

STN	Tepelnoizolačné výrobky pre budovy Výrobky z lepených a sypkých výplňových perličiek expandovaného polystyrénu (EPS) vytvárané na stavbe Časť 1: Špecifikácia výrobkov pred zabudovaním	STN EN 16809-1 72 7081
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Thermal insulation products of buildings - In-situ formed products from loose-fill expanded polystyrene (EPS) beads and bonded expanded polystyrene beads - Part 1: Specification for the bonded and loose-fill products before installation

Táto norma obsahuje anglickú verziu európskej normy.
This standard includes the English version of the European Standard.

Táto norma bola oznámená vo Vestníku ÚNMS SR č. 04/20

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EUROPEAN STANDARD

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NORME EUROPÉENNE

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English Version

Thermal insulation products of buildings - In-situ formed products from loose-fill expanded polystyrene (EPS) beads and bonded expanded polystyrene beads - Part 1: Specification for the bonded and loose-fill products before installation

Produits isolants thermiques destinés aux bâtiments - Produits formés sur place à partir de billes en polystyrène expansé (PSE) en vrac et de billes en polystyrène expansé liées - Partie 1 : Spécification des produits avec et sans liant avant mise en œuvre

Wärmedämmstoffe für Gebäude - An der Verwendungsstelle hergestellte Produkte aus losen expandierten Polystyrolkugeln (EPS) und gebundenen expandierten Polystyrolkugeln - Teil 1: Spezifikation für gebundene und lose Schütt- und Einblasdämmstoffe vor dem Einbau

This European Standard was approved by CEN on 23 September 2019.

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 CEN-CENELEC 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 CEN-CENELEC Management Centre has the same status as the official versions.

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

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Contents	Page
European foreword	3
1 Scope	4
2 Normative references	4
3 Terms, definitions, symbols and abbreviations	5
4 Requirements	7
5 Test methods	9
6 Designation code	11
7 Assessment and verification of the constancy of performance	11
8 Marking and labelling	12
Annex A (normative) Determination of the declared values of thermal resistance and thermal conductivity	13
Annex B (normative) Product type determination (PTD) and factory production control (FPC)	16
Annex C (normative) Specimen preparation method for thermal resistance and thermal conductivity test	20
Annex D (normative) Preparing samples for testing for reaction to fire of products	23
Annex E (normative) Specimen preparation method for water absorption test and water vapour diffusion resistance test	24
Annex F (normative) Specimen preparation method for density measurement	25
Annex G (normative) Determination of settlement for EPS loose-fill product	26
Annex H (informative) Masonry cavity walls - Method for determining suitable spacings for blowing holes	28
Bibliography	30

European foreword

This document (EN 16809-1:2019) has been prepared by Technical Committee CEN/TC 88 “Thermal insulating materials and products”, the secretariat of which is held by DIN.

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 May 2020, and conflicting national standards shall be withdrawn at the latest by August 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.

EN 16809-1, *Thermal insulation products for buildings — In situ formed products from loose-fill expanded polystyrene (EPS) beads and bonded expanded polystyrene beads*, consists of two parts which form a package. The first part (this document), covers the products, which are placed on the market. The second part covers the specification for the installed products. Both parts need to be used for the application of the insulation product in the end-use applications covered by EN 16809-2.

The reduction in energy used and emissions produced during the installed life of insulation products exceeds by far the energy used and emissions made during the production and disposal processes.

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.

EN 16809-1:2019 (E)

1 Scope

This document specifies the requirements for products of loose-filled expanded polystyrene (EPS) beads and bonded expanded polystyrene beads for *in situ* installation in masonry cavity walls and frame constructions.

This document is a specification for the insulation products before installation. It describes the product characteristics and includes procedures for testing, marking and labelling.

This document does not specify the required level of a given property to be achieved by a product to demonstrate fitness for purpose in a particular application. The levels required for a given application are to be found in regulations or non-conflicting standards.

NOTE To avoid water penetration in masonry walls special tests adjusted to local climate could be needed.

This document does not cover factory made expanded polystyrene (EPS) insulation products and factory made or *in situ* products intended to be used for the insulation of building equipment and industrial installations.

Products with a declared thermal resistance lower than $0,25 \text{ m}^2 \cdot \text{K}/\text{W}$ or a declared thermal conductivity greater than $0,060 \text{ W}/(\text{m} \cdot \text{K})$ at $10 \text{ }^\circ\text{C}$ are not covered by this document.

This document does not cover products intended for airborne sound insulation and for acoustic absorption applications.

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 933-1, *Tests for geometrical properties of aggregates – Part 1: Determination of particle size distribution – Sieving method*

EN 1602, *Thermal insulating products for building applications — Determination of the apparent density*

EN 1609, *Thermal insulating products for building applications — Determination of short term water absorption by partial immersion*

EN 12086, *Thermal insulating products for building applications – Determination of water vapour transmission properties*

EN 12667, *Thermal performance of building materials and products — Determination of thermal resistance by means of guarded hot plate and heat flow meter methods — Products of high and medium thermal resistance*

EN 12939, *Thermal performance of building materials and products — Determination of thermal resistance by means of guarded hot plate and heat flow meter methods — Thick products of high and medium thermal resistance*

EN 13172, *Thermal insulation products — Evaluation of conformity*

EN 13501-1, *Fire classification of construction products and building elements — Part 1: Classification using data from reaction to fire tests*

EN 13820, *Thermal insulating materials for building applications — Determination of organic content*

EN 13823, *Reaction to fire tests for building products — Building products excluding floorings exposed to the thermal attack by a single burning item*

EN 15715, *Thermal insulation products — Instructions for mounting and fixing for reaction to fire testing — Factory made products*

EN ISO 1182, *Reaction to fire tests for products — Non-combustibility test (ISO 1182)*

EN ISO 11925-2, *Reaction to fire tests — Ignitability of products subjected to direct impingement of flame — Part 2: Single-flame source test (ISO 11925-2)*

ISO 16269-6:2014, *Statistical interpretation of data — Part 6: determination of statistical tolerance intervals*

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