

PocketMonitor

Compact Laser Power Meter

- fast and convenient
- easy handling
- practical design



PocketMonitor ready for measurement (Model 30p)

The PocketMonitor is a mobile, easy to use laser power meter, that has consequently been developed for everyday application in production. Emphasis was laid on a compact design and fast, trouble-free use. The electronics is protected against impact, shock and dampness by a solid aluminium housing. When the housing is closed, the absorber protects the operational elements. Thus, a transportation package is not necessary.

The microprocessor controlled electronics measures the temperature of the absorber and calculates the power of the laser beam with a resolution of one watt. With a resolution that high, measurements can be carried out in a very wide power range with constant accuracy. The big $4\frac{1}{2}$ digit display optionally indicates the laser power or the temperature of the absorber. Power is supplied by a built-in lithium cell for approximately 30,000 measurements.

In the unlikely case of damage to the absorber it can be replaced at its joint. An optional electronic interface for data exchange is available.

Technical Data:

Power range: 10 W to 12 kW (depending on the size of the absorber)

Display: 4 ½ digit LCD

Resolution: 1 W (PMT 120 icu) - 0.01 W (PMT 002p)

Dynamics: 20 bit A/D converter Exposure time: 10 or 20 seconds

Life span: extremely long, approximately 30,000 measurements

Seven different PocketMonitors are available for corresponding power ranges.

The PocketMonitor70icu with a cone made of copper is designed to withstand very high power densities.

Description	Power range	Geometry	Weight
PocketMonitor 002p	1 W-20 W	nlano	520 a
•	=	plane	530 g
PocketMonitor 01p	5 W-100 W	plane	535 g
PocketMonitor 05p	25 W - 500 W	plane	560 g
PocketMonitor 30p	150 W - 3.000 W	plane	670 g
PocketMonitor 60p	300 W - 6.000 W	plane	940 g
PocketMonitor 70icu	350 W - 7.000 W	conical	1.110g
PocketMonitor 120icu	500 W - 12.000 W	conical	1.550 g

In measuring position (open), the device is 279mm long. The diameter of the absorber is 79 mm. Accuracy of the PocketMonitor is \pm 4% of the measured value in the range of 10% to 100% of the maximum value. An optional electronic interface is available.

Power density often can be as important for the choice of a PocketMonitor model as the maximum laser power is. Especially the PMT 70icu and the PMT 120icu have an outstanding capacity for high power densities. With these two types, even measurements at $5 \, \text{kW/cm}^2$ at $5 \, \text{kW}$ optical power are possible. We will be glad to assist you in your choice of the right PocketMonitor for your application.



PocketMonitor, housing closed



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