

## **Solvents**

# Headspace Analysis of Chlorinated Solvents

## **Application Note**

Environmental

### **Authors**

Agilent Technologies, Inc.

### **Introduction**

Gas chromatography using an Agilent J&W CP-Sil 8 CB column separates 10 chlorinated solvents in 9 minutes.



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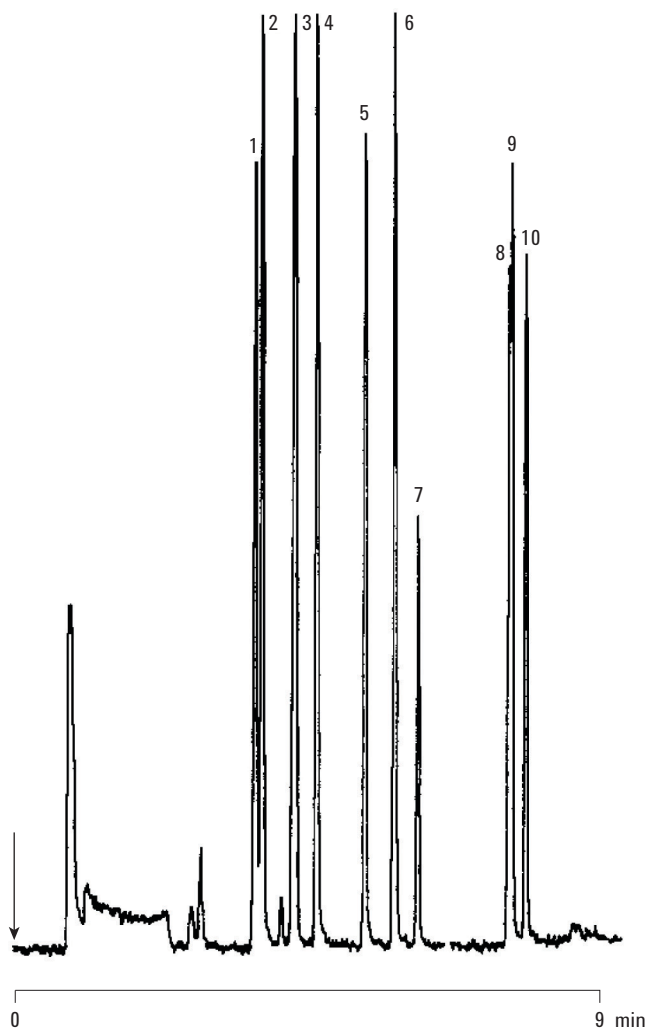
## Conditions

|                     |   |
|---------------------|---|
| Technique           | GC-capillary  |
| Column              | Agilent J&W CP-Sil 8 CB, 0.32 mm × 25 m fused silica<br>WCOT CP-Sil 8 CB (df = 5 µm) (p/n CP7681) |
| Temperature         | 40 °C (1 minute) 250 °C, 30 °C/min; 250 °C (6 minutes)  |
| Carrier gas         | He, 100 kPa (1.0 bar, 14.3 psi)   |
| Injector            | Splitter, 20 mL/min<br>T = 250 °C   |
| Detector            | ELCD (Hall) in halogen mode<br>T = 280 °C   |
| Sample size         | 1 mL headspace (80 °C)  |
| Concentration range | 1 µg/L (= 1 ppb)  |
| Solvent sample      | water   |

Courtesy P. de Haan, Analytical Research, Duphar B.V.,  
Weesp, The Netherlands

## Peak identification

1. cis-1,2-dichloroethylene
2. trichloromethane (chloroform)
3. tetrachloromethane
4. trichloroethylene
5. 1,1,2-trichloroethane
6. tetrachloroethylene
7. chlorobenzene
8. 1,3-dichlorobenzene
9. 1,4-dichlorobenzene
10. 1,2-dichlorobenzene



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