Marking strips; as a DIN A4 sheet; MAR-KED; 1-16 (160x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white

## Item No.: 210-332/500-205

Marking strips; as a DIN A4 sheet; MAR-KED; 1-32 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white

## Item No.: 210-331/500-104

Marking strips; as a DIN A4 sheet; MAR-KED; 13-24 (300x); Height of marker strip: 2.3 mm/0.091 in; Strip length 182 mm; Horizontal marking; Self-adhesive; white

### Item No.: 210-332/500-204

Marking strips; as a DIN A4 sheet; MAR-KED; 17-32 (160x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white

### Item No.: 210-332/500-206

Marking strips; as a DIN A4 sheet; MAR-KED; 33-48 (160x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white



### 1.2.7 Strain relief

### 1.2.7.1 Strain relief housing



### Item No.: 232-610

Strain relief housing; for female and male connectors; 2 parts; Pin spacing 5 mm; 10-pole; gray

### 1.2.8 Tool

## 1.2.8.1 Operating tool





Combination operating tool; red



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



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

Item No.: 280-440

Operating tool; made of insulating material; 10-way



Item No.: 209-130

Operating tool; made of insulating material; 1-way; for 264 Series (1-/2-way), 280, 281 Series (up to 3-way); natural



Operating tool; made of insulating material; 1-way; loose; red

Item No.: 231-131

Operating tool; made of insulating material; 1-way; loose; white



Operating tool; made of insulating material; 2-way; white



Item No.: 280-433

Operating tool; made of insulating material; 3-way



Operating tool; made of insulating material; 4-way

Item No.: 280-435

Operating tool; made of insulating material; 5-way; gray

Item No.: 280-436
Operating tool; made of insulating materials Course



Item No.: 280-437

Operating tool; made of insulating material; 7-way

Item No.: 280-438

Operating tool; made of insulating material: 8-way

<u>Item No.: 231-159</u>

Operating tool; natural

## **Installation Notes**

## **Conductor termination**



Inserting a conductor via 3.5 mm screwdriver – CAGE CLAMP® actuation parallel to conductor entry.



Inserting a conductor via 3.5 mm screwdriver – CAGE CLAMP® actuation perpendicular to conductor entry.



Inserting a conductor via operating tool.



Testing



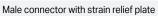
Testing perpendicular to conductor entry with 2 or 2.3 mm Ø test plug – female connector with CAGE CLAMP® – via integrated test ports

https://www.wago.com/721-610



## Installation







Strain relief housing shown with a male connector equipped with CAGE CLAMP®

## Coding



Coding a male header – fitting coding key

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