

Performance The minimum scale value (0.05ppm) is not printed on the tube, but only the scale line is printed.

Measuring range	0.02 to 0.05 ppm	(0.05) to 2 ppm	2 to 5 ppm
Number of pump strokes	5(500 ml)	2 (200 ml)	1(100 ml)
Correction factor	1/3	1	2.5
Sampling time	5 min	2 min	1 min

Detecting limit: 0.01 ppm (5 pump strokes)

Colour change : Yellow → Red

Corrections for temperature & humidity: Temperature correction is necessary.

Relative standard deviation: 10 % (for 0.05 to 0.4 ppm), 5 % (for 0.4 to 2 ppm)

Shelf life: 2 years

Reaction principle

 $B_2H_6 + 6HgCl_2 \rightarrow 2B_2(HgCl)_3 + 6HCl$

HCI + Base → Chloride

Possible coexisting substances and their interferences

Substance	Concentration	Interference	Changes colour by itself to
Arsine	≥ 1/10	+)
Hydrogen chloride	≥ 1/3	+	Dod
Hydrogen selenide	≥ 1/10	+	Red
Phosphine	≥ 1/10	+	J

Water vapour is trapped in the pretreatment (white) layer.

Calibration gas generation

High pressure gas cylinder method