
Magnetni materiali - Tanka magnetna jeklena pločevina in trakovi za uporabo pri srednjih frekvencah

Magnetics materials - Thin magnetic steel strip and sheet for use at medium frequencies

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

Matériaux magnétiques - Bandes et tôles magnétiques minces en acier pour utilisation à moyennes fréquences

Ta slovenski standard je istoveten z: prEN 10303

ICS:

77.140.40	Jekla s posebnimi magnetnimi lastnostmi	Steels with special magnetic properties
77.140.50	Ploščati jekleni izdelki in polizdelki	Flat steel products and semi-products

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EUROPEAN STANDARD
NORME EUROPÉENNE
EUROPÄISCHE NORM

DRAFT
prEN 10303

June 2026

ICS 77.140.40; 77.140.50

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English Version

**Magnetics materials - Thin magnetic steel strip and sheet
for use at medium frequencies**

Matériaux magnétiques - Bandes et tôles magnétiques
minces en acier pour utilisation à moyennes
fréquences

Magnetische Werkstoffe - Dünnes Elektroband und -
blech aus Stahl zur Verwendung bei mittleren
Frequenzen

This draft European Standard is submitted to CEN members for enquiry. It has been drawn up by the Technical Committee CEN/TC 459/SC 8.

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prEN 10303:2026 (E)**European foreword**

This document (prEN 10303:2026) has been prepared by Technical Committee CEN/TC 459/SC 8 “Steel sheet and strip for electrical applications”, the secretariat of which is held by DIN.

This document is currently submitted to the CEN Enquiry.

This document will supersede EN 10303:2015.

prEN 10303:2026 includes the following significant technical changes with respect to EN 10303:2015:

- the normative references and the definitions have been updated;
- the list of options is more detailed (see 5.2);
- “defects” has been replaced by “imperfections”;
- throughout the document technical changes have been made to improve the tolerances supplied;
- 0,05 mm thickness have been removed for both grain oriented and non-oriented grades;
- throughout the document, editorial changes have been made to improve the quality of the text.

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1 Scope

This document defines the grades of thin non-oriented magnetic steel strip and sheet in nominal thicknesses of 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 0,10 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 document 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 are referred to in the text in such a way that some or all of their content constitutes requirements of this document. 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 10251:2024, *Magnetic materials — Methods of determination of the geometrical characteristics of electrical steel sheet and strip*

EN 10342, *Magnetic materials — Classification of surface insulations of electrical steel sheet, strip and laminations*

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 IEC 60404-11, *Magnetic materials — Part 11: Methods of measurement of the surface insulation resistance of electrical steel strip and sheet (IEC 60404-11)*

EN IEC 60404-12, *Magnetic materials — Part 12: Methods of test for the assessment of the thermal endurance of surface insulation coatings on electrical steel strip and sheet (IEC 60404-12)*

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