# Methyl Bromide 5/b Order No. CH 27 301

### Application Range

Standard Measuring Range:	5 to 50 ppm
Number of Strokes n:	5
Time for Measurement:	approx. 1 min.
Standard Deviation:	± 20 to 30 %
Color Change:	green → brown

# Ambient Operating Conditions

Temperature:	0 to 40 °C
Absolute Humidity:	3 to 15 mg H <sub>2</sub> O / L

# **Reaction Principle**

a)  $CH_3Br + SO_3 + MnO_4^- \rightarrow Br_2$ 

b)  $Br_2$  + o-Dianisidine  $\rightarrow$  brown reaction product

## **Cross Sensitivity**

Several other halogenated hydrocarbons and free halogens are indicated, but not all of them.

The sensitivity to the other halogenated hydrocarbons varies, in some cases higher and in others lower. Examples:

5 ppm Hydrogen chloride gives an indication of 1 - 2 mm in length. 50 ppm Hydrogen chloride and hydrogen bromide give an indication of 20 - 30 ppm.

1,2-Dibromoethane is indicated with about the same sensitivity.100 ppm 1,1,1-Trichloroethane gives an indication of 5 - 10 ppm.

### Additional Information

Before carrying out the measurement the reagent ampoule must be broken. The granular contents must be shaken out of the broken ampoule by gently tapping the side of the tube. The tube must be held vertically with the inlet of the tube up during the measurement.

