Gases

Analysis of impurities in ethylene

Application Note

Energy & Fuels

Authors

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Introduction

Gas chromatography with an Agilent PoraPLOT Q UltiMetal column separates gaseous impurities in ethylene in less than three minutes.

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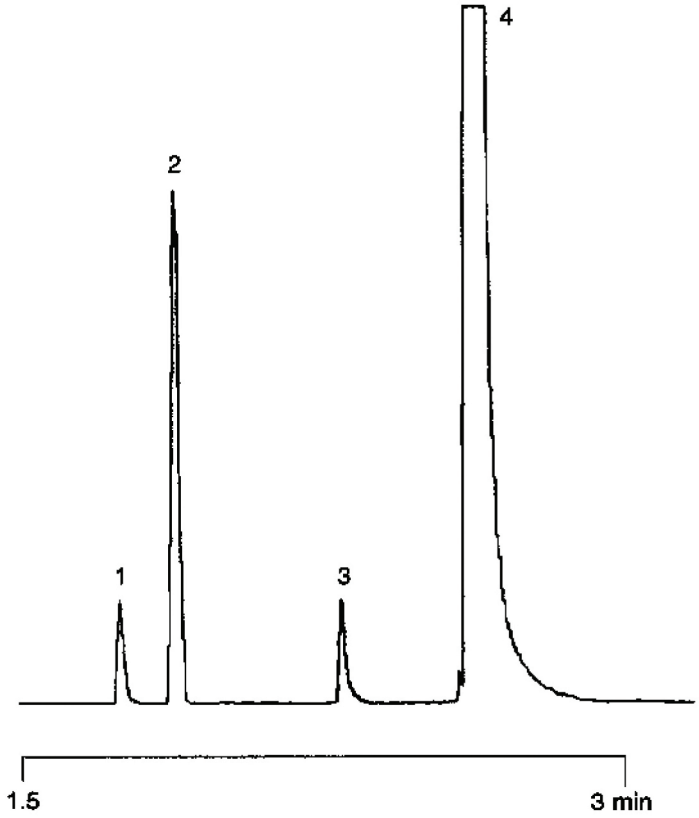
Conditions

Technique	:	GC-wide-bore
Column	:	Agilent PoraPLOT Q Ultimetal, 0.53 mm x 25 m PLOT (df = 20 µm) (Part no. CP6954)
Temperature	:	35 °C
Carrier Gas	:	He, 20 kPa (0.2 bar, 2.9 psi)
Injector	:	Valco valve, 250 µL T = 50 °C
Detector	:	FID with a Ni-catalyst methanizer T = 200 °C
Sample Size	:	250 µL



Peak identification

1. carbon monoxide 3 ppm
2. methane 23 ppm
3. carbon dioxide 3 ppm
4. ethylene 99%

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