



**Operating Instructions  
Chlorine / Fluorine Cassette  
(Part Number: 084035)**

**Applications:**

The Chameleon is the only hands-free, power-free, chemical detector for gases and vapors **in air**, allowing First Responders, Firefighters, EMS, Police Officers and Military to detect the presence of hazardous chemicals. No liquid sample required. The Chameleon may even be immersed in salt water or fresh water without affecting its performance. Developed under funding by the United States Marine Corps, the Chameleon is ideal for users to screen unknown hazards in their environment.

Exposure to chlorine gas can occur during the synthesis of other chemicals, bleaches and disinfectants. Chlorine is a common industrial chemical and is used in most water treatment facilities. Fluorine gas is very reactive and quickly attacks all metals - steel wool may burst into flames when exposed to it. Exposure to fluorine may occur during the synthesis of other chemicals. Storage tank leaks in chemical plants and during transportation result in exposure to chlorine and fluorine vapors.

**Specifications:**

The chemical sensor in the chlorine / fluorine cassette shows an easy to see color change. Half of the sensor window will change color as shown in the example below:



Unexposed

Exposed

Description	Concentration	Reaction Time
Chlorine	5 ppm	3 minutes
Fluorine	5 ppm	3 minutes

**Interferences:**

The chlorine / fluorine cassette was exposed to saturated vapor concentrations of toluene, bleach, DEET, gasoline, diesel fuel and JP-8 jet fuel for one hour. No false positive or false negative readings were observed. However, repeated immersion in a layer of oil/fuel on top of salt water significantly impaired the performance of the chlorine / fluorine cassette.

**Operating Instructions:**

1. Expiration date marked on packaging is based on storage at or below 77°F/25°C. Storage at higher temperatures reduces shelf life.
2. Product shelf life when stored at 122°F/50°C is thirty days.
3. At time of use - remove cassette from its protective pouch.
4. Holding cassette with text facing up, slide cassette into Chameleon armband until the cassette firmly snaps into the armband.
5. Periodically view the cassette to observe color change in half of the sensor window.
6. Discard cassette after color change is observed or after 24 hours of use.
7. DO NOT use cassette beyond 24-hour service life.

WARRANTY EXCLUSIONS AND LIMITATION OF LIABILITY

IF THE USER DOES NOT ACCEPT THE FOLLOWING TERMS, THE USER SHOULD NOT USE THE CHAMELEON CASSETTE AND ARMBAND.

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Warning: Keep out of reach of children, if ingested seek medical attention immediately.

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