

INTERNATIONAL STANDARD

NORME INTERNATIONALE

AMENDMENT 2
AMENDEMENT 2

Household and similar electrical appliances – Safety –
Part 2-53: Particular requirements for sauna heating appliances and infrared
cabins

Appareils électrodomestiques et analogues – Sécurité –
Partie 2-53: Règles particulières pour les appareils de chauffage de saunas et
les cabines infrarouges





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FOREWORD

This amendment has been prepared by IEC technical committee 61: Safety of household and similar electrical appliances.

The text of this amendment is based on the following documents:

FDIS	Report on voting
61/6129/FDIS	61/6180/RVD

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

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

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- withdrawn,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

iTeh STANDARD PREVIEW

NOTE The attention of National Committees is drawn to the fact that equipment manufacturers and testing organizations may need a transitional period following publication of a new, amended or revised IEC publication in which to make products in accordance with the new requirements and to equip themselves for conducting new or revised tests.

[IEC 60335-2-53:2011/AMD2:2021](http://standards.iteh.ai/catalog/standards/sist/95430124-f792-46d2-a8a3-81a650000000/iec-60335-2-53-2011-amd2-2021)

It is the recommendation of the committee that the content of this publication be adopted for implementation nationally not earlier than 12 months or later than 36 months from the date of publication.

FOREWORD

In the differences that exist in the countries indicated, add the following immediately before the difference listed for 19.102.

- 19.101: Sauna heating appliances provided with a programmable timer are considered to be appliances that are used remotely (Finland);

3 Terms and definitions

Add, after Definition 3.108, added by Amendment 1, the following new definitions:

3.109

control board

unit connected to a **sauna heater** or an **infrared emitter** and intended to control a **sauna heater** or an **infrared emitter**

Note 1 to entry: **Control boards** can include **protective devices**. **Control boards** can be integrated with a **sauna heater** or connected with a cable to a **sauna heater**. See Figure 103.

3.110

programmable timer

time-based control which continues with a subsequent cycle when the preceding one has been completed

3.111

supervised operation

supervision by monitoring person(s) who can be physically present to observe first-hand, or a combination of physical presence and remote viewing of data to indicate condition and operation of the appliance

5 General conditions for the tests

Add, after 5.3, the following new subclause:

5.9 Addition:

Sauna heaters and infrared emitters shall be tested with the controls and control boards specified in the instructions that give the most unfavourable results.

7 Marking and instructions

7.12 *Replace the existing second paragraph by the following:*

The instructions for **sauna heating appliances and infrared emitting units** for public saunas and infrared cabins that do not have a timer or **programmable timer** shall state that the appliance is to be operated supervised. The instructions for **sauna heating appliances and infrared emitting units** that have a timer shall state that the sauna room or infrared cabin shall be inspected before restarting the timer or before switching on the appliance.

Delete the third paragraph.

7.12.1 *Replace the existing penultimate paragraph by the following:*

The instructions for appliances for **supervised operation** in public saunas or infrared cabins that do not have a timer shall state that a pilot lamp or similar indication showing that the **sauna heater** or **infrared emitter** is switched on is to be installed where visible to the monitoring person.

Replace the existing last paragraph by the following:

Unless the **sauna heater** complies with the test of 19.101 or 19.102 as appropriate, the instructions for **sauna heating appliances** or **infrared emitting units** that incorporate a stand-by mode setting for **remote operation** shall state that the door of the sauna room or infrared cabin shall be fitted with an interlock such that the stand-by mode setting for **remote operation** is disabled if the sauna room door or infrared cabin door is opened when the stand-by mode setting for **remote operation** is set.

Add the following new paragraph:

The instructions shall state the model number or type reference of controls and **control boards** that can be used with a **sauna heater** or an **infrared emitter**.

11 Heating

11.2 Add the following new paragraph to the addition:

The sauna room of Annex AA, **prefabricated saunas** and **prefabricated infrared cabins** are installed away from the walls of the test corner.

11.8 Replace the first paragraph of the modification by the following:

The temperature rise of the

- wooden rod;
 - walls, ceiling and floor of the sauna room of Annex AA or of the **prefabricated sauna**;
- shall not exceed 115 K.

Replace the third paragraph of the modification by the following:

In the sauna room of Annex AA or of the **prefabricated sauna** or of the cabin of the **prefabricated infrared cabin**, the temperature rises of handles, knobs, grips and similar parts that are held for short periods only are increased by 20 K.

Replace NOTE 101 by the following:

The ambient temperature is the temperature of the air outside the sauna room of Annex AA or of the **prefabricated sauna** or of the cabin of the **prefabricated infrared cabin**.

19 Abnormal operation

19.1 Replace the existing first paragraph after Table 101 by the following:

The test of 19.101 is carried out on **sauna heaters** that are a part of a **sauna heating appliance** that incorporates a stand-by mode setting for **remote operation**, unless they form part of a **sauna heating appliance** or **prefabricated sauna** complying with 22.108.

Delete the existing second paragraph after Table 101.

Replace the existing third paragraph after Table 101 by the following:

All **sauna heaters** that are intended to be installed out of sight of the users or behind a wall, and having air outlets in the wall of the sauna room are subjected to the test of 19.102 instead of the test of 19.101.

22 Construction

22.103 Replace the requirement by the following:

Appliances, other than those for installation in public saunas and public infrared cabins where the appliance is for **supervised operation**, shall be provided with a timer or **programmable timer**. For appliances for public saunas and public infrared cabins, the operating period of the **sauna heater** or **infrared emitter** shall be limited such that any 24 h period includes at least one continuous 6 h rest period when heating elements are not energized before any automatic restarting of a **sauna heater**. For appliances for household use, the operating period of the timer shall be limited to 6 h, automatic restarting not being allowed.

22.108 *Replace the existing fourth paragraph by the following:*

*Requirements concerning door interlock are not applicable if the **sauna heater** complies with the test of 19.101 or 19.102 as appropriate.*

Add the following new subclause:

22.110 Sauna heating appliances shall be provided with an indication, such as a pilot lamp, icon or other display options, showing that the **sauna heater** is switched on.

If a **sauna heating appliance** is provided with a delayed switching on mode or a stand-by mode setting for **remote operation**, then it shall be provided with

- a visual indication, such as a pilot lamp, icon or other display options, showing that the mode has been activated; and
- means requiring two independent actions before the mode can be activated.

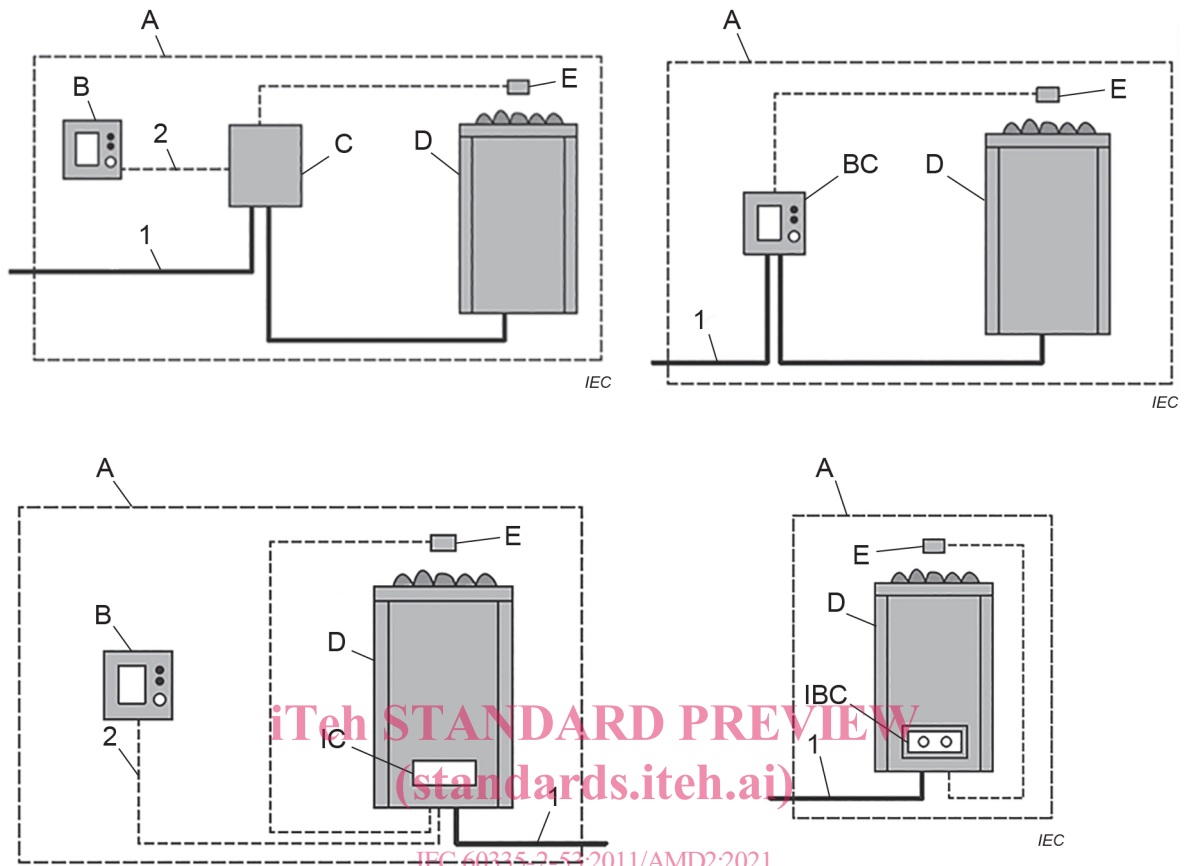
Compliance is checked by manual inspection.

iTeh STANDARD PREVIEW (standards.iteh.ai)

[IEC 60335-2-53:2011/AMD2:2021](https://standards.iteh.ai/catalog/standards/sist/95d30124-f792-46d2-a8a3-853ea2b92294/iec-60335-2-53-2011-amd2-2021)

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Add the following new figure:



IEC 60335-2-53:2011/AMD2:2021
<https://standards.iteh.ai/catalog/standards/sist/95d30124-f792-46d2-a8a3-853ea2b92294/iec-60335-2-53-2011-amd2-2021>

Key

- A sauna heating appliance
- B control
- C control board
- D sauna heater
- E protective device

- IC integral control board
- BC combined control board and control
- IBC integral control board and control
- 1 supply mains
- 2 wired or wireless connection

Figure 103 – Examples of different types of sauna heating appliances

iTeh STANDARD PREVIEW
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[IEC 60335-2-53:2011/AMD2:2021](https://standards.iteh.ai/catalog/standards/sist/95d30124-f792-46d2-a8a3-853ea2b92294/iec-60335-2-53-2011-amd2-2021)

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AVANT-PROPOS

Le présent amendement a été établi par le comité d'études 61 de l'IEC: Sécurité des appareils électrodomestiques et analogues.

Le texte de cet amendement est issu des documents suivants:

FDIS	Rapport de vote
61/6129/FDIS	61/6180/RVD

Le rapport de vote indiqué dans le tableau ci-dessus donne toute information sur le vote ayant abouti à l'approbation de cet amendement.

Le comité a décidé que le contenu de cet amendement et de la publication de base ne sera pas modifié avant la date de stabilité indiquée sur le site web de l'IEC sous "http://webstore.iec.ch" dans les données relatives à la publication recherchée. À cette date, la publication sera:

- reconduite,
- supprimée,
- remplacée par une édition révisée, ou
- amendée.

NOTE L'attention des Comités nationaux est attirée sur le fait que les fabricants d'appareils et les organismes d'essai peuvent avoir besoin d'une période transitoire après la publication d'une nouvelle publication IEC, ou d'une publication amendée ou révisée, pour fabriquer des produits conformes aux nouvelles exigences et pour adapter leurs équipements aux nouveaux essais ou aux essais révisés.

Le comité recommande que le contenu de cette publication soit entériné au niveau national au plus tôt 12 mois et au plus tard 36 mois après la date de publication.

AVANT-PROPOS

Dans le cadre des différences existant dans les pays indiqués, ajouter ce qui suit juste avant la différence mentionnée pour 19.102.

- 19.101: Les appareils de chauffage de saunas comportant une minuterie programmable sont considérés comme des appareils utilisés à distance (Finlande);

3 Termes et définitions

Ajouter, après la Définition 3.108, ajoutée par l'Amendement 1, les nouvelles définitions suivantes:

3.109

tableau de commande

unité raccordée à un **radiateur pour sauna** ou un **émetteur infrarouge** et destinée à commander un **radiateur pour sauna** ou un **émetteur infrarouge**

Note 1 à l'article: Les **tableaux de commande** peuvent inclure les **dispositifs de protection**. Les **tableaux de commande** peuvent être intégrés à un **radiateur pour sauna** ou raccordés par un câble à un **radiateur pour sauna**. Voir la Figure 103.