

Mixed Fiber Expanded Beam Test Set MOFT

Harsh
Environment
Solutions

Advanced Fiber Products designs, engineers and manufactures optical, optoelectronic and specialized products for military, telecom, enterprise, industrial applications. The company is headquartered near Cambridge in the United Kingdom. The manufacturing facilities are in the United States and the UK. AFP has developed a wide variety of novel fiber connectivity products both for use in sensitive and adverse operating environments, including extreme military field environments.

Description

The MOFT ruggedized optical test set is designed for insertion loss testing of cable harnesses terminated with 'mixed mode' expanded beam connectors such as the new Mixed Fiber Optic Cable Assembly (MFOCA[®]) developed by the US Marine Corps. The MOFT combines the function of both light source and optical power meter in one common and portable box. Designed to meet tactical military demands and those of the broadcast industry. The MOFT is housed in a precisely engineered ruggedized aluminum case providing a test set perfect for field operational environments.

With simplicity of operator use in mind, the MOFT has memory capacity allowing storage and uploading of up to 2000 measurements including memory position or fiber number, wavelength (nm), absolute value or relative value and insertion loss. The tester supports memory download and test report generation through its USB port. HMA-EB test ports are presented directly on the MOFT to conveniently interface with the HMA-EB to 'reference' HMA-EB>HMA-EB launch cable provided. Two MOFT's can be combined for MFOCA[®] end to end testing by cross calibration. Alternatively the optional MOFT-V (with power meter and visible light source for fault finding), can be used with a MOFT for end to end testing. The rechargeable battery ensures long term working with minimal operation costs.



Features

- Integrated HMA-EB harsh environmental connectors for direct coupling to MFOCA[®] assemblies
- Multimode (MM) M1/M2 and singlemode (SM) S1/S2 ports for mixed fiber use
- Simultaneous testing of all 2/4 fibers
- Precision engineered light weight rugged aluminium case
- Large Internal memory storage for measurements
- Clear LED display in units: dBm, dB
- High dynamic range plus Go/No Go parameters for 300m & 1,000m MFOCA[®] assemblies
- Up to 4 wavelength combinations
- Easy to use menu navigation
- Built-in charger, battery status indicator
- Calibration status indicator



Advanced Fiber Products LLC
200 East Howard Ave, Suite 244
Des Plaines, IL, USA 60018
Tel: +1-847-768-9001
E-mail: video@afpgco.com

Advanced Fiber Products Ltd
Hollands Road Industrial Estate
Haverhill, Suffolk
England CB9 8PR

Tel: +44 (0) 1440-706441
Tel USA: +1-909-576-5854
Fax: +44 (0) 1440-762044
E-mail: sales@afpgco.com

AAdvanced
Fiber
Products

www.afpgco.com

MOFT Series Product Sheet
Rev. 15168.00

MOFT Specifications

| Light Source: | | |
|-------------------------------|--------------------------------|---|
| Output power | | Note: |
| LD 850 nm, LED 850nm, 1300 nm | -26 dBm (50/125 μ m fiber) | Typ. values |
| LD 1310nm , 1550 nm | -16 dBm (9/125 μ m fiber) | |
| Stability (1 hour, delta/2): | | Tested after 20 min warm up temperature 23 \pm 1° |
| LD 850 nm, LED 850, 1300 nm | \pm 0.03 dB | |
| LD 1310 nm, 1550 nm | \pm 0.05 dB | |

| Power Meter: | | |
|---------------------|---|-----------------------------------|
| Photodetector | 1 mm InGaAs | |
| Working wavelengths | MM: 850nm, 1300 nm SM: 1310nm, 1550 nm | Can be customized |
| Uncertainty | \pm 12% | 1310, 1550 nm @ -20 dBm |
| Resolution | 0.1 | |
| Dynamic range | -55 dBm to +10 dBm -53 dBm to +17 dBm | 1300nm, 1310nm 1550 nm, 850 nm |



Standard Accessories

- Power charging adaptor USB
- Rugged field carrying case with internal and external pockets, desert tan or forest green options
- USB data interface
- Cleaning wipes and swabs
- HMA-HMA Reference (1 meter) launch cable
- Operation/application manual (hard copy or DVD)
- 1 year service and maintenance warranty

Optional Accessories

- ST /HMA or LC /HMA adaptors
- MFOCA® Loop Back Plug
- Extended warranty (Service and maintenance)
- Calibration contract
- Operation & Application Field Training Contract

| General Specifications | | |
|------------------------|-----------|---|
| Dimensions | | 5.7 x 5.7 x 2.2 inches (145 x 145 x 56mm) |
| Weight | | 14.1 oz. (400g) |
| Temperature | Operating | -18 deg. to + 90 deg. Fahrenheit |
| Humidity | | 0 to 95% |
| IP Rating | | IP 54 |
| Battery Working Time | | > 20 Hours |

**Harsh
Environment
Solutions**



Advanced Fiber Products LLC
200 East Howard Ave, Suite 244
Des Plaines, IL, USA 60018
Tel: +1-847-768-9001
E-mail: video@afpgco.com

Advanced Fiber Products Ltd
Hollands Road Industrial Estate
Haverhill, Suffolk
England CB9 8PR

Tel: +44 (0) 1440-706441
Tel USA: +1-909-576-5854
Fax: +44 (0) 1440-762044
E-mail: sales@afpgco.com

**Advanced
Fiber
Products**

www.afpgco.com

MOFT Series Product Sheet
Rev. 15168.00

RoHS Directive Compliant. Conforms to GR-326. Flammability: UL 94 V-0 Grade

Advanced Fiber Products reserves the right to change or discontinue any product or service in this publication and advises customers to obtain the latest versions of publications before placing orders. Patents are pending. Advanced Fiber Products standard warranty conditions apply and are available upon request. Advanced Fiber Products customers using its products in life preserving applications where the reasonable malfunction of the products might be expected and may result in personal injury, agree to indemnify Advanced Fiber Products against all such improper use and any consequential damages. Advanced Fiber Products makes no representations or warranties that the products are free from patent, copyright or intellectual property rights. Standard Terms and Conditions of sale apply and are available on request