

# ESD Glove Test Fixture Installation, Operation and Maintenance



Made in the  
United States of America



Figure 1. EMIT 50755 ESD Glove Test Fixture

## Description

The EMIT 50755 ESD Glove Test Fixture is designed to be used with the SmartLog Pro®, Combo Tester X3, and Combo Tester X3 Plus to test operators that wear ESD gloves or finger cots per Compliance Verification required by ESD TR53. The Test Fixture is made with a stainless steel electrode that creates a larger test surface area allowing the path-to-ground of the operator wearing gloves or finger cots to be measured. An infrared sensor activates the ESD Glove Test Fixture when the operator grips the electrode and overrides the test switch on the personnel tester.

ESD Control Programs which include measures to prevent Charge Device Model (CDM) ESD damage will often require the use of finger cots or Static Dissipative Gloves. Operators handling ESD sensitive items wearing gloves or finger cots should be tested using a wrist strap or footwear tester while wearing the gloves or finger cots. The test is in accordance with Compliance Verification ESD TR53.

The ESD Glove Test Fixture is compatible with the following items:

Desco	19270	Combo Tester X3
Desco	19271	Combo Tester X3 with Stand
Desco	19287	Combo Tester X3 with 10mm Adapter
Desco	19288	Combo Tester X3 with Stand and 10mm Adapter
Desco	19265	Combo Tester X3 Plus
EMIT	50774	Combo Tester X3 with Turnstile, 120VAC
EMIT	50775	Combo Tester X3 with Turnstile, 220VAC
EMIT	50779	Combo Tester X3 with Turnstile, 100VAC
EMIT	50780	SmartLog Pro®
EMIT	50781	SmartLog Pro® with Turnstile, 120VAC
EMIT	50782	SmartLog Pro® with Turnstile, 220VAC
EMIT	50721	SmartLog Pro® with Motorized Turnstile, 100-120VAC
EMIT	50722	SmartLog Pro® with Motorized Turnstile, 220VAC
EMIT	50723	SmartLog Pro® with Turnstile, 100VAC

## Packaging

- 1 ESD Glove Test Fixture
- 1 Communication Cable
- 2 Mounting Screws

## Installation

### SmartLog Pro® & Combo Tester X3 Plus

1. Mount the ESD Glove Test Fixture next to the tester using its mounting tabs located at the top and bottom.
2. Connect the included communication cable to the jack located at the bottom of the ESD Glove Test Fixture.
3. Connect the other end of the communication cable to the ESD Glove Test Fixture port located on the back of the tester. No power adapter is needed for the ESD Glove Test Fixture. It will draw its power from the tester.

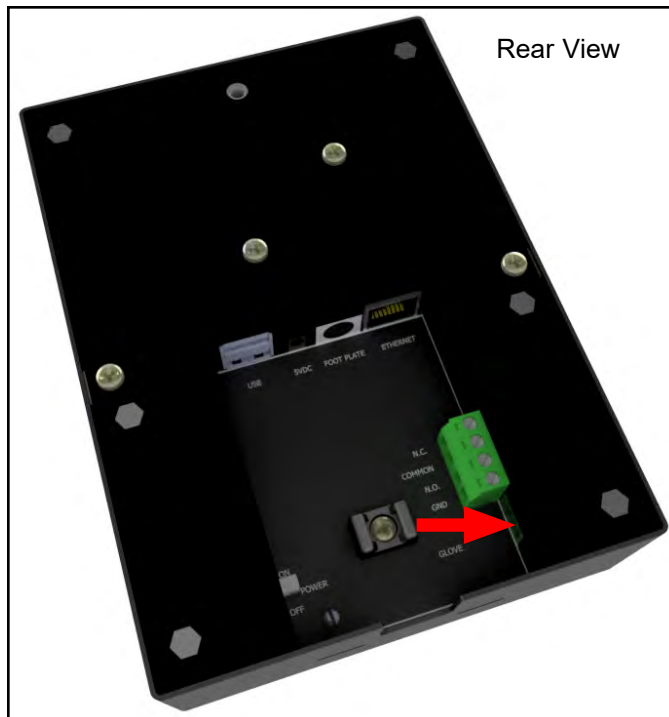


Figure 2. Locating the ESD Glove Test Fixture port on the SmartLog Pro® and Combo Tester X3 Plus

### Combo Tester X3

1. Mount the ESD Glove Test Fixture next to the Combo Tester X3 using its mounting tabs located at the top and bottom.
2. Connect the included communication cable to the jack located at the bottom of the ESD Glove Test Fixture.
3. Connect the other end of the communication cable to the External Reader port located on the bottom of the Combo Tester X3. No power adapter is needed for the ESD Glove Test Fixture. It will draw its power from the tester.

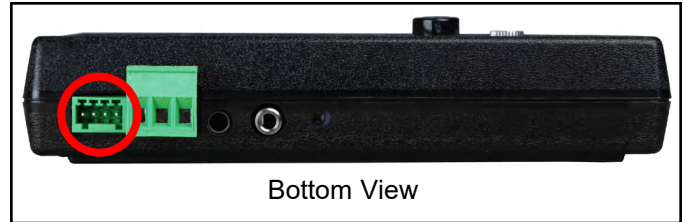


Figure 3. Locating the External Reader port on the Combo Tester X3

## Operation

### SmartLog Pro® & Combo Tester X3 Plus

1. A circling light around the test switch indicates when the tester is on standby and ready to perform a test.
2. Initiate the test procedure by identifying yourself to the SmartLog Pro®. This may be done using the touchscreen keypad, barcode scanner or proximity reader.

NOTE: Hold the proximity badge in front of the RFID icon for a full second if using proximity badges. See Figure 4.



Figure 4. Holding a proximity badge in front of the RFID icon on the SmartLog Pro®

3. Follow the prompt on the tester's display.
4. When performing a footwear test, be sure to place both feet on the dual foot plate (one foot per plate).

NOTE: Keep the foot plate clean with 99% isopropyl alcohol when using the 1 Gigohm high test limit. A dirty foot plate could yield a false pass.

When performing a wrist strap\* test, be sure to completely plug in the wrist cord into the tester's jack.

5. To begin the test, grab the ESD Glove Test Fixture's electrode. The blue standby LED will become solid to indicate that the test has been initiated. Hold the electrode until the test results are displayed on the touchscreen.

If the electrode is released too early, the tester's blue LEDs will blink three times to indicate that the test was not completed. DO NOT touch any other metal while performing your test as this will affect your results.

- The relay terminal will activate if the defined tests are passed (if applicable).

\*The SmartLog Pro® and Combo Tester X3 Plus may also be used to test smocks or garments that feature a grounding mechanism for operators using a coiled cord connection.



Figure 5. Using the ESD Glove Test Fixture with the SmartLog Pro®

### Combo Tester X3

- A circling light around the test switch indicates when the Combo Tester X3 is on standby and ready to perform a test.
- When performing a footwear test, be sure to place both feet on the dual foot plate (one foot per plate).

NOTE: Keep the foot plate clean with 99% isopropyl alcohol when using the 1 Gigohm high test limit. A dirty foot plate could yield a false pass.

When performing a wrist strap test, be sure to completely plug in the wrist cord into the tester's jack.

- To begin the test, grab the ESD Glove Test Fixture's electrode. The blue standby LED will become solid to indicate that the test has been initiated. Hold the electrode until the test results are displayed on the touchscreen.

If the electrode is released too early, the tester's blue LEDs will blink three times to indicate that the test was not completed. DO NOT touch any other metal while performing your test as this will affect your results.

- The relay terminal will activate if the defined tests are passed (if applicable).



Figure 6. Using the ESD Glove Test Fixture with the Combo Tester X3

### Specifications

Operating Voltage	12 VDC
Operating Temperature	41 to 85°F (5 to 30°C)
Environmental Requirements	Indoor use only at altitudes less than 6500 ft. (2 km) Maximum relative humidity of 80% up to 85°F (30°C) decreasing linearly to 50% @ 85°F (30°C)
Dimensions	8.3" L x 4.0" W x 3.2" H (210 mm x 102 mm x 81 mm)
Weight	0.9 lbs. (0.4 kg)
Communication Cable Length	2 ft. (610 mm)
Country of Origin	United States of America

### Limited Warranty, Warranty Exclusions, Limit of Liability and RMA Request Instructions

See the EMIT Warranty - [DescoEMIT.com/Warranty.aspx](https://DescoEMIT.com/Warranty.aspx)