

KES

**Method of Ferric Chloride
Test for Stainless Steels**

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Contents

- 1. Scope of Application**
- 2. Test Device**
- 3. Test Solution**
- 4. Test Piece**
- 5. Test Piece Heat Treatment for
Sensitivity**
- 6. Test Method**
- Quoted Standard**



1. Scope of application

This standard shall specify test method of degree of critical corrosion through observation of cracks by bending test after test by putting austenite series stainless steel in solution of boiling sulfur · copper sulfate.

2. Test equipment

Test equipment is as follows.

- (1) Use a glass flask (volume of about 1 ℓ) made by combining taper with normal counter current condenser made of glass that has enough cooling area for test container.
- (2) Use the one that can maintain test solution into silent equilibrium state for heating equipment.

3. Test solution

After making 1ℓ of sulfur · copper sulfate solution by dissolving a special grade article 100g specified at test solution KS M 8124 [Copper sulfate reagent] into distilled water and post-ionized water 700ml and by adding a special grade article 100ml specified at KS M 8103 [Sulfur (Reagent)] (Specific gravity about 1.84), add top pitch copper or copper piece having the same quality specified at KS D 5201 (A piece or a group of copper and alloy) enough to remain after finishing test.

4. Test piece

Test piece is as follows.

- (1) Use test pieces of shapes and sizes in table 1
- (2) Cut test pieces by a saw in principle. In the case of shearing, parts influenced by shearing must be removed by retouch the end of the cutting area using cutting or grinding machine.