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**NONFERROUS METALS INDUSTRY STANDARD OF THE
PEOPLE'S REPUBLIC OF CHINA**

YS/T 715.3-2009

**Methods for chemical analysis of selenium dioxide. Part 3:
Determination of chlorine content. Silver chlorine
turbidimetric method**

二氧化硒化学分析方法 第3部分：氯量的测定 氯化银浊度法

(English Translation)

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Foreword

YS/T 715 "selenium dioxide chemical analysis method" is divided into five parts.

- Part 1. Determination of the amount of selenium dioxide, sodium thiosulfate titration;
- Part 2. arsenic, cadmium, iron, mercury, lead content - Inductively coupled plasma atomic emission spectrometry;
- Part 3. Determination of chlorine content of silver chloride turbidimetric method;
- Part 4. residue on ignition - Gravimetric method;
- Part 5. water-insoluble content - Gravimetric method.

This section YS/T Part 3 715.

The non-ferrous metal part by the National Standardization Technical Committee and centralized.

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1 Scope

YS/T of the provisions of section 715 of the method for the determination of selenium dioxide in the chlorine content.

This section applies to the determination of selenium dioxide in the chlorine content.
Measurement range. 0.0010% to 0.050%.

2 Method summary

Sample was dissolved in water, glycerol in the presence of silver nitrate and chlorine generated silver chloride emulsion, measured at 420nm wavelength spectrophotometer the amount of the absorbance.

3 Reagents

Unless otherwise indicated in the analysis using only the reagents and recognized as distilled or deionized water or equivalent purity analytical grade, this section Test water is deionized water, third grade water specifications.

Nitrate 3.1 (ρ 1.42g/mL).

Glycerin 3.2 (1 + 1).

3.3

silver nitrate solution (10g/L).

3.4

Storage chlorine standard solution. Weigh 1.6485g reference sodium chloride (pre-ignition to constant weight at 400 °C ~ 500 °C, cooled in a dryer to room temperature) was dissolved in water and transferred to 1000mL volumetric flask, dilute with water to the mark. This solution 1mL 1mg containing chlorine.

3.5

Chlorine Standard Solution A. Pipette 10.00mL chlorine standard stock solution (3.4) into 100mL volumetric flask, dilute to the mark with water, shake uniform. This solution 1mL containing 100 μ g chlorine.

3.6

chlorine standard solution B. Pipette 10.00mL chlorine standard solution A (3.5) into 100mL volumetric flask, dilute to the mark with water, shake uniform. This solution 1mL containing 10 μ g chlorine.

4 Instrument

Spectrophotometer.

5 Sample

Sample required uniform, dry and seal intact.

6.1 Sample

In dry conditions, according to Table 1 quickly and accurately weighed sample (5), accurate to 0.0001g.

Table 1 sample amount

Chlorine mass fraction /%	sample mass/g	dispensing volume of test solution/mL
0.0010	0.0030	2.0
full amount	> 0.0030 to 0.0075	2.0
10	> 0.0075	0.030
1.0	5	> 0.030 to 0.050
0.5		