

# FPM-600

POWER METER



The highly versatile FPM-600 Power Meter is designed for link and system qualification.

## KEY FEATURES

High accuracy, wide dynamic range and high power measurement capability (up to 26 dBm)

Memory capacity of 1000 data items; enables data transfer to a PC via USB connection

User-configurable pass/fail thresholds with LED indicator

Over 40 calibrated wavelengths, and hold Min/Max power function

Rechargeable batteries

Error-free, time-saving test features: automatic wavelength switching, no offset nulling

Low cost of ownership: three-year warranty and recommended calibration interval

## SUITED FOR ALL NETWORK TYPES

The FPM-600 is a very powerful tool for the most demanding applications such as high-speed DWDM or CWDM network qualification.

With more than 40 calibrated wavelengths, including all CWDM wavelengths, it allows for user-defined measurement wavelengths, using the interpolation method between calibrated points. Use its Hold Min/Max Power function to measure system power burst or fluctuations.

## ERROR-FREE, TIME SAVING TEST FEATURES

When used in combination with a FLS-600 Light Source in Auto-Switching mode, the power meter automatically recognizes the wavelength in use and switches to the proper calibration parameter. At the press of a button, you can store results for all wavelengths at once.

## FTTx READY

EXFO's FPM-600 allows for the testing of passive optical networks (PONs) at 1310 nm, 1490 nm and 1550 nm, the three wavelengths recommended by the ITU-T (G.983.3) for PONs at once.

## RUGGED AND VERSATILE

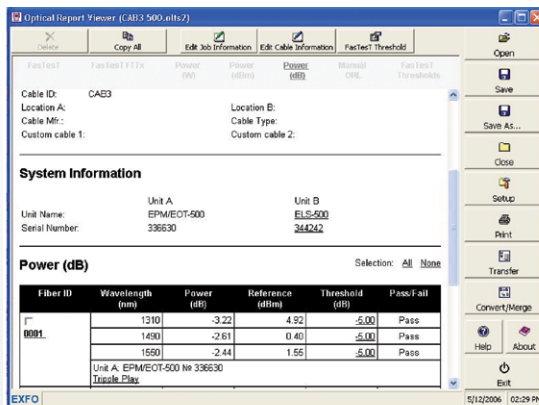
Like all EXFO portable instruments, the FPM-600 is built for top ruggedness and versatility, perfect for the harshest test conditions. It features a keypad/LCD backlight, for easy operation in darker environments. What's more, it is powered by a rechargeable battery.

## REPORTING SOFTWARE

This new software tool enables you to produce professional-looking reports with comprehensive documentation. It also offers these functionalities:

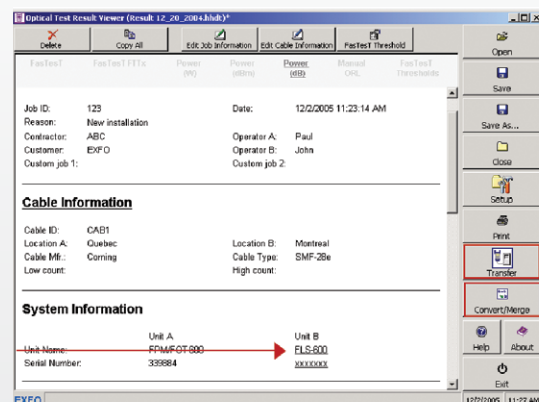
- Two test files can be merged into one test report (see note no. 3)
- Pass/fail thresholds that are active during download are automatically activated and displayed in the Report Viewer
- One-touch storage of results for all wavelengths at once (see note no. 1)
- Unit B configuration information can be input and documented (see note no. 2)
- Data transfer can be launched from the Report Viewer window (see note no. 3)
- A pass/fail threshold can be set for an individual fiber or wavelength (see note no. 4)

**1**  
Store test results  
for all wavelengths  
at once



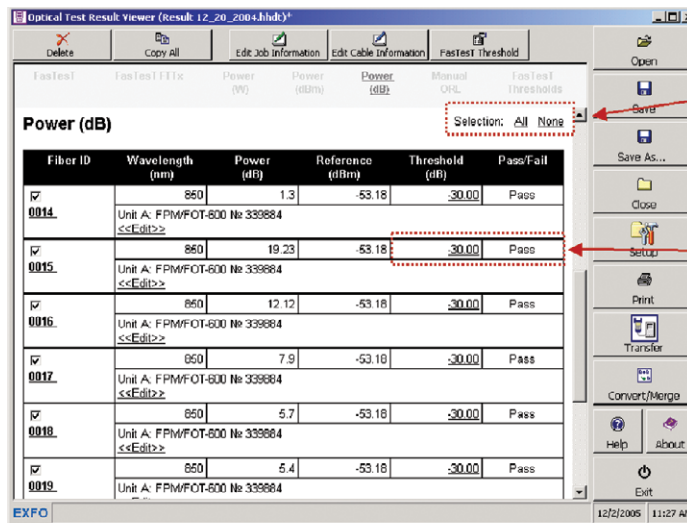
Optical Report Viewer: main window

**2** Configure unit B  
information



Optical Report Viewer: main window

**3**  
Launch  
data transfer and  
converter/merger



Select all or no results in a specific section

Apply a specific threshold to each fiber and/or wavelength and get a complete pass/fail status (not available with FasTesT results)

4

Optical Report Viewer: main window

SPECIFICATIONS <sup>a</sup>		
Model	FPM-602	FPM-602X
Detector	Ge	GeX
Power range (dBm) <sup>b</sup>	10 to -70	26 to -55
Wavelength range (nm)	800 to 1650	800 to 1650
Calibrated wavelengths (nm)	800, 820, 830, 840, 850, 860, 870, 880, 910, 980, 1270, 1280, 1290, 1300, 1310, 1320, 1330, 1340, 1350, 1370, 1390, 1410, 1430, 1450, 1460, 1470, 1480, 1490, 1500, 1510, 1520, 1530, 1540, 1550, 1560, 1570, 1580, 1590, 1600, 1610, 1620, 1630, 1640, 1650	Same calibrated wavelengths as the FPM-602, plus 1060
Power uncertainty <sup>c</sup>	±5 % ± 0.1 nW	±5 % ± 3 nW
Resolution (dB)	±0.01 (10 dBm to -60 dBm)	±0.01 (26 dBm to -45 dBm)
Automatic offset nulling <sup>d</sup>	Yes	Yes
Display units	dB, dBm, W	dB, dBm, W
Tone detection	270 Hz, 1 kHz and 2 kHz	270 Hz, 1 kHz and 2 kHz
Auto-switching <sup>e</sup>	Yes	Yes
Warm-up period (min) <sup>f</sup>	0	0
Data storage (items)	More than 1000	More than 1000
Battery life (hours) (typical)	72	72
Warranty and recommended recalibration interval (years)	3	3

**Notes**

- a. Guaranteed unless otherwise specified. All specifications valid at 1550 nm and 23 °C ± 1 °C, with an FC connector.
- b. In CW mode; sensitivity defined as 6 x rms noise level.
- c. For calibrated wavelengths. Valid up to 20 dBm for FPM-602X.
- d. For power > -40 dBm for FPM-602, and > -25 dBm for FPM-602X.
- e. At 850 nm, 1300 nm, 1310 nm, 1490 nm, 1550 nm and 1650 nm; for power > -50 dBm for FPM-602 and > -40 dBm (typical) for FPM-602X.
- f. For a variation of ≤ 0.06 dB at power levels ≥ -40 dBm for FPM-602 and ≥ -25 dBm for FPM-602X.

## STANDARD ACCESSORIES

User guide, Certificate of Calibration, instrument stickers in six languages, AC adapter/charger, lithium ion battery, shoulder strap, carrying case, USB cable.

## GENERAL SPECIFICATIONS

Size (H x W x D)	190 mm x 100 mm x 55 mm	(7 1/2 in x 4 in x 2 1/8 in)
Weight (with battery)	0.48 kg (1.1 lb)	
Temperature	operating	-10 °C to 50 °C (14 °F to 122 °F)
	storage	-40 °C to 70 °C (-40 °F to 158 °F)
Relative humidity	0 % to 95 % noncondensing	

## LASER SAFETY



## ORDERING INFORMATION

### FPM-60X-XX

#### Model

FPM-602 = Ge detector  
FPM-602X = High-power Ge detector

#### Connector adapter

FOA-12 = Biconic  
FOA-14 = D4, D4: PC  
FOA-16 = SMA/905, SMA-906  
FOA-22 = FC/PC, FC/SPC, FC/UPC, FC/APC, NEC-D3  
FOA-28 = DIN 47256 (LSA), DIN 47256 (PC/APC)  
FOA-32 = ST/PC, ST/SPC, ST/UPC  
FOA-40 = Diamond HMS-0HFS-3 (3.5 mm)  
FOA-54 = SC/PC, SC/SPC, SC/UPC, SC/APC  
FOA-76 = FSMA HMS-10/AG, HFS-10/AG  
FOA-78 = Radial EC  
FOA-84 = Diamond HMS-10, HFS-13  
FOA-96B = E-2000  
FOA-98 = LC  
FOA-99 = MU

Example: FPM-602X-FOA-22

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