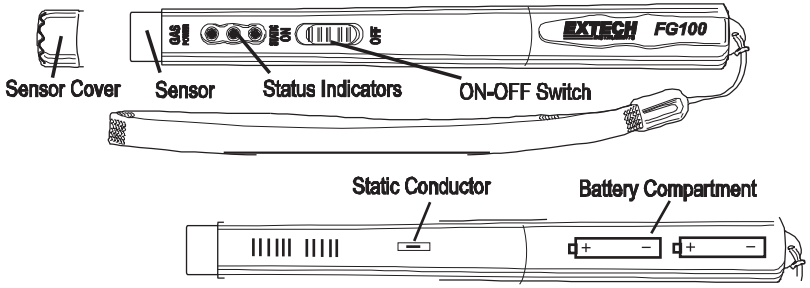
Gas Leak Detector

EXTECH INSTRUMENTS

Congratulations on your purchase of the Extech FG100 Gas Leak Detector. The FG100 detects the presence of propane or natural gases. Careful use of this detector will provide years of reliable service.

Description



Specifications

Measurement ranges	Propane: 500 to 6500 ppm; Natural gas: 1000 to 6500 ppm
Power	2 x 'AAA' 1.5V batteries; 200mA consumption; 4 hour battery life
Operating conditions	50 to 122°F (10 to 50°C); < 95% RH non-condensing
Storage conditions	41 to 131°F (5 to 55°C); < 95% RH (non condensing)
Dimensions	7.1" Length; 0.8": diameter" (180mm length; 21mm diameter)
Weight	1.6 oz (46g)

Application

This device can be used to detect gas leaks from small liquid gas containers such as camping cartridges, lighters, soldering torches, etc. This device is not suitable for continuous operation, industrial use, or complex systems such as heaters and ovens.

Safety

- Do not get the sensor wet. Avoid extreme dampness
- Do not expose the device to high temperature, high humidity, or strong vibration
- Avoid mechanical stress to the device. Do not touch the sensor
- Clean with a soft, dry cloth or brush. Do not use liquid, abrasives, solvents, etc.

Battery Installation/Replacement

When the status indicators fail to light with the ON-OFF switch in the ON position, replace the two (2) 'AAA' batteries. Slide the battery compartment cover off (rear of the detector) to access the batteries. Replace the batteries observing polarity and close the compartment. Remove the batteries if the detector is to be stored for long periods of time.

Operation

Static Electricity

The metal conductor protruding from the back of the detector is used for static tests. Before detecting a leak (and at a safe distance from the testing area), touch the conductor with one hand and, at the same time with the other hand, touch an earth grounded metal object such as a heater or cold water pipe. If the user is statically discharged, the yellow indicator will light for a short period. If there are strong charges present, gas detection measurements should not be taken since discharges could ignite leaking gas.

Leak Detection

1. Remove the protective sensor cap.
2. Slide the ON/OFF switch to the ON position. The Red indicator will light and the audible tone will sound for a short period of time and then the Green indicator will light.
3. Perform the static electricity test.
4. Trace the sensor around the source of the suspected leak.

Indicators

- Yellow — used for static electricity tests.
- Red — lights when gas is detected (along with an audible beep).
- Green — lights in clean ambient air

When Gas is Detected

When a leak is detected, the red indicator will light and an audible tone will sound. Open all doors and windows. Avoid open fire and sparks, leave the room, and do not operate any electrical switches (light switches, etc.). If possible, turn off the gas supply. When the concentration of gas falls below detectable limits, the red indicator and audible tone will no longer activate when tests are taken. Note that false alarms are possible due to the presence of aerosol sprays, tobacco smoke, etc.

Testing the Gas Leak Detector

Hold a gas lighter close to the sensor and allow the unlit lighter to leak a small amount of gas. If the detector is working correctly, the red indicator will light and the audible tone will sound. If the light and sound do not activate, the batteries may be weak or the unit is defective.

Note on Liquefied Gases

Liquefied gases are heavier than air and therefore settle on the floor. For this reason, the highest concentration of gas is close to the ground.