

Building and civil engineering sealants -
Determination of adhesion and cohesion properties of
sealants after exposure to heat, water and artificial
light through glass (ISO 11431:2025)

EESTI STANDARDI EESSÕNA

NATIONAL FOREWORD

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| <p>See Eesti standard EVS-EN ISO 11431:2025 sisaldab Euroopa standardi EN ISO 11431:2025 ingliskeelset teksti.</p> <p>Standard on jõustunud sellekohase teate avaldamisega EVS Teatajas.</p> <p>Euroopa standardimisorganisatsioonid on teinud Euroopa standardi rahvuslikele liikmetele kättesaadavaks 10.09.2025.</p> <p>Standard on kättesaadav Eesti Standardimis- ja Akrediteerimiskeskusest.</p> | <p>This Estonian standard EVS-EN ISO 11431:2025 consists of the English text of the European standard EN ISO 11431:2025.</p> <p>This standard has been endorsed with a notification published in the official bulletin of the Estonian Centre for Standardisation and Accreditation.</p> <p>Date of Availability of the European standard is 10.09.2025.</p> <p>The standard is available from the Estonian Centre for Standardisation and Accreditation.</p> |
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EUROPEAN STANDARD

EN ISO 11431

NORME EUROPÉENNE

EUROPÄISCHE NORM

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Supersedes EN ISO 11431:2002

English Version

**Building and civil engineering sealants - Determination of
adhesion and cohesion properties of sealants after
exposure to heat, water and artificial light through glass
(ISO 11431:2025)**

Mastics pour le bâtiment et le génie civil -
Détermination des propriétés d'adhésivité et de
cohésion des mastics après exposition à la chaleur, à
l'eau et à la lumière artificielle à travers le verre (ISO
11431:2025)

Fugendichtstoffe für Hoch- und Tiefbau - Bestimmung
des Haft- und Dehnverhaltens von Dichtstoffen nach
Einwirkung von Wärme, Wasser und künstlichem Licht
durch Glas (ISO 11431:2025)

This European Standard was approved by CEN on 4 September 2025.

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

CEN-CENELEC Management Centre: Rue de la Science 23, B-1040 Brussels

European foreword

This document (EN ISO 11431:2025) has been prepared by Technical Committee ISO/TC 59 "Buildings and civil engineering works" in collaboration with CCMC.

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 2026, and conflicting national standards shall be withdrawn at the latest by March 2026.

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 ISO 11431:2002.

Any feedback and questions on this document should be directed to the users' national standards body/national committee. A complete listing of these bodies can be found on the CEN website.

According to the CEN-CENELEC Internal Regulations, the national standards organizations 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, Türkiye and the United Kingdom.

Endorsement notice

The text of ISO 11431:2025 has been approved by CEN as EN ISO 11431:2025 without any modification.

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Foreword

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The procedures used to develop this document and those intended for its further maintenance are described in the ISO/IEC Directives, Part 1. In particular, the different approval criteria needed for the different types of ISO documents should be noted. This document was drafted in accordance with the editorial rules of the ISO/IEC Directives, Part 2 (see www.iso.org/directives).

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This document was prepared by Technical Committee ISO/TC 59, *Buildings and civil engineering works*, Subcommittee SC 8, *Sealants*, in collaboration with the European Committee for Standardization (CEN) Technical Committee CEN/BT Technical Board, in accordance with the Agreement on technical cooperation between ISO and CEN (Vienna Agreement).

This third edition cancels and replaces the second edition (ISO 11431:2002), which has been technically revised.

The main changes are as follows:

- the title has been revised from *Building construction — Jointing products — Determination of adhesion/cohesion properties of sealants after exposure to heat, water and artificial light through glass*;
- normative references have been updated;
- a normative reference to ISO 4892-2 has been added in [5.6](#);
- [5.7](#) has been revised;
- in [5.8](#), the subclause of referenced document has been revised and the preferred device for measuring the maximum surface temperature has been added;
- the tolerance for relative humidity has been revised in [7.2](#) and [8.3](#).

Any feedback or questions on this document should be directed to the user's national standards body. A complete listing of these bodies can be found at www.iso.org/members.html.

Building and civil engineering sealants — Determination of adhesion and cohesion properties of sealants after exposure to heat, water and artificial light through glass

1 Scope

This document specifies a method for the determination of the adhesion and cohesion properties of sealants after cyclic exposure to heat and artificial light followed by a period of exposure to water at a defined temperature.

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.

ISO 4892-1, *Plastics — Methods of exposure to laboratory light sources — Part 1: General guidance and requirements*

ISO 4892-2:2013, *Plastics — Methods of exposure to laboratory light sources — Part 2: Xenon-arc lamps*

ISO 6927, *Building and civil engineering sealants — Vocabulary*

ISO 13640, *Building and civil engineering sealants — Specifications for test substrates*

3 Terms and definitions

For the purposes of this document, the terms and definitions given in ISO 6927 apply.

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

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

4 Principle

Specimens are prepared in which the sealant to be tested adheres to two parallel glass surfaces. After submitting the specimens to a cyclic exposure to artificial light at elevated temperature and to water, the specimens are extended to a defined width. After maintenance of the extension for a defined time, the specimens are examined for evidence of loss of adhesion or cohesion.

NOTE The cyclic exposure of the test specimens to water and to radiation and heat is meant to simulate the exposure of sealants in service to natural weather conditions. The acceleration factor in comparison with the real situation is unknown. The intention is not to receive durability data for the sealants under evaluation but to ensure a minimum performance in glazing applications.