



Connectors > Circular Connectors > Standard Circular Connectors



Connector System: **Cable-to-Board**  
Connector Mounting Type: **Board Mount**  
Number of Positions: **5**  
Sealable: **No**  
Connector & Contact Terminates To: **Printed Circuit Board**

Features

Product Type Features

|                                   |                               |
|-----------------------------------|-------------------------------|
| Connector Product Type            | Connector Assembly            |
| Connector System                  | Cable-to-Board                |
| Sealable                          | No                            |
| Connector & Contact Terminates To | Printed Circuit Board         |
| Circular Connector Type           | Circular Connector Receptacle |

Configuration Features

|                     |     |
|---------------------|-----|
| Number of Positions | 5   |
| Contacts Preloaded  | Yes |

Body Features

|                          |            |
|--------------------------|------------|
| Entry Style              | Top        |
| Environmental Protection | IP65, IP67 |

Contact Features

|                              |     |
|------------------------------|-----|
| Contact Current Rating (Max) | 4 A |
| Reverse Gender               | No  |



|                                 |        |
|---------------------------------|--------|
| Circular Connector Contact Type | Socket |
|---------------------------------|--------|

Termination Features

|                           |               |
|---------------------------|---------------|
| Termination Method to PCB | Surface Mount |
|---------------------------|---------------|

Mechanical Attachment

|                         |              |
|-------------------------|--------------|
| Mating Alignment        | With         |
| PCB Mount Retention     | With         |
| PCB Mount Alignment     | With         |
| Connector Mounting Type | Board Mount  |
| Polarization Code       | B            |
| Mating Alignment Type   | Polarization |
| Mating Retention        | Without      |

Dimensions

|                 |       |
|-----------------|-------|
| Assembly Length | 17 mm |
|-----------------|-------|

Usage Conditions

|                             |                           |
|-----------------------------|---------------------------|
| Operating Temperature Range | -25 – 85 °C[-13 – 185 °F] |
|-----------------------------|---------------------------|

Operation/Application

|                     |                                 |
|---------------------|---------------------------------|
| Durability Rating   | 100 Cycles                      |
| Circuit Application | Power, Signal & High Speed Data |
| Shielded            | No                              |

Industry Standards

|                        |          |
|------------------------|----------|
| UL Flammability Rating | UL 94V-0 |
|------------------------|----------|

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 | 有害物质含量符合标准要求 No Restricted Substance(s) Above Threshold                                                                        |
| EU REACH Regulation (EC) No. 1907/2006        | Current ECHA Candidate List: FEB 2026 (253)<br>Candidate List Declared Against: JUNE 2025 (250)<br>Does not contain REACH SVHC |
| Halogen Content                               | Low Halogen - Br, Cl, F < 900 ppm per                                                                                          |



homogenous material. Also BFR/CFR/PVC Free

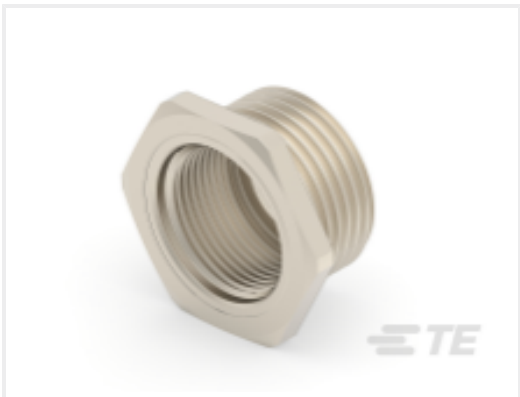
Solder Process Capability

Not reviewed for solder process capability

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



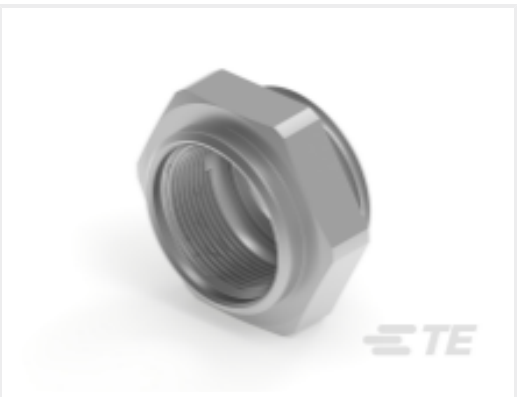
TE Part # 394847-E  
M12 METAL SHELL, FEMALE, VERT, 13MM, C6A



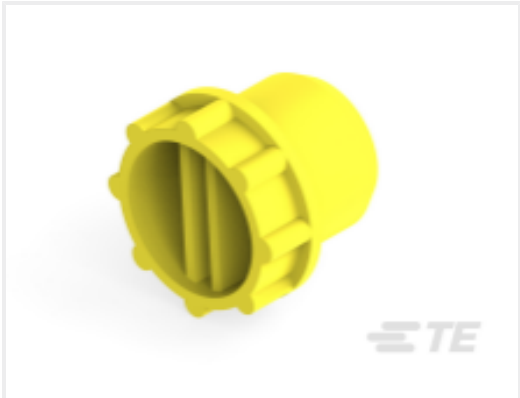
TE Part # T4113412051-000  
M12 M, 5P GOLD B\_CODE RA SHIELDED PG9



TE Part # T4111412051-000  
M12 M, 5P GOLD B\_CODE S SHIELDED PG9



TE Part # 394828-E  
M12 METAL SHELL, FEMALE, VERT, 9MM, C6A



TE Part # 374343-E  
CCA PC M12 \* F \* J 3 22553

Also in the Series | M12 Connector



Connector Hardware(11)



Connector Seals & Cavity Plugs(4)



Standard Circular Connectors(633)

Customers Also Bought



TE Part #454949-E  
M12 FEMALE, D CODE, 4P, 17MM SMT

TE Part #354179-E  
MSPEED 50 F SMDTHR F8 B AB VV 137 094 \*

TE Part #394811-E  
M12 FEMALE, X CODE, 8P, 17MM SMT, CAT6A

TE Part #354267-E  
MSPPM 5 F SMDTHR F8 B A V 137 094 \* E008

TE Part #354265-E  
MSPPM 5 F SMDTHR F6 B A V 137 094 \* E008

TE Part #454950-E  
M12 FEMALE, A CODE, 5P, 17MM SMT

TE Part #354276-E  
MSPPM 5 M SMDTHR M1 B A V 137 094 \* E008

TE Part #254206-E  
M12 FEMALE, B CODE, 5P, 17MM SMT

TE Part #5120912-1  
UPM MALE ASSEMBLY, SEQUENCED

TE Part #354269-E  
MSPPM 5 F SMDTHR F10 B A V 137 094 \* E00

Documents

Product Drawings

M12 FEMALE, B CODE, 5P, 17MM SMT

English

CAD Files

Customer View Model

ENG\_CVM\_CVM\_454951-E\_1.3d\_igs.zip

English

Customer View Model

ENG\_CVM\_CVM\_454951-E\_1.3d\_stp.zip

English

Customer View Model

ENG\_CVM\_CVM\_454951-E\_1.2d\_dxf.zip

English

3D PDF

3D

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

Datasheets & Catalog Pages



ERNI M8M12 Circular Connectors

English

ERNI M8M12 Circular Connectors

German

Product Specifications

Application Specification

English

Agency Approvals

UL

English