

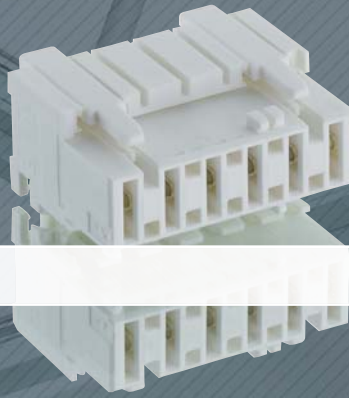


Building Technology



■ DIN EN ISO 50001

■ DIN EN ISO 14001



Lumberg [discover]

■ ISO/TS 16949

■ DIN EN ISO 9001

Sustainability: Third Generation

| by Lumberg





We are an independent, family-run company based in Germany – and have been for over 80 years now. Our success is based on sustainable performance, technical solution competence – and our “passion for connections”.

With a tradition of expertise, our products and systems solutions support an industrial environment – worldwide. We engineer and produce connectors and contact systems, electromechanical elements and mechatronic components of outstanding quality for your individual technical application. Our focus on automotive, building technology, home appliance, communications, photovoltaic and consumer electronics industries generates highly-specialized user knowledge for your benefit.



Our team of experts in building technology





Competence in Providing Solutions [connecting the world of tomorrow]



Manufacturing: Precise Production

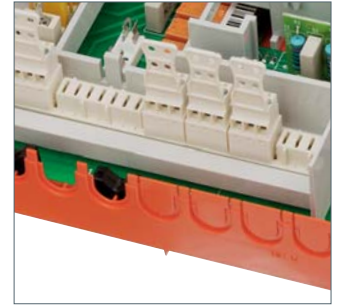
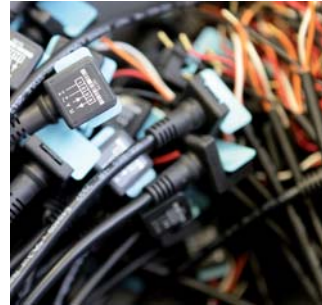
| by Lumberg



The right idea, straight construction, completely equipped laboratories and precise system measurements are the primary steps in our developing projects. According to state-of-the-art methods and technologies we mobilize our established development expertise and our passion for feasibility for your product.

We create consistently innovative and value adding solutions for your individual and complex requirements.

- Connectors in insulation displacement technology (IDT), with screw clamps or crimp for transmitting signals or load currents
- User-friendly installation and maintenance concepts
- More safety with touch-safe design
- Superior semi- and fully-automatic manufacturing machinery

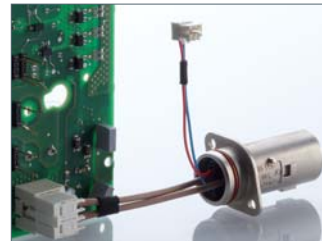


■ HEATING ■ VENTILATION ■ AIR CONTROL

■ LIGHTING ■ INSTALLATION

■ COMMUNICATION ■ SECURITY

■ DRIVES ■ GATES ■ DOORS





Applications [Heating · Ventilation · Air Control]

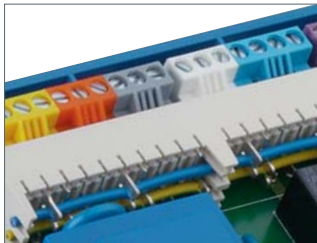
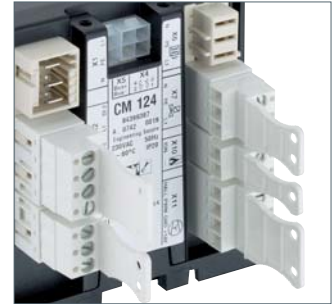
Material:
Glow Wire Resistant

| by Lumberg



For years the HVAC industry has been striving for the highest energy efficiency and for alternative concepts. Solar thermal systems, photovoltaics, heat pumps, combined heat and power, wood pellets or fuel cell heating – our connectors are well-established in sophisticated achievements.

- RAST connectors for direct and indirect mating from 1 to 27 poles as standard range
- Foolproof connection with RAST keying
- Optional color coding for easy installation
- Tab headers and socket boards according to RAST 5 standard allow customized configurations, with neutral and protective conductor bridges in IDT



Applications [Communication · Security]



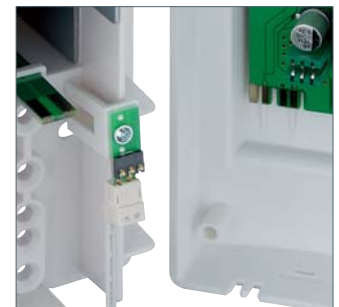
**Solutions:
Customer-specific**

| by Lumberg



Today's modern building technology is becoming more and more intricate, which requires ever-growing expertise about the individual building technology segments. From security and communication technology with control and feedback control, measurement, telecommunications and computer technology, to computer engineering – all are clearly advancing. Our offer for a broad spectrum of signal to high currents covers a large array of connectors for your pioneering ideas.

- Wide range of standard products
- Proven glow wire resistance
- Extensive knowledge of customer-specific system solutions





Applications [Lighting · Installation]



Quality:
No Compromises

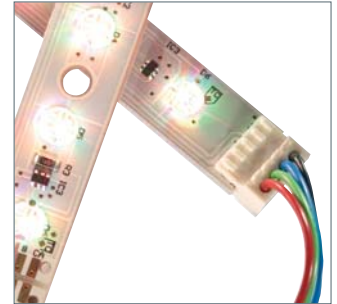
| by Lumberg



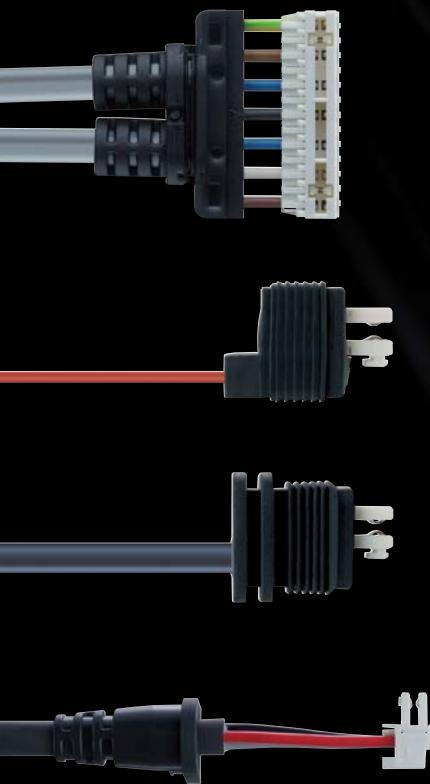
It is increasingly required that heat produced from electronic components has to be dissipated in order to improve the life and functionality of modern parts. Especially high-power LEDs demand an optimized heat management for tight installation spaces.

Insulated Metal Substrate (IMS) is used more and more for printed circuit boards, with aluminum and copper being the primary thermoconductive substrate to which dielectric and copper traces are applied.

As a pioneer in the field of RAST connectors we have developed an edge connector that secures the safe single-sided mating with an aluminum or copper PCB. Compatible with our manufacturing equipment, its mating face leans toward the versatile 2.5 RAST connector used by the billion.



Overmolded Connectors [precision components]

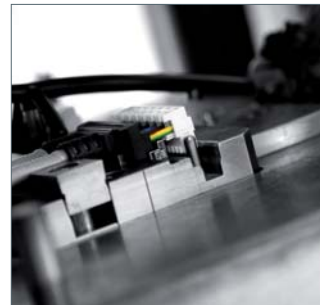
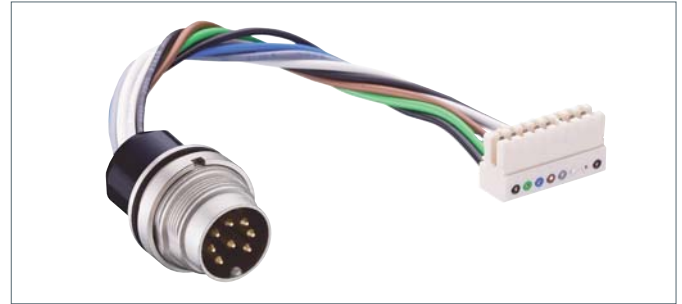


Overmolding:
More than a Connector

| by Lumberg



Our proficiency is not limited to connectors alone. The cost-effective overmolding of our connectors for your individual precision components are equally elements of our services portfolio. By using integrated production systems for highly-automated overmolding and naturally, injection molding, we implement runnerless, safe solutions for a cost- and time-efficient application with your product assembly.



System Partnership [customer-specific contact systems]

Success: Joint Solution

| with Lumberg

1	BK	COM I
2	RD	+ ~
3	WH	Y + ~
5	OG	U
6	PK	C1
7	GY	C2



Reference: Contact pressure connector system with IDT for dramper drives

A large catalog range is our mission. Customized system solutions developed jointly with you are the highlights:

The starting point for teaming up with this customer is their request for a compatible connector from our catalogue. Many talks produce a complex new idea: an individual, modular contact pressure connector in IP54 with assembled and overmolded cables. In addition to the originally sought connector it offers the added plus of optimizing assembly and test processes paired with distinctive installation benefits. The end result is a lead that proves worthwhile.





Mechatronic Modules [cutting edge technology]

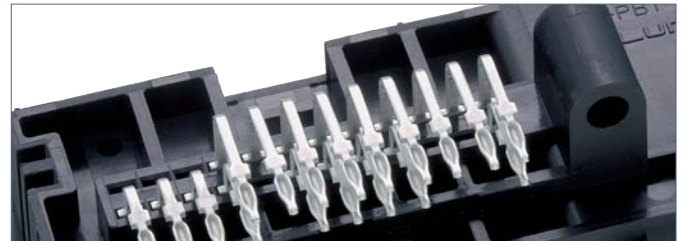


**Combination:
Metal-Plastics Sub-Assemblies**
| by Lumberg



Lumberg stands for premium-class connectors and for providing high-tech solutions based on advanced manufacturing equipment. Especially for metal-plastic compound assemblies combined with electronic components this becomes cutting edge technology.

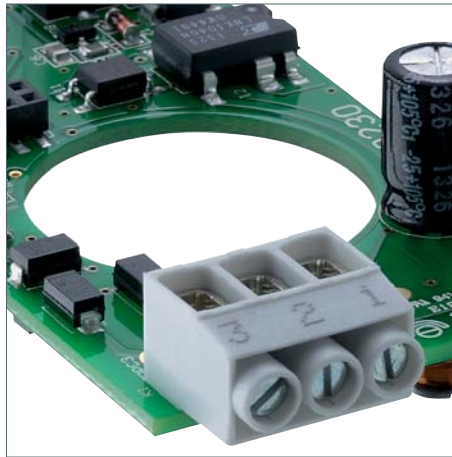
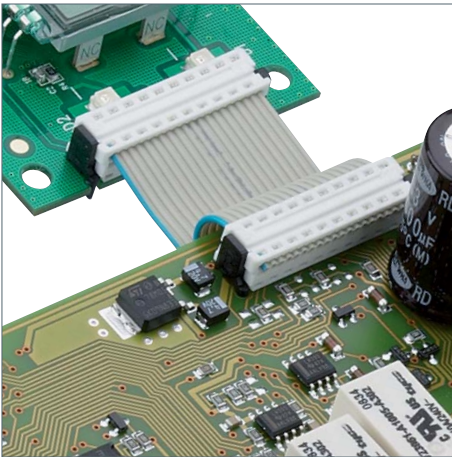
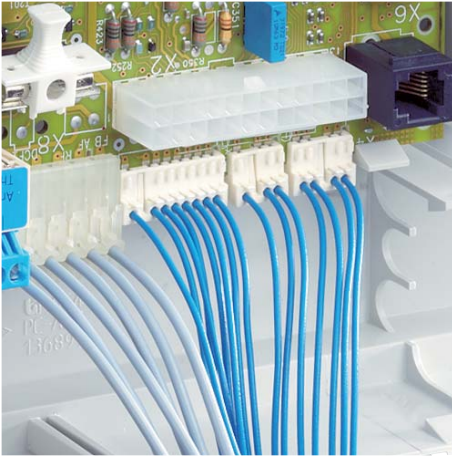
- System responsibility e.g. for electronic drives
- Press-fit-technology: tried & tested pin geometries for solderless connections
- Highest precision – filigree parts: we also punch, injection mold and overmold components with a mass of a hundredth gram

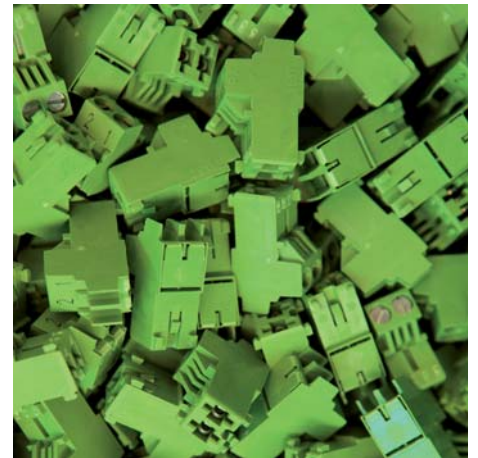
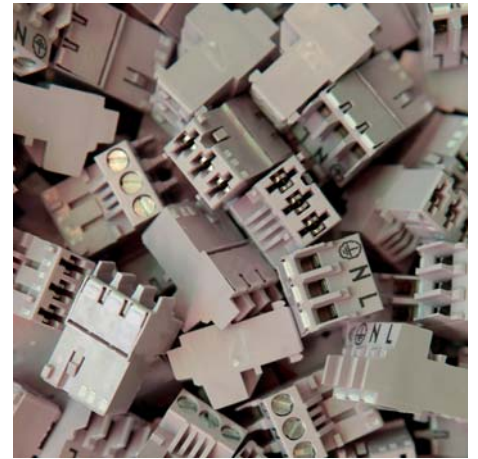
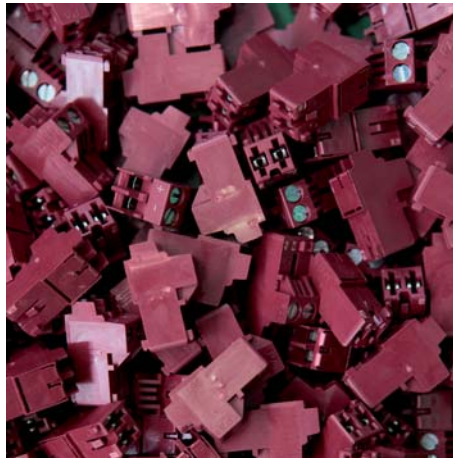




Your success
is based on
their skills.

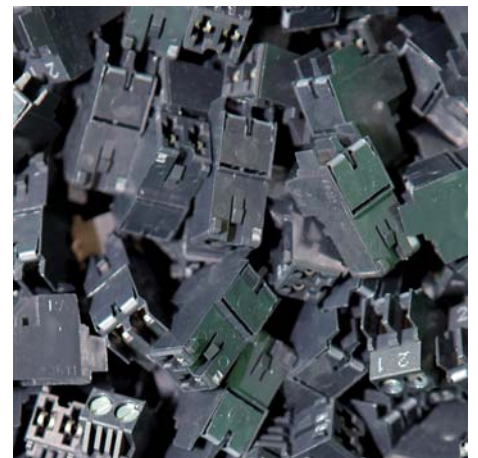
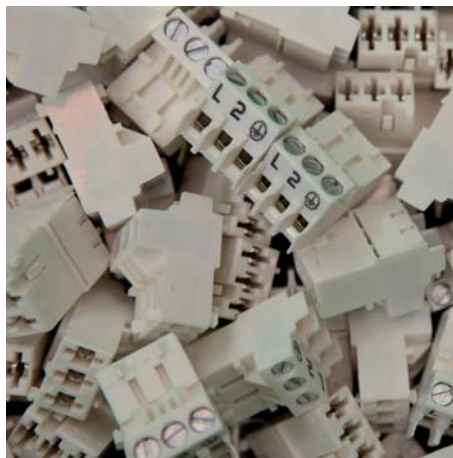


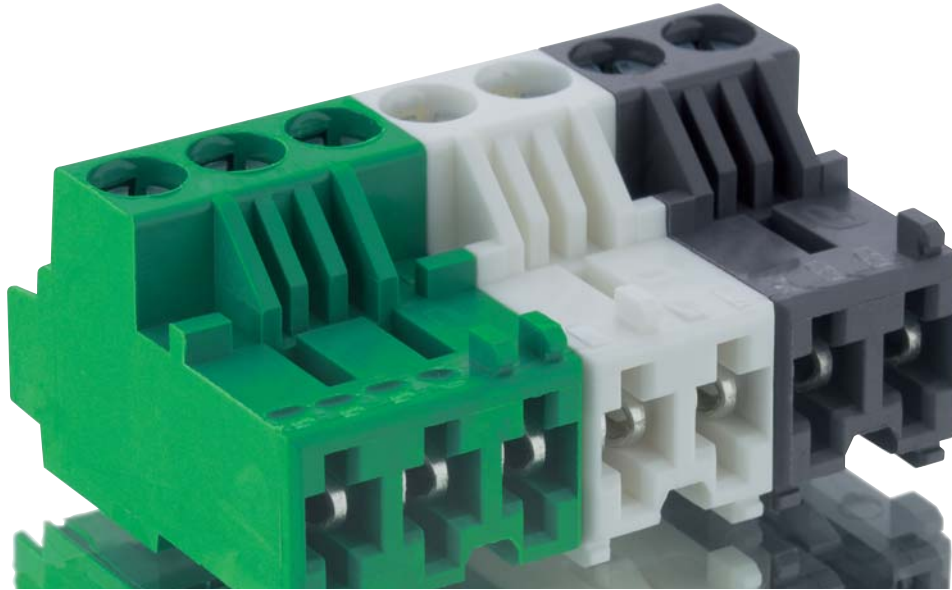




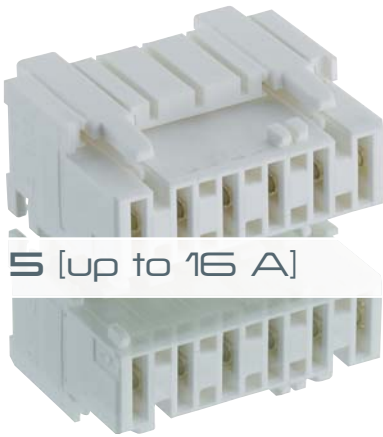
RAST

infinite diversity -
not only of color.





Building Technology Connector Systems



RAST 5 [up to 16 A]

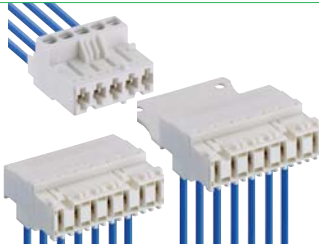
- Direct and indirect mating
- For cable-to-board and cable-to-cable connections
- Insulation displacement technology (IDT) or screw clamp
- Keying to avoid mismatching
- Color keying facilitates assembly and servicing
- Special versions for higher ambient temperatures
- For load currents up to 16 A

3611 · 3615

RAST 5 connectors with screw terminals and interior locking

3611 straight

3615 angular, with/without handle latches



10 A – 250 V AC – GWT 750 °C – 2-7 poles

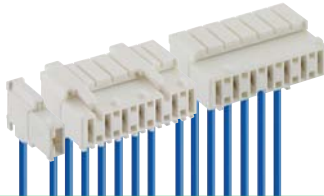
3623 · 3625 · 3626 · 3628

RAST 5 connectors, insulation displacement technology

3623 · 3625 with exterior locking

3626 with interior locking

3628 chassis connector



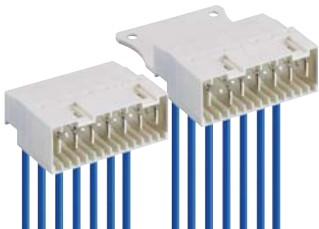
10 A (**3625** 16 A) – 250 V AC – GWT 750 °C – 1-12 (**3625** 1-4) poles

3618 · 361899

RAST 5 tab headers with screw terminals, with/without handle latches

3618 standard version

361899 with pre-mating contact



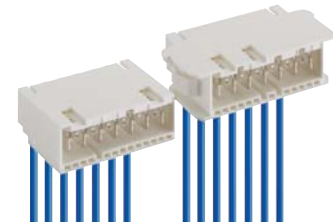
10 A – 250 V AC – GWT 750 °C – 2-7 poles

3647 · 3648

RAST 5 tab headers, insulation displacement technology

3647 standard version

3648 for panel mounting



10 A – 250 V AC – GWT 750 °C – 2-8 poles

3612 · 3613 · 3614 · 3602

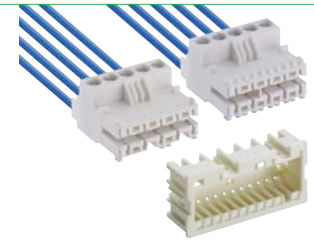
RAST 5 direct connectors with screw terminals

3612 with interior locking on guide frame

3613 with keying rib and closed sides

3614 with/without keying rib and (shorter) closed sides

3602 guide frame



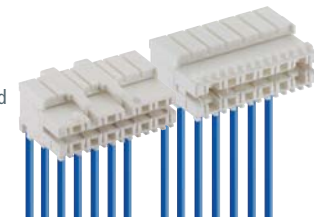
6 A – 250 V AC – GWT 750 °C – 2-6 (**3602** 2-12) poles

3633 · 3636

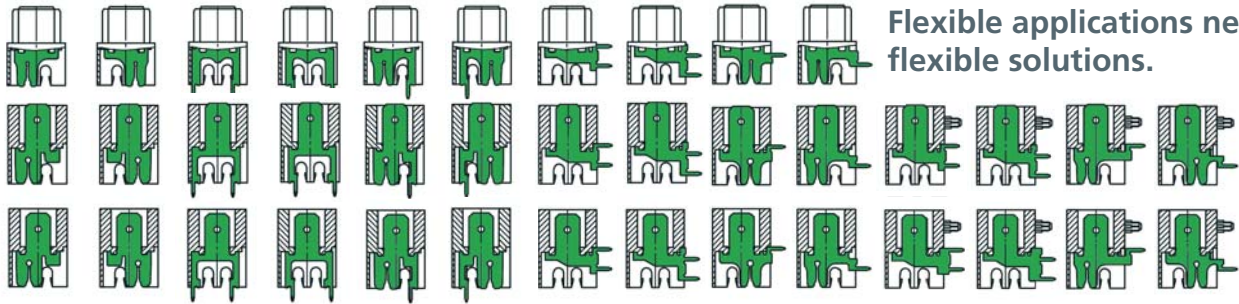
RAST 5 direct connectors, insulation displacement technology

3633 with exterior locking on guide frame

3636 with/without keying rib and closed sides, with/without locking on printed circuit board



6 A – 250 V AC – GWT 750 °C – 2-12 poles



Flexible applications need flexible solutions.

3641 · 3642 · 3671 · 3672

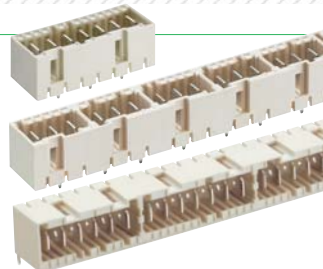
RAST 5 tab headers, with/without partitions

3641 · 3671 upright with spigot

364197 pottable version

3642 · 3672 angular with upper side locking

(364... without partitions)



10 A (364...V167 16 A) – 250 V AC – GWT 750 °C – 3-27 (364... 2-12) poles

3643–3645 · 3649 · 3673 · 3674

RAST 5 tab headers, with/without partitions, angular with lower side locking

3643 · 3673 standard version

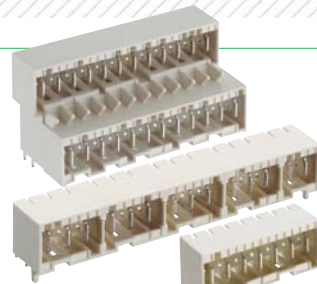
3644 · 3674 higher version with spigot

3645 higher version without spigot

3649 dual row tab header

(364... without partitions)

(367x99 with pre-mating contact)



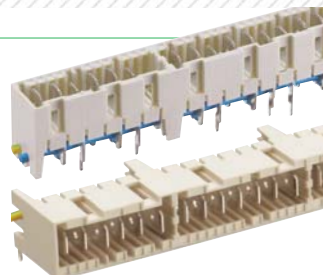
10 A (364...V167 16 A) – 250 V AC – GWT 750 °C – 3-27 (364... 2-12) poles

3676 · 3677

RAST 5 tab headers with partitions and neutral and/or protective conductor bridges in insulation displacement technology

3676 upright

3677 angular with upper side locking



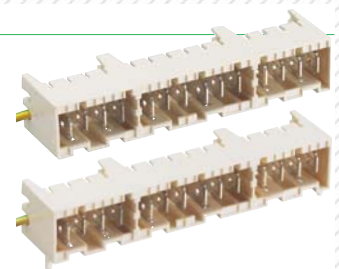
10 A – 250 V AC – GWT 750 °C – 3-27 poles

3678 · 3679

RAST 5 tab headers with partitions and neutral and/or protective conductor bridges in insulation displacement technology, angular with lower side locking

3678 standard version

3679 higher version with spigot



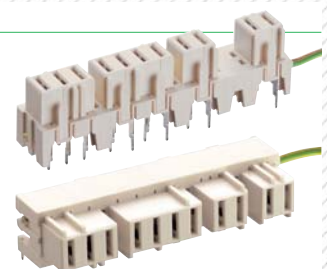
10 A – 250 V AC – GWT 750 °C – 3-27 poles

3686 · 3687

RAST 5 socket boards with partitions and neutral and/or protective conductor bridges in insulation displacement technology

3686 upright

3687 angular with lower side locking



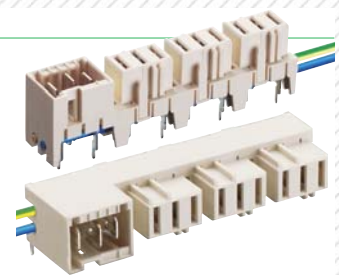
10 A – 250 V AC – GWT 750 °C – 2-26 poles

3680 · 3683

Combined RAST 5 tab headers and socket boards with partitions and neutral and/or protective conductor bridges in insulation displacement technology

3680 upright

3683 angular with lower side locking



10 A – 250 V AC – GWT 750 °C – 2-25 (3680) poles, 2-27 (3683) poles

PITCH
7.5 m



RAST 7.5 Power™ [25 A]

PITCH
5 m



RAST 2.5 Power™ [up to 10 A]

- Indirect mating
- Insulation displacement technology (IDT), AWG 14/2.5 mm²
- Up to 25 A/500 V AC

3690

RAST 7.5 Power™ connector, indirect mating, insulation displacement technology, with exterior locking



25 A – 500 V AC – 1-2 poles

3695

RAST 7.5 Power™ tab header, upright with spigot



25 A – 630 V AC – 2-4 poles

- Direct and indirect mating
- Insulation displacement technology (IDT)
- Up to 10 A/400 V AC

3570 · 357099

RAST 2.5 Power connector, direct and indirect mating, insulation displacement technology



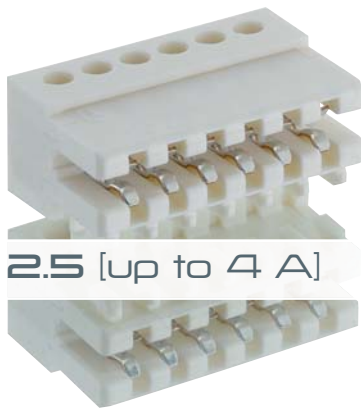
6 A (10 A indirect mated 2-5 pole) – 400 V AC – 2-10 poles

3575

RAST 2.5 Power connector, direct mating, insulation displacement technology, with/without locking on printed circuit board, with/without keying rib and closed sides



6 A – 400 V AC – 2-10 poles



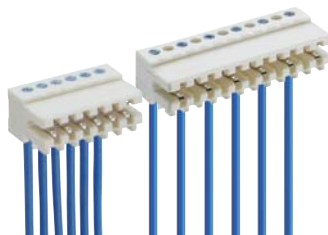
RAST 2.5 [up to 4 A]

- Direct and indirect mating
- For cable-to-board and cable-to-cable connections
- Insulation displacement technology (IDT)
- Keying to avoid mismatching, single or double-row
- For signal and load currents up to 4 A

3520–3523

RAST 2.5 connectors, direct and indirect mating, insulation displacement technology, pitch 2.5/5.0 mm

- 3521 · 3523** standard version
- 3520 · 3522** with interior locking

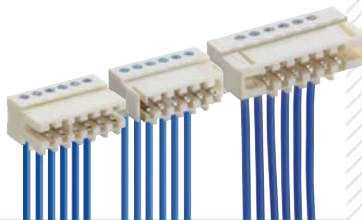


4 A – 32/250 V AC – 2-20 poles

3510–3518

RAST 2.5 connectors, direct mating, insulation displacement technology, with/without keying rib and closed sides, pitch 2.5/5.0 mm

- 3510 · 3511** standard version
- 3512 · 3513** locking by lateral locking hooks
- 3515 · 3516** locking by locking hooks
- 3517 · 3518** locking by locking toes

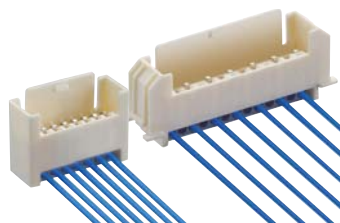


4 A – 32/250 V AC – 2-20 poles

3541–3546

RAST 2.5 (chassis) tab headers, insulation displacement technology, with locking latch, pitch 2.5/5.0 mm

- 3541 · 3542** standard version
- 3545 · 3546** for panel mounting



4 A (6 A with **3570**) – 32/250 V AC – 2-12 poles

3550–3553

RAST 2.5 pin headers, upright with spigot, pitch 2.5/5.0 mm

- 3550 · 3552** with locking latch
- 3551 · 3553** with interior locking

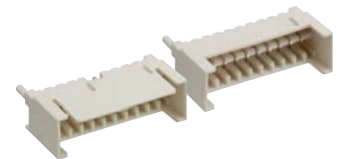


4 A – 32/250 V AC – 2-20 poles

3554–3557

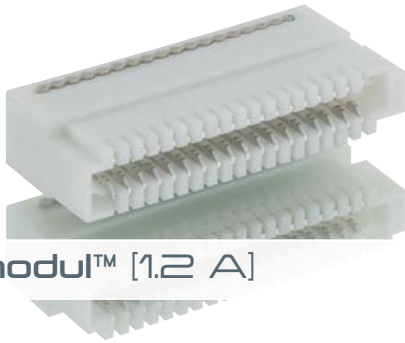
RAST 2.5 pin headers, angular, pitch 2.5/5.0 mm

- 3554 · 3556** with locking latch
- 3555 · 3557** with interior locking



4 A (**355...V167** 10 A) – 32/250 V AC – 2-20 poles

PITCH
1.27 m



Micromodul™ [1.2 A]

- Direct and indirect mating
- Ideal for space saving cable-to-board connections
- Insulation displacement technology (IDT)
- Tab headers for THT or SMT soldering
- For signal and load currents up to 1.2 A

302299

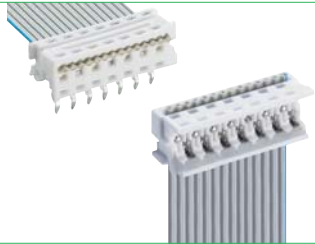
Micromodul™ connector, direct and indirect mating, insulation displacement technology, with locking on printed circuit board by means of locking hooks and toes, with closed sides



1.2 A – 125 V AC – 2-22 poles

MICAL... · MICA

Micromodul™ (solder-in) connector, indirect and indirect mating, insulation displacement technology, with locking



1.2 A – 32 V AC – 4-20 (all even) and 26 poles

MICS... · MICS/SMD

Micromodul™ tab headers, upright/angular, with/without retaining hooks and press-fit spigots

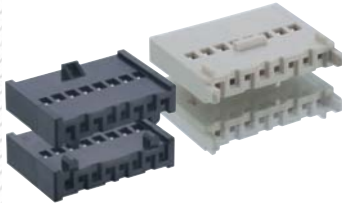


1.2 A – 32V AC – 4-20 (all even) and 26 poles



More Systems [diversity]

Minimodul™ · Multimodul™



- Pitch 2.5 mm
- For cable-to-board and board-to-board connections
- Insulation displacement and crimp technology
- For signal and low load currents up to 5 A

USB- and Modular connectors



- Data transmission rates up to 5 Gbit/s
- According to USB 2.0 and USB 3.0 specification
- For signal and low load currents up to 1.5 A/2 A

Circular connectors



- Circular connectors with threaded joint M16, IP68, AISG
- DIN circular connectors

Photovoltaics · LC4®



- Connectors with/without connecting cables
- Junction boxes
- Array harnesses
- Fuse and diode connectors

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