

Application Memo

Total Chlorine in 13% Sodium Hypochlorite (NaClO)

Industry	Inorganic chemical industry
Instrument	Automatic potentiometric titrator
Measurement method	Precipitation titration
Standards	

1. Overview

Add 3% hydrogen peroxide to the sample until no more bubbles are generated. After adding distilled water and phenolphthalein solution, neutralize by adding nitric acid until the color of phenolphthalein disappears. Total chlorine is measured by titration with 0.1mol/L silver nitrate solution. The endpoint is the maximum inflexion on the titration curve. The total chlorine concentration is calculated from the titration volume of the silver nitrate solution.

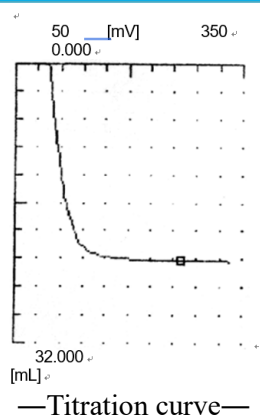
2. Apparatus

Main unit	Automatic potentiometric titrator (preamplifier STD)
Electrode	Combined silver electrode

3. Reagents

Titrant	0.1mol/L silver nitrate solution
Solvent	Distilled water, 3% hydrogen peroxide, 1% phenolphthalein solution, 0.1mol/L nitric acid

4. Example



—Measurement results—

	Sample (g)	Titer (mL)	Total chlorine (%)
1	1.0194	22.5449	7.8894
2	1.0128	22.4368	7.9027
3	1.0159	22.4683	7.8896
Average			7.8939
SD			0.0076
RSD(%)			0.097

Please feel free to contact us for any further information.
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