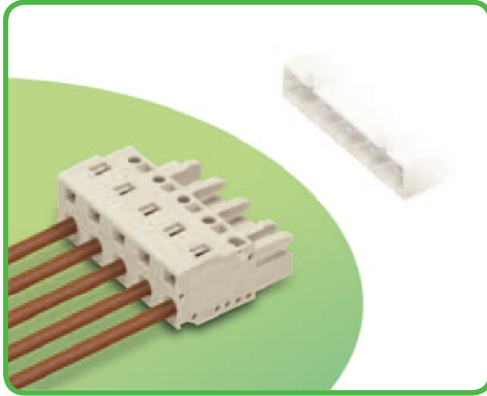


## Female Connectors Pin Spacing 7.5 mm MCS-MIDI



- Universal connection for all conductor types
- Easy cable pre-assembly and on-unit wiring via vertical and horizontal CAGE CLAMP® actuation
- Integrated test ports
- 100% protected against mismatching
- With coding fingers

### Technical data:

Pin Spacing	7.5 mm 0.295 in		
Rating per	IEC/EN 60664-1		
Overtoltage category	III	III	II
Pollution degree	3	2	2
Rated voltage	500 V	630 V	1000 V
Rated surge voltage	6 kV	6 kV	6 kV
Nominal current	16 A	16 A	16 A
Approvals per	UL/CSA		
Use group UL 1059	B	C	D
Rated voltage	300 V	-	300 V
Nominal current UL	15 A	-	10 A
Nominal current CSA	15 A	-	10 A

The MCS-MIDI connection system is UL 1977 approved and capable of up to 600 V for factory wiring.

### Conductor data:

Connection technology	CAGE CLAMP®	
Conductor size: solid	0.08 - 2.5 mm <sup>2</sup>	
Conductor size: fine-stranded	0.08 - 2.5 mm <sup>2</sup>	
Conductor size: fine-stranded	0.25 - 1.5 mm <sup>2</sup> (with insulated ferrule)	
Conductor size: fine-stranded	0.25 - 2.5 mm <sup>2</sup> (with uninsulated ferrule)	
AWG	28 - 12	12: THHN, THWN
Strip length	8 - 9 mm / 0.31 - 0.35 in	

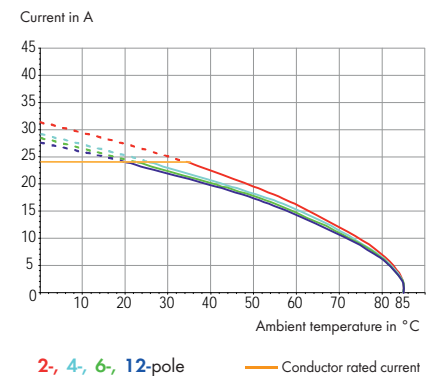
### Material data:

Material group	I
Insulating material	Nylon 6.6 (PA 6.6)
Flammability rating per UL 94	V0
Lower/Upper temperature limit	-60°C / +85°C
Clamping spring material	Chrome-nickel spring steel (CrNi)
Contact material	Copper alloy
Contact plating	tin-plated
MCS connectors are also available upon request with gold-plated or partially gold-plated contact surfaces.	
Depending on the version requested, "item no. suffix . . . /010-000" is added to the "basic item no."	

MCS - MULTI CONNECTION SYSTEM includes connectors **without** breaking capacity in accordance with IEC 61984. When used as intended, these connectors shall not be connected/disconnected when live or under load. The circuit design should ensure header pins, which can be touched, are not live in unmated condition.

### Derating Curve

721-202/026-000 female connector  
with 721-832/001-000 male connector  
Pin spacing: 7.5 mm / Conductor size: 2.5 mm<sup>2</sup> "fst"  
Based on: EN 60512-5-2 / Reduction factor: 0.8



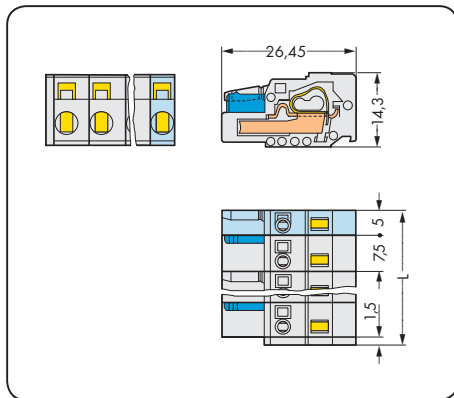
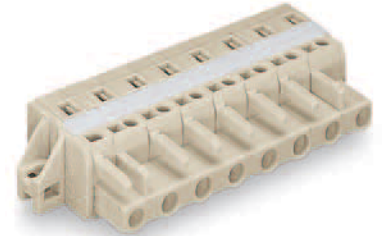
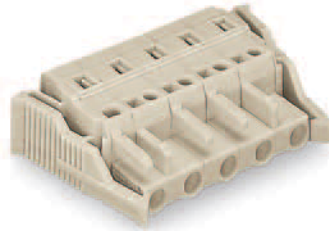
### MCS-MIDI accessories:

### Page:

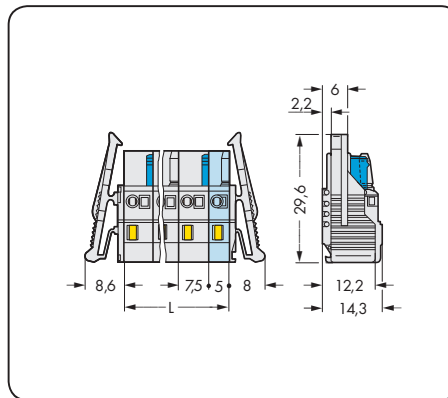
Marking accessories	540 - 543
Operating tools	466 - 467
Direct marking	358 - 360
Insulation stop	469
Test plug adapter	474
Test plugs	538
Screws	546
Strain relief housings	472 - 473
Strain relief plates	470 - 471

# Female Connectors MCS-MIDI

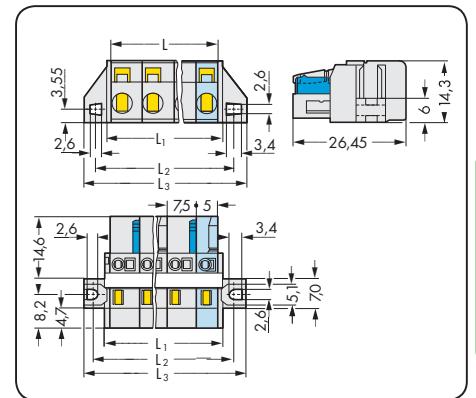
Pin spacing 7.5 mm / 0.295 in		With locking levers Pin spacing 7.5 mm / 0.295 in		With fixing flanges for racks and through-panel mounting Pin spacing 7.5 mm / 0.295 in	
0.08 - 2.5 mm <sup>2</sup>	AWG 28 - 12	0.08 - 2.5 mm <sup>2</sup>	AWG 28 - 12	0.08 - 2.5 mm <sup>2</sup>	AWG 28 - 12
630 V/ 6kV/2 16 A	300 V/15 A	630 V/ 6kV/2 16 A	300 V/15 A	630 V/ 6kV/2 16 A	300 V/15 A



$L = (\text{pole no.} - 1) \times \text{pin spacing} + 5 \text{ mm} + 1.5 \text{ mm}$



$L = (\text{pole no.} - 1) \times \text{pin spacing} + 5 \text{ mm}$

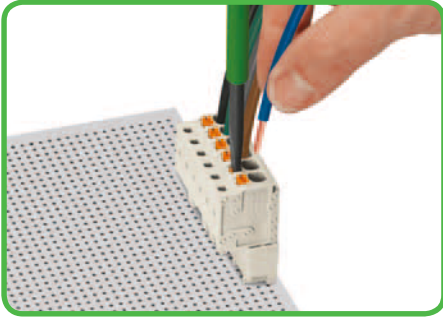


$L = (\text{pole no.} - 1) \times \text{pin spacing} + 5 \text{ mm}$   
 $L_1 = L + 3 \text{ mm}$   
 $L_2 = L + 8.8 \text{ mm}$   
 $L_3 = L + 14.8 \text{ mm}$

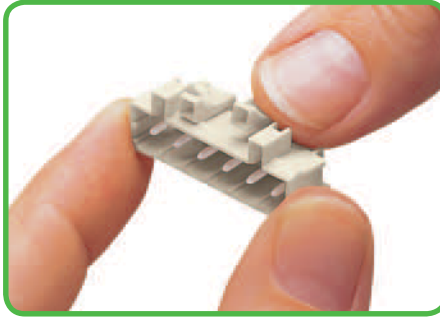
Pole No.	Item No.	Pack. Unit	Pole No.	Item No.	Pack. Unit	Pole No.	Item No.	Pack. Unit
Female connector, light gray			Female connector with locking levers, light gray			Female connector with fixing flanges, for racks and through-panel mounting, with reinforcing strips, light gray		
2	721-202/026-000	100	2	721-202/037-000	50	2	721-202/031-000	50
3	721-203/026-000	100	3	721-203/037-000	50	3	721-203/031-000	50
4	721-204/026-000	50	4	721-204/037-000	50	4	721-204/031-000	50
5	721-205/026-000	50	5	721-205/037-000	50	5	721-205/031-000	50
6	721-206/026-000	50	6	721-206/037-000	25	6	721-206/027-000	25
7	721-207/026-000	50	7	721-207/037-000	25	7	721-207/027-000	25
8	721-208/026-000	25	8	721-208/037-000	25	8	721-208/027-000	25
9	721-209/026-000	25	9	721-209/037-000	25	9	721-209/027-000	25
10	721-210/026-000	25	10	721-210/037-000	25	10	721-210/027-000	25
11	721-211/026-000	25	11	721-211/037-000	10	11	721-211/027-000	10
12	721-212/026-000	25	12	721-212/037-000	10	12	721-212/027-000	10
						Item nos. for 2- to 5-pole female connectors are identical to item nos. for panel-mounted female connectors.		
						For cutout dimensions, see page 484, table 1.		
2-pole female connectors - one latch only								

## Description and Handling

# MCS - MULTI CONNECTION SYSTEM MIDI 100% Protected Against Mismatching



Inserting/removing conductor via 3.5 mm screwdriver - CAGE CLAMP<sup>®</sup>S actuation in mated condition.

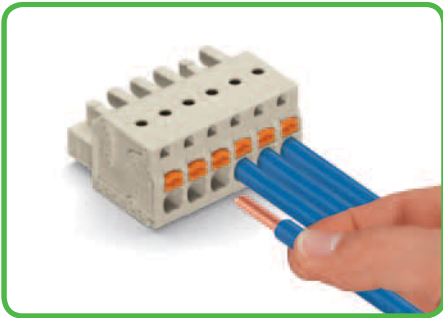


Coding a male header - fitting coding key(s).

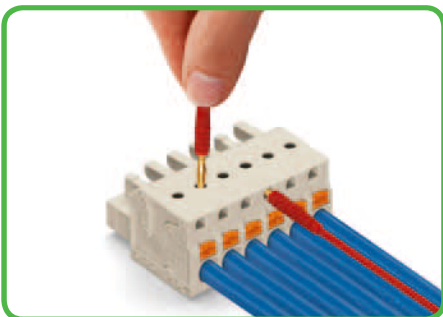


Coding a female connector - removing coding finger(s).

### 2721 Series Female Connector with Push-Buttons

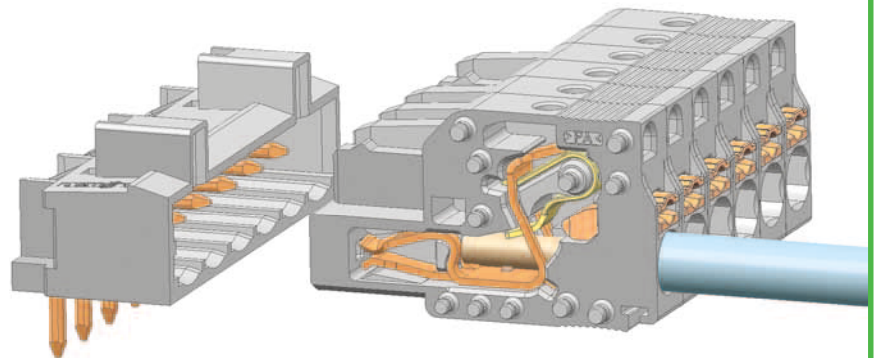


Inserting solid or ferruled conductors via CAGE CLAMP<sup>®</sup>S push-in terminations.



Testing parallel to conductor entry via integrated test ports - female connector with push-button actuated CAGE CLAMP<sup>®</sup>S. Tip contact with current bar from top of unit.

100% protected against mismatching

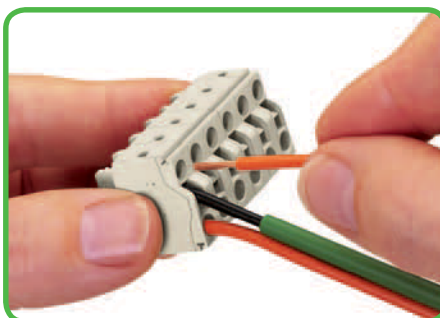


MCS-MIDI

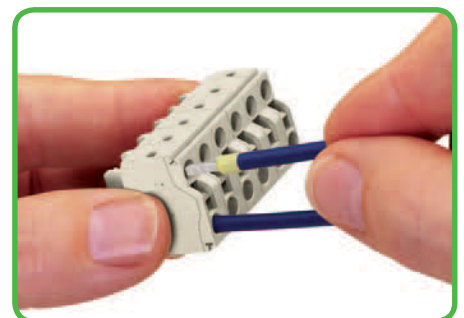
Pin spacing 5 mm and 7.5 mm



Marking via self-adhesive marker strips or factory direct printing.



Inserting conductor via 3.5 mm screwdriver into a 2-conductor female connector equipped with CAGE CLAMP<sup>®</sup>S.



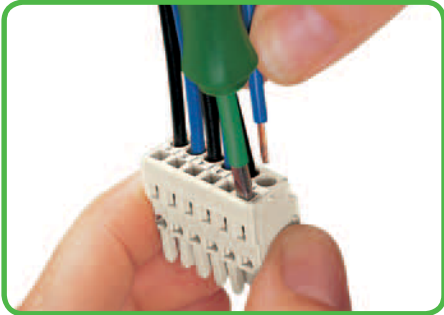
Inserting ferruled, fine-stranded conductors via CAGE CLAMP<sup>®</sup>S push-in terminations.

CAGE CLAMP<sup>®</sup> and CAGE CLAMP<sup>®</sup>S clamp the following copper conductors:<sup>\*</sup>  
solid

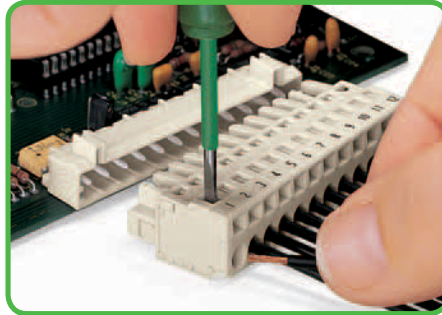
stranded

fine-stranded, also with tinned single strands

\* For aluminum conductors, see notes in Section 11.



Inserting conductor via 3.5 mm screwdriver - horizontal CAGE CLAMP® actuation.



Inserting conductor via 3.5 mm screwdriver - vertical CAGE CLAMP® actuation.

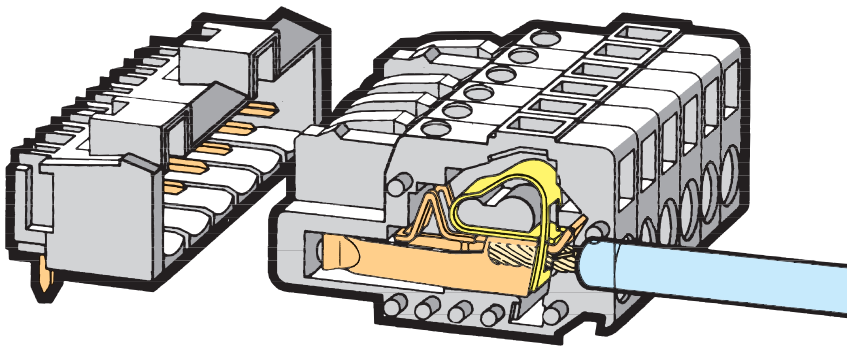


Inserting conductor - CAGE CLAMP® actuation via 231-291 push-buttons.

721, 722 and 723 Series

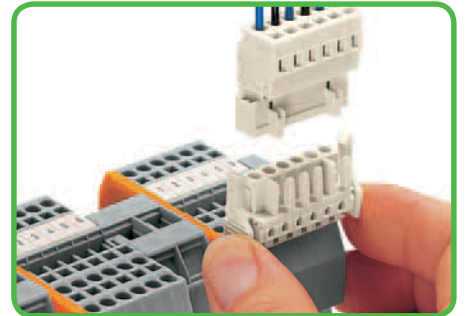
100% protected against mismatching

CAGE CLAMP®

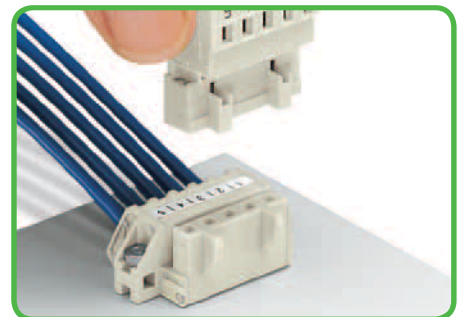


MCS-MIDI

Pin spacing 5 mm and 7.5 mm



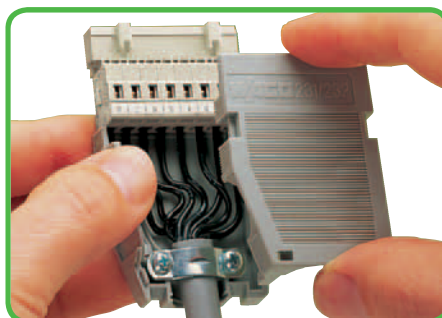
Connectors for 280 Series rail-mounted terminal blocks.



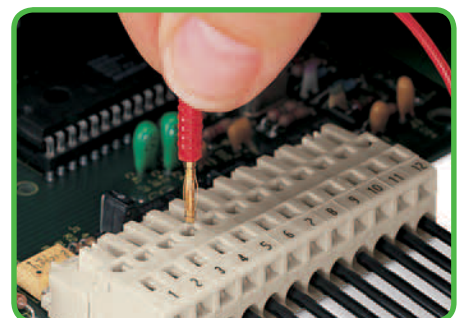
Angled female connector for panel mounting.



Male connector with strain relief plate.



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



Testing - female connector with CAGE CLAMP®. Vertical insertion of Ø 2 mm and Ø 2.3 mm test plugs.



fine-stranded,  
tip-bonded



fine-stranded with  
crimped ferrules  
(gas-tight)



fine-stranded with  
crimped pin terminal  
(gas-tight)