



**better analysis counts**

16 32.06

# Sindie 7039 M-SERIES

Sulfur Analyzer



## Sulfur Analysis in Petroleum and Bio Fuels

From ultra low sulfur diesel and gasoline to heavy fuel oil and crudes, the Sindie 7039 analyzer delivers unprecedented precision and accuracy. The analyzer is the ultimate easy-to-use and robust sulfur analyzer for petroleum and bio fuels. The ideal analytical solution for the energy industry where detection, performance and reliability are critical. SINDIE 7039 complies with ASTM D7039 and ISO 20884 methods. Plug it in and measure. Results with one touch. Unrivaled precision.

### Application Areas:

- Total sulfur analysis from ultra low sulfur fuels to crudes.
- For use in refinery labs, pipeline terminals, additive plants, testing vans and inspection laboratories.
- Complies with ASTM D7039 and ISO 20884.

### Features and Benefits:

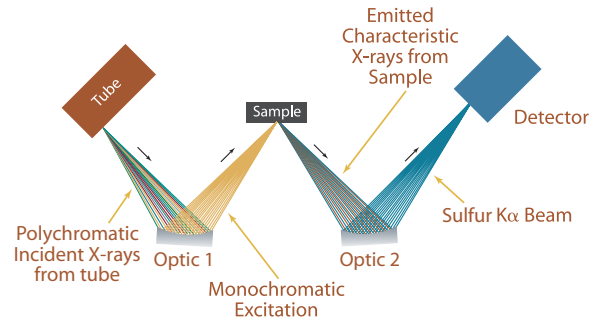
- LOD: 0.4 ppm at 300 s.
- Dynamic Range:  
Standard: 0.4 ppm to 3000 ppm  
XR package: 0.4 ppm to 10%
- Fits on any bench and compatible for use in mobile labs and vans :  
37 cm (w) x 50 cm (d) x 34 cm (h)
- Plug-it-in and measure: no additional utilities required.
- Touch Screen user interface.
- User programmable measurement time:  
30-900 s.
- One calibration curve will run both diesel and gasoline up to 3000 ppm
- No conversion gasses, heating elements, quartz tubes or columns.
- 75 W air-cooled excitation tube.
- Robust polyamide window for easy cleaning.

### Options:

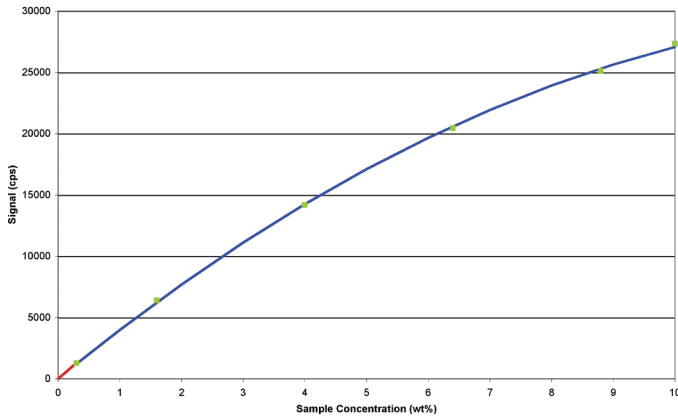
- Extended Range package: from 0.4 ppm up to 10%.
- LIMS data output software capability.

# MWD XRF

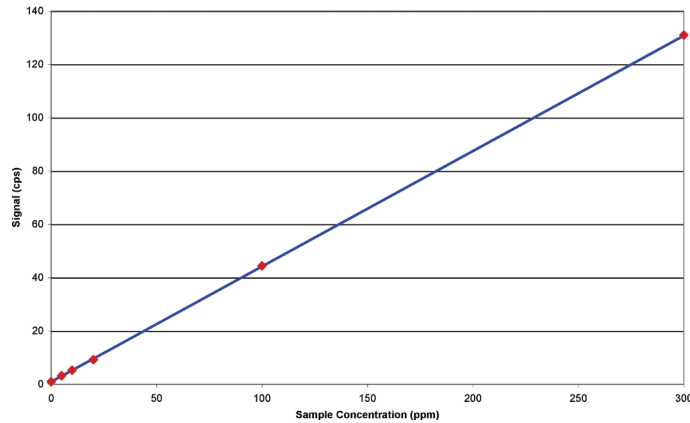
**Monochromatic Wavelength Dispersive X-Ray Fluorescence (MWD XRF)** utilizes state-of-the-art focusing and monochromating optics to increase excitation intensity and dramatically improve signal-to-background over high power traditional WD XRF instruments. This enables significantly improved detection limits and precision and a reduced sensitivity to matrix effects. A monochromatic and focused primary beam excites the sample and secondary characteristic fluorescence x-rays are emitted from the sample. A second monochromating optic selects the sulfur characteristic x-rays and directs these x-rays to the detector. MWD XRF is a direct measurement technique and does not require consumable gasses or sample conversion.



## SINDIE-XR Calibration Curve



## Low Range Calibration



## Precision

Typical repeatability (r) and reproducibility (R) values in diesel fuel, at 95% confidence. 300s measurement time.

Sulfur Concentration (ppm)	r	R
2	0.4	1.0
8	0.7	1.2
15	0.9	1.7
100	3	6
500	6	12

## Product Specifications

Test Method	ASTM D7039 and ISO 20884
Dimensions	37 cm (w) x 50 cm (d) x 34 cm (h)
Power	100-120 VAC, 47-63 HZ at 6.0 Amps/200-240 VAC, 47-63 HZ at 6.0 Amps
Sample Cup Volume	10 ml
I/O Ports	Ethernet 10/100 base T, RS232
Optional Computer Interface	Pentium, 100MHz, 32MB RAM/Windows 98 or newer operating system
Ambient Temperature Requirements	5-40° C (40-104° C)
Dynamic Range	Standard: 0.4 – 3000 ppm, XR Package: 0.4 ppm – 10%
Measurement	User selectable: 30-900 s
Calibration	8 calibration curves. Automatic and Manual Calibration functionality.



**better analysis counts**

15 Tech Valley Drive • East Greenbush, New York 12061, USA • 518.880.1500 • Fax: 518.880.1510  
e-mail: info@xos.com • website: www.xos.com