IEC 60335-2-119

Edition 1.0 2021-08

INTERNATIONAL STANDARD

NORME INTERNATIONALE

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Household and similar electrical appliances – Safety –
Part 2-119: Particular requirements for commercial vacuum packaging appliances

Appareils électrodomestiques et analogues – Sécurité –
Partie 2-119: Exigences particulières pour les emballeuses sous vide à usage commercial



IEC 60335-2-119:2021-08(en-fr)

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INTERNATIONAL ELECTROTECHNICAL COMMISSION

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HOUSEHOLD AND SIMILAR ELECTRICAL APPLIANCES – SAFETY –

Part 2-119: Particular requirements for commercial vacuum packaging appliances

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FOREWORD

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IEC 60335-2-119 has been prepared by IEC technical committee 61: Safety of household and similar electrical appliances. It is an International Standard.

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

Draft	Report on voting
61/6176/CDV	61/6295/RVC

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

The language used for the development of this International Standard is English.

This document was drafted in accordance with ISO/IEC Directives, Part 2, and developed in accordance with ISO/IEC Directives, Part 1 and ISO/IEC Directives, IEC Supplement, available at www.iec.ch/members_experts/refdocs. The main document types developed by IEC are described in greater detail at www.iec.ch/standardsdev/publications.

A list of all parts in the IEC 60335 series, published under the general title *Household and similar electrical appliances – Safety*, can be found on the IEC website.

This Part 2 is to be used in conjunction with the latest edition of IEC 60335-1 and its amendments unless that edition precludes it; in that case, the latest edition that does not preclude it is used. It was established on the basis of the sixth edition (2020) of that standard.

NOTE 1 When "Part 1" is mentioned in this standard, it refers to IEC 60335-1.

This Part 2 supplements or modifies the corresponding clauses in IEC 60335-1, so as to convert that publication into the IEC standard: Particular requirements for commercial vacuum packaging appliances.

When a particular subclause of Part 1 is not mentioned in this Part 2, that subclause applies as far as is reasonable. When this standard states "addition", "modification" or "replacement", the relevant text in Part 1 is to be adapted accordingly.

NOTE 2 The following numbering system is used:

– subclauses, tables and figures that are numbered starting from 101 are additional to those in Part 1;

– unless notes are in a new subclause or involve notes in Part 1, they are numbered starting from 101, including those in a replaced clause or subclause;

– additional annexes are lettered AA, BB, etc.

NOTE 3 The following print types are used:

– requirements: in roman type;

– *test specifications: in italic type;*

– notes: in small roman type.

Words in **bold** in the text are defined in Clause 3. When a definition concerns an adjective, the adjective and the associated noun are also in bold.

The committee has decided that the contents of this document will remain unchanged until the stability date indicated on the IEC website under 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
- amended.

NOTE 4 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.

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.

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INTRODUCTION

It has been assumed in the drafting of this International Standard that the execution of its provisions is entrusted to appropriately qualified and experienced persons.

Guidance documents concerning the application of the safety requirements for appliances can be accessed via TC 61 supporting documents on the IEC website:

https://www.iec.ch/tc61/supportingdocuments

This information is given for the convenience of users of this International Standard and does not constitute a replacement for the normative text in this standard.

This standard recognizes the internationally accepted level of protection against hazards such as electrical, mechanical, thermal, fire and radiation of appliances when operated as in normal use taking into account the manufacturer's instructions. It also covers abnormal situations that can be expected in practice and takes into account the way in which electromagnetic phenomena can affect the safe operation of appliances.

This standard takes into account the requirements of IEC 60364 as far as possible so that there is compatibility with the wiring rules when the appliance is connected to the supply mains. However, national wiring rules may differ.

If an appliance within the scope of this standard also incorporates functions that are covered by another Part 2 of IEC 60335, the relevant Part 2 is applied to each function separately, as far as is reasonable. If applicable, the influence of one function on the other is taken into account.

When a Part 2 standard does not include additional requirements to cover hazards dealt with in Part 1, Part 1 applies.

NOTE 1 This means that the technical committees responsible for the Part 2 standards have determined that it is not necessary to specify particular requirements for the appliance in question over and above the general requirements.

This standard is a product family standard dealing with the safety of appliances and takes precedence over horizontal and generic standards covering the same subject.

NOTE 2 Horizontal publications, basic safety publications and group safety publications covering a hazard are not applicable since they have been taken into consideration when developing the general and particular requirements for the IEC 60335 series of standards.

An appliance that complies with the text of this standard will not necessarily be considered to comply with the safety principles of the standard if, when examined and tested, it is found to have other features that impair the level of safety covered by these requirements.

An appliance employing materials or having forms of construction differing from those detailed in the requirements of this standard may be examined and tested according to the intent of the requirements and, if found to be substantially equivalent, may be considered to comply with the standard.

NOTE 3 Standards dealing with non-safety aspects of household appliances are:

– IEC standards published by TC 59 concerning methods of measuring performance;
– CISPR 11, CISPR 14-1 and relevant IEC 61000-3 series standards concerning electromagnetic emissions;
– CISPR 14-2 concerning electromagnetic immunity;
– IEC standards published by TC 111 concerning environmental matters.

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HOUSEHOLD AND SIMILAR ELECTRICAL APPLIANCES – SAFETY –

Part 2-119: Particular requirements for commercial vacuum packaging appliances

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1 Scope

This clause of Part 1 is replaced by the following.

This part of IEC 60335 deals with the safety of commercial electric packaging appliances using vacuum conditions for food preservation, their **rated voltage** being not more than 250 V for single-phase appliances and 480 V for other appliances.

These appliances are not intended for household and similar purposes. They are used for commercial preservation of food in areas not open to the public, for example in kitchens of restaurants, canteens, hospitals and in commercial enterprises such as bakeries and butcheries.

Examples of appliances that are within the scope of this standard are:

– chamber vacuum packaging appliances;

– vacuum packaging appliances.

These appliances may be provided with a film-sealing function.

This standard also deals with the hygiene aspects of appliances.

As far as is practicable, this standard deals with the common hazards presented by appliances that are encountered by users. However, in general, it does not consider young children playing with the appliance.

Attention is drawn to the fact that:

– for appliances intended to be used in vehicles or onboard ships or aircraft, additional requirements may be necessary;

– in many countries, additional requirements for appliances incorporating pressure vessels are specified;

– in many countries, additional requirements are specified by the national health authorities, the national authorities responsible for the protection of labour, the national water supply authorities and similar authorities.

This standard does not apply to:

– appliances which operate with injection in the vacuum chamber of inert gas with an oxygen content exceeding 21 %;

– appliances intended to be used in locations where special conditions prevail, such as the presence of a corrosive or explosive atmosphere (dust, vapour or gas);

– vacuum packaging appliances for household and similar use (IEC 60335-2-45);

– **battery-operated appliances**.

2 Normative references

This clause of Part 1 is applicable except as follows.

Addition:

IEC 60068-2-52:2017, *Environmental testing – Part 2-52: Tests – Test Kb: Salt mist, cyclic (sodium chloride solution)*

ISO 683-1:2016, *Heat-treatable steels, alloy steels and free-cutting steels – Part 1:Non-alloy steels for quenching and tempering·*

3 Terms and definitions

This clause of Part 1 is applicable except as follows.

3.1 Definitions relating to physical characteristics

3.1.9 *Replacement:*

operation of the appliance under the following conditions:

Vacuum packaging appliances and **chamber vacuum packaging appliances** without deaeration function are operated empty in vacuum and sealing cycles in accordance with the instructions, choosing the most unfavourable condition. If no instructions are given, the appliance is operated for the:

– vacuum function, the maximum period allowed by the construction;

– sealing function, 10 s or the maximum period allowed by a timer, if higher, with a rest period of 30 s between each cycle.

The sealing function is carried out by sealing together two sheets of plastic film. The plastic film is high pressure (low density) polyethylene, each sheet having a thickness of 50 µm.

Vacuum packaging appliances and **chamber vacuum packaging appliances** provided with deaeration function intended to remove air molecules from liquids, creams and sauces are operated as indicated above but for 5 min for the vacuum function.

Vacuum packaging appliances and **chamber vacuum packaging appliances** for vacuum and sealing and which can perform sealing function only, are also operated for a series of operating cycles as specified in the instruction for use, choosing the most unfavourable condition. If no instructions are given, in each cycle the sealing function is operated 10 s.

In all cases the sealing operation period is followed by a further period of 15 s for the appliance to be ready to perform the next sealing operation.

The sealing function is carried out by sealing together two sheets of plastic film. The plastic film is high pressure (low density) polyethylene, each sheet having a thickness of 50 µm.

3.5 Definitions relating to types of appliances

3.5.101
vacuum packaging appliance
appliance in which the vacuum function is performed with the packaging outside the vacuum chamber

Note 1 to entry: **Vacuum packaging appliances** may be provided with a sealing function.

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