

# optical fault locator

# FR2

## Description

The Wilcom FR2 Fiber Ranger Fault Locator is a rugged, lightweight, hand-held, easy-to-use optical fault locator for multimode and singlemode applications. Using OTDR (Optical Time Domain Reflectometer) technology, the FR2 is designed to pinpoint faults in optical cable, that can be over 20 kilometers away, with amazing accuracy. The FR2 operates at the industry standard wavelength of 1310nm, and can display the distance to the fault in meters or feet.

Useful applications for the FR2 include testing: Wide Area Networks (WANs), telecommunication spans of up to 20 kilometers, Fiber-to-the-Curb, installation and maintenance of multimode and singlemode fiber cabling, and Military systems. The FR2 is an excellent tool for locating faulty connectors, end-of-fiber, and breaks in multimode and singlemode fiber cable.

The FR2 has been designed with the user in mind with easy to use features. It has a large easy to read LCD display, and a *single* measure push-button for activating the unit's measure operation. The Index of Refraction (**IOR**) is user selectable with a *single* push-button. The FR2 will display the distance to an event (fault) in either feet or meters. The FR2 has the ability to detect up to seven multiple events with the push of a single button.



## Features and Benefits

### ✓ Multiple Events

*The FR2 Fiber Ranger has the ability to measure up to seven events. Each event can be displayed in feet or meters.*

### ✓ Singlemode and Multimode Operation

*Time and cost savings with one unit which can be used for singlemode and multimode fiber cable testing.*

### ✓ Single Key Operation

*Ease of operation is provided for by single key entry. Easy to use and easy to operate. No tedious learning curve as associated with mini-OTDRs.*

### ✓ Economical

*The FR2 is a fraction of the size, weight, and cost of a mini-OTDR.*

### ✓ Battery Operated for Field Use

*Don't get stuck away from the truck with a dead laser; your AA batteries last longer, and our low battery annunciator is an early warning system that gives you plenty of time.*

### ✓ Hand-Held

*The FR2 is a light weight, hand-held, rugged optical fault locator, with a large easy to read LCD display.*

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## Specification

Optical Connection:	Single Port
Emitter type:	Laser
Emitter Classification:	Class I (FDA 21 CFR and IEC 825 )
Wavelength:	1310 nm
Emitter Fiber Type:	Multimode & Singlemode
Index of Refraction:	1.40 - 1.69
Time base & Computational Accuracy:	± 2m
IOR Error:	.001 IOR error = .67m/Km
Minimum Distance Measured:	30m
Maximum Distance Measured:	20Km
Minimum detectable signal @10Km:	-49 dB
Number of events detected:	7
Operating temperature:	-10 to +50°C
Storage temperature:	-20 to +60°C
Battery type:	4 AA Alkaline
Battery life (Alkaline):	>13,000 operations
Dimension:	7.7 x 4.0 x 1.7 in. (195 x 100 x 45) mm
Weight (w/ battery):	0.9lbs (440)g
Connector Type:	ST, FC, or SC



## Warranty

The Wilcom FR2 Fiber Ranger is warranted for a period of one year to be free of defects in material and workmanship.

## ISO-9001 Registered

ST is a trademark of AT&T.

## Ordering Information

<u>Model No.</u>	<u>Part No.</u>
*FR2- w/ STPC style connector	30000202
*FR2- w/ FCPC style connector	30000201
*FR2- w/ SCPC style connector	30000203

**\*Note:** Soft carrying case included

**Patent:** Pending

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Specifications and prices are subject to change without notice. 7/00, 812-652-003



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