

## Natural Gas/Trace Sulfur Analysis

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Configuration of an Agilent Technologies 7890 Series Gas Chromatograph with thermal conductivity and flame photometric detectors (TCD/FPD) for natural gas and trace sulfur components analysis.

### TDC Determines Components

- Propane
- Isobutane
- n-Butane
- Isopentane
- n-Pentane
- Carbon dioxide
- Ethane
- Hydrogen sulfide
- Oxygen/argon composite
- Nitrogen
- Methane
- Carbon monoxide
- Initial composite C6+ backflush to detector

The lower quantifiable limit on the TCD is 400 ppm.

### FPD Determines Components

- Hydrogen sulfide
- Carbonyl sulfide
- Methyl mercaptan
- Ethyl mercaptan

The lower quantifiable limit on the FPD is 1 ppm.

**NOTE** *Samples containing more than 500 ppm of any single sulfur component should not be analyzed on the FPD. Detector over-ranging will occur and data will not be valid.*