Krüogeenanumad. Staatilised vaakumisolatsiooniga anumad. Osa 1: Põhinõuded

Cryogenic vessels - Static vacuum insulated vessels - Part 1: Fundamental requirements



EESTI STANDARDI EESSÕNA

NATIONAL FOREWORD

Käesolev Eesti standard EVS-EN 13458-1:2002 sisaldab Euroopa standardi EN 13458-1:2002 ingliskeelset teksti.

Käesolev dokument on jõustatud 18.10.2002 ja selle kohta on avaldatud teade Eesti standardiorganisatsiooni ametlikus väljaandes.

Standard on kättesaadav Eesti standardiorganisatsioonist.

This Estonian standard EVS-EN 13458-1:2002 consists of the English text of the European standard EN 13458-1:2002.

This document is endorsed on 18.10.2002 with the notification being published in the official publication of the Estonian national standardisation organisation.

The standard is available from Estonian standardisation organisation.

Käsitlusala:

This European Standard specifies the fundamental requirements for static vacuum insulated cryogenic vessels designed for a maximum allowable pressure greater than 0,5 bar. This European Standard applies to static vacuum insulated cryogenic vessels for fluids as specified in 3.1.

Scope:

This European Standard specifies the fundamental requirements for static vacuum insulated cryogenic vessels designed for a maximum allowable pressure greater than 0,5 bar. This European Standard applies to static vacuum insulated cryogenic vessels for fluids as specified in 3.1.

ICS 23.020.40

Võtmesõnad: coolers, gas cylinders, gas holders, incription, insulated, insulations, loading, marking, materials, pressure vessels, safety requirements, sample surveys, specification (approval), specifications, static pressure vessels, surveillance (approval), testing, vacuum

EUROPEAN STANDARD NORME EUROPÉENNE EUROPÄISCHE NORM

EN 13458-1

May 2002

ICS 23.020.40

English version

Cryogenic vessels - Static vacuum insulated vessels - Part 1: Fundamental requirements

Récipients cryogéniques - Récipients fixes, isolés sous vide - Partie 1: Exigences fondamentales

Kryo-Behälter - Ortsfeste, vakuum-isolierte Behälter - Teil 1: Grundanforderungen

This European Standard was approved by CEN on 25 March 2002.

CEN 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 Management Centre or to any CEN 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 CEN member into its own language and notified to the Management Centre has the same status as the official versions.

CEN members are the national standards bodies of Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Malta, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and United Kingdom.



EUROPEAN COMMITTEE FOR STANDARDIZATION COMITÉ EUROPÉEN DE NORMALISATION EUROPÄISCHES KOMITEE FÜR NORMUNG

Management Centre: rue de Stassart, 36 B-1050 Brussels

Contents

	O'	page
Forew		3
1	Scope	4
2	Normative references	4
3	Terms and definitions	5
4	General requirements	7
5		7
6		8
7		8
8 8.1 8.2 8.3	Selection of materialsInspection certificate	
9		9
10		9
11	Final assessment	10
12	Periodic inspection	10
2		

Foreword

This document EN 13458-1:2002 has been prepared by Technical Committee CEN/TC 268 "Cryogenic vessels", the secretariat of which is held by AFNOR.

This European Standard shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by November 2002, and conflicting national standards shall be withdrawn at the latest by November 2002.

This document has been prepared under a mandate given to CEN by the European Commission and the European Free Trade Association, and supports essential requirements of EU Directive(s).

For relationship with EU Directive(s), see informative annex ZA, which is an integral part of this document.

EN 13458 consists of the following parts under the general title, *Cryogenic vessels – Static vacuum insulated vessels*:

- Part 1: Fundamental requirements.
- Part 2: Design, fabrication, inspection and testing. Part 3: Operational requirements.

According to the CEN/CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard: Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Malta, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and the United Kingdom.

1 Scope

This European Standard specifies the fundamental requirements for static vacuum insulated cryogenic vessels designed for a maximum allowable pressure greater than 0,5 bar.

This European Standard applies to static vacuum insulated cryogenic vessels for fluids as specified in 3.1.

For static vacuum insulated cryogenic vessels designed for a maximum allowable pressure of not more than 0,5 bar, this standard can be used as a guide.

This European Standard is not applicable to vessels built on-site.

2 Normative references

This European Standard incorporates by dated or undated reference, provisions from other publications. These normative references are cited at the appropriate places in the text, and the publications are listed hereafter. For dated references, subsequent amendments to or revisions of any of these publications apply to this European Standard only when incorporated in it by amendment or revision. For undated references the latest edition of the publication referred to applies (including amendments).

EN 1252-1, Cryogenic vessels - Materials - Part 1: Toughness requirements for temperature below - 80 °C.

EN 1252-2, Cryogenic vessels - Materials - Part 2: Toughness requirements for temperature between – 80 °C and – 20 °C.

EN 1626, Cryogenic vessels - Valves for cryogenic service.

EN 1797, Cryogenic vessels - Gas/material compatibility.

EN 10204, Metallic products - Types of inspection documents.

EN 12300, Cryogenic vessels - Cleanliness for cryogenic service.

EN 13371, Cryogenic vessels - Couplings for cryogenic service.

prEN 13458-2, Cryogenic vessels - Static vacuum insulated vessels - Part 2: Design, fabrication, inspection and testing.

. So O T T

prEN 13458-3, Cryogenic vessels - Static vacuum insulated vessels - Part 3: Operational requirements.