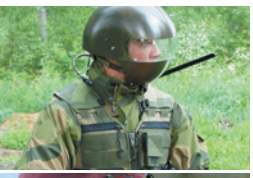
DEFENCE, SECURITY & MILITARY CONNECTORS GUIDE



LEMO®

Over 50’000 different connectors







Since its creation in Switzerland in 1946 the LEMO Group has been recognized as a global leader for circular Push-Pull connectors and connector solutions. Today LEMO and its affiliated companies, REDEL and COELVER, are active in more than 80 countries with the help of over 40 local partners.

Dedicated product range for Security, Defence and Military applications

LEMO Push-Pull electric & fibre optic connectors are used in defence, security and military applications where quick connection/disconnection, space and weight savings and high reliability are essential. LEMO connectors are rugged, highly reliable and environmentally sealed.

The modular construction uses stocked components (COTS) making it easy to select just the right solution for each specific application.

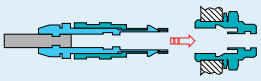
A very wide range of housings and contact types (including coaxial, triaxial, multipole, high voltage and fibre optics as well as mixed variants of all these) provides a vast range of potential options.

LEMO connectors are significantly smaller for the same performance in comparison with traditional MIL specification connectors.
This is particularly relevant with panel mounted housings, which enable dramatic reductions in size (and consequently weight) of equipment.

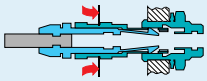


Personal Role Radio (PRR) with LEMO B Series connector. (Selex Communications Ltd, UK)

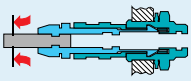
Push-Pull Self-Latching System



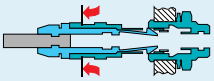
01. This self-latching system is renowned worldwide for its easy and quick mating and unmating features. It provides absolute security against vibration, shock or pull on the cable.



02. The LEMO self-latching system allows the connector to be mated by simply pushing the plug axially into the socket.



03. Once firmly latched, connection cannot be broken by pulling on the cable or any other component part other than the outer release sleeve.



04. When required, the connector is disengaged by a single axial pull on the outer release sleeve. This first disengages the latches and then withdraws the plug from the socket.

Examples of applications

Examples of existing applications are night vision goggles, weapon sight, radio and headset applications.



Police motorcycle equipped with a headset.



Personal Role Radio (PRR)
with LEMO B Series connector.
(Selex Communications Ltd, UK)



NORMANS vest with LEMO F Series connectors. (TECHNI AS, Norway)



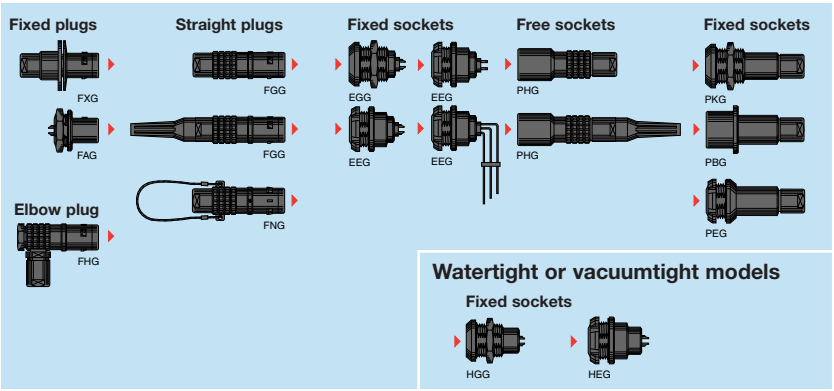
Firearms Remote Audio Terminal with K series connectors. (Sonic Communications Ltd, UK)

K Series

K series ruggedised connectors are used in a broad range of outdoor and harsh environment applications.

K series connectors include an inner sleeve and two seals to prevent penetration of solids or liquids into the connector housing.





Benefits

- Push-Pull self-latching syst. for safe connection
- safety quick release option
- 6 nominal sizes
- multiple key options to avoid cross mating
- watertight connection (IP 68/IP 66)
- 360° screening for full EMC shielding
- solder, crimp or print (straight or elbow) cont.
- cable ø 1 to 23.5 mm

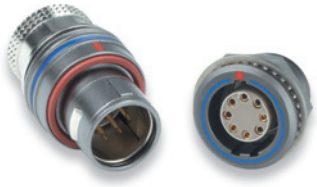
Contact types include:

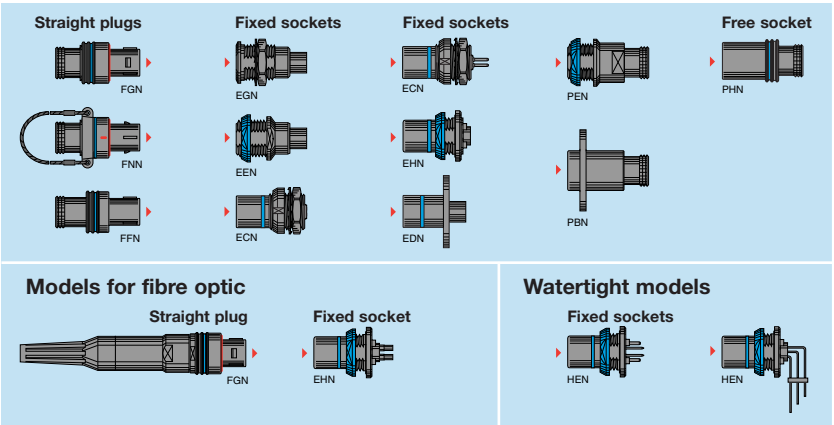
- multipole 2 to 64 contacts
- high voltage multi or mixed
- fibre optics in both singlemode and multimode multi or mixed
- coaxial multi or mixed

F Series

F series connectors were originally designed for the highly demanding environment of motorsport. They are frequently used in defense, security and military equipments.

Due to their lightweight, watertight rugged design, the F series provides excellent performances in environments exposed to vibrations and shock.





Benefits

- Push-Pull self-latching syst. for safe connection
- 7 nominal sizes
- keys ensuring ease of blind mating
- multiple key options to avoid cross mating
- watertight connection (IP 67)
- compact design
- aluminium alloy housings
- high shock and vibration resistance
- 360° screening for full EMC shielding
- colour coded key options for system security
- crimp or print contacts (straight or elbow)
- cable ø 2 to 34 mm

Contact types include:

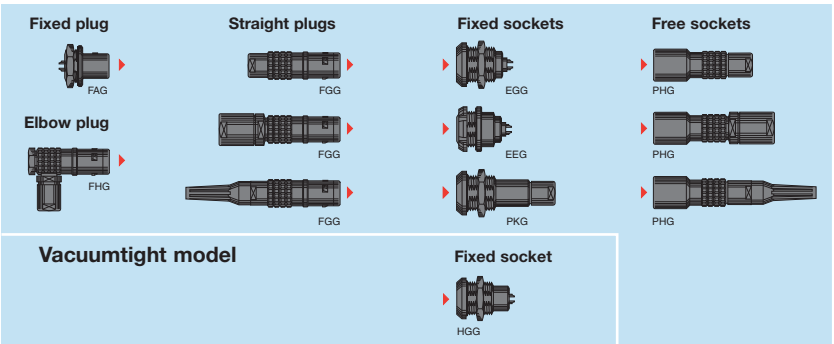
- multipole 2 to 66 contacts
- fibre optics in both singlemode and multimode
- mixed electric-optic

L Series

L series connectors have been specifically designed for outdoor extreme conditions. This series offer superior polarization combining the stepped insert (half-moon) with the keying system of the K series. L series connectors include an inner sleeve and two seals to prevent penetration of solids or liquids into the housing.







Benefits

- Push-Pull self-latching syst. for safe connection
- stepped insert (half-moon) fitted with male and female contacts
- watertight connection (IP 68/IP 66)
- solder, crimp or print (straight) contacts
- multiple key options to avoid cross mating
- 360° screening for full EMC shielding
- cable ø 1 to 10.5 mm

Contact types include:

- multipole 2 to 18 contacts
- mixed with coaxial or high voltage

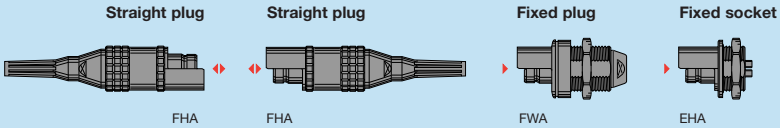
H Series

H series hermaphroditic connectors are a rugged high performance patented Push-Pull hermaphroditic interconnection system.

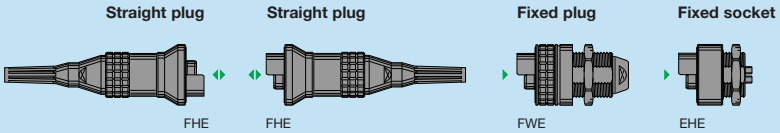
These «genderless» connectors combine LEMO's well proven Push-Pull latching technology with high performance optical or electrical contacts.



Standard version (IP 50 when mated)



Sealed version (IP 68 when mated)



Benefits

- security of patented Push-Pull hermaphroditic self-latching system
- 2 nominal sizes (S and M)
- lightweight design with shell in anthracite nickel-plated aluminium alloy
- rugged waterproof (IP 68) version for all outdoor applications
- low loss ceramic PC technology in multimode and singlemode
- cable ø 1 to 23.5 mm

Contact types include:

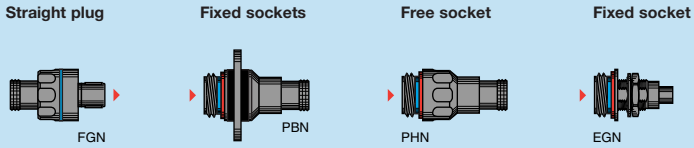
- multipole 2 to 12 contacts
- fibre optic 2, 4 or 6 fibres
- mixed of the above

M Series

The M series connectors have been designed with a secured screw coupling mechanism ensuring specially high resistance to shock and vibration.

The M Series combines high contact density with specific features of a ratchet screw coupling mechanism.





Benefits

- secured screw coupling
- watertight connection IP 68
- crimp or print contact
- keying system for connector alignment
- 360° screening for full EMC shielding
- outer shell made of strong aluminium alloy
- special socket with antivibrating flange
- cable ø 4 to 16 mm

Contact types include:

- multipole 2 to 19 contacts
- fibre optics in both singlemode and multimode
- mixed electric-optic

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