

OPTICAL INSTRUMENTS SERIES

User's Guide to the **PROLITE-30B**

Optical Fiber Identifier



v1.0

0 DG0185 (02/12/2014)

Introduction



The **PROLITE-30B** optical fiber identifier is an inexpensive, portable instrument designed to identify optical test tones and live traffic without disconnecting live system. By simply clamping the **PROLITE-30B** onto a fiber, the instrument will indicate if there is a signal, or traffic and show the signal direction. It can detect a variety of optical tones, 270 Hz, 1 kHz and 2 kHz.

The **PROLITE-30B** is recommended for both 0.25 mm bare fiber, 0.9 mm tightly buffered fiber and 2/3 mm jacket fiber. When testing jacket fibers, the slim design of the **PROLITE-30B** allows easier access to a splice tray where the amount of workspace is limited. The clamping trigger is designed to fit the natural motion of the operator's hand. The instrument is ruggedly constructed and reliable to use.

Specifications

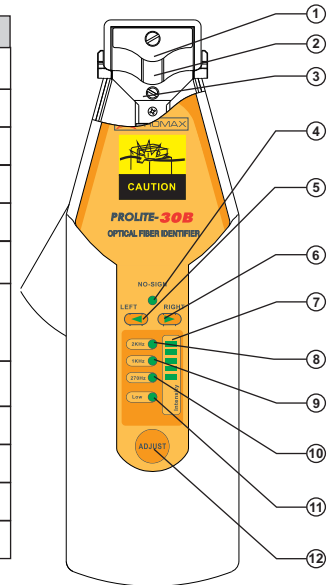
Model	PROLITE-30B
Recognizable Wavelength Range	900 nm - 1650 nm
Recognizable Signal Type	CW, 270 Hz $\pm 5\%$, 1 kHz $\pm 5\%$, 2 kHz $\pm 5\%$
Detector Type	InGaAs
Available Plunger	H 0.25 for bare fibers H 0.9 for tightly buffered fibers H3.0 for jacket fibers
Detecting Sensitivity	≤ -50 dBm
Power	2 x 1.5 V AA batteries

Sensitivity (Minimum recognizable optical power intensity in the fiber)	1310 nm (typical)	1550 nm (typical)
Continuous Wave	-20 dBm	-30 dBm
2 kHz Modulated Wave Detection	-10 dBm	-18 dBm
1 kHz Modulated Wave Detection	-10 dBm	-18 dBm
270 Hz Modulated Wave Detection	-10 dBm	-18 dBm

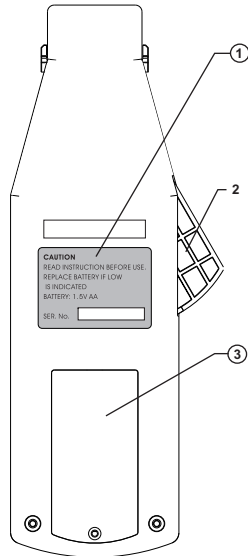
Operation Temperature	-10 °C ~ +50 °C
Storage Temperature	-20 °C ~ +70 °C
Size (HxWxD)	3.6 cm x 6.2 cm x 20.2 cm
Weight	0.27 kg

Front (Panel Board)

No.	Key / Indicator	Description
1	Plunger	Three available types: H0.25 mm, H0.9 mm, H3.0 mm.
2	Fiber Groove	A slot to place tested fiber.
3	PD Headstock	
4	No Signal Indicator	Lights up if there is not a signal in tested fiber.
5	Left Traffic Indicator	Lights up if the signal in tested fiber is from right to left.
6	Right Traffic Indicator	Lights up if the signal in tested fiber is from left to right.
7	Signal Intensity Indicator	To show the signal intensity level. The higher, the stronger.
8	2 kHz Indicator	Lights up if the wave frequency is 2 kHz.
9	1 kHz Indicator	Lights up if the wave frequency is 1 kHz.
10	270 Hz Indicator	Lights up if the wave frequency is 270 Hz.
11	Low Battery Indicator	Lights up when there is not enough power.
12	Adjusting Key	Self-calibrates.



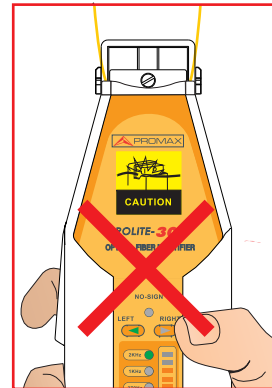
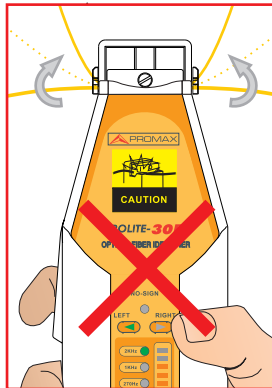
Back & Side



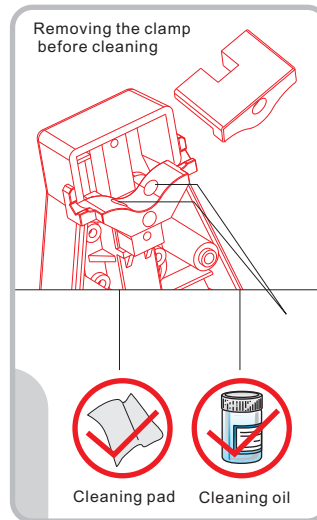
1	Serial Number
2	Clamping Trigger
3	Battery Plate

Maintenance

1. All the specifications of **PROLITE-30B** series are tested with cleaned Corning SMF-28TM/SMF-D pure non-dispersion coated fiber. The testing performance will be affected when using different brands or types of fibers with various coating color.
2. Please do not bend the fiber excessively; which may lead to misjudgment on traffic or even breaking the fiber.



3. Keep the optical receiver clean and use cleaning oil when testing bare fiber to achieve the best performance.
4. To clean the optical assembly, remove the clamp and gently clean the prism and optical windows using cleaning pads and cleaning oil. Do not immerse the plunger assembly in alcohol.





PROMAX ELECTRONICA, S. L.

Francesc Moragas, 71-75
08907 L'HOSPITALET DE LLOBREGAT (Barcelona)
SPAIN

Tel.: 93 184 77 00 * Tel. Intl.: (+34) 93 184 77 02

Fax: 93 338 11 26 * Fax Intl.: (+34) 93 338 11 26

<http://www.promaxelectronics.com>

e-mail: promax@promaxelectronics.com