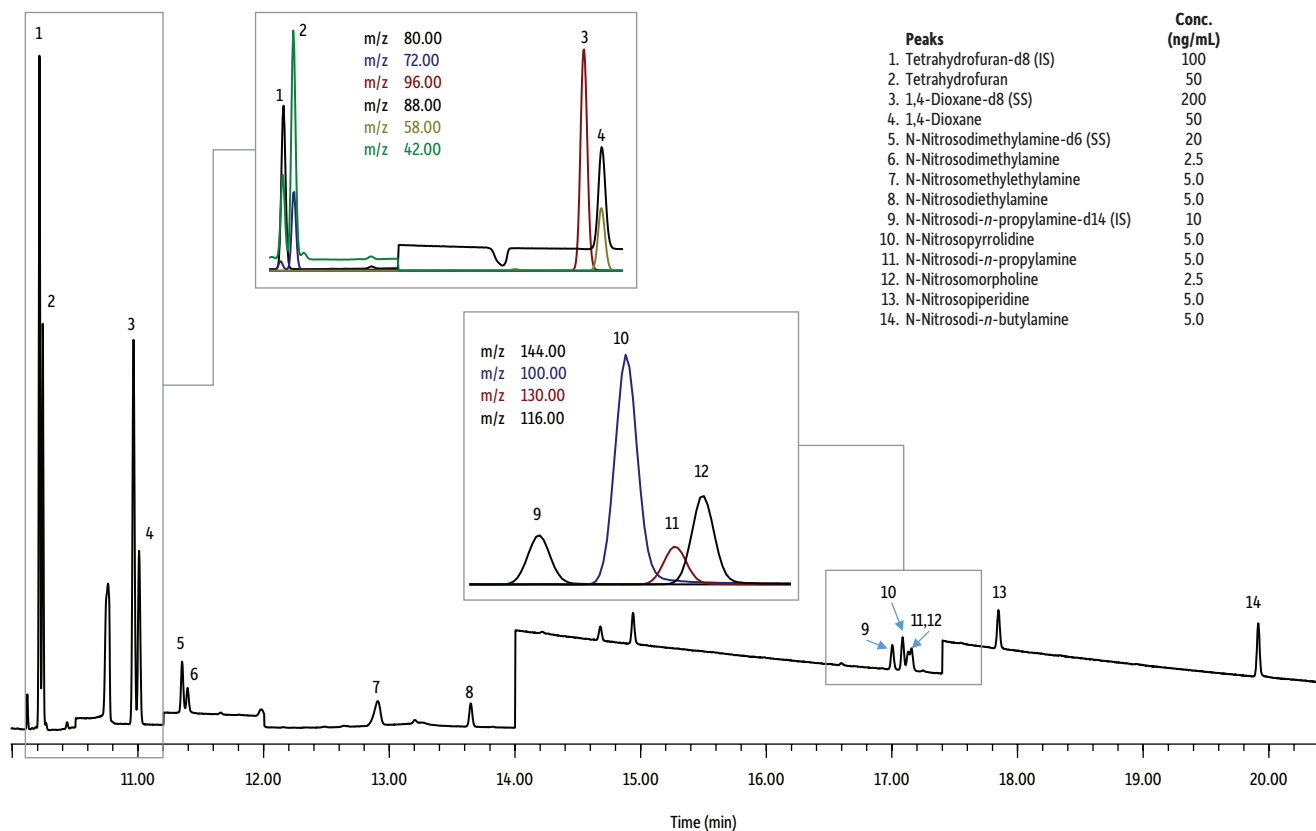


Combination Run of U.S. EPA Methods 521 and 522, Nitrosamines and 1,4-Dioxane, on Rxi®-5Sil-MS by CSR-LVSI



Peaks	Conc. (ng/mL)
1. Tetrahydrofuran-d8 (IS)	100
2. Tetrahydrofuran	50
3. 1,4-Dioxane-d8 (SS)	200
4. 1,4-Dioxane	50
5. N-Nitrosodimethylamine-d6 (SS)	20
6. N-Nitrosodimethylamine	2.5
7. N-Nitrosomethylethylamine	5.0
8. N-Nitrosodiethylamine	5.0
9. N-Nitrosodi-n-propylamine-d14 (IS)	10
10. N-Nitrosopyrrolidine	5.0
11. N-Nitrosodi-n-propylamine	5.0
12. N-Nitrosomorpholine	2.5
13. N-Nitrosopiperidine	5.0
14. N-Nitrosodi-n-butylamine	5.0

GC_EV1334

Column Rxi®-5Sil MS, 30 m, 0.25 mm ID, 1.00 µm (cat.# 13653) using Rxi® guard column 10 m, 0.53 mm ID (cat.# 10073) with SGE µ-union

Sample N-Nitrosodimethylamine-d6 (cat.# 33910)
1,4-Dioxane-d8 (cat.# 30614)
N-Nitrosodi-n-propylamine-d14 (cat.# 33911)
Tetrahydrofuran-d8 (cat.# 30112)
Nitrosamine calibration mix, Method 521 (cat.# 31898)
Appendix IX mix #1, revised (cat.# 32459)
Dichloromethane

Diluent:

Injection
Inj. Vol.: 50 µL splitless (hold 1.5 min)
Liner: Custom Premium single taper 4 mm ID liner with 15 mg quartz wool
Inj. Temp.: 275 °C
Purge Flow: 100 mL/min

Oven
Oven Temp.: 35 °C (hold 1.5 min) to 50 °C at 50 °C/min (hold 7.1 min) to 320 °C at 11.12 °C/min (hold 1.5 min)

Carrier Gas
Flow Program: He, flow program
5.08 mL/min (hold 8.9 min) to 2.0 mL/min at 1.0 mL/min/min

Detector MS
Mode: SIM
SIM Program:

Group	Start Time (min)	Ion(s) (m/z)	Dwell (ms)
1	9.9	42, 46, 71, 72, 78, 80	20
2	10.5	58, 62, 64, 88, 96	20
3	11.2	42, 43, 46, 48, 74, 80	20
4	12	43, 56, 88, 102	30
5	15.5	58, 68, 70, 78, 86, 100, 116, 130, 144	20
6	17.4	84, 99, 114, 116, 141, 158	20

Transfer Line Temp.: 320 °C
Analyzer Type: Quadrupole
Source Temp.: 230 °C
Quad Temp.: 150 °C
Solvent Delay Time: 9.9 min
Tune Type: BFB
Ionization Mode: EI
Instrument Agilent 7890A GC & 5975C MSD