

ODU AMC: Advanced Military Connectors

Günter Rohr, Global Portfolio Manager, ODU, talks about connectors for Soldier Modernisation Programmes and Military/Security Applications around the world

Since its founding in 1942, ODU has developed and manufactured reliable connector systems for the military and security sectors.

With more than 1,300 employees around the world, ODU develops and manufactures connection systems for transmitting power, signals, data and media. The headquarters in Germany offers all technologies in one location: Design and development, tool manufacture, injection, stamping, turning, electroplating, assembly automation and cable assembly. With its persuasive implementation competence, in the last 70 years ODU has established itself globally in demanding markets such as industrial and measurement and testing technology, but also in future-oriented growth markets such as medical, military and security, automotive and energy. The high-tech company has systematically expanded its network around the world in the last 30 years. Today the ODU family includes numerous global marketing partners, as well as a total of seven subsidiaries in China, France, Romania, Scandinavia, the USA and the UK.

ODU is involved in soldier modernisation programs – worldwide. In this field connectors must meet a number of rigorous conditions including ease-of-use and reliability under the most extreme conditions. ODU connectors meet and often exceed these by providing a reliable connection under the harshest of conditions. If you are looking for an innovative, robust, secure and reliable connector solution in the military/defence area – ODU is your partner!

To meet all requirements of the future ODU developed the military connector **ODU AMC** – Advanced Military Connector.

The ODU AMC connector at a glance:

- Extremely robust and stable
- Light weight, small dimensions
- Simple to use and blind mating
- Can be used under the toughest conditions
- Excellent shielding properties (360°)
- Operating temperature: -51° C to + 125° C
- Different coding options – either mechanical or by colour
- Watertight – protection class IP 68
- 5,000 mating cycles
- System solutions, including packaging and encapsulation



These high-quality, innovative connectors are involved in many different sectors of the defence and security market, e.g. soldier communication systems, various „Soldier of the future” programmes, night vision systems, radio systems, radar systems, sonar systems for nuclear and non-nuclear submarines, weapon systems, portable navigation systems, launcher/rockets, aviation, battleships, armoured vehicles, etc.

ODU AMC – a Connection You Can Count On

ODU AMC HD – Functionality in the most compact perfection!

For the toughest demands on ruggedness, reliability and data security.

Connectors in the military sector are increasingly expected to be compact and light. The ODU AMC HD connector complies with these requirements to the highest possible degree. With a diameter of <10mm, it is compact like no other connector on the market. It nevertheless guarantees complete signal and data transfer under even the harshest conditions. The ODU AMC HD connector will now be the first choice wherever small and light connectors are used.



The ODU AMC HD – reliable connections with unique properties:

The ODU AMC HD connector is available in three different types and is equipped with mechanical coding. This makes incorrect practically impossible.



The most important facts:

- More than 5,000 mating cycles
- Watertight IP 68 protection
- Rugged housing
- Mechanical coding
- Break-away function
- High level of corrosion resistance

Available pole numbers:

- 2-contact position direct voltage charging connector (2x AWG24)
- 4-contact position USB connection (2x AWG24 / 2x AWG28)
- 7-contact position signal and power (7x AWG28)

ODU AMC Easy-Clean – Fast and Easy Cleaning Guaranteed!

Remove mud, slop or dust quick as a flash. For clean contacts and safe data transmission.

What is more important to an infantryman than to be able to act quickly during action? It is therefore necessary that all information systems are completely compatible with each other and that they meet the highest standards of quality. Light, small, robust and easily cleanable on the field. The ODU AMC Easy-Clean series meets all these requirements in an ideal manner and through a number of different configurations: The connectors are unaffected by dirt and dust. The receptacle or the plug can be cleaned depending on their configuration. The Easy-Clean connectors are available in three different sizes and in different contact arrangements:

- Size 0: 7 positions
- Size 1: 10/16 positions
- Size 1.5: 19 positions
- All solder termination.



ODU AMC – Your Right Choice for Highspeed Communication

ODU – Performing and Setting the Standards in Safe and Highspeed Data Transmission.

The secure transfer of as much data as possible in as short a time as possible is becoming increasingly important in military and security technology. The goal is the comprehensive and up-to-date provision of data anywhere at any time.

This requirement is fulfilled by the ODU AMC connector range with various models: in addition to the USB 2.0 version and the Ethernet versions with transfer rates from 100 Mbit up to 10 Gbit, ODU also offers a connector that combines USB 2.0 and Ethernet transfer.

The connector systems in the ODU AMC range are smaller and lighter than the well-known MIL housings with RJ 45 connectors.

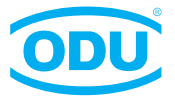
They are also extremely robust, versatile and very easy to handle. This has already been proven under realistic conditions within Soldier Modernisation Programmes. The various different models come in Push-Pull and Break-Away versions. ■



THE ODU AMC PRODUCT SERIES VARIETY:

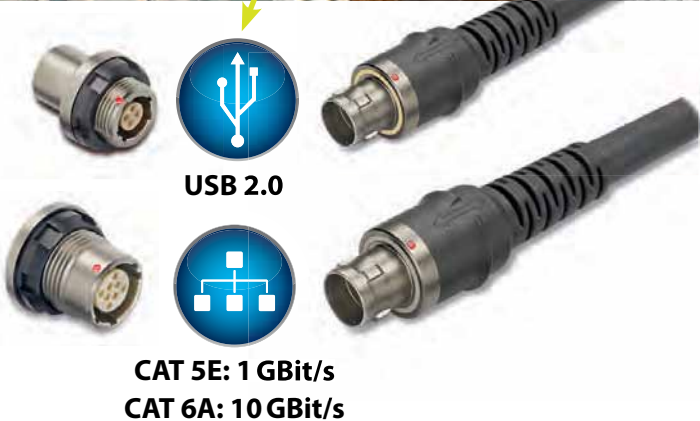


ODU AMC – Advanced Military Connectors: Your Right Choice for High-Speed Communication



A perfect alliance.

Performing and setting the standards in safe and highspeed data transmission.



- Push-Pull or Break-Away function
- Excellent 360° shielding properties
- More than 5,000 mating cycles
- Light, robust and reliable
- Watertight (IP 68)
- USB 2.0 and 1 GBit/s-Ethernet in one connector
- USB 2.0
- 100 MBit/s-Fast-Ethernet
- 1 – 10 GBit/s-Ethernet

