

Application Memo

Sulfadimethoxine of Dye

Industry	Paint, Adhesive
Instrument	Automatic potentiometric titrator
Measurement method	Polarization titration
Standards	JIS K 4101

1. Overview

Sulfadimethoxine is an intermediate of a dye, and its concentration is measured according to **JIS K 4101-1993 General test method for organic intermediates - 11.6 Diazotization titration – 11.6.2 Direct (General) method**. The sample, first hydrochloric acidified is dissolved with potassium bromide, and is titrated with 0.5mol/L sodium nitrite while maintaining temperature at 0 to 5°C. The endpoint is determined by the maximum inflexion point on the titration curve. The concentration of sulfadimethoxine is calculated from the titration volume of 0.5mol/L sodium nitrite.

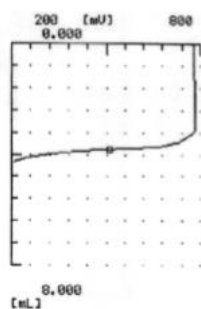
2. Apparatus

Main unit	Automatic potentiometric titrator (preamplifier POT)
Electrode	Twin platinum electrode

3. Reagents

Titrant	0.5mol/L sodium nitrite
Solvent	Hydrochloric acid, Potassium bromide

4. Example



—Titration curve—

—Measurement results—

	Sample (g)	Titer (mL)	Concentration (%)
1	1.0472	3.8363	56.837
2	1.1279	4.1275	56.777
3	1.0881	3.9521	56.353
Average			56.656
SD			0.264
RSD(%)			0.466

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