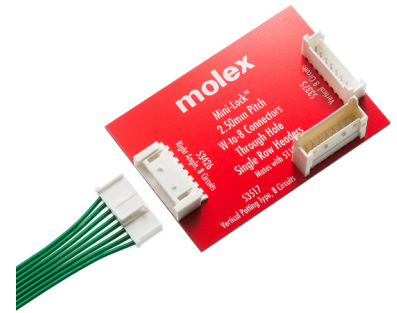


Mini-Lock Wire-to-Board Connector System

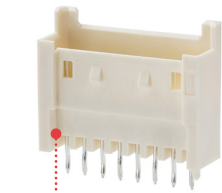
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2.50mm pitch Mini-Lock Wire-to-Board is a longtime best-selling connector system, ideal for a wide range of applications

Features and Advantages

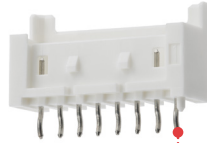


2 to 15 circuit W-to-B connectors in vertical and right-angle configurations
Offer design flexibility

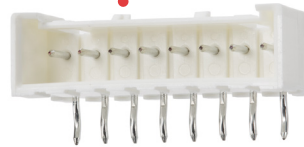


Glow wire capability certified by VDE
Offers safety and reliability

Terminal Position Assurance (TPA)
Ensures that wires are fully inserted



Locating Peg (Boss)
Mitigates the misalignment by assisting in right mount orientation

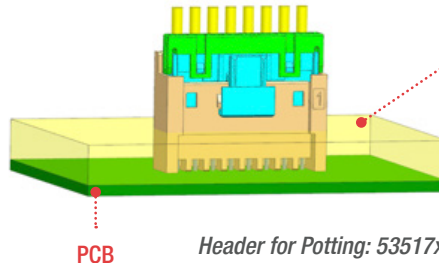


Kinked Pins
Provide secure header retention on the PCB before soldering

Potting treatment (Height 2.00 to 6.00mm)
Protects the components on PCB from dust and water



Receptacle Housing: 51163
TPA: 51164



PCB

Header for Potting: 53517xx30

Applications

Home Appliance

- Refrigerators
- Washers and dryers
- Air conditioners

Industrial

- Automation equipment
- Vending machines

Consumer

- Fitness equipment
- Gaming machines
- Security systems

Automotive

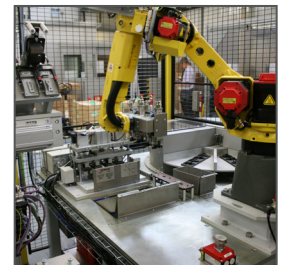
- Interior/exterior lightings
- Audio equipment
- Navigation systems



Home Appliance



Security System



Automation equipment

Mini-Lock Wire-to-Board Connector System

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Specifications

REFERENCE INFORMATION

Packaging:

Reel

50752 Crimp Terminal

Bag

51163 Receptacle Housing

51164 TPA

53375 Vertical Header

Tray

53517 Vertical Header for Potting

53426 Right Angle Header

UL File No.: E29179

CSA File No.: LR19980

Designed In: Millimeters

RoHS: Yes

Halogen Free: No

Glow Wire Compliant: Yes

(53517, 51163, 51164 only)

ELECTRICAL

Voltage (max.): 250V

Current (max.): 3.5A (20 AWG)

Contact Resistance (max.): 20 milliohms

Dielectric Withstanding Voltage: 1000V AC/ min

Insulation Resistance (min.): 1000 Megohms

MECHANICAL

Contact Insertion Force (max.): 9.8N

Contact Retention to Housing (min.): 14.7N

Mating Force (max.): 58.8N (8 circuit)

Unmating Force (min.): 7.9N (8 circuit)

Durability (max.): 30 cycles

PHYSICAL

Housing:

PBTP UL94V-0 (51163, 51164, 53375, 53426)

PA66 UL94V-0 (53517)

Contact: Phosphor Bronze

Plating: Pre-Tin

Contact Area (min.) — 0.9 micrometer

Header Pin: Phosphor Bronze

Plating: Pre-Tin

Contact Area (min.) — 1.0 micrometer

Operating Temperature: -40 to +105°C

Ordering Information

Series No.	Component	AWG or Circuits	Glow Wire Compliant
<u>50752</u>	Crimp Terminal	20 to 26 AWG	-
<u>51163</u>	Receptacle Housing	2 to 15	Yes
<u>51164</u>	TPA Retainer		
<u>53517</u>	Vertical Header for Potting		
<u>53375</u>	Vertical Header		No
<u>53426</u>	Right Angle Header		

www.molex.com/link/minilock.html

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