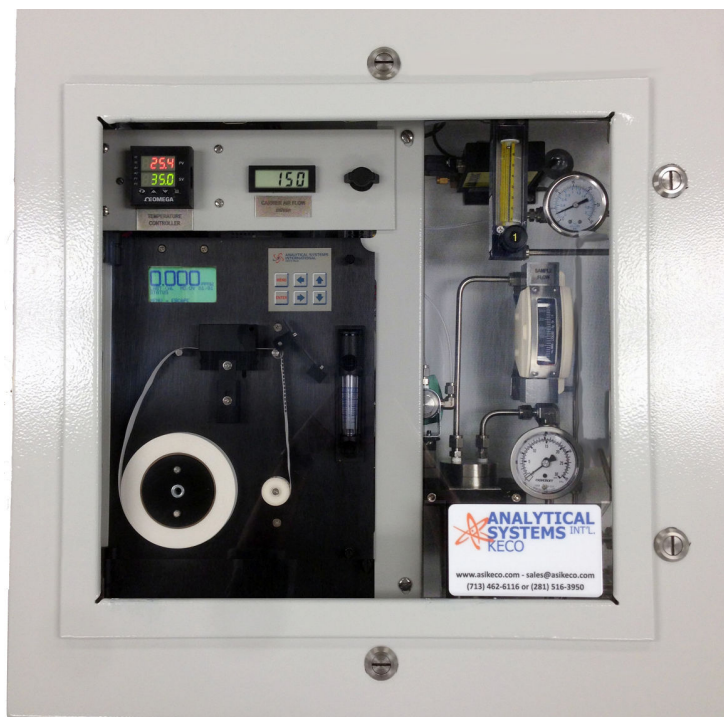


H₂S IN LIQUIDS ANALYZER

CONTINUOUS ON-LINE PROCESS

WATER • LIGHT CRUDE • NAPHTHA • GASOLINE • DIESEL

Model 205P



FEATURES - EXCLUSIVE

- **Conformity to ASTM Methods**
- **Specific to H₂S Only**
- **Accurate and Continuous Analysis**
- **Quantitative Measurement in PPB, PPM & Percent Levels**
- **Push Button Validation**
- **Proven Reliability**
- **Normal Calibrations Not Required**
- **Fast Response Time**



Awarded 'Preferred Vendor' by
Saudi Aramco, Chevron & others
for the 205 H₂S Analyzer

Description & Principle of Operation

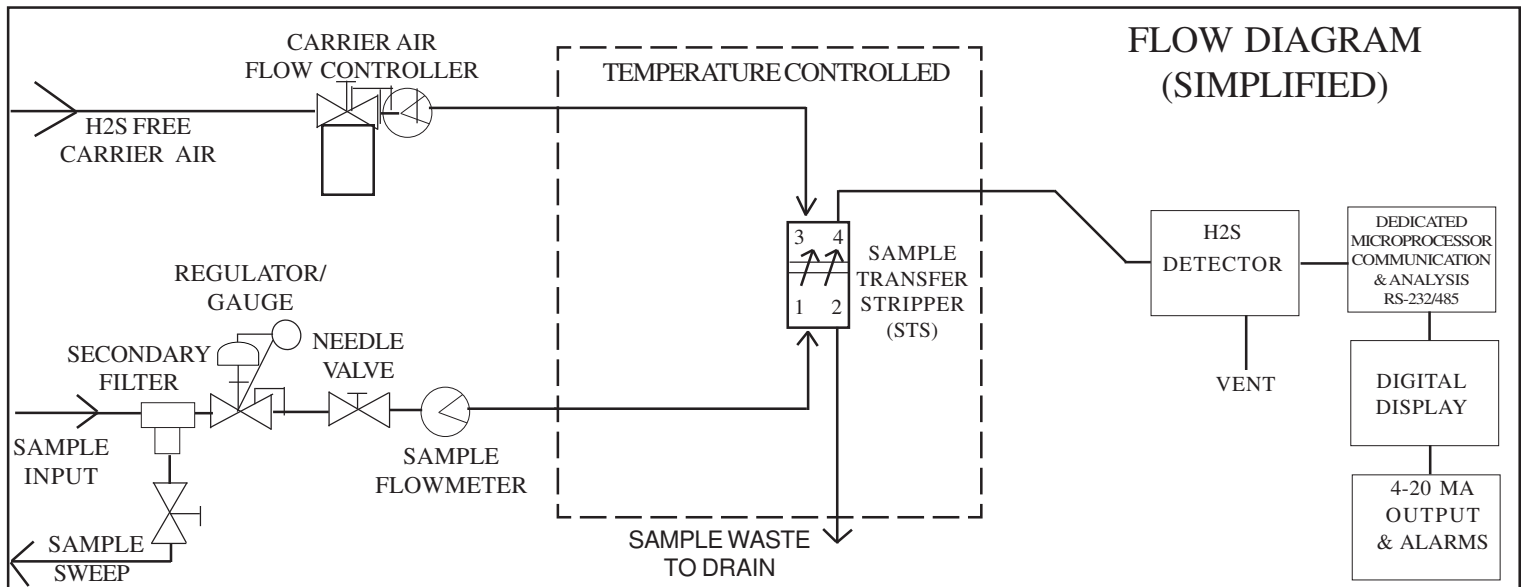
The ability to analytically quantify H₂S in light liquids such as water, light crude oil, diesel, naphtha, etc. is enhanced with the Sample Transfer Stripper, exclusive ASI Membrane Technology and ratiometric colorimetric technologies offered by Analytical Systems International (ASI). This principle of operation is described in various ASTM methods including D4084-82, D4468-85, and D4045-81.

The process of measuring H₂S in liquid samples requires the H₂S to be representatively separated from the liquid for measurement in the gas phase. Sparging, or the problematic & complicated "headspace" system, which often suffers from liquid carry-over which requires extensive cleaning, is not required for this separation. ASI utilizes the state-of-the-art Sample Transfer Stripper (STS) with exclusive ASI Membrane Technology to efficiently and reliably separate the H₂S from the liquid sample. The STS is an extremely simple device that provides an ultra-clean and dry sample to the analyzer for analysis. This results in radically reduced maintenance requirements when compared to the headspace method and also enhances analytical reliability. ASI is established as the world-wide leader in H₂S in Liquid analysis due to the many benefits of this exclusive technology.

The principle of operation requires a continuous free flowing liquid sample into a heater where the Sample Transfer Stripper (STS) unit separates the liquids from the H₂S gas sample. An H₂S free air or nitrogen carrier then sweeps the H₂S gas sample to the H₂S analyzer for quantitative analysis in PPBw, PPMw, and up to saturation levels. The detection technology is based on chemically specific density changes. The lead acetate sensing tape utilized in our analyzers is the only detection method that is absolutely specific to H₂S. Optical illumination & detection are integrated for maximum resolution accuracy. Economic payout is increased because of this automated & continuous process. Laboratory version is also available. Patents and Patents Pending based on letters that are available on request.



(281) 516-3950 • FAX (281) 351-8925
www.asikeco.com • Sales@asikeco.com



MODEL 205P TYPICAL SPECIFICATIONS

POWER INPUT:

- 110 VAC 50/60Hz @ 400 Watts.
- 220 VAC 50/60Hz (Optional)

TEMPERATURE:

- Operating: 1C to 55C
- Storage: 0C to 70C

ANALYTICAL PERFORMANCE:

(APPLICATION DEPENDENT)

- Range Customer Specified: PPB W Thru PPM W to Saturation (Lower Detectable Limit < 100 PPBW)
- Accuracy: $\pm 2\%$ of Full Scale
- Repeatability: $\pm 1\%$ of Full Scale
- Resolution: 5 PPB
- Linearity: $\pm 1\%$ of Full Scale
- Drift: Nil
- Temp. Coefficient: 0.01% 1 Degrees C
- Analysis Time: 0.7 Seconds (concentration dependent)

ACCESSORY OPTIONS:

- Special Sampling Systems
- Validation System
- Portable Quick Cleaning Kit
- Drain Collection Tank (for no back-pressure)

DISPLAY:

- Alpha Numeric LCD

MEMORY / COMPUTER INTERFACE:

- RS-232/485 Serial Port (optional)

ANALOG OUTPUT SIGNAL:

- 4-20ma Linearized (standard)
- 4-20ma Isolated Linearized (optional)

UTILITY GASES:

- Air carrier clean and H2S free 180 ml/min.
- Air or Nitrogen Purge Supply (optional)

ALARM CONTACTS (Optional):

- High and Low Concentration Relay
- Diagnostic Alarms Include:
Sample, Air, Purge Flow & Detector Faults

AREA CLASSIFICATIONS:

- General Purpose (Standard)
- Purge Class I Div. II or I, GR. B,C,D (optional)
- Zone 1 or Zone 2 (optional)

CABINET DIMENSIONS & WEIGHT:

- Stainless Steel, NEMA 4X, Powder Coated
- 24 inch H x 24 inch W x 10 inch D
- Approx. 85 lbs.

Quotation Information:

Analytical Systems International provides design and application engineering assistance for the user's analyzer requirements. For a quotation, please complete ASI Analyzer Quote Request Form at www.ASIKECO.com