

1-770170-0 ✓ ACTIVE

MATE-N-LOK | Mini-Universal MATE-N-LOK

TE Internal #: 1-770170-0

PCB Mount Header, Vertical, Wire-to-Board, 3 Position, 4.14 mm [.162 in] Centerline, Fully Shrouded, Tin, Mini-Universal MATE-N-LOK

[View on TE.com >](#)



Connectors > PCB Connectors > PCB Headers & Receptacles



EU RoHS Compliance: **Compliant**

EU ELV Compliance: **Compliant**

PCB Connector Assembly Type: **PCB Mount Header**

PCB Mount Orientation: **Vertical**

Connector System: **Wire-to-Board**

## Features

### Other

EU RoHS Compliance	Compliant
EU ELV Compliance	Compliant

### Product Type Features

Mixed & Hybrid Header	No
Connector Shape	Rectangular
PCB Connector Assembly Type	PCB Mount Header
Connector System	Wire-to-Board
Header Type	Fully Shrouded
Sealable	No
Connector & Contact Terminates To	Printed Circuit Board

### Configuration Features

Connector Contact Load Condition	Fully Loaded
Number of Columns	3
Number of Loaded Positions	3



Number of Power Positions	3
---------------------------	---

PCB Mount Orientation	Vertical
-----------------------	----------

Number of Positions	3
---------------------	---

Number of Rows	1
----------------	---

### Electrical Characteristics

Operating Voltage	600 VDC
-------------------	---------

### Body Features

PCB Retention Feature Material	Nylon
--------------------------------	-------

Primary Product Color	White
-----------------------	-------

### Contact Features

Contact Underplating Material	Nickel
-------------------------------	--------

Mating Pin Diameter	1 mm [.039 in]
---------------------	----------------

Contact Underplating Material Thickness	1.27 $\mu$ m [50 $\mu$ in]
---	----------------------------

Contact Size	1mm
--------------	-----

Contact Mating Area Plating Material Thickness	3.81 – 8.89 $\mu$ m [150 – 350 $\mu$ in]
--	--

Contact Base Material	Brass
-----------------------	-------

PCB Contact Termination Area Plating Material	Tin
---	-----

Contact Mating Area Plating Material Finish	Matte
---	-------

PCB Contact Termination Area Plating Material Finish	Matte
--	-------

PCB Contact Termination Area Plating Material Thickness	3.81 – 8.89 $\mu$ m [150 – 350 $\mu$ in]
---	--

Contact Shape & Form	Round
----------------------	-------

Contact Layout	Inline
----------------	--------

Contact Mating Area Plating Material	Tin
--------------------------------------	-----

Contact Type	Pin
--------------	-----

Contact Current Rating (Max)	9.5 A
------------------------------	-------

### Termination Features

Termination Post & Tail Diameter	1 mm [.039 in]
----------------------------------	----------------

Termination Post & Tail Length	3.69 mm [.145 in]
--------------------------------	-------------------

Termination Method to PCB	Through Hole - Solder
---------------------------	-----------------------

### Mechanical Attachment

Panel Mount Feature	Without
---------------------	---------

Mating Alignment Type	Chamfered Edges
-----------------------	-----------------



PCB Mount Retention Type	Boardlock
Mating Retention Type	Locking Tab
Mating Retention	With
PCB Mount Retention	With
PCB Mount Alignment	Without
Connector Mounting Type	Board Mount
Mating Alignment	With

### Housing Features

Mating Entry Location	Top
Housing Material	Nylon
Centerline (Pitch)	4.14 mm [.162 in]

### Dimensions

Connector Width	6.35 mm [.25 in]
Connector Height	13.49 mm [.531 in]
Connector Length	17.83 mm [.702 in]
PCB Thickness (Recommended)	1.57 mm [.062 in]
Profile Height from PCB	14.25 mm [.56 in]

### Usage Conditions

Operating Temperature (Max)	105 °C [221 °F]
Operating Temperature Range	-55 – 105 °C [-67 – 221 °F]

### Operation/Application

Circuit Application	Power
---------------------	-------

### Industry Standards

Compatible With Agency/Standards Products	UL, CSA
UL Rating	Recognized
Compatible With Approved Standards Products	UL E28476
Glow Wire Rating	Standard Part - Not Glow Wire
UL Flammability Rating	UL 94V-0

### Packaging Features

Packaging Quantity	200
Packaging Method	Bag



## Product Compliance

[For compliance documentation, visit the product page on TE.com>](#)

EU RoHS Directive 2011/65/EU	Compliant
EU ELV Directive 2000/53/EC	Compliant
China RoHS 2 Directive MIIT Order No 32, 2016	No Restricted Materials Above Threshold
EU REACH Regulation (EC) No. 1907/2006	Current ECHA Candidate List: JUNE 2024 (241) Candidate List Declared Against: JUNE 2024 (241) Does not contain REACH SVHC
Halogen Content	Low Halogen - Br, Cl, F, I < 900 ppm per homogenous material. Also BFR/CFR/PVC Free
Solder Process Capability	Wave solder capable to 265°C

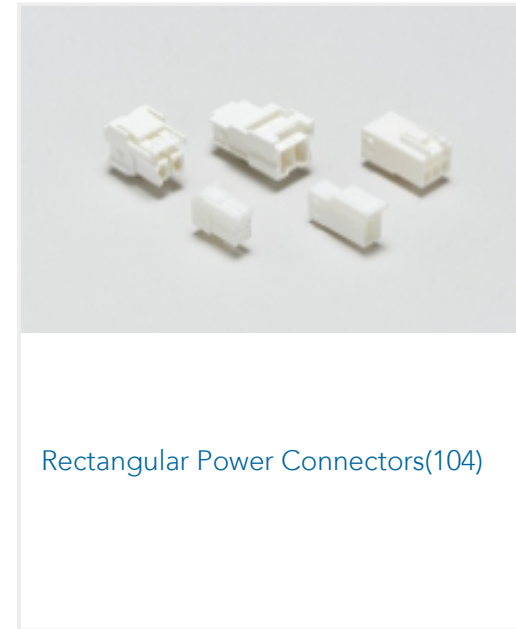
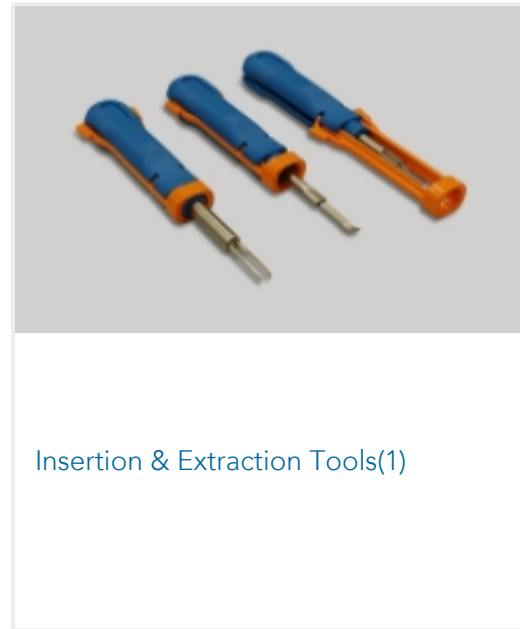
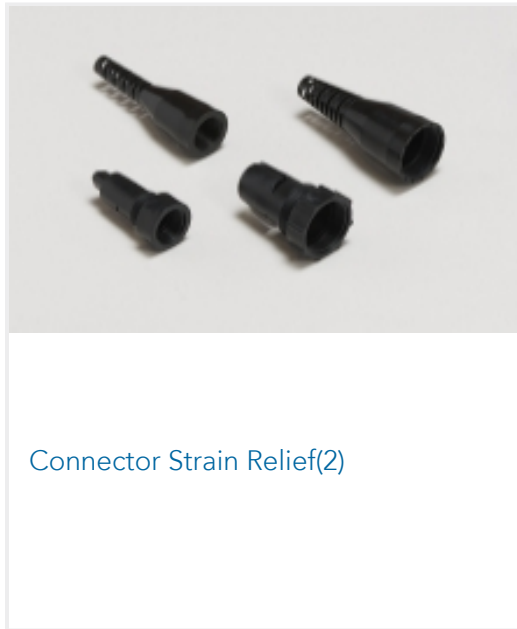
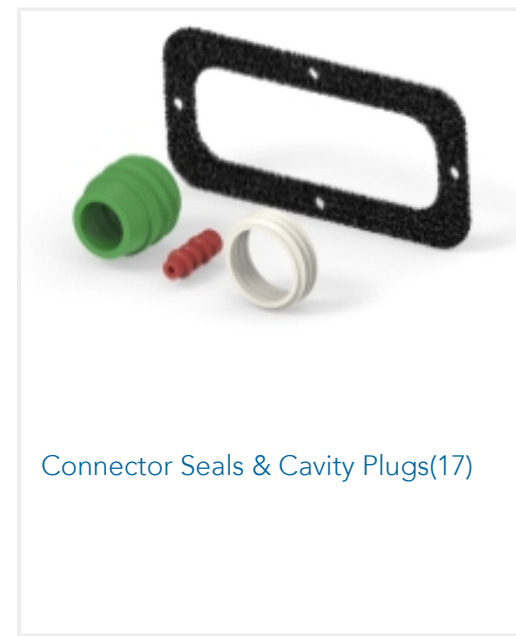
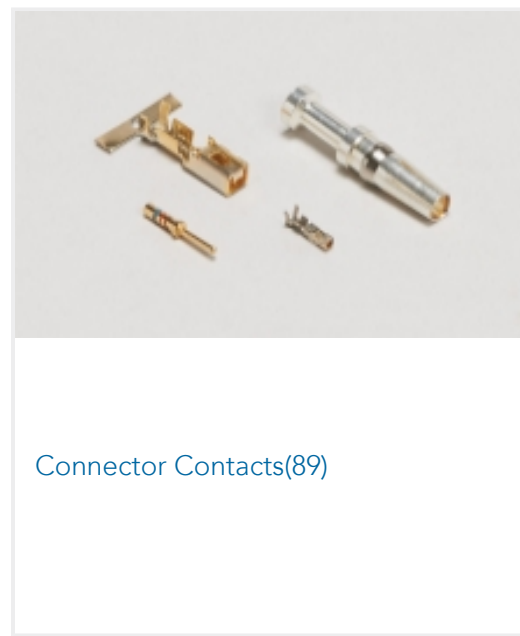
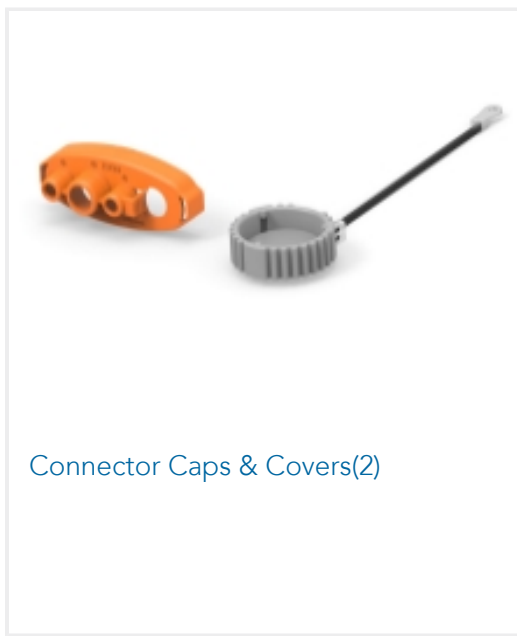
### Product Compliance Disclaimer

This information is provided based on reasonable inquiry of our suppliers and represents our current actual knowledge based on the information they provided. This information is subject to change. The part numbers that TE has identified as EU RoHS compliant have a maximum concentration of 0.1% by weight in homogenous materials for lead, hexavalent chromium, mercury, PBB, PBDE, DBP, BBP, DEHP, DIBP, and 0.01% for cadmium, or qualify for an exemption to these limits as defined in the Annexes of Directive 2011/65/EU (RoHS2). Finished electrical and electronic equipment products will be CE marked as required by Directive 2011/65/EU. Components may not be CE marked. Additionally, the part numbers that TE has identified as EU ELV compliant have a maximum concentration of 0.1% by weight in homogenous materials for lead, hexavalent chromium, and mercury, and 0.01% for cadmium, or qualify for an exemption to these limits as defined in the Annexes of Directive 2000/53/EC (ELV). Regarding the REACH Regulation, the information TE provides on SVHC in articles for this part number is based on the latest European Chemicals Agency (ECHA) 'Guidance on requirements for substances in articles' posted at this URL: <https://echa.europa.eu/guidance-documents/guidance-on-reach>

## Compatible Parts



Also in the Series | [Mini-Universal MATE-N-LOK](#)



## Customers Also Bought



## Documents



### Product Drawings

[03P MINI-UMNL ASSY VO SNNI\\*](#)

English

---

### CAD Files

[3D PDF](#)

3D

Customer View Model

[ENG\\_CVM\\_CVM\\_1-770170-0\\_N.2d\\_dxf.zip](#)

English

Customer View Model

[ENG\\_CVM\\_CVM\\_1-770170-0\\_N.3d\\_igs.zip](#)

English

Customer View Model

[ENG\\_CVM\\_CVM\\_1-770170-0\\_N.3d\\_stp.zip](#)

English

By downloading the CAD file I accept and agree to the [Terms and Conditions](#) of use.

---

### Datasheets & Catalog Pages

[SOFT\\_SHELL\\_PIN\\_AND\\_SOCKET\\_CONNECTORS\\_CATALOG](#)

English

---

### Product Specifications

[Application Specification](#)

English

---

### Instruction Sheets

[Instruction Sheet \(U.S.\)](#)

English

---

### Agency Approvals

[UL](#)

English

---