

Institut luxembourgeois de la normalisation de l'accréditation, de la sécurité et qualité des produits et services

ILNAS-EN 50625-2-3:2017

Collection, logistics & treatment requirements for WEEE - Part 2-3:

Treatment requirements for temperature exchange equipment and

Exigences de collecte, logistique et traitement pour les déchets d'équipements électriques et électroniques (DEEE) - Partie 2-3:

Sammlung, Logistik und Behandlung von Elektro- und Elektronik-Altgeräten (WEEE) - Teil 2-3: Anforderungen an die Behandlung von Wärmeträgern und

National Foreword

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EUROPEAN STANDARD LINAS-EN 50625-2-3:20 EN 50625-2-3

NORME EUROPÉENNE

EUROPÄISCHE NORM

July 2017

ICS 13.030.99

Supersedes EN 50574-1:2012

English Version

Collection, logistics & treatment requirements for WEEE - Part 2-3: Treatment requirements for temperature exchange equipment and other WEEE containing VFC and/or VHC

Exigences de collecte, logistique et traitement pour les déchets d'équipements électriques et électroniques (DEEE)
- Partie 2-3: exigences de traitement des équipements d'échange thermique et autres DEEE contenant des fluorocarbures volatils et/ou des hydrocarbures volatils

Sammlung, Logistik und Behandlung von Elektro- und Elektronik-Altgeräten (WEEE) - Teil 2-3: Anforderungen an die Behandlung von Wärmeträgern und anderen Elektro- und Elektronik-Altgeräten die VFC und/oder VFC enthalten

This European Standard was approved by CENELEC on 2017-05-29. 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

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European foreword

This document (EN 50625-2-3:2017) has been prepared by CLC/TC 111X "Environment".

The following dates are fixed:

- latest date by which this document has to be (dop) 2018-05-29 implemented at national level by publication of an identical national standard or by endorsement
- latest date by which the national standards (dow) 2020-05-29 conflicting with this document have to be withdrawn

This document supersedes EN 50574-1:2012.

This document has been prepared under a mandate given to CENELEC by the European Commission and the European Free Trade Association.

This part 2 is to be used in conjunction with the latest edition of EN 50625-1.

NOTE 1 When "Part 1" is mentioned in this standard, it refers to EN 50625–1.

This Part 2 supplements or modifies the corresponding clauses in EN 50625-1, so as to convert that publication into the European Standard: *Treatment requirements for temperature exchange equipment*.

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.

Introduction

This clause of Part 1 is applicable.

1 Scope

This clause of Part 1 is replaced by the following:

This European Standard is applicable to the treatment of waste temperature exchange equipment and other WEEE containing VFC or VHC in refrigerants or blowing agents.

This European Standard applies to the treatment of temperature exchange equipment until end-ofwaste status is fulfilled, or temperature exchange equipment fractions are recycled, recovered, or disposed of.

This European Standard addresses all operators involved in the treatment including related handling, sorting and storage of temperature exchange equipment.

2 Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

This clause of Part 1 is applicable with the following additions:

EN 50625-1:2014, Collection, logistics & Treatment requirements for WEEE - Part 1: General treatment requirements

CLC/TS 50625-3-1, Collection, logistics & treatment requirements for WEEE - Part 3-1: Specification for de-pollution - General

CLC/TS 50625-3-4, Collection, logistics & treatment requirements for WEEE - Part 3-4: Specification for de-pollution - temperature exchange equipment and other WEEE containing VFC and/or VHC

3 Terms and definitions

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

This clause of Part 1 is applicable except as follows:

In definition 3.37, the Note 1 to entry is replaced with the following:

Note 1 to entry: Common commercial designations for these materials are R12, R11 for CFCs; R22, R141b for HCFCs; R134a, R410A, R407C, R32, R1234yf and R1234ze for HFCs.

The following subclauses are added to this clause or Part 1:

3.101

refrigerant

fluid used for heat transfer in a refrigerating system which absorbs heat at a low temperature and a low pressure of the fluid and rejects it at a higher temperature and higher pressure of the fluid usually involving reversible changes of the phase of the fluid

[SOURCE: ISO 817:2014]

3.102

refrigerating system

part that uses a refrigerant to transfer thermal energy from one part of an appliance to another part

NOTE 1 to entry: The refrigerating system in new appliances is hermetically sealed and typically also contains oil.

NOTE 2 to entry: Heat pumps also use a refrigerating system.

3.103

oil

lubricants within the refrigerating system or heat carrier fluids other than water contained in radiators

3.104

blowing agent

substance that is used to produce cells in the structure of an insulating foam

3.105

vacuum insulation panel (VIP)

type of thermal insulation consisting of a gas-tight evacuated enclosure surrounding a rigid core

Note 1 to entry: VIPs can contain several types of materials, for example glass fibres or silica, etc.

3.106

encapsulated system

set of procedures which ensure that the emission of refrigerants or blowing agents is prevented

3.107

step 1

treatment involving the removal and capturing of refrigerant and oil from the refrigerating system and subsequently removal and capturing of refrigerants (i.e. VFC, VHC) from oil both done in an encapsulated system

Note 1 to entry: Other components (i.e. compressors cable, glass shelves, plastic parts, mercury switches, capacitors, printed circuit boards) can also be removed during step 1 treatment.

3.108

step 2

treatment involving the removal of insulating foam from the cabinet and subsequently removal and capturing of blowing agents (i.e. VFC, VHC) from insulating foam, both to be done in an encapsulated system

Note 1 to entry: Other fractions (i.e. ferrous metals, non-ferrous metals, plastics, water and residual waste) can also be separated during step 2 treatment.

Note 2 to entry: Step 2 treatment is not applicable for heat pump tumble dryers, de-humidifiers and portable air conditioners if they do not contain insulating foam.

Note 3 to entry: Absorption refrigerators can have polyurethane insulation containing VFC or VHC and should consequently be treated in the step 2 and step 3 treatment.

3.109

step 3

treatment involving the disposal or recovery operations for refrigerants and/or blowing agents

Note 1 to entry: The disposal or recovery operations can be done on site of the treatment facility or at the facility of an downstream acceptor.

3.110

class 1 appliance

refrigerator having a total net capacity of less than 0,18 m³

Note 1 to entry: Class 1 appliances only have one compressor.

Note 2 to entry: Net capacity potentially specified by the appliance manufacturer on a label.