Specifications for the re-use of sulphur hexafluoride (SF6) and its mixtures in electrical equipment



#### EESTI STANDARDI EESSÕNA

#### NATIONAL FOREWORD

See Eesti standard EVS-EN IEC 60480:2019 sisaldab Euroopa standardi EN IEC 60480:2019 ingliskeelset teksti.	This Estonian standard EVS-EN IEC 60480:2019 consists of the English text of the European standard EN IEC 60480:2019.
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.
Euroopa standardimisorganisatsioonid on teinud Euroopa standardi rahvuslikele liikmetele kättesaadavaks 24.05.2019.	Date of Availability of the European standard is 24.05.2019.
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#### ICS 29.040.20, 29.130.01

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## EUROPEAN STANDARD NORME EUROPÉENNE EUROPÄISCHE NORM

**EN IEC 60480** 

May 2019

ICS 29.130.01; 29.040.20

Supersedes EN 60480:2004

#### **English Version**

# Specifications for the re-use of sulphur hexafluoride (SF<sub>6</sub>) and its mixtures in electrical equipment (IEC 60480:2019)

Spécifications pour la réutilisation de l'hexafluorure de soufre ( $SF_6$ ) et des mélanges contenant du  $SF_6$  dans le matériel électrique (IEC 60480:2019)

Spezifikationen für die Wiederverwendung von Schwefelhexafluorid ( $SF_\theta$ ) und seinen Mischungen in elektrischen Betriebsmitteln (IEC 60480:2019)

This European Standard was approved by CENELEC on 2019-05-09. CENELEC 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.

Up-to-date lists and bibliographical references concerning such national standards may be obtained on application to the CEN-CENELEC Management Centre or to any CENELEC member.

This European Standard exists in three official versions (English, French, German). A version in any other language made by translation under the responsibility of a CENELEC member into its own language and notified to the CEN-CENELEC Management Centre has the same status as the official versions.

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European Committee for Electrotechnical Standardization Comité Européen de Normalisation Electrotechnique Europäisches Komitee für Elektrotechnische Normung

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

#### **European foreword**

The text of document 10/1075/FDIS, future edition 3 of IEC 60480, prepared by IEC/TC 10 "Fluids for electrotechnical applications" was submitted to the IEC-CENELEC parallel vote and approved by CENELEC as EN IEC 60480:2019.

The following dates are fixed:

- latest date by which the document has to be implemented at national (dop) 2020-02-09 level by publication of an identical national standard or by endorsement
- latest date by which the national standards conflicting with the document have to be withdrawn

This document supersedes EN 60480:2004.

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#### **Endorsement notice**

The text of the International Standard IEC 60480:2019 was approved by CENELEC as a European Standard without any modification.

In the official version, for Bibliography, the following notes have to be added for the standards indicated:

IEC 60079-29-2	NOTE	Harmonized as EN 60079-29-2
IEC 62271-203	NOTE	Harmonized as EN 62271-203
IEC 60376	NOTE	Harmonized as EN IEC 60376
IEC 60068-2-17	NOTE	Harmonized as EN 60068-2-17

#### **Annex ZA**

(normative)

## Normative references to international publications with their corresponding European publications

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.

NOTE 1 Where an International Publication has been modified by common modifications, indicated by (mod), the relevant EN/HD applies.

NOTE 2 Up-to-date information on the latest versions of the European Standards listed in this annex is available here: <a href="https://www.cenelec.eu">www.cenelec.eu</a>.

<u>Publication</u>	<u>Year</u>	<u>Title</u>	EN/HD	<u>Year</u>
IEC 60050-192	-	International electrotechnical vocabulary - Part 192: Dependability	-	-
IEC 60050-212	-	International Electrotechnical Vocabulary - Part 212: Electrical insulating solids, liquids and gases	-	-
IEC 60050-441	-	International Electrotechnical Vocabulary. Switchgear, controlgear and fuses	-	-
IEC 60050-826	-	International Electrotechnical Vocabulary - Part 826: Electrical installations	-	-
IEC 62271-4	2013	High-voltage switchgear and controlgear - Part 4: Handling procedures for sulphur hexafluoride (SF <sub>6</sub> ) and its mixtures	EN 62271-4	2013

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#### INTERNATIONAL ELECTROTECHNICAL COMMISSION

## SPECIFICATIONS FOR THE RE-USE OF SULPHUR HEXAFLUORIDE (SF<sub>6</sub>) AND ITS MIXTURES IN ELECTRICAL EQUIPMENT

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International Standard IEC 60480 has been prepared by IEC technical committee 10: Fluids for electrotechnical applications.

This third edition cancels and replaces the second edition, published in 2004. This edition constitutes a technical revision.

This edition includes the following significant technical changes with respect to the previous edition:

- specifications for the re-use of SF<sub>6</sub> have been confirmed;
- specifications for the re-use of SF<sub>6</sub> mixtures, namely SF<sub>6</sub>/N<sub>2</sub> and SF<sub>6</sub>/CF<sub>4</sub> mixtures are included;
- as a result of a new repartition of annexes in IEC 60376, IEC 60480 and IEC 62271-4, this
  new edition now contains the following five annexes:
  - Annex A: Description of methods of analysis (on-site and laboratory);
  - Annex B: By-products of SF<sub>6</sub> and its mixtures;

- Annex C: Procedure for evaluating the potential effects on health from by-products of SF<sub>6</sub> and its mixtures;
- Annex D: Reclaiming recommendations.
- Annex E: Cryogenic reclaiming of SF<sub>6</sub>;

The text of this International Standard is based on the following documents:

FDIS	Report on voting
10/1075/FDIS	10/1080/RVD

Full information on the voting for the approval of this International Standard can be found in the report on voting indicated in the above table.

This document has been drafted in accordance with the ISO/IEC Directives, Part 2.

The committee has decided that the contents of this document will remain unchanged until the stability date indicated on the IEC website under "http://webstore.iec.ch" in the data related to the specific document. At this date, the document will be

- reconfirmed,
- withdrawn,
- replaced by a revised edition, or
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