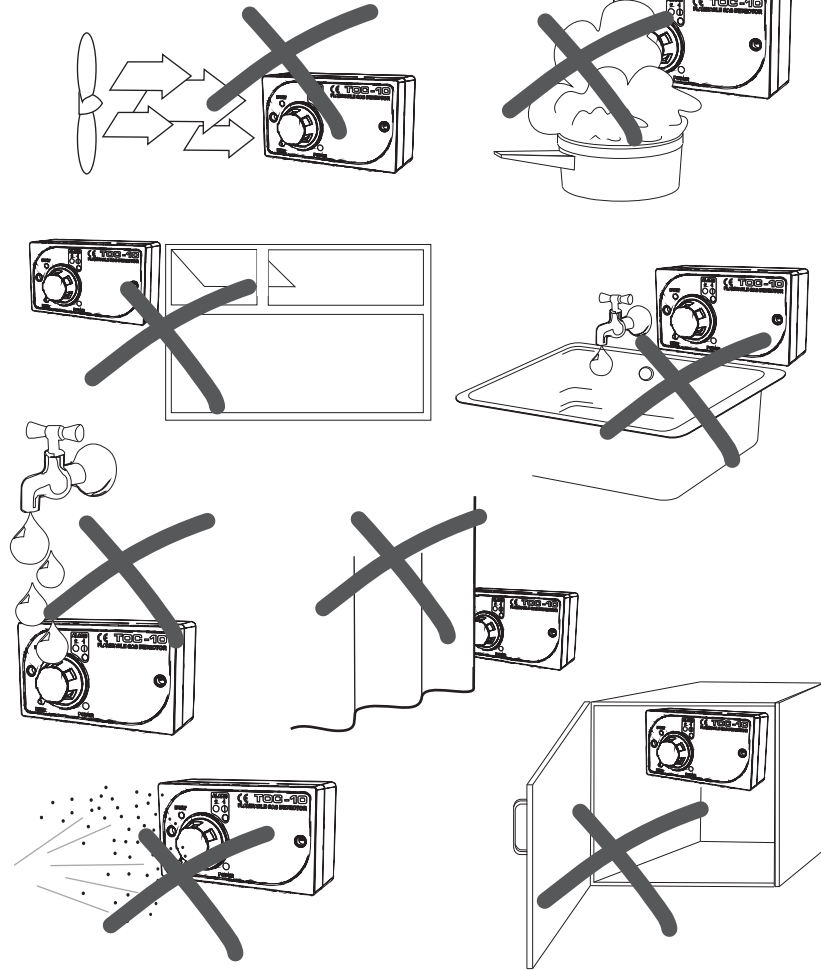


# CAUTION



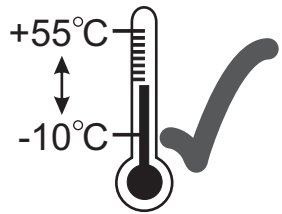
# Information

The TOC-10 © is pre-calibrated for its indicated target gas, usually LPG or Methane. The TOC-10 © will respond to any flammable gas to a greater or lesser degree. The following list indicates typical materials that may be commonly present which the unit may respond to in operation:

- Aerosol Propellants (Butane)
- Paint Solvents (VOC's)
- Hot Cooking Oils
- Nail Varnish
- Solvent Based Adhesives (VOC's)

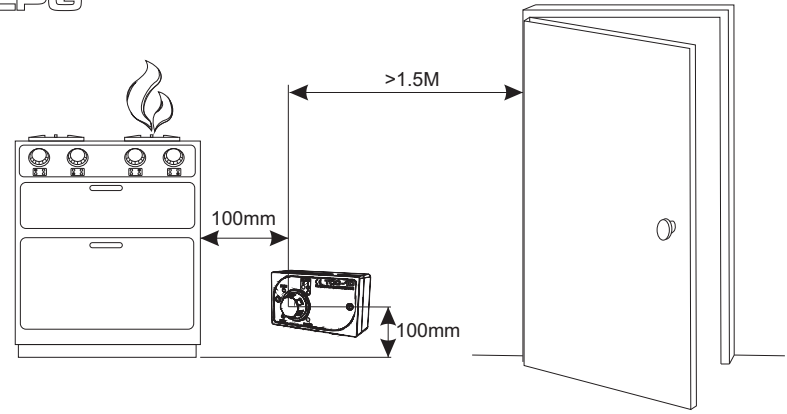
Some commonly occurring substances may cause long term detector damage, typically:

- Silicones (furniture polishes)
- Hair sprays (Silicones, VOC's etc)
- Chlorinated Cleaning Agents

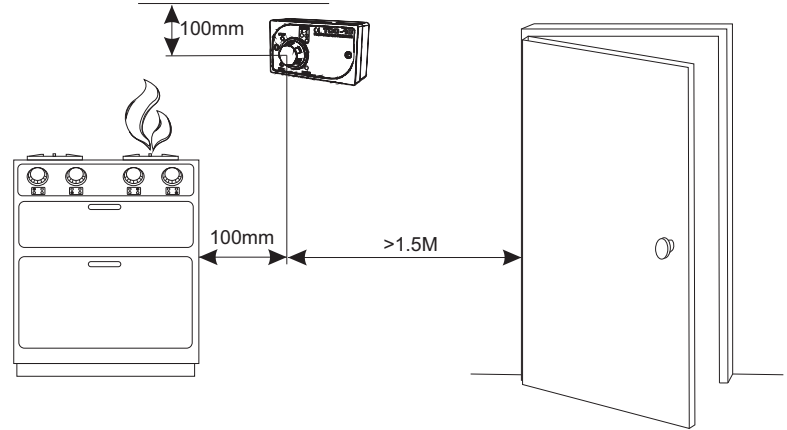


# LOCATING THE DETECTOR

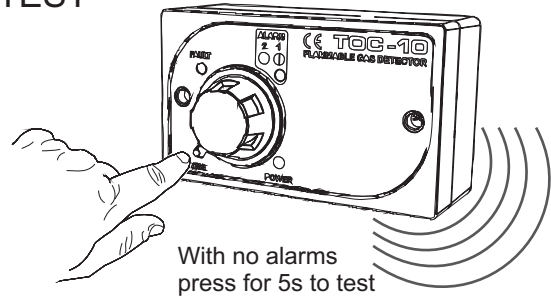
## LPG



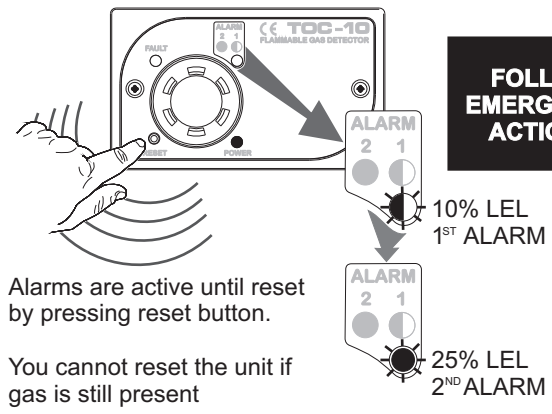
## NATURAL GAS (METHANE CH4)



# TEST



# OPERATION



## FOLLOW EMERGENCY ACTIONS

	Alarm Level 1 relay	Alarm Level 2 relay	Sounder	Power LED	Fault LED	Alarm LED
Alarm 1 ~10% LEL	✓		✓	☀		☀
Alarm 2 ~25% LEL	✓	✓	✓	☀		☀
Normal				☀		
Fault				☀	☀	

**CALL FOR SERVICE**

# TOC-10 FLAMMABLE GAS DETECTOR

Power Supply: 230V AC +/-10% 50/60Hz  
 (check SN label) 110V AC +/-10% 50/60Hz (Option)  
 12V DC (Option)

Environmental: -10 to +55 Degrees Centigrade  
 0-95%RH Non-condensing  
 Enclosure IP52

Response Time: <30 Seconds

Nominal Alarm Levels: Alarm 1 10% LEL Alarm Level 1 Relay Active SPCO 5A @ 230V AC Non inductive  
 Alarm 2 25% LEL Alarm Level 2 Relay Active SPCO 5A @ 230V AC Non inductive

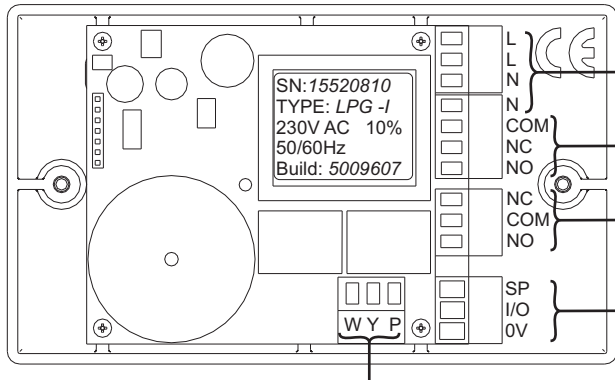
Expected Life: >2 Years

Target Gas: LPG-I (Integral sensor) LPG-R (Remote sensor)  
 Methane CH4-I (Integral sensor) CH4-R (Remote sensor)

Service: This equipment must only be serviced by competent persons and checked periodically using traceable calibration gases. Do not test using lighter fuel or similar fuel gases as this can give misleading results. In extreme cases this can result in sensor damage.

Standards Applied: EN50194-1:2009 EN50270  
 EN60335-1:2002

## Terminal Functions



Remote sensor terminals if applicable see SN label

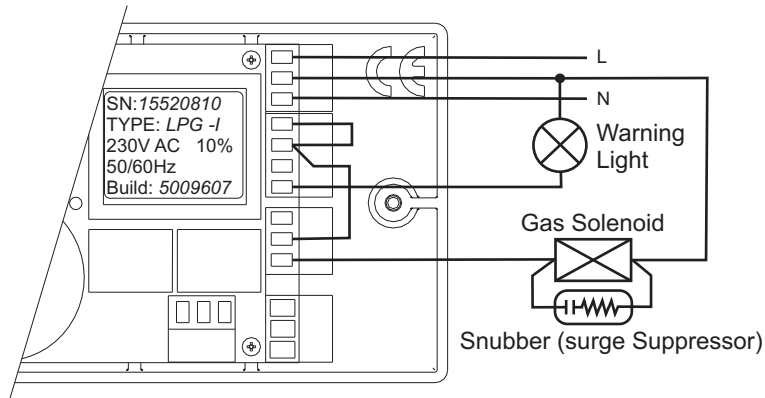
Power Supply With Auxiliary Output Terminals

Alarm Level 1 Relay Terminals Active at Nominally 10% LEL

Alarm Level 2 Relay Terminals Active at Nominally 25% LEL

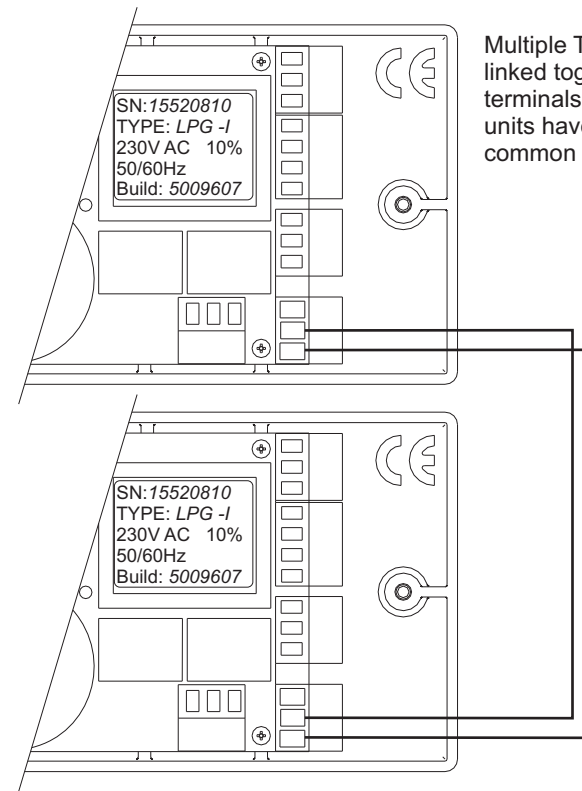
Data interconnect between Toc-10 units for linked operation

## Typical Stand Alone Operation



Example shows a Toc-10 © Wired to a gas supply solenoid valve and warning light. The warning light is active in this example when the first alarm level is reached (10%) and the gas solenoid is de-activated when the second alarm level is reached (25%). Note in this example a surge suppressor is fitted to the gas solenoid to extend the life of the relay. For DC solenoids a diode could be fitted. Any such installation must comply with the national regulations in force in the country EN1775 refers

## Linked Operation



Multiple Toc-10 © units can be linked together using the I/O and 0V terminals. When linked the Toc-10 © units have common alarm and common reset function.

## ! Warning !

Installation of this device to the mains power supply should only be made by a competent person. The unit is supplied pre-calibrated but should be checked regularly, at least monthly using the test feature. Clean only with a damp cloth do not use any cleaning products

Do no tamper with this equipment to do so may risk electric shock or incorrect operation

## Emergency actions

If the TOC-10 © initiates an alarm signal or there is a smell of gas, keep calm and carry out the following actions, not necessarily in this order.

- Extinguish all naked flames, including all smoking material.
- Turn off all gas appliances.
- Do not switch on or off any electrical equipment; including gas detection apparatus.
- Turn off the gas supply at the gas main control and/or, with a LPG supply, the storage tank.
- Open doors and windows to increase ventilation.
- Do not use a telephone in the building where the presence of gas is suspected.

If the alarm continues to operate, even after an alarm resetting action, where appropriate, and the cause of the leak is not apparent and/or cannot be corrected, vacate the premises and IMMEDIATELY NOTIFY the gas supplier and/or the gas emergency 24 hour service in order that the installation may be tested and made safe and any necessary repair carried out.

If the alarm can be reset and the reason for the alarm having operated is identified, (for example a gas tap switched on with the burner unlit), after stopping the gas release and ensuring all appliances are turned off, the main gas supply may be reinstated.