



# OIL IN WATER ANALYZER

Trace Oil Detection



LEAK DETECTION

CONTAMINATION MONITORING

POLLUTION CONTROL





# LEAK DETECTION

## BENEFITS

- 01 / Aromatic and non-aromatic oil contaminants are detected using simultaneous UV fluorescence and turbidity measurement.
- 02 / Sensitivity down to parts per billion for precise trace oil contamination.
- 03 / Real-time monitoring detects leaks instantly as they occur.
- 04 / Low maintenance easy to use UV-LED based analyzer.
- 05 / Hazardous area uses with EExD, IECEx & UL enclosures.

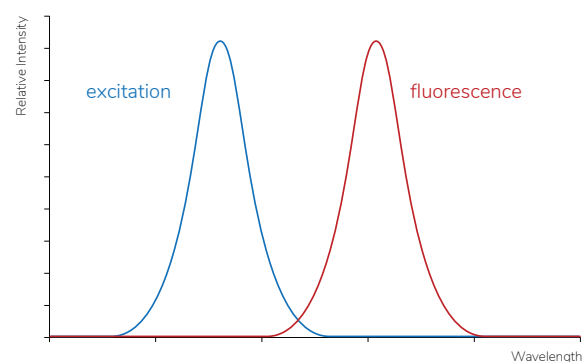


Kemtrak manufactures industrial inline oil in water analyzers that detect trace hydrocarbons in water. These analyzers use dual UV fluorescence and turbidimetric analysis, which is a reliable and continuous method for detecting oil and hydrocarbon contamination in water.

Oils rich in aromatic content will fluoresce when illuminated with ultraviolet light. The intensity of this fluorescence is dependent upon the polyaromatic hydrocarbon (PAH) content of the oil.

Each oil has its own unique fluorescence intensity resulting from its specific PAH content. The combined fluorescence from both dissolved and dispersed oil in water can be measured and correlated to the oil content. Entrained gas and solids present in the stream will not fluoresce and therefore do not affect the measurement. Oils or hydrocarbons low in aromatic content that may not fluoresce can easily be detected using simultaneous turbidity measurement. Operators are instantly informed of leaks or product contamination, resulting in high measurement confidence.

The hygienic immersion probe has the same dimensions as industry standard Ø12 mm PG 13.5 pH sensors, allowing a range of standard fittings and retractable probe holders to be used.



Fluorescence is a phenomenon in which a substance absorbs light energy and then re-emits it at a longer wavelength.

# APPLICATIONS





01 /

## Environmental Monitoring

Detecting oil and hydrocarbons in waste and run-off water is crucial for preventing environmental damage, as oil spills are a major environmental concern.

02 /

## Industrial Processes

Trace oil in water monitoring is used in industrial processes to prevent hazardous situations and costly process interruptions. Early detection of leaks and contaminations can prevent damage to process equipment.

03 /

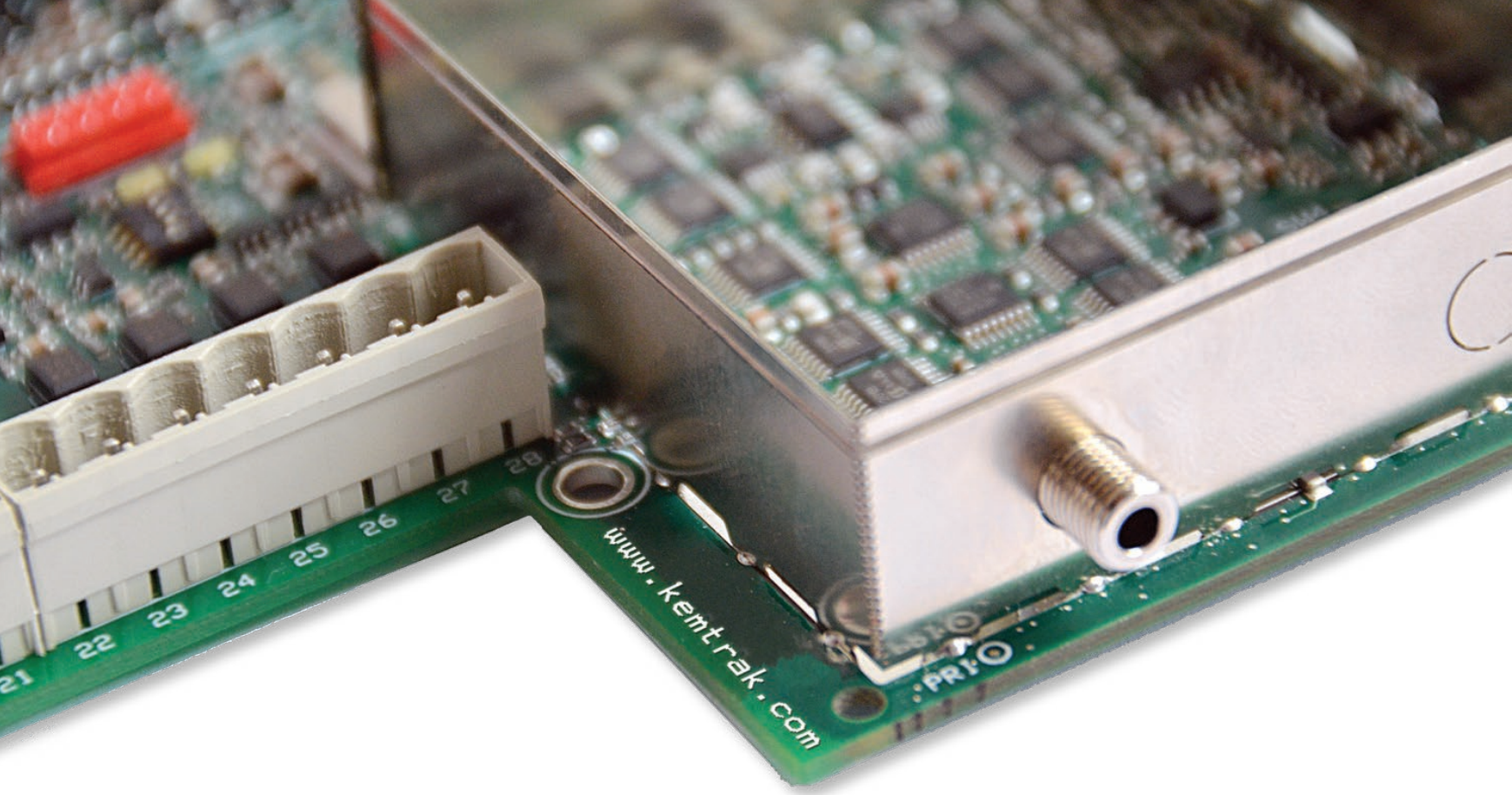
## Oil contamination of food products

Safeguard food products from oil contamination and lubricants used in food processing equipment.

04 /

## Water treatment

Trace oil in water detection is used to monitor the quality of drinking water.



# ABOUT KEMTRAK

Founded in 2006, Kemtrak is the industry leader in LED-based industrial photometers. Low optical power and long lifetime provide dependable products with the highest performance and lowest cost of ownership available.

The Kemtrak 007 analyzer platform is a robust industrial analyzer designed to accurately measure and report specific properties of liquids and gases in-line and in real time. Based upon either absorbance, light scatter, or fluorescence, Kemtrak photometers are used in a wide range of industrial applications for measuring parameters like color, concentration, turbidity, and solids concentration.

Kemtrak is located in Stockholm, Sweden. Kemtrak products are distributed globally. No

matter where you are in the world, Kemtrak has a motivated team of skilled engineers ready to help.

- Industrial liquid and gas concentration measurement
- Real-time, in-line
- State of the art with exceptional performance
- Low cost of ownership:
  - No / ultra-low maintenance
  - Long life LED light source
  - Robust and reliable
- Application experience and know-how
- Global sales and support
- ISO 9001:2015 Quality System

At Kemtrak, we believe efficient manufacturing processes are essential for a sustainable world. Our products empower our customers to increase profits by preventing or limiting waste. Kemtrak analyzers provide insight into the process enabling resources to be conserved, waste minimized, energy reduced, and harmful leaks detected.

Kemtrak technology delivers tangible, measurable, and substantial benefits. We help our customers make the transition to a greener future through process optimization.

Our philosophy is to focus on areas that are beneficial for people and the planet, and Kemtrak supports the societies where we conduct business. By leveraging the latest and greenest technologies, we ensure we are doing our best to create a more sustainable process industry for the coming generations.



## TYPICAL APPLICATIONS:

1. **Gas Scrubber Optimization:** Kemtrak photometers continuously monitor exhaust gases such as  $\text{ClO}_2$  and  $\text{Cl}_2$  to limit harmful emissions and loss of product into the environment.
2. **Leak Detection:** Continuous monitoring of leaks is an essential part of any process and Kemtrak analyzers provide ultra-low (ppb) levels of detection.
3. **Distillation Optimization:** Reduce energy consumption in distillation processes through real time measurement of tray & distillate concentration.
4. **Centrifuge Control:** Kemtrak turbidimeters optimize separators used to remove  $\text{SO}_2$  and particulates from wet scrubbers that clean marine exhaust gas.
5. **Interface Detection:** Kemtrak analyzers minimize product loss, process downtime, and waste through precise interface control, ensuring consistent performance at any concentration.

## OUR APPROACH:

**Eco-Friendly Products:** Kemtrak products have a no/ultra-low service and maintenance requirement, helping companies lower their ecological footprint and reduce costs. Our products are mercury-free, comply with RoHS directives, and are made from durable materials like stainless steel.

**Minimizing Carbon Footprint:** Kemtrak promotes environmental awareness, has energy-efficient facilities with eco-friendly electricity, recycles waste, and encourages remote meetings and responsible travel.

**Research & Development:** Kemtrak invests in sustainable technologies and practices, and develops products used to create a more sustainable process industry.



KEATRAK 



Contact:



[www.southforkinstruments.com](http://www.southforkinstruments.com)  
[sales@southforkinstruments.com](mailto:sales@southforkinstruments.com)  
Tel: 925 461 5059

