

Thin magnetic steel strip and sheet for use at medium frequencies

EESTI STANDARDI EESSÕNA

NATIONAL FOREWORD

See Eesti standard EVS-EN 10303:2015 sisaldab Euroopa standardi EN 10303:2015 ingliskeelset teksti.	This Estonian standard EVS-EN 10303:2015 consists of the English text of the European standard EN 10303:2015.
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English Version

Thin magnetic steel strip and sheet for use at medium frequencies

Bandes et tôles extra-minces en acier électrique pour utilisation à moyennes fréquences

Dünnes Elektrobund und -blech aus Stahl zur Verwendung bei mittleren Frequenzen

This European Standard was approved by CEN on 29 August 2015.

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European foreword

This document (EN 10303:2015) has been prepared by Technical Committee ECISS/TC 108 “Steel sheet and strip for electrical applications”, the secretariat of which is held by DIN.

This European Standard shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by April 2016, and conflicting national standards shall be withdrawn at the latest by April 2016.

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This document supersedes EN 10303:2001.

Regarding the changes that were made in this new edition of EN 10303, see Annex E.

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1 Scope

This European Standard defines the grades of thin non-oriented magnetic steel strip and sheet in nominal thicknesses of 0,05 mm, 0,10 mm, 0,15 mm, 0,20 mm, 0,25 mm, 0,27 mm, 0,30 mm and 0,35 mm, and of thin grain-oriented magnetic steel strip and sheet in nominal thicknesses of 0,05 mm, 0,10 mm, 0,15 mm and 0,18 mm. In particular, it gives general requirements, magnetic properties, geometric characteristics and tolerances and technological characteristics, as well as inspection procedure.

This European Standard applies to magnetic steel strip and sheet supplied in the finally annealed condition in coils and intended for the construction of magnetic circuits used at frequencies equal to or higher than 100 Hz.

2 Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

EN 10021, *General technical delivery conditions for steel products*

EN 10204, *Metallic products — Types of inspection documents*

EN 10251, *Magnetic materials — Methods of determination of the geometrical characteristics of electrical steel sheet and strip*

EN 60404-2, *Magnetic materials — Part 2: Methods of measurement of the magnetic properties of electrical steel strip and sheet by means of an Epstein frame (IEC 60404-2)*

EN 60404-13, *Magnetic materials — Part 13: Methods of measurement of density, resistivity and stacking factor of electrical steel sheet and strip (IEC 60404-13)*

EN ISO 377, *Steel and steel products — Location and preparation of samples and test pieces for mechanical testing (ISO 377)*

EN ISO 6892-1, *Metallic materials — Tensile testing — Part 1: Method of test at room temperature (ISO 6892-1)*

EN ISO 7799, *Metallic materials — Sheet and strip 3 mm thick or less — Reverse bend test (ISO 7799)*

IEC 60050-121, *International Electrotechnical Vocabulary — Chapter 121: Electromagnetism*

IEC 60050-221, *International Electrotechnical Vocabulary — Chapter 221: Magnetic materials and components*

IEC 60404-10, *Magnetic materials — Part 10: Methods of measurement of magnetic properties of magnetic sheet and strip at medium frequencies*

3 Terms and definitions

For the purposes of this document, the terms and definitions given in IEC 60050-121, IEC 60050-221 and the following apply.