# MPO/MTP - A Reliable Connection

## What is MPO-MTP?

MPO-MTP stands for "Multi-Fiber Push On". The design is design is based on the MT(Mechanical transfer) ferrule. It is defiled by the Telecommunications Industry Association's (TIA)Fiber Optic Connector Intermateability (FOCIS 5) document, the TIA 604-5B Standard, and internationally by the IEC-61754-7 standard.

## Why MPO-MTP?

Data Center & FTTx system must be able to quickly perform adds, moves, and changes, as well as restorations in case of and outage. A solution for achieving quick connection is the use of multi-fiber connectors. By connecting several fibers at once, the installer or administrator saves a considerable amount of time. Since the time to connect a 12 fiber MPO-MTP connector is the same as to connect as single fiber connector (also called a discrete connector) one can make the same number of connections in roughly 1/12 th the time.

## MPO-MTP

Started MPO-MTP termination from 2004 & completed 1 million of multi mode & 0.7 million of single mode MPO-MTP termination. Also we are manufacturing large volume of MPO-MTP based FMS based on the customer specifications.

Supplying MPO-MTP based products to main communication customers in US/UK/Japan and India from 2004.   These customers are    leading supplier of passive cabling solutions for high-quality communication networks.

## Different grade MPO-MTP

| Multi mode | Select Ultra Premium-MTP | Ultra premium-MTP | Premium-MTP | Standard |
|---|---|---|---|---|
| IL | 0.2 dB | 0.35 dB | 0.60 dB | 0.75 dB |
| BR | -35 dB | -20dB | -20dB | -20dB |

| Single Mode | Select Ultra Premium-MTP | Ultra premium-MTP | Premium-MTP | Standard |
|---|---|---|---|---|
| IL | 0.35 | 0.35 dB | 0.5 dB | 0.6 dB |
| BR | -65 dB | -60 dB | -60 dB | -60 dB |

## Features

- ❖ Optimum optical performance through high quality MT ferrules
- ❖ High-density Connection with Multi-Core (Up –up-24C) Support
- ❖ Male and Female type Classification with Guide Pin
- ❖ Push-Pull type connecting for Easy & Fast Installation
- ❖ 40/100Gbps Parallel Transmission (IEEE 802.3ba) support solution
- ❖ Ferrule inspection data sheet included with all shipments
- ❖ Small form factor and high density applications
- ❖ Terminates ribbon fiber or loose individual fibers
- ❖ Designed for low loss and standard loss SM and MM applications
- ❖ Ruggedized round cable, oval cable and bare ribbon options available
- ❖ Compatible for IEC61754-7
- ❖ Color coded housings available to differentiate fiber type, polish type and/ or connector grade
- ❖ Housing is removable for quick change of pin clamps and easy ferrule cleaning / re polishing
- ❖ Alignment achieved with high precision guide pins

## Applications

- ❖ Data centre cabling infrastructure
- ❖ Backbone terminations in telecommunication rooms and main distribution rooms
- ❖ High density connection between equipment
- ❖ Horizontal distribution for FTTx application
- ❖ Gigabit Ethernet, CATV and Video
- ❖ Telecommunications Networks
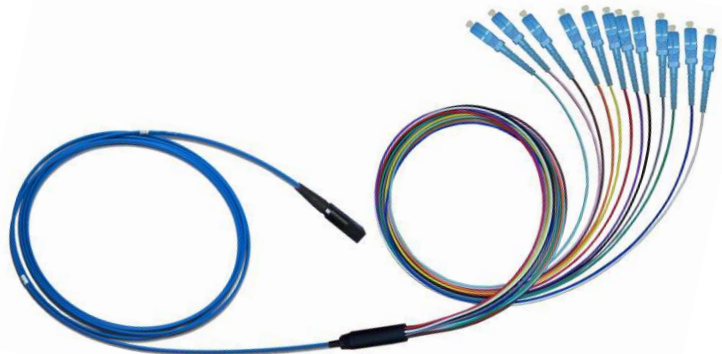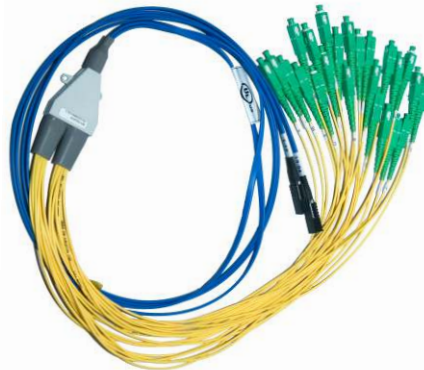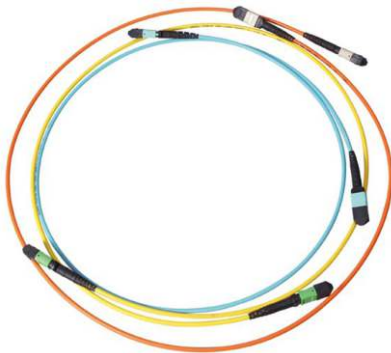- ❖ Active Device/ Transceiver Interface

# MPO-MTP Based Products

**MPO-MTP Patch cords, truck cable & PnP Panels**

## Cable Types

| Construction | Fibre types |
|---|---|
| ❊ Round Micro-fibre<br>❊ Flat Ribbon<br>❊ Armoured Cable<br>❊ MPO-MTP Break out - 250µm, 900µm, 2mm & 3mm branches | ❊ 62.5/125 (OM1)<br>❊ 50/125 (OM2)<br>❊ 50/125 (laser optimised OM3)<br>❊ 50/125 (laser optimised OM4)<br>❊ Singlemode<br>❊ Bend insensitive |

# 4 Module Solution

# 3 Module Solution

Earth Stud    Earth Label    ID Label    Frame panel

① 

Laser Warning

③    ②    ④ Blank panel

MTP Adaptor Blank    Key up key down adaptor    Six MTP Adaptor Plate

⑤

# MPO - LC High Density solution

**1U Chassis**



**2U Chassis**



# 2 MTP - 24F LC Cassette