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BSI Standards Publication

Utility lighters — Safety specifications

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National foreword

This British Standard is the UK implementation of ISO 22702:2018. It supersedes BS ISO 22702:2003+A1:2008, which is withdrawn.

The UK participation in its preparation was entrusted to Technical Committee PRI/26, Burning behaviour of plastics and rubbers.

A list of organizations represented on this committee can be obtained on request to its secretary.

This publication does not purport to include all the necessary provisions of a contract. Users are responsible for its correct application.

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Utility lighters — Safety specifications

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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).

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. ISO shall not be held responsible for identifying any or all such patent rights. Details of any patent rights identified during the development of the document will be in the Introduction and/or on the ISO list of patent declarations received (see www.iso.org/patents).

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 61, *Plastics*, Subcommittee SC 4, *Burning behaviour*.

This second edition cancels and replaces the first edition (ISO 22702:2003), which has been technically revised. It also incorporates the Amendment ISO 22702:2003/Amd.1:2008.

The main changes compared to the previous edition are as follows:

- [Clause 2](#), [3.20](#), [3.21](#), [subclause 4.2.10](#), [subclause 4.2.11](#), [subclause 4.5.4](#), [subclause 4.5.5](#), [subclause 4.7](#), [subclause 8.1](#), [subclause 8.8.4.9](#), [subclause 8.8.4.10](#) have been added;
- [subclause 5.4](#), [subclause 5.7](#), [subclause 7.1.4](#), [Figure 3](#), [Figure 4](#), [Figure 6](#), [subclause 8.3.3](#), [Figure 8](#), [subclause 8.7.4](#), [subclause 8.10.5](#), [subclause 8.12.4](#) and [Annex A](#) have been modified;
- Bibliography has been deleted.

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.

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Introduction

Utility lighters, being flame-producing devices, can, as do all flame sources, present a potential hazard to the user. The safety specifications given in this document cannot eliminate all hazards, but are intended to minimize potential hazards of utility lighters to users.

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Utility lighters — Safety specifications

WARNING — This document does not purport to address all the safety concerns, if any, associated with its use. It is the responsibility of the user of this document to establish appropriate safety and health practices and to determine the applicability of any other restrictions.

1 Scope

This document specifies requirements for utility lighters to ensure a reasonable degree of safety for normal use or reasonably foreseeable misuse of such lighters by users.

This document applies to all flame-producing consumer products commonly known as utility lighters (also known as grill lighters, fireplace lighters, lighting rods or gas matches), and similar devices.

It does not apply to matches and flame-producing products intended for igniting cigars, pipes and cigarettes.

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.

ISO 7941, *Commercial propane and butane — Analysis by gas chromatography*

UL 1439, *Tests for Sharpness of Edges on Equipment*

3 Terms and definitions

For the purposes of this document, the following terms and definitions apply.

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

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

3.1

valve

component of a *utility lighter* (3.6) that controls the input or release of *fuel* (3.9)

3.2

nozzle

end of the fuel discharge system

3.3

flame height

linear distance from the tip of the visible *flame* (3.19) to the end of the *shield* (3.12)

3.4

flaring

variation of *flame height* (3.3) from the steady-state flame condition