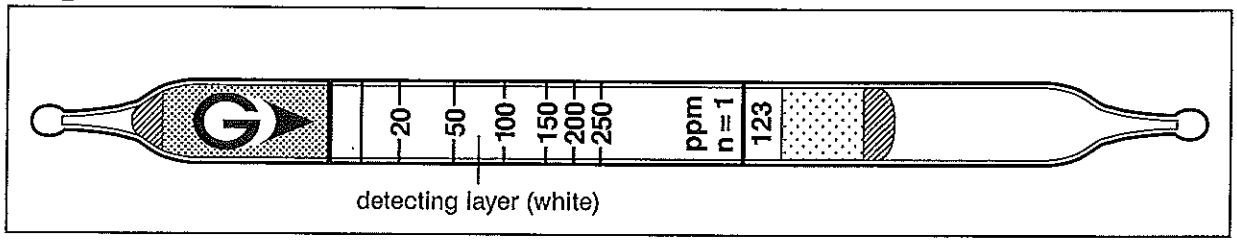
Xylene $C_6H_4(CH_3)_2$ No.123



Performance

Measuring range	5 to 10 ppm	(10) to 250 ppm	250 to 625 ppm
Number of pump strokes	2 (200 ml)	1 (100 ml)	1/2 (50 ml)
Correction factor	1/2	1	2.5
Sampling time	3 min	1.5 min	1 min

Detecting limit : 1 ppm (2 pump strokes)
Colour change : White → Brown
Corrections for temperature & humidity : Unnecessary
Relative standard deviation : 10 %(for 10 to 50 ppm), 5 %(for 50 to 250 ppm)
Shelf life : 3 years

Reaction principle

$C_6H_4(CH_3)_2 + I_2O_5 + H_2SO_4 \rightarrow I_2$

Possible coexisting substances and their interferences (NOTE : Page 2-5)

Substance	Concentration	Interference	Changes colour by itself to
Toluene	≧ 1/5	+	Brown
Acetylene, Hexane	≦ 2000 ppm	No(Two layers)	Pale brown (Whole layer)
Carbon monoxide	≦ 1000 ppm	No(Two layers)	
Benzene	≧ 1/5	+	Pale yellow

Other substance measurable with this detector tube

Substance	Correction	No. of pump strokes	Measuring range
Trimethylbenzene	by scale	2	10 to 300 ppm

Calibration gas generation

Diffusion tube method

TLV-TWA : 100 ppm TLV-STEL : 150 ppm Explosive range : 1.0 to 7.0 %