



SLOVENSKI STANDARD
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Aluminij in aluminijeve zlitine - Gradbeni proizvodi za konstrukcijska dela - Ocena in deklaracija lastnosti

Aluminium and aluminium alloys - Structural products for construction works - Performance assessment and declaration

Aluminium und Aluminiumlegierungen - Erzeugnisse für Tragwerksanwendungen - Technische Lieferbedingungen

Aluminium et alliages d'aluminium - Produits structurels pour les ouvrages de construction - Évaluation et déclaration des performances

Ta slovenski standard je istoveten z: prEN 15088

ICS:

77.150.10 Alumijski izdelki Aluminium products

oSIST prEN 15088:2026

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EUROPEAN STANDARD
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EUROPÄISCHE NORM

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April 2026

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Will supersede EN 15088:2005

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Aluminium and aluminium alloys - Structural products for construction works - Performance assessment and declaration

Aluminium et alliages d'aluminium - Produits
structurels pour les ouvrages de construction -
Évaluation et déclaration des performances

Aluminium und Aluminiumlegierungen - Erzeugnisse
für Tragwerksanwendungen - Technische
Lieferbedingungen

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European foreword

This document (prEN 15088:2026) has been prepared by Technical Committee CEN/TC 132 “Aluminium and aluminium alloys”, the secretariat of which is held by AFNOR.

This document is currently submitted to the CEN Enquiry.

This document will supersede EN 15088:2005.

prEN 15088:2026 includes the following significant technical changes with respect to EN 15088:2005:

- adaptation to the Standardization Request for Structural Metallic Products in the framework of the Construction Products Regulation (EU) No 305/2011;
- introduction of Reference Service Life as essential characteristic;
- introduction of environmental sustainability essential characteristics, assessments and related Assessment and Verification of Constancy of Performance (AVCP) system 3+;
- added reference to forms of structural products made of aluminium and aluminium alloys (i.e. extruded rods, bars, tubes and profiles; cold-drawn rods and bars; precision profiles; sheets and strips including coil-coated sheets and strips; plates including tread plates; drawn tubes and wires; castings and forgings);
- revision of normative references.

This document has been prepared under a standardization request addressed to CEN by the European Commission. The Standing Committee of the EFTA States subsequently approves these requests for its Member States.

For the relationship with EU Legislation, see informative Annex ZA, which is an integral part of this document.

1 Scope

This document covers products made of aluminium and aluminium alloys intended to be used as structural elements in construction works, including its use in installations.

A product can be delivered in its final shape in coils or in one of the following forms:

- extruded rods, bars, tubes and profiles;
- cold-drawn rods and bars;
- precision profiles;
- sheets and strips including coil-coated sheets and strips;
- plates including tread plates;
- drawn tubes and wires;
- castings;
- forgings.

When delivered in coils, the characteristics are assessed on samples taken after de-coiling, straightening, cutting and bending according to the applicable factory production control procedure.

Procedures for assessment and verification of constancy of performance (AVCP) of characteristics of structural elements made of aluminium and aluminium alloys are specified in this document.

Products delivered in other forms, e.g. delivered after machining or joining operations such as bolting and welding, are excluded from the scope of this document.

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 485-1:2016, *Aluminium and aluminium alloys — Sheet, strip and plate — Part 1: Technical conditions for inspection and delivery*

EN 485-2:2016+A1:2018, *Aluminium and aluminium alloys — Sheet, strip and plate — Part 2: Mechanical properties*

EN 586-2:1994, *Aluminium and aluminium alloys — Forgings — Part 2: Mechanical properties and additional property requirements*

EN 754-1:2016, *Aluminium and aluminium alloys — Cold drawn rod/bar and tube — Part 1: Technical conditions for inspection and delivery*

EN 754-2:2024, *Aluminium and aluminium alloys — Cold drawn rod/bar and tube — Part 2: Mechanical properties*

EN 755-1:2016, *Aluminium and aluminium alloys — Extruded rod/bar, tube and profiles — Part 1: Technical conditions for inspection and delivery*

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EN 755-2:2025, *Aluminium and aluminium alloys — Extruded rod/bar, tube and profiles — Part 2: Mechanical properties*

EN 1301-2:2008, *Aluminium and aluminium alloys — Drawn wire — Part 2: Mechanical properties*

EN 1386:2007, *Aluminium and aluminium alloys — Tread plate — Specifications*

EN 1396:2023, *Aluminium and aluminium alloys — Coil coated sheet and strip for general applications - Specifications*

EN 1706:2020+A1:2021, *Aluminium and aluminium alloys — Castings — Chemical composition and mechanical properties*

EN 12258-1:2012, *Aluminium and aluminium alloys — Terms and definitions — Part 1: General terms*

EN 13501-1:2018, *Fire classification of construction products and building elements — Part 1: Classification using data from reaction to fire tests*

EN 15804:2012+A2:2019, *Sustainability of construction works — Environmental product declarations - Core rules for the product category of construction products*

prEN 17662:2025, *Execution of steel structures and aluminium structures — Environmental Product Declarations — Product category rules complementary to EN 15804 for Steel, Iron and Aluminium structural products for use in construction works*

3 Terms, definitions, symbols, units and abbreviated terms

For the purposes of this document, the following terms and definitions given in EN 12258-1:2012 and the following apply.

ISO and IEC maintain terminology databases for use in standardization at the following addresses:

- ISO Online browsing platform: available at <https://www.iso.org/obp/>
- IEC Electropedia: available at <https://www.electropedia.org/>

3.1 Terms and definitions

3.1.1

aluminium structural element

any aluminium product which is placed on the market that could be transformed into a structural component, to be used as load-bearing part of a work

3.1.2

aluminium product family

group of products of the same series of aluminium alloys, process (i.e.: extrusion, rolled, casting, forging) and similar kind of temper that is produced by the same production line

EXAMPLE 1 For extrusion: EN AW 6060-T6 is in the same product family as EN AW 6082-T5.

EXAMPLE 2 For rolling: EN AW 5005-O is in the same product family as EN AW 5083-H24.

3.2 Symbols

$A, A_{50\text{ mm}}$	Elongation
R_m	Ultimate tensile strength
$R_{p0,2}$	0,2 % proof strength
N	Number of cycles derived from test results

4 Characteristics

4.1 Ultimate tensile strength

The capacity of a product to withstand loads tending to elongate.

NOTE This characteristic is referenced as “tensile strength” (with symbol R_m) in standards like EN 755-2 or EN 485-2.

When tested in accordance with the test method given in 5.1, results are expressed in MPa.

4.2 0,2 % proof strength

The stress at which a specific amount of plastic deformation is produced.

NOTE This characteristic is also referenced as “yield strength” (with symbol $R_{p0,2}$) in standards like EN 755-2 or EN 485-2.

When tested in accordance with the test method given in 5.2, results are expressed in MPa.

4.3 Elongation after fracture

The amount of permanent elongation of the gauge length after fracture, expressed as a percentage of the original gauge length.

NOTE This characteristic is referenced as “elongation A or $A_{50\text{ mm}}$ (minimum)” in standards like EN 755-2 or EN 485-2.

When tested in accordance with the test method given in 5.3, results are expressed as %.

4.4 Reaction to fire

4.4.1 General

The reaction to fire indicates the degree of contribution of the material to the behaviour of the construction product in the event of fire. When tested in accordance with the test methods given in 5.4, relevant for the claimed class, the test results are expressed as a class according to EN 13501-1:2018.

4.4.2 Classification without testing (WT)

Whether products covered by this standard are made from one or more of the materials that have been considered, under established conditions, as belonging to the category “No contribution to fire” because of their low level of combustibility, the reaction to fire class A applies to these products without the need of carrying out reaction to fire tests