

OPM-36 SERIES PORTABLE OPTICAL POWER METER OPERATION MANUAL



1. Product Description

OPM-36 portable optical power meter is a new optical power measurement equipment which developed independently based on the functions and characteristics of the testing instruments in the current market. This equipment has the characteristics of small size, easy to operate, high accuracy and subscriber self-calibration. It is an ideal measuring equipment for optical fiber transmission network.

2. Product Features

- 7 kinds of wavelengths can be tested, high accuracy ($\leq 0.1\text{dBm}$).
- 650nm VFL can be customized
- Support USB power supply
- LED lighting, convenient to use in dark environment.
- Automatic wavelength memory function
- Data storage record function
- Self-calibration

3. Product Diagram

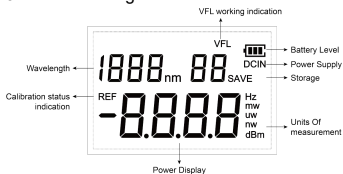


Fig 3.1 Display

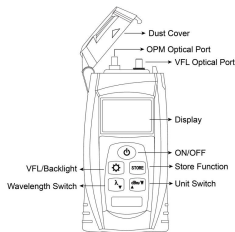


Fig 3.2 Positive

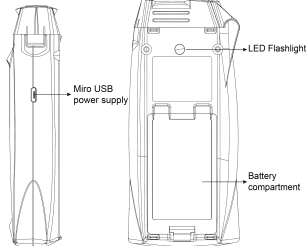


Fig 3.3 Side

Fig 3.4 Back

4. Operating Instruction

4.1 ON/OFF:

Press bottom $\text{\textcircled{P}}$ to turn on the equipment, Press and hold $\text{\textcircled{P}}$ for 1 second then release to turn off the equipment.

4.2 Using instruction of OPM:

Turn on the equipment, it will enter OPM function,

press $\text{\textcircled{\lambda}}$ to switch the wavelength, press $\text{\textcircled{uW}}$ to switch the units of measurement.

4.3 VFL Instruction:

Press and hold bottom $\text{\textcircled{\lambda}}$, the VFL is on, the indication of "VFL" on display is always on, press and hold $\text{\textcircled{\lambda}}$ again, the VFL flashing, the indication of "VFL" on the display is flashing too; Press and hold bottom $\text{\textcircled{\lambda}}$ again to turn off VFL.

4.4 LED flashlight:

Long press $\text{\textcircled{\lambda}}$ to turn on the flashlight, and long press again to turn off the flashlight.

4.5 Data storage:

Short press the key $\text{\textcircled{STORE}}$ to save the current measurement results; the storage is successful if the storage indicator flashes 3 times.

Long press $\text{\textcircled{STORE}}$ to enter storage read mode, "SAVE" indicator is on, Short press the key $\text{\textcircled{\lambda}}$ or $\text{\textcircled{\lambda}}$ to scroll up and down to check the stored records; long press $\text{\textcircled{STORE}}$ again to exit the storage read mode then the "SAVE" indicator is off.

4.6 Backlight:

Short press $\text{\textcircled{\lambda}}$, open backlight; short press $\text{\textcircled{\lambda}}$ again, turn off the backlight.

4.7 Wavelength memory function:

Memorize the test wavelength before turn off the power meter automatically.

4.8 Self-calibration:

Press and hold $\text{\textcircled{\lambda}}$, then press $\text{\textcircled{P}}$ at the same time to turn on the power meter entering the offset setting interface, the calibration status "REF" lights up on the display; short press $\text{\textcircled{\lambda}}$ or $\text{\textcircled{\lambda}}$ to adjust or set offset, short press $\text{\textcircled{P}}$ again to confirm the offset setting.

5. Technical parameters

The part of Optical power meter	
Standard wavelength (nm)	850 / 980 / 1300 / 1310、 1490 / 1550 / 1625
Probe type	InGaAs
Measuring range (dBm)	-70 ~ +6; -50 ~ +26 (default)
Inherent uncertainty	±5%
Display resolution(dB)	0.05
Net weight	87g (without battery)
Work temp (°C)	-10 ~ +50
Battery type	Dry batteries: 3 Pcs 1.5V AAA dry batteries (Note 1)
Power supply	Micro USB
Continuous working time for dry battery models	120h (independent operation of optical power meter)
Intelligent auto-shut off	Auto-shut off without operation within 10 min
Wavelength memory function	Memorize the test wavelength before turn off the power meter automatically
Measurement result storage	10 groups
Size (mm)	126*56*27
VFL (this function is customized)	
Light emitting	FP-LD

component	
Working wavelength (nm)	650±10
VFL frequency flashing function	Frequency 2Hz
Typical output power	1mw
Transmission distance	5km
VFL mode	Always on and flashing

Note 1: The dry battery type optical power meter can be charged through USB cable if the dry batteries are in low power. The dry batteries can be installed or can be removed when charging the power meter (this operation will not charge the battery).

6. Maintenance

6.1 Keep the optical connector clean.

6.2 Please put on the dust cap immediately when the meter is not in use so as to protect the optical connector clean and prevent the measurement error.

6.3 Plug in and out the optical adapter connector carefully to avoid scratches on the port.

6.4 Clean the optical adapter connector regularly. Please use a special cleaning cotton swab to wipe in the circumferential direction gently when cleaning the optical adapter connector.

6.5 This equipment need to be installed 3 pcs dry batteries, please replace the dry batteries in time when the battery power is insufficient.

7. Quality Assurance

7.1 The equipment warranty period is 12 months from the date of shipping.

Our company will promise the warranty period is valid within 12 months from the date of shipping, and make appropriate repairs or replacements if the product have quality problems during this period.

7.2 Please contact our company or local agents if the subscriber can not solve the fault in the process of using. The subscriber can not be allowed to open the case of this equipment without authorization of our company.

7.3 Our company is responsible for free maintenance or replacement the meter for quality failures caused by production. This guarantee is only applicable to the normal use of the meter and without damage or improper use.

The faults caused by the following reasons will not be included in the warranty:

A. Repair or modify the equipment without the authorization of our company.

B. Improper, negligent use or accidental damage, etc.