

STN	Ocele a liatiny Stanovenie obsahu chrómu Metóda plameňovej atómovej absorpcnej spektrometrie (FAAS)	STN EN 10188
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Steels and cast irons - Determination of chromium content - Flame atomic absorption spectrometric method (FAAS)

Táto norma obsahuje anglickú verziu európskej normy.
This standard includes the English version of the European Standard.

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English Version

Steels and cast irons - Determination of chromium content
- Flame atomic absorption spectrometric method (FAAS)

Aciérs et fontes - Détermination de la teneur en
chrome - Méthode par spectrométrie d'absorption
atomique dans la flamme (SAAF)

Chemische Analyse von Eisenwerkstoffen -
Bestimmung von Chrom in Stahl und Eisen -
Flammenatomabsorptionsspektrometrisches
Verfahren (FAAS)

This European Standard was approved by CEN on 29 April 2024.

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EUROPEAN COMMITTEE FOR STANDARDIZATION
COMITÉ EUROPÉEN DE NORMALISATION
EUROPÄISCHES KOMITEE FÜR NORMUNG

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European foreword

This document (EN 10188:2024) has been prepared by Technical Committee CEN/TC 459/SC 2 "Methods of chemical analysis for iron and steel", the secretariat of which is held by SIS.

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of an identical text or by endorsement, at the latest by December 2024, and conflicting national standards shall be withdrawn at the latest by December 2024.

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. CEN shall not be held responsible for identifying any or all such patent rights.

This document supersedes EN 10188:1989.

In comparison with the previous edition, the following technical modifications have been made:

- normative references: updated;
- Clause 3 Terms and definitions: added;
- subclauses 5.10 and 5.11: added;
- subclauses 6.1 and 6.2: added;
- in 6.3.3.3: definition of limit of detection added;
- subclause 6.3: reworded;
- Clause 7: updated;
- subclause 8.3.1: partially aligned with ISO 10138:1991;
- subclause 8.3.2: aligned with ISO 10138:1991;
- subclause 8.3.4: aligned with EN 10136:2019;
- Bibliography: added.

Any feedback and questions on this document should be directed to the users' national standards body. A complete listing of these bodies can be found on the CEN website.

According to the CEN-CENELEC Internal Regulations, the national standards organisations of the following countries are bound to implement this European Standard: Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Republic of North Macedonia, Romania, Serbia, Slovakia, Slovenia, Spain, Sweden, Switzerland, Türkiye and the United Kingdom.

EN 10188:2024 (E)**1 Scope**

This document specifies a flame atomic absorption spectrometric method (FAAS) for the determination of chromium content in steels and cast irons.

The method is applicable to non-alloy and low-alloy steels and cast irons with chromium contents between 0,002 % (by mass) to 2,0 % (by mass).

The method can be adapted to lower or higher chromium contents by changing the test portion or the dilution factor, provided the criteria in 6.3.2 and 6.3.3 are still met.

The precision data of the present method are given in Annex A.

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 ISO 648, *Laboratory glassware — Single-volume pipettes (ISO 648)*

EN ISO 1042, *Laboratory glassware — One-mark volumetric flasks (ISO 1042)*

EN ISO 14284, *Steel and iron — Sampling and preparation of samples for the determination of chemical composition (ISO 14284)*

EN ISO 3696, *Water for analytical laboratory use — Specification and test methods (ISO 3696)*

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