

# FI-7000 FiberInspector™ Pro

**Video Probe** 

# **Getting Started Guide**

The FI-7000 FiberInspector™ video probe lets you see dirt, scratches, and other defects that can cause unsatisfactory performance or failures in fiber optic networks.

# **Accessing the Product Manuals**

This guide provides basic information to help you get started using the tester. For more detailed information, see the latest versions of the *Versiv Users Manual* and the *Versiv Technical Reference Handbook* provided on the Fluke Networks website.

# **Symbols**

$\triangle$	Warning or Caution: Risk of damage or destruction to equipment or software. See explanations in the manuals.
A	Warning: Risk of fire, electric shock, or personal injury.
<u>X</u>	Do not put products containing circuit boards into the garbage. Dispose of circuit boards in accordance with local regulations.
C€	Conformite Europeene. Conforms to the requirements of the European Union and the European Free Trade Association (EFTA).
<b>®</b> Us	Listed by the Canadian Standards Association.
	Conforms to relevant Australian standards.
<b>C</b>	Conforms to relevant Russian standards.
	KCC-REM-FKN-012001001: EMC approval for Korea
	Class A Equipment (Industrial Broadcasting & Communication Equipment)
	This product meets requirements for industrial (Class A) electromagnetic wave equipment and the seller or user should take notice of it. This equipment is intended for use in business environments and is not to be used in homes.
0	This key turns the Product on and off.

# ∧ Safety Information

### **⚠** Warning **⚠**

To prevent possible fire, electric shock, or personal injury:

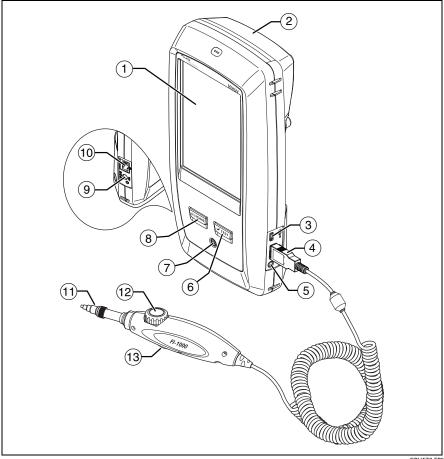
- Read all safety information before you use the Product.
- Carefully read all instructions.
- Do not open the case. You cannot repair or replace parts in the case.
- Do not modify the Product.
- Use only replacement parts that are approved by Fluke Networks.
- Do not use the Product around explosive gas, vapor, or in damp or wet environments.
- Use this Product indoors only.
- Use the Product only as specified, or the protection supplied by the Product can be compromised.
- Do not use and disable the Product if it is damaged.
- Do not use the Product if it operates incorrectly.
- Batteries contain hazardous chemicals that can cause burns or explode. If exposure to chemicals occurs, clean with water and get medical aid.
- Remove the batteries if the Product is not used for an extended period of time, or if stored in temperatures above 50 °C. If the batteries are not removed, battery leakage can damage the Product.
- The performance of rechargeable batteries typically goes down to 80% of the specified performance after 2 years of frequent use.
  Frequent use is when you discharge the battery completely and recharge it every day. Fluke Networks recommends that you replace frequently-used rechargeable batteries every 2 years.
- The performance of rechargeable batteries typically goes down to 80% of the specified performance after 5 years of moderate use. Moderate use is when you discharge the battery completely and recharge it twice each week. Fluke Networks recommends that you replace moderately-used rechargeable battery every 5 years.
- Typical battery life is 8 hours. If your battery life goes down by 20% or more, then replace the battery the next time you send the tester to a service center for service or calibration.
- If the rechargeable battery is hot when you charge it (>50 °C (>122 °F)), disconnect the charger and move product or battery to a cool, nonflammable location. Recycle the battery according to local regulations and return the product for service as applicable.

- The battery door must be closed and locked before you operate the Product.
- Repair the Product before use if the battery leaks.
- Recharge the batteries when the low battery indicator shows to prevent incorrect measurements.
- Do not disassemble or crush battery cells and battery packs.
- Do not put battery cells and battery packs near heat or fire. Do not put in sunlight.
- Have an approved technician repair the Product.
- For Products with rechargeable batteries, use only AC adapters approved by Fluke Networks for use with the Product to supply power to the Product and charge the battery.

### **^** Caution

To prevent damage to the Product or cables under test and to prevent data loss, read all safety information given in all documentation supplied with the Product.

### Connectors, Keys, and LEDs



GPU173.EPS

Figure 1. Connectors, Keys, and LEDs

- 1) LCD display with touchscreen.
- 2 Blank module included with the FI-7000 kit. Keep the module installed to give protection to the module connectors.
- Micro-AB USB port: This USB port lets you connect the tester to a PC so you can upload test results to the PC and install software updates in the tester.
- 4 Type A USB port: This USB host port lets you save test results on a USB flash drive, connect the FI-1000 video probe to the tester, or connect a Wi-Fi adapter for access to Fluke Networks cloud services.
- 5 Headset jack.
- (6) TEST: Starts a test. To start a test, you can also tap TEST on the display.
- 7 Power key.
- 8 Саномы: Press Саномы to go to the home screen.

- (9) Connector for the ac adapter.
- (10) RJ45 connector: Lets you connect to a network for access to Fluke Networks cloud services.
- (11) Removable tip for different types of connectors.
- (12) Dial for focus adjustment.
- (13) The button starts the FiberInspector test and switches the probe between still and live modes.

# How to Do a FiberInspector Test

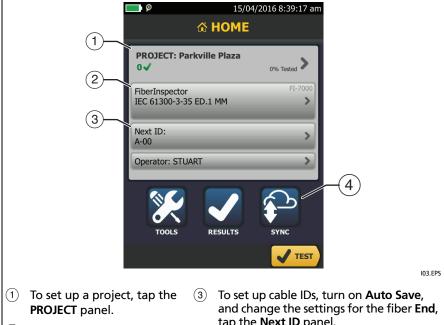
#### 1. Power the Tester

Charge the battery if necessary. Connect the ac adapter to ac power and to the adapter connector (9) shown in Figure 1. You can use the tester while the battery charges.

#### 2. Connect the FI-1000 Probe

With the tester off, connect the probe to the type A USB port on the side of the tester. Then turn on the tester. Figure 2 shows the home screen for a FiberInspector test.

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- (2) To change settings for the test, tap the test setup panel.
- tap the **Next ID** panel.
- To upload results to LinkWare Live, tap SYNC.

Figure 2. Panels on the Home Screen

### 3. Install the Correct Tip on the Probe

See Figure 3.

#### 4. Clean the Connector

Use proper cleaning procedures to clean the connector you will inspect.

### 5. Do the FiberInspector Test

To start the test, press the button on the probe, tap **TEST**, or press **TEST**. To adjust the focus, turn the dial on the probe.

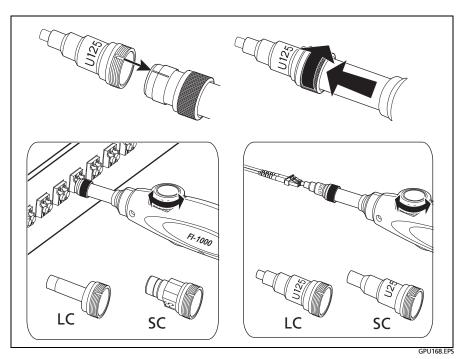


Figure 3. How to Use the FI-1000 Probe

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#### 6. Examine the Results

See Figure 4:

- Manual limit selected (default): To give a PASS or FAIL grade to the image, tap GRADE.
- (2) Test limit selected: To see an analysis of the defects, tap ANALYZE. The tester uses the selected test limit to give scratches and defects a PASS (green highlight) or FAIL (red highlight) grade.

### **⚠** Caution

If a defect is possibly a dirt particle, clean the endface and do the inspection again. You must remove all loose particles because they can move into the core when you make connections.

#### 7. Save the Results

- 7-1 Tap SAVE.
- 7-2 If the Cable ID box shows the correct ID, tap SAVE.

To enter a cable ID, tap the Cable ID box on the SAVE RESULT screen, use the keyboard to enter a name for the results, tap DONE, then tap SAVE.

The tester saves the results in the **DEFAULT** project, unless you selected a different project.

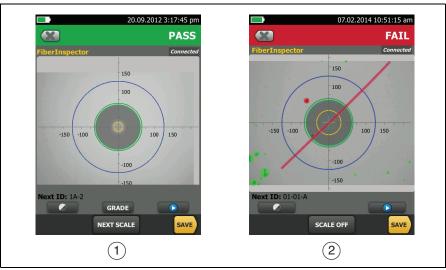


Figure 4. Examples of FiberInspector Results Screens

IO2 FPS

### **About Projects**

You can set up a project to specify the settings and tests necessary for a job, monitor the status of a job, and organize the test results.

To start a new project, tap **PROJECT** on the home screen, tap **CHANGE PROJECT**, then tap **NEW PROJECT**. See the Users Manual or Technical Reference Handbook for more information.

### **About Fluke Networks Cloud Services**

With a Fluke Networks web account and a wired or wireless network connection, you can use the LinkWare Live web application to store and manage projects in the cloud. Go to <a href="https://www.linkwarelive.com/signin">https://www.linkwarelive.com/signin</a> or see the Users Manual or Technical Reference Handbook for more information.

### Registration

Registering your product with Fluke Networks gives you access to valuable information on product updates, troubleshooting tips, and other support services.

To register, use LinkWare PC software. Download LinkWare PC from the Fluke Networks website.

### **Contact Fluke Networks**



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Fluke Networks operates in more than 50 countries worldwide. For more contact information, go to our website.

# **General Specifications**

Battery Type	Lithium-ion
Temperature	Operating: -18 °C to +45 °C Storage: -30 °C to +60 °C
Altitude	Operating: 4,000 m (3,200 m with AC adapter) Storage: 12,000 m