

Vedelgaasiseadmete tehniline kirjeldus. Välisgrillid

Specification for dedicated liquefied petroleum gas
appliances - Barbecues for outdoor use

EESTI STANDARDI EESSÕNA

NATIONAL FOREWORD

Käesolev Eesti standard EVS-EN 498:1999 sisaldab Euroopa standardi EN 498 + AC:1997 ingliskeelset teksti. Käesolev dokument on jõustatud 23.11.1999 ja selle kohta on avaldatud teade Eesti standardiorganisatsiooni ametlikus väljaandes. Standard on kättesaadav Eesti standardiorganisatsioonist.	This Estonian standard EVS-EN 498:1999 consists of the English text of the European standard EN 498 + AC:1997. This document is endorsed on 23.11.1999 with the notification being published in the official publication of the Estonian national standardisation organisation. The standard is available from Estonian standardisation organisation.
---	--

Käsitlusala: See standard määrab kindlaks konstruktsiooni- ja käituskarakteristikud, ohutusandmed, asjakohased katsemeetodid ja märgistamise selliste grillahjude puhul, mis põletavad veeldatud naftagaasi ja mis tekstis on nimetatud kui seadmed.	Scope:
--	----------------------

ICS 97.040.20

Võtmesõnad: gaasiseadmed, grillahi, katsed, kontrollimine, liigitused, märgistamine, ohutus, seadmete tehnilised andmed, tehnilised märkused, toiduvalmistusseadmed, töömadruste hindamine, veeldatud naftagaasid, välismääratlused

ICS 97.040.20

Descriptors: Gas appliances, barbecues, testing.

English version

**Specification for dedicated liquefied petroleum gas appliances
Barbecues for outdoor use**

Spécifications pour les appareils
fonctionnant exclusivement aux gas
de pétrole liquéfiés – Barbecues
utilisés en plein air

Festlegungen für Flüssiggasgeräte –
Grillgeräte zur Verwendung im Freien

This European Standard was approved by CEN on 1997-08-21.

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 Central Secretariat or to any CEN member.

The European Standards exist 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 Central Secretariat has the same status as the official versions.

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

CEN

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

Central Secretariat: rue de Stassart 36, B-1050 Brussels

Contents

Foreword	4
1 Scope and field of application.....	5
2 Normative references.....	5
3 Definitions.....	6
4 Classification.....	10
5 Constructional characteristics.....	11
5.1 Conversion to different gases.....	11
5.2 Materials.....	11
5.3 Ease of cleaning and maintenance	12
5.4 Strength.....	12
5.5 Assembly.....	12
5.6 Stability.....	13
5.7 Soundness of the gas circuit	13
5.8 Connections	14
5.9 Locking of wheels and castors	14
5.10 Taps	14
5.11 Control handles	15
5.12 Injectors.....	16
5.13 Ignition devices.....	16
5.14 Flame supervision devices	17
5.15 Burners.....	17
5.16 Grids.....	18
5.17 Turnspits.....	18
5.18 Appliances incorporating a gas container.....	18
5.19 Durability of markings	19
5.20 Auxiliary energy	19
6 Performance characteristics	19
6.1 Soundness	19
6.2 Verification of the nominal heat input	19
6.3 Flame supervision devices	20
6.4 Safety of operation	20
6.5 Temperatures	21
6.6 Overheating of the gas container	21
6.7 Combustion	22
6.8 Sooting	22
7 Test methods	22
7.1 General.....	22
7.2 Verification of the constructional characteristics.....	24
7.3 Verification of the performance characteristics.....	27
8 Marking.....	32
8.1 Appliance marking.....	32
8.2 Packaging marking.....	33
8.3 Assembly use and maintenance instructions.....	33

Figure 1 Glass panels - Apparatus for checking resistance to thermal shock	35
Figure 2 Apparatus for testing soundness	36
Figure 3 Sampling device for checking combustion	37

Annex A (normative) National situations 38

A.1 Categories sold in various countries.....	38
A.2 Nominal appliance operating pressures	39
A.3 Types of connection used in various countries.....	40

Annex B (normative) Method of calculation of the nominal heat input 41

Annex C (normative) Composition of test gases..... 43

Annex D (informative) Appliance connections..... 44

Annex ZA (informative) Clauses of this European Standard addressing essential requirements or other provisions of EU Directives..... 45

This document is a preview generated by EVS

Foreword

This European standard has been prepared by Technical Committee CEN /TC 181 "Dedicated liquefied petroleum gas appliances", the secretariat of which is held by NSAI.

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 March 1998, and conflicting national standards shall be withdrawn at the latest by March 1998.

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

For relationship with EU Directives, see informative Annex ZA, which is an integral part of this standard.

This standard applies only to type testing.

Items relating to quality assurance systems, production testing and particularly certificates of conformity of auxiliary equipment are not covered by this standard

Particular attention should be paid to the quality of nonmetallic materials used in the construction of these appliances. A European Standard specifying "Requirements for rubber materials for seals and diaphragms for gas appliances and equipment" has been prepared by CEN TC 108 (EN 549). A European Standard for "Flexible hose, tubing and assemblies for use with butane or propane in the vapour phase" is being prepared by CEN TC 218. These standards will be applicable to these types of appliances.

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, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and the United Kingdom.

1 Scope

This standard specifies the constructional and performance characteristics, safety specifications, relevant test methods and marking of barbecues burning liquefied petroleum gas, referred to in the body of the text as "appliances".

This standard covers barbecues as defined in 3.6, used outdoors and operating with the gases indicated in 4.1 according to the categories indicated in 4.2. They are fitted with at least one cooking device.

This standard applies to these appliances and their functional sections whether or not the latter are independent or incorporated into an assembly.

This standard also applies to appliances designed to be built-in.

This standard only applies to type testing.

Appliances supplied with third family gas at pressures greater those defined in 4.2 are outside the field of application of this standard.

During the consideration of this text, it was apparent that the concept of thermal efficiency with regard to appliances such as barbecues was not appropriate.

This is because:

- during cooking, there is an additional transfer of heat due to the meat juices falling onto the refractories;
- there is no relation between the item to be cooked and the useful area;
- the barbecue is an outdoor appliance in which the action of the wind is important in relation to efficiency;

In consequence there is no specific requirement covering thermal efficiency for this type of appliance.

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 their 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.

EN 125:1991	Flame supervision safety devices for gas burning appliances - Thermoelectric flame supervision devices
EN 126:1993	Multifunctional controls for gas-burning appliances.
EN 437:1993	Test gases, test pressures, appliance categories

EN 60335-1	Safety of household and similar electrical appliances - Part 1: general requirements (IEC 335-1:1983, modified)
ISO 7-1:1994	Pipe threads where pressure-tight joints are made on the threads - Part 1: Designation, dimensions and tolerances
ISO 228-1:1994	Pipe threads where pressure-tight joints are not made on the threads - Part 1: Designation, dimensions and tolerances

3 Definitions

For the purposes of this standard, the following terminology applies.

3.1 cooking devices: Component parts of the appliance designed to hold or receive the food to be cooked (grids, turnspits, plates, etc.).

3.2 detachable: That which can be dismantled without using a tool.

3.3 appliances incorporating a gas container: An appliance whose body or support includes a compartment for a liquefied petroleum gas container, or a fixing or support device for this container.

3.4 built-in appliance: An appliance designed to be built into a brick or similar structure.

3.5 auxiliary equipment: All the components and devices acting directly or indirectly on the gas rate.

3.6 barbecue: An appliance principally designed to roast and/or grill foodstuffs. Cooking is achieved by the action of radiant heat and, possibly by convection.

3.7 mobile barbecue: A barbecue fitted with at least one wheel enabling it to be moved easily on the ground.

3.8 locking of an adjuster: Locking of an adjuster by the manufacturer or by an installer, in its adjustment position by any means (a screw, etc.).

3.9 turnspit: A cooking device enabling the rotation of the food to be roasted. Its rotation can be effected manually or using a mechanical or electrical motor.

3.10 burner: A component that allows the gas to burn. It may be one of two types:

- non-aerated burner, in which the air for combustion is entrained entirely at the burner outlet;