

KES

Tensile Test Standard in High Temperature

KES T – L197

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Additional Rule

1. Scope of application

This standard shall regulate tensile test of metal in high temperature over normal temperature.

2. Purpose

The purpose of this standard is to measure properties of material under tensile load in high temperature, and to test mechanical properties like yield point (0.2 % of internal force), tensile strength, strain, and shrink rate of cross section.

3. Test device

(1) Tensile tester

- (a) Tester shall be based on KS B 5521 (Tensile tester).
- (b) When the test sample is sealed in a vessel to test in a vacuum or special gas, make correction to know weight of sample.

(2) Heating device

For heating the sample, use heating soil with temperature regulator. During the test, heat a sample uniformly and constantly within the allowable range in table 1. However, if it is less than 300 °C or more than 1200 °C, follow the agreement between people in concerns.

Table 1. Allowable temperature range of test sample

More than 300 °C less than 600 °C	More than 600 °C less than 800 °C	More than 800 °C less than 1200 °C
± 3 °C	± 4 °C	± 6 °C