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GB/T 28900-2022

Test methods of steel for reinforcement of concrete

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Foreword

This document was drafted in accordance with the rules given in GB/T 1.1-2020, Directives for standardization - Part 1.Rules for the structure and drafting of standardizing documents.

This document replaces GB/T 28900-2012 Test methods of steel for reinforcement of concrete. Compared with GB/T 28900-2012, except for structural adjustment and editorial changes, the main technical changes are as follows.

-- Change the scope of the document (see Chapter 1; Chapter 1 of the 2012 edition);

-- Add symbols and descriptions of L'o, L'u and deltal; remove the symbol and description of lambda (see Table 1; Table 1 of the 2012 edition);

-- Change some requirements for the tensile test procedure (see 6.3; 5.3 of the 2012 edition);

-- Add the calculation formula for Ar (see 6.3.4);

-- Add some requirements for the bending test (see 7.3);

-- Add the accuracy requirements for the measurement of width of the transverse rib (see 11.2);

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-- Add the measurement method of height of the transverse rib when there are different angles (beta) between the transverse rib and the axis (see 11.3.1);

-- Add the schematic diagram M'-M' of the cross-section of two adjacent transverse ribs along the axial direction (see Figure 6);

-- Remove the empirical formula in the simplified formulae [See Formula (8) of the 2012 edition];

-- Add the sampling position of the test piece used for the determination of weight deviation (see 13.1);

-- Remove part of the test procedures for the determination of weight deviation (see 12.3 of the 2012 edition);

-- Add the "Cyclic inelastic load test" (see Chapter 14);

-- Remove the "Metallographic test method for steel bars" (see Chapter 13 of the 2012 edition).

This document is modified and adopted from ISO 15630-1.2019 Steel for the reinforcement and prestressing of concrete - Test methods - Part 1.Reinforcing bars, rods and wire.

Compared with ISO 15630-1.2019, this document has a lot of adjustments in structure. See Appendix A for a list of structure number changes between the two documents.

Compared with ISO 15630-1.2019, this document has many technical differences, and the terms involved are marked with a vertical single line (|) on the outer margin. See Appendix B for a list of these technical differences and their reasons.

The following editorial changes have been made for this document.

-- Change the standard name to "Test methods of steel for reinforcement of concrete", in order to coordinate with the existing standards;

-- Remove Appendix A of ISO 15630-1.2019;

-- Remove Bibliography of ISO 15630-1.2019.

Please note that some contents of this document may involve patents. The issuing

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organization of this document is not responsible for identifying patents.

This document was proposed by China Iron and Steel Industry Association.

This document shall be under the jurisdiction of National Technical Committee 183 on Iron and Steel of Standardization Administration of China (SAC/TC 183).

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This document was first published in 2012, and this is the first revision.

Test methods of steel for reinforcement of concrete

1 Scope

This document specifies the test methods of tensile test, bending test, rebending test, axial force fatigue test, chemical analysis, geometric dimension measurement, determination of specific projected rib area, determination of weight deviation and cyclic inelastic load test of steel for reinforcement of concrete.

2 Normative references

The following documents are normatively referenced in this document and are indispensable for its application. For dated references, only the version corresponding to that date is applicable to this document; for undated references, the latest version (including all amendments) is applicable to this document.

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