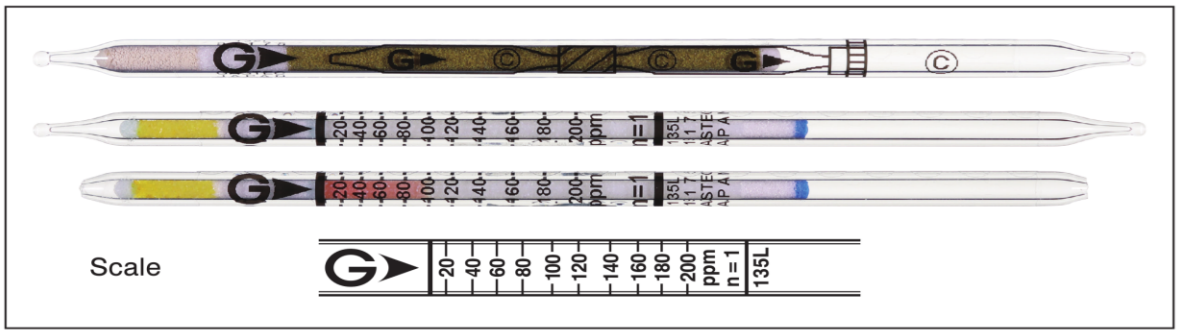
1,1,1-Trichloroethane CH3CCI3

Part No.: 135L

1,1,1-Trichloroethane CH_3CCl_3 No.135L



Performance

When used, these tubes are to be connected. See page 2-3.

Measuring range	6 to 20 ppm	20 to 200 ppm	200 to 900 ppm
Number of pump strokes	2 (200 mL)	1 (100 mL)	1/2 (50 mL)
Correction factor	0.3	1	4.5
Sampling time	6 min	3 min	1.5 min

Detecting limit : 3 ppm (2 pump strokes)
Colour change : White → Pale pink
Operating conditions : Temperature 0 to 40 °C (32 to 104 °F) correction used
Relative humidity 0 to 90 % correction not used
Relative standard deviation : 10 % (for 20 to 60 ppm), 5 % (for 60 to 200 ppm)
Tube quantity and number of tests per box : 10 tubes for 5 tests
Shelf life : 27 months

Reaction principle

$CH_3CCl_3 + CrO_3 + H_2S_2O_7 \rightarrow Cl_2$
Cl_2 + 3,3',5,5'-Tetramethylbenzidine → Pale pink product

Possible coexisting substances and their interferences

Substance	Concentration	Interference	Changes colour by itself to
Halogens		+	Pale pink
Nitrogen oxides		+	Pale pink
Saturated halogenated hydrocarbons		+	Pale pink

Other substances measurable with this detector tube

Substance	Correction	No. of pump strokes	Measuring range
1,2-Dichloroethane	Factor : 5.2	1	104 to 1040 ppm
1,1,2,2-Tetrabromoethane	Factor : 0.046	4	0.92 to 9.2 ppm
1,2,3-Trichloropropane	Factor : 1.8	4	36 to 360 ppm

Calibration gas generation

High pressure gas cylinder method

Special note

This twin tube can also be used with the Gastec Water Pollutant Analysis Systems to measure 1,1,1-Trichloroethane in the water. With these systems, samples are collected by using a syringe.