



BSI Standards Publication

Test gases — Test pressures — Appliance categories

National foreword

This British Standard is the UK implementation of EN 437:2021. It supersedes BS EN 437:2018, which is withdrawn.

The UK participation in its preparation was entrusted to Technical Committee GSE/26, Test gases.

A list of organizations represented on this committee can be obtained on request to its committee manager.

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EUROPEAN STANDARD

EN 437

NORME EUROPÉENNE

EUROPÄISCHE NORM

April 2021

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Supersedes EN 437:2018

English Version

Test gases - Test pressures - Appliance categories

Gaz d'essais - Pressions d'essais - Catégories
d'appareils

Prüfgase - Prüfdrücke - Gerätekategorien

This European Standard was approved by CEN on 19 January 2021.

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European foreword

This document (EN 437:2021) has been prepared by Technical Committee CEN/TC 238 “Test gases, test pressures, appliance categories and gas appliance types”, 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of an identical text or by endorsement, at the latest by October 2021, and conflicting national standards shall be withdrawn at the latest by October 2021.

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. CEN shall not be held responsible for identifying any or all such patent rights.

This document supersedes EN 437:2018.

EN 437 is intended to provide all the CEN Technical Committees preparing standards on gas appliances with definitions for test gases, test pressures and categories of appliances for use by these committees within the limits of the scope defined in Clause 1.

The document seeks to clarify the present situation with respect to test gases, test pressures and appliance categories.

The concern for clarity has led to the elucidation of numerous categories and national situations or conditions. The complexity of the document is likely to increase as new members join the Union.

This document can be considered as an important stage in the harmonization of test gases, test pressures and appliance categories and the quality of information on gas usage in Europe.

In comparison with the previous version, this document incorporates updates of Table 6, Table 7, Table B.4 and some editorial changes.

Annex B gives national situations relating to gases, gas pressures and appliance categories that apply nationally or locally. The information provided is included under the responsibility of the national standardization bodies. The tables of Annex B give the available information. Therefore, Annex B is informative.

According to the CEN-CENELEC Internal Regulations, the national standards organisations of the following countries are bound to implement this European Standard: Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Republic of North Macedonia, Romania, Serbia, Slovakia, Slovenia, Spain, Sweden, Switzerland, Turkey and the United Kingdom.

1 Scope

This document specifies the test gases, test pressures and categories of appliances relative to the use of gaseous fuels of the first, second and third families. It serves as a reference document in the specific standards for appliances.

The document makes recommendations for the use of the gases and pressures to be applied for the tests of appliances burning gaseous fuels.

NOTE Procedures for tests are given in the corresponding appliance standards. The test gases and the test pressures specified in this standard are in principle intended to be used with all types of appliances.

However, the use of some test gases and test pressures may not be appropriate in the following cases:

- appliances with nominal heat input greater than 300 kW;
- appliances constructed on site;
- appliances in which the final design is influenced by the user;
- appliances constructed for use with high supply pressures (notably direct use of the saturated vapour pressure).

In these cases, the specific appliance standards may specify other test conditions in order to establish compliance with their requirements.

2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

EN ISO 3166-1:2020, *Codes for the representation of names of countries and their subdivisions - Part 1: Country code (ISO 3166-1:2020)*

EN ISO 6976:2016, *Natural gas - Calculation of calorific values, density, relative density and Wobbe indices from composition (ISO 6976:2016)*

3 Terms and definitions

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

ISO and IEC maintain terminological databases for use in standardization at the following addresses:

- IEC Electropedia: available at <http://www.electropedia.org/>
- ISO Online browsing platform: available at <https://www.iso.org/obp>

3.1 gas appliance

appliance burning gaseous fuels

Note 1 to entry: For the purposes of this standard the term “gaseous fuels” means any fuel which is in a gaseous state at a temperature of 15 °C under an absolute pressure of 1 bar.

3.2 distributed gas

gaseous fuel used on the territory of a CEN member