



# SLOVENSKI STANDARD

## kSIST FprEN 754-1:2015

01-oktober-2015

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### **Aluminij in aluminijeve zlitine - Hladno vlečene palice/drogovi in cevi - 1. del: Tehnični pogoji za pregled in dobavo**

Aluminium and aluminium alloys - Cold drawn rod/bar and tube - Part 1: Technical conditions for inspection and delivery

Aluminium und Aluminiumlegierungen - Gezogene Stangen und Rohre - Teil 1: Technische Lieferbedingungen

Aluminium et alliages d'aluminium - Barres et tubes étirés - Partie 1 : Conditions techniques de contrôle et de livraison

**Ta slovenski standard je istoveten z: FprEN 754-1**

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#### **ICS:**

77.150.10      Alumijski izdelki                      Aluminium products

**kSIST FprEN 754-1:2015**                      **en,fr,de**



EUROPEAN STANDARD  
NORME EUROPÉENNE  
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**FINAL DRAFT**  
**FprEN 754-1**

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ICS 77.150.10

Will supersede EN 754-1:2008

English Version

## Aluminium and aluminium alloys - Cold drawn rod/bar and tube - Part 1: Technical conditions for inspection and delivery

Aluminium et alliages d'aluminium - Barres et tubes étirés -  
Partie 1 : Conditions techniques de contrôle et de livraison

Aluminium und Aluminiumlegierungen - Gezogene Stangen  
und Rohre - Teil 1: Technische Lieferbedingungen

This draft European Standard is submitted to CEN members for unique acceptance procedure. It has been drawn up by the Technical Committee CEN/TC 132.

If this draft becomes a European Standard, CEN members are bound to comply with the CEN/CENELEC Internal Regulations which stipulate the conditions for giving this European Standard the status of a national standard without any alteration.

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Recipients of this draft are invited to submit, with their comments, notification of any relevant patent rights of which they are aware and to provide supporting documentation.

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EUROPEAN COMMITTEE FOR STANDARDIZATION  
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EUROPÄISCHES KOMITEE FÜR NORMUNG

**CEN-CENELEC Management Centre: Avenue Marnix 17, B-1000 Brussels**

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## European foreword

This document (FprEN 754-1:2015) 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 Unique Acceptance Procedure.

This document will supersede EN 754-1:2008.

Within its programme of work, Technical committee CEN/TC 132 entrusted CEN/TC 132/WG 5 "Extruded and drawn products" to revise EN 754-1:2008.

The following technical modifications have been introduced during the revision:

- In the Normative references clause, EN 10002-1 was replaced by EN ISO 6892-1.

EN 754, *Aluminium and aluminium alloys — Cold drawn rod/bar and tube* comprises the following parts:

- *Part 1: Technical conditions for inspection and delivery*
- *Part 2: Mechanical properties*
- *Part 3: Round bars, tolerances on dimensions and form*
- *Part 4: Square bars, tolerances on dimensions and form*
- *Part 5: Rectangular bars, tolerances on dimensions and form*
- *Part 6: Hexagonal bars, tolerances on dimensions and form*
- *Part 7: Seamless tubes, tolerances on dimensions and form*
- *Part 8: Porthole tubes, tolerances on dimensions and form*

**FprEN 754-1:2015 (E)****1 Scope**

This European Standard specifies the technical conditions for inspection and delivery of aluminium and aluminium alloy cold drawn rod/bar and tube for general engineering applications.

This document applies to products which are extruded and then cold drawn.

This document does not apply to:

- forging stock (EN 603),
- products delivered in coils (EN 13958),
- coiled tubes cut to length (EN 13958).

**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 515, *Aluminium and aluminium alloys - Wrought products - Temper designations*

EN 573-3, *Aluminium and aluminium alloys - Chemical composition and form of wrought products - Part 3: Chemical composition and form of products*

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

EN 754-3, *Aluminium and aluminium alloys - Cold drawn rod/bar and tube - Part 3: Round bars, tolerances on dimensions and form*

EN 754-4, *Aluminium and aluminium alloys - Cold drawn rod/bar and tube - Part 4: Square bars, tolerances on dimensions and form*

EN 754-5, *Aluminium and aluminium alloys - Cold drawn rod/bar and tube - Part 5: Rectangular bars, tolerances on dimensions and form*

EN 754-6, *Aluminium and aluminium alloys - Cold drawn rod/bar and tube - Part 6: Hexagonal bars, tolerances on dimensions and form*

EN 754-7, *Aluminium and aluminium alloys - Cold drawn rod/bar and tube - Part 7: Seamless tubes, tolerances on dimensions and form*

EN 754-8, *Aluminium and aluminium alloys - Cold drawn rod/bar and tube - Part 8: Porthole tubes, tolerances on dimensions and form*

EN 2004-1, *Aerospace series - Test methods for aluminium and aluminium alloy products - Part 1: Determination of electrical conductivity of wrought aluminium alloys*

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

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

EN 14242, *Aluminium and aluminium alloys - Chemical analysis - Inductively coupled plasma optical emission spectral analysis*

EN 14361, *Aluminium and aluminium alloys - Chemical analysis - Sampling from metal melts*

EN ISO 6506-1, *Metallic materials - Brinell hardness test - Part 1: Test method (ISO 6506-1)*

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

ISO 9591, *Corrosion of aluminium alloys — Determination of resistance to stress corrosion cracking*

ASTM G47, *Standard Test Method for Determining Susceptibility to Stress-Corrosion Cracking of 2XXX and 7XXX Aluminium Alloy Products*

### 3 Terms and definitions

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

#### 3.1

##### **order document**

document or set of documents agreed between supplier and purchaser at the time of ordering

### 4 Ordering information

The order document shall contain the following:

a) form and type of product:

- 1) form of the product (cold drawn rod/bar or tube). If tube, whether seamless or porthole/bridge;
- 2) reference to EN 573-3 for chemical composition limits;
- 3) reference to EN 515 for temper designation;
- 4) purchaser application, in particular whether subsequent anodising is intended. This shall be clearly stated on the order document;

b) reference to EN 754-2 for mechanical property limits;

c) a reference to this document (EN 754-1);

d) dimensions and shape of the product:

1) round tube:

i) length;

and only two of the following dimensions:

ii) outside diameter;

iii) inside diameter;

- iv) the tolerances for outside or inside diameter shall state as to whether the proposed tolerances are mean or inclusive of ovality (i.e. the maximum allowable deviation at any point from the specified diameter. If this is not made clear on the order, then the supplier shall assume that the specified tolerances for either or both outside and inside diameters are inclusive of ovality.

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However, if the purchaser specifically requires that the outside and/or inside diameter tolerances must be both mean and inclusive of ovality then this shall be clearly stated on the order;

- v) wall thickness;
- 2) round bar:
  - i) diameter;
  - ii) length;
- 3) square and hexagonal bar:
  - i) width across flats;
  - ii) length;
- 4) rectangular bar:
  - i) width;
  - ii) thickness;
  - iii) length;
- 5) all other cases:
  - i) drawing of cross section;
  - ii) length;
- e) tolerances on dimensions and form, with reference to the appropriate European Standard and/or a drawing;
- f) quantity:
  - 1) mass;
  - 2) number of pieces;
  - 3) total length;
  - 4) tolerance on quantity;
- g) any requirements for inspection documents;
- h) any special requirements agreed between supplier and purchaser:
  - 1) marking of products;
  - 2) reference to drawings, part numbers, etc.;
  - 3) additional or special testing, e.g. stress corrosion testing;
  - 4) surface finish requirements;
  - 5) surface protection;