

High Reliability Rectangular Plastic Connector

The REP connector is a multi pole sealed rectangular plastic connector which provides a quick, reliable and easy connection in all electronic applications: Railway, Industrial, Test & Measurement, Automotive and Defense markets.

The REP connector series uses the proven Hypertac[®] Hyperboloid contact technology which guarantees excellent reliability, even under high levels of shock and vibration. The REP connector is available in 2, 6 and 12 ways and uses one contact for 24-12AWG wire gauge. The REP can also be delivered as a pre-cabled solution according to customers' specifications.

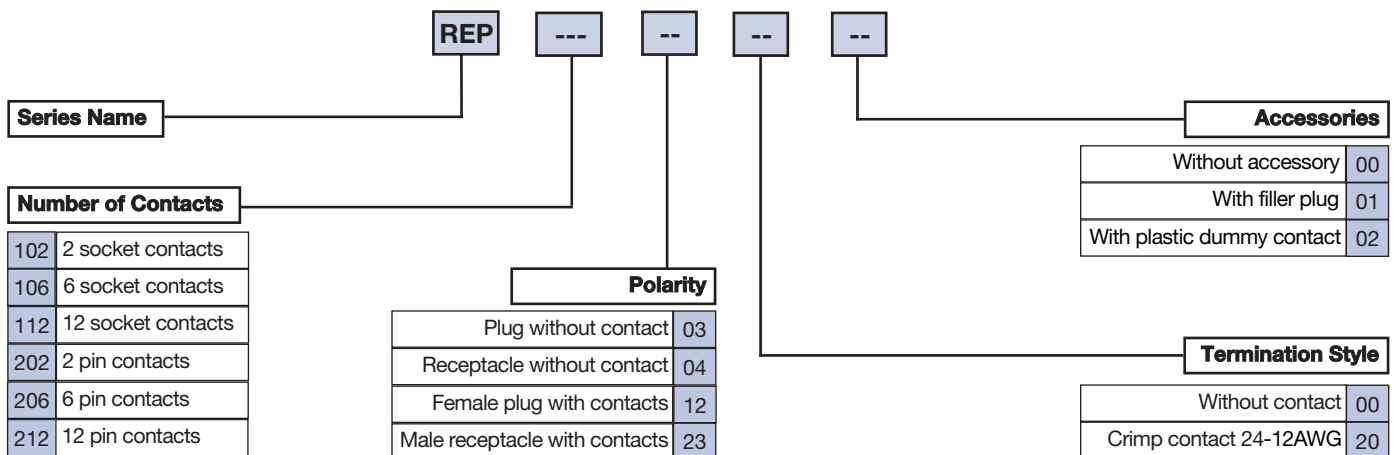
Other benefits of the REP series:

- Compliance with standards** >> UL94V0, EN 61-373, EN 50-124, NFF 61-030, NFF 16-101, NFF 16-102 (fire & smoke), materials in polycarbonate and back shell in silicone
- Cost saving** >> Only one contact for cables from size 0.50mm² to 2.5mm² (24-12AWG) according to EN 50306-2
- Ease of use** >> Polarised guides & 4 different configurations (cable to cable, clips, front and back panel mount)
- Safety** >> Plug finger proof IP2- and high withstanding voltage up to 2725V
- Long life cycle** >> 500 mating/unmating cycles: just push to mate, press & release to unmate
- Sealing** >> IP66 protection according to IEC/DIN EN 60529
- Reliability** >> Hyperboloid contact, high current rating supporting up to 13A, high level of vibrations resistance (40G, 5 hours)

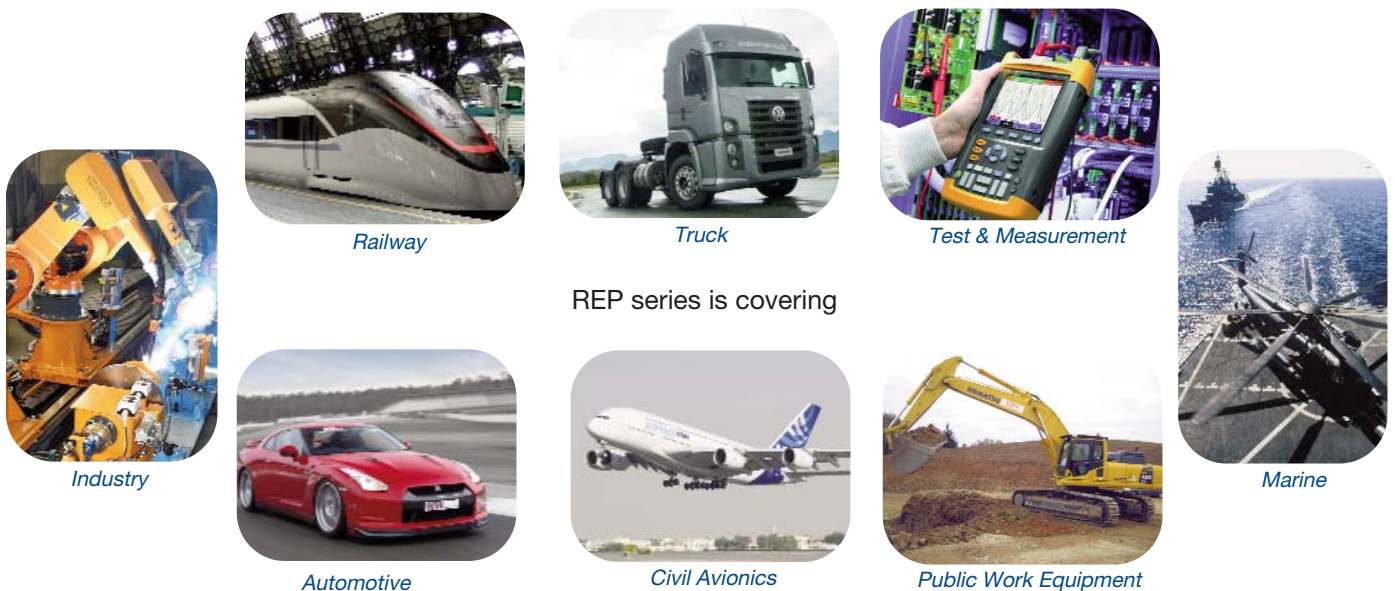
Technical Characteristics

| ELECTRICAL | | MECHANICAL & MATERIAL | |
|------------------------|---------------------------------------------------------------------------|---------------------------------|--------------------------------------------------|
| Contacts | Ø 1.5mm (size 16) | Contact retention force | > 70 N |
| Withstanding voltage | 2725V (EN-50124-1) | Mating cycles | > 500 cycles |
| Insulation resistance | ≥ 5 x 10 ³ MΩ | Coding | 3 configurations |
| Contact resistance | ≤ 2.50 mΩ | Polarisation | 180° |
| Voltage rating | 230V (EN-50124-1) pollution degree 3 > 400V with plastic dummy contact | Weight (equipped with contacts) | 2 ways: 17.3g 6 ways: 35.5g 12 ways: 62.8g |
| Current rating | 13A (compliant 18A acc. to NFF 61-030) | Insulator | Thermoplastic |
| Contact plating | gold plating | Seal & grommet | Silicone |
| ENVIRONMENTAL | | | |
| Temperature range | -40° +100°C | Salt spray | > 96 hours |
| Fire & smoke standards | NFF 16-101 & NFF 16-102 | Environmental level | IP66 , IP67 |
| Vibration resistance | EN 61-373 cat. 2 (on boggie) | | |

Ordering Information

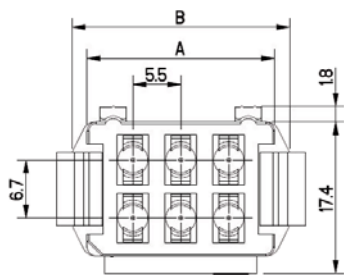
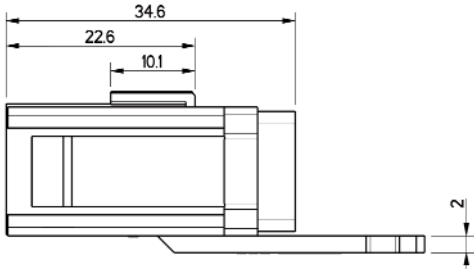


Main Applications



Drawings & Dimensions

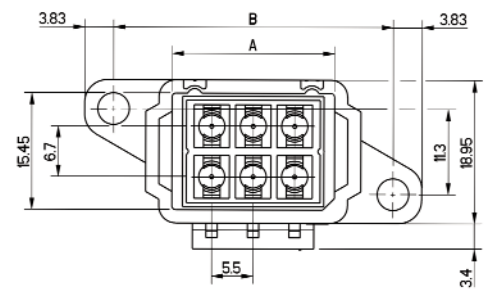
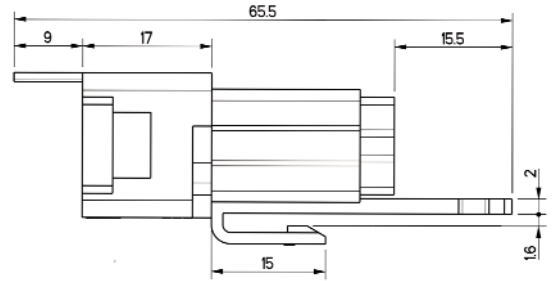
Female Plug



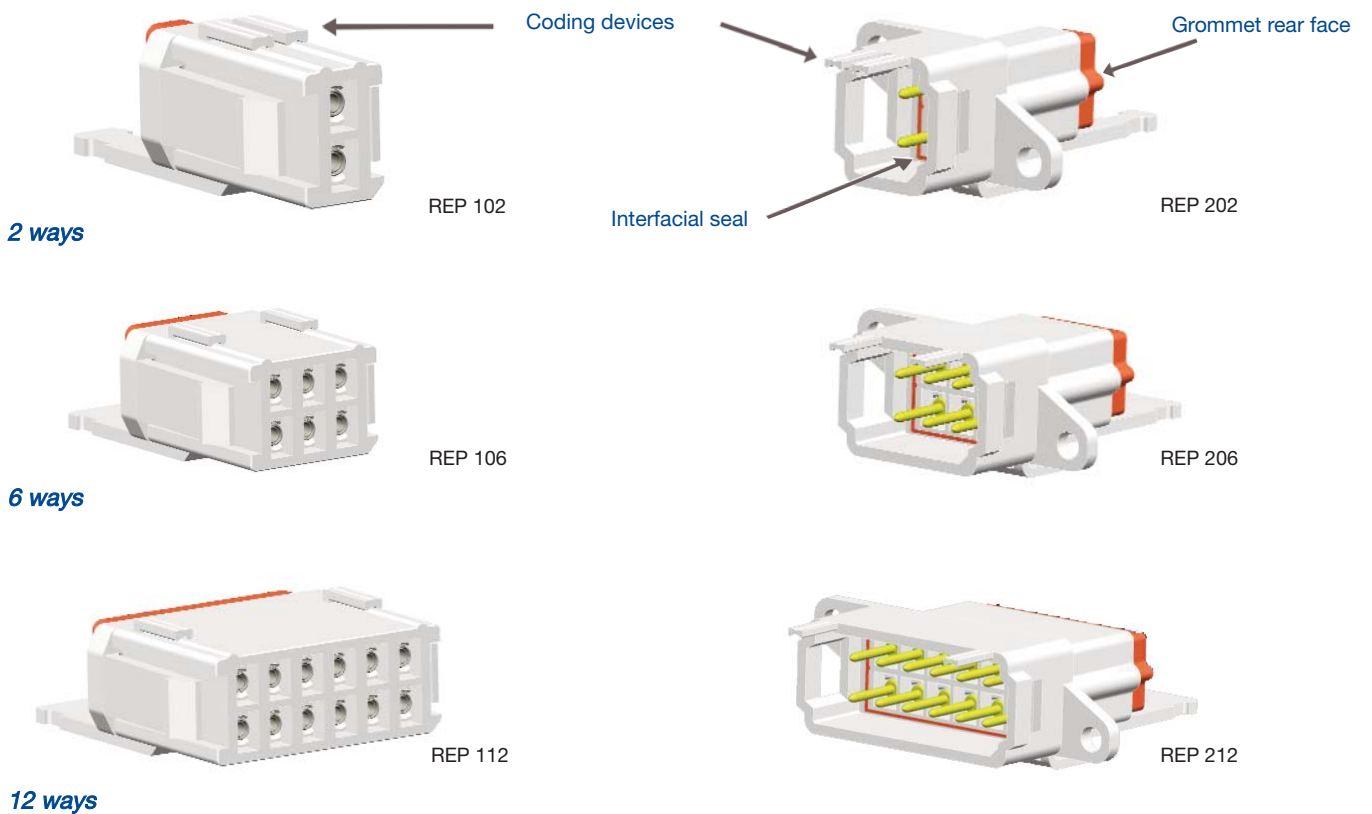
| REP 1-- | A | B |
|---------|------|------|
| REP 102 | 10.5 | 14 |
| REP 106 | 21.5 | 25 |
| REP 112 | 38 | 41.5 |

Dimensions are in mm

Male Receptacle



| REP 2-- | A | B |
|---------|-------|------|
| REP 202 | 10.65 | 26.1 |
| REP 206 | 21.65 | 37.1 |
| REP 212 | 38.15 | 53.6 |



2 ways

REP 102

Interfacial seal

REP 202

6 ways

REP 106

REP 206

12 ways

REP 112

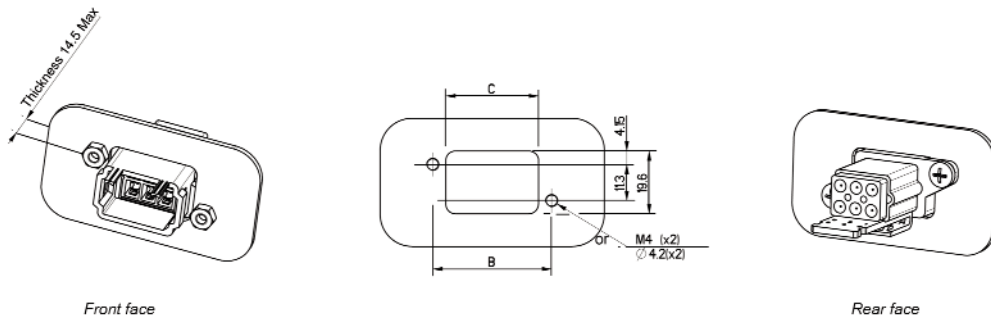
REP 212

Contacts

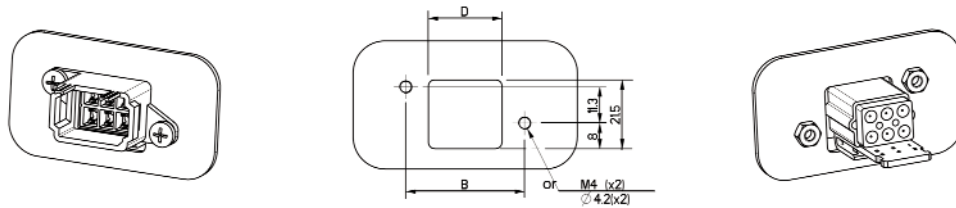
| Contacts | | | Crimping Tool | | | Extraction Tool |
|---------------|--------|-----------------|-----------------------------------------------|---------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------|
| P/N | Type | PIN dia. (size) | Crimping tool | Tool Turret | Position & Wire section | P/N |
| 0151071-20-OG | Pin | 1.5mm (16) | Astro-tool TGV 101 or Daniels FT8 | TGV 202 red or SH 463 red | 4 - 0.50mm ² to 0.60mm ² (20AWG) 5 - 0.50mm ² to 1mm ² (18AWG) 6 - 1.34mm ² to 1.50mm ² (16AWG) 7 - 1.82mm ² to 2.61mm ² (24-12AWG) | SD-0150000012 |
| 0151832-20-N1 | Socket | | | | | |

Panel Mounting

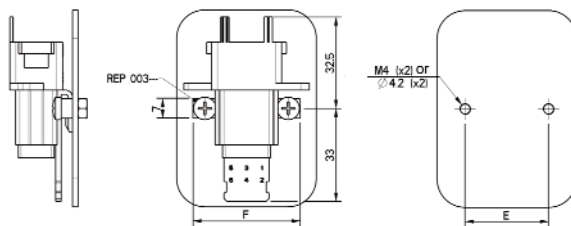
Back Panel Mount



Front Panel Mount



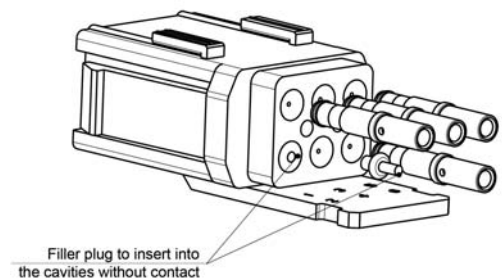
Panel Preparation detail with REP-003-xx accessory



| REP 2-- | B | C | D | E | F |
|---------|------|------|------|------|------|
| REP 202 | 26.1 | 18 | 12 | 18.7 | 27.2 |
| REP 206 | 37.1 | 29 | 23 | 29.7 | 38.2 |
| REP 212 | 53.6 | 45.5 | 39.5 | 46.2 | 54.7 |

Accessories

| P/N | Description |
|------------|----------------------------------------------|
| REP_001 | Filler plug |
| REP_002 | Plastic dummy contact to use > 400V |
| REP_003-02 | Bracket for panel mounting, 2 way connector |
| REP_003-06 | Bracket for panel mounting, 6 way connector |
| REP_003-12 | Bracket for panel mounting, 12 way connector |



More information on our website www.hypertac.com