

STANDARDNE KATSEMEETOD SIGARETTIDE
SÜÜTAMISVÕIME HINDAMISEKS

Standard test method for assessing the ignition
propensity of cigarettes (ISO 12863:2022)

EESTI STANDARDI EESSÕNA

NATIONAL FOREWORD

See Eesti standard EVS-EN ISO 12863:2022 sisaldab Euroopa standardi EN ISO 12863:2022 ingliskeelset teksti.	This Estonian standard EVS-EN ISO 12863:2022 consists of the English text of the European standard EN ISO 12863:2022.
Standard on jõustunud sellekohase teate avaldamisega EVS Teatajas	This standard has been endorsed with a notification published in the official bulletin of the Estonian Centre for Standardisation and Accreditation.
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EUROPEAN STANDARD

EN ISO 12863

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Supersedes EN ISO 12863:2010, EN ISO 12863:2010/AC:2011, EN ISO 12863:2010/A1:2016

English Version

Standard test method for assessing the ignition propensity of cigarettes (ISO 12863:2022)

Méthode d'essai normalisée pour évaluer le potentiel
incendiaire des cigarettes (ISO 12863:2022)

Normprüfverfahren zur Beurteilung der Zündneigung
von Zigaretten (ISO 12863:2022)

This European Standard was approved by CEN on 28 March 2022.

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

CEN-CENELEC Management Centre: Rue de la Science 23, B-1040 Brussels

European foreword

This document (EN ISO 12863:2022) has been prepared by Technical Committee ISO/TC 92 "Fire safety" in collaboration with Technical Committee CEN/TC 401 "Reduced Ignition Propensity Cigarettes" 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of an identical text or by endorsement, at the latest by October 2022, and conflicting national standards shall be withdrawn at the latest by October 2022.

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 ISO 12863:2010.

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

According to the CEN-CENELEC Internal Regulations, the national standards organizations 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, Turkey and the United Kingdom.

Endorsement notice

The text of ISO 12863:2022 has been approved by CEN as EN ISO 12863:2022 without any modification.

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Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

The procedures used to develop this document and those intended for its further maintenance are described in the ISO/IEC Directives, Part 1. In particular, the different approval criteria needed for the different types of ISO documents should be noted. This document was drafted in accordance with the editorial rules of the ISO/IEC Directives, Part 2 (see www.iso.org/directives).

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Any trade name used in this document is information given for the convenience of users and does not constitute an endorsement.

For an explanation of the voluntary nature of standards, the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the World Trade Organization (WTO) principles in the Technical Barriers to Trade (TBT), see www.iso.org/iso/foreword.html.

This document was prepared by Technical Committee ISO/TC 92, *Fire safety*, Subcommittee SC 1, *Fire initiation and growth*, in collaboration with the European Committee for Standardization (CEN) Technical Committee CEN/TC 401, *Reduced Ignition Propensity Cigarettes*, in accordance with the Agreement on technical cooperation between ISO and CEN (Vienna Agreement).

This second edition cancels and replaces the first edition (ISO 12863:2010), which has been technically revised. It also incorporates the Amendment ISO 12863:2010/Amd 1:2016 and the Technical Corrigendum ISO 12863:2010/Cor 1:2011.

The main changes are as follows:

- a new [Annex G](#) “Physical parameters of filter paper substrates for the determination of ignition propensity of cigarettes” has been added;
- the Bibliography has been updated.

Any feedback or questions on this document should be directed to the user's national standards body. A complete listing of these bodies can be found at www.iso.org/members.html.

Introduction

A very common initiating event in a fatal fire is the dropping of a cigarette onto a bed or piece of upholstered furniture. The burning cigarette heats the furnishing materials to the point where smouldering combustion begins, perhaps followed by a transition to flaming combustion. Since limiting the frequency of ignitions is a principal approach to reducing fire loss, it is desirable to establish a test method for the propensity of a cigarette to ignite soft furnishings.

This document is based, with permission from ASTM International, on ASTM International E2187, *Standard Test Method for Measuring the Ignition Strength of Cigarettes*, copyright ASTM International.

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Standard test method for assessing the ignition propensity of cigarettes

WARNING — This document involves the use of combustible materials that are exposed to ignition sources. The burning materials emit toxic combustion products. The user shall take proper precautions to avoid thermal injury and inhalation of combustion products. The user shall ensure that all burning has ceased before safely discarding test materials.

1 Scope

This document specifies a test method for testing the capability of a cigarette, positioned on one of three standard substrates, to extinguish or to generate sufficient heat to continue burning, and thus potentially cause ignition of bedding or upholstered furniture. This document is only applicable to factory-made cigarettes that burn along the length of a tobacco column.

This is a performance-based document; it does not prescribe any design features of the cigarette that can lead to improved or degraded performance in the test method. The output of this method has been correlated with the potential for cigarettes to ignite upholstered furniture.

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.

ASTM E2187, *Standard Test Method for Measuring the Ignition Strength of Cigarettes*

ISO 534, *Paper and board — Determination of thickness, density and specific volume*

ISO 536, *Paper and board — Determination of grammage*

ISO 5636-5, *Paper and board — Determination of air permeance (medium range) — Part 5: Gurley method*

ISO 8243, *Cigarettes — Sampling*

ISO 8791-2, *Paper and board — Determination of roughness/smoothness (air leak methods) — Part 2: Bendtsen method*

ISO 13943, *Fire safety — Vocabulary*

3 Terms and definitions

For the purposes of this document, the terms and definitions given in ISO 13943 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

determination

single measurement involving a lit cigarette placed on a selected substrate