



ORL 3B Optical Return Loss Test Set

The ORL 3B is a handheld fiber optic test and measurement instrument that offers two modes of testing. It performs optical return loss measurements (ORL mode) and operates as an optical power meter (OPM mode).

The ORL 3B can store up to 1000 records (40 files) in any combination of its two operating modes. With the supplied PC software, saved test results can be transferred to a PC for storage, printing, and analysis. The ORL3B operates from an internal rechargeable Lithium-Ion battery pack or external AC power adapter.

specifications

ORL specifications	ORL3-MM	ORL3-3B	ORL3-4B
Calibrated wavelengths (nm)	850, 1300	1310, 1550	1310, 1550
Output power (dBm)	-20	-5	-5
Emitter type	LED	Laser	Laser
Safety class	Class 1 (IEC 60825 - 1)	Class 1 (FDA 21 CFR 1040.10 and 1040.11, and IEC 60825-1)	
ORL dynamic range (dB)	40	65	65
Measurement units	dB, dBm, μ W	dB, dBm, μ W	dB, dBm, μ W
Available connector types	ASC	ASC	ASC
OPM specifications			
Calibrated wavelengths (nm)	850, 1300, 1310, 1550		
Detector type	InGaAs	InGaAs	InGaAs
Measurement range (dBm)	+6 to -70	+6 to -70	+26 to -50
Resolution	0.01 dB		
Accuracy @ -10 dBm @ 25°C	\pm 0.25 dB		
Measurement units	dB, dBm, μ W		
general specifications			
Display type	128 X 64 dot matrix liquid crystal display, w/LED backlight		
Dimensions, without boot (H x W x D)	19.5 X 10.1 X 5.7 cm (7.67 X 3.97 X 2.25 in)		
Weight, without boot	0.907 kg (2 lbs.)		
Operating temperature	0 to +50°C, 90% RH (non-condensing)		
Storage temperature	-20 to +60°C, 95% RH		
Power	Lithium-Ion or AC Adapter		
Battery life (typ.)	32 hours		
Li-Ion battery pack charging temp.	-10 to +45°C		

features

- Provides 850/1300 or 1310/1550 nm Return Loss and OPM testing
- Store up to 1000 records
- Field portable
- Battery operated
- Lightweight
- Includes accessories
- Includes WinTest software

applications

- Measure polish quality of connectors
- Verify link ORL for Gigabit Ethernet
- Measure insertion loss for cable acceptance/certification
- Verify output levels

Note: Li-Ion battery pack charging time will increase by 25% at a temperature below -5°C.

Important: Do not charge the Li-Ion battery pack at a temperature above +45°C.

ordering information

The ORL 3B test set includes: ORL 3B instrument, WinTEST software and manual, AC adapter/charger, serial cable, (1) APC/UPC optical reference cable, (1) adapter cap, hex screwdriver, user's guide, and carry case.