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МЕЖДУНАРОДНАЯ ОРГАНИЗАЦИЯ ПО СТАНДАРТИЗАЦИИ

Building construction — Jointing products — Determination of extrudability of sealants using standardized apparatus

Construction immobilière — Produits pour joints — Détermination de l'extrudabilité des mastics au moyen d'un appareil normalisé

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Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work.

Draft International Standards adopted by the technical committees are circulated to the member bodies for approval before their acceptance as International Standards by the ISO Council. They are approved in accordance with ISO procedures requiring at least 75 % approval by the member bodies voting.

International Standard ISO 9048 was prepared by Technical Committee ISO/TC 59, *Building construction*.

Users should note that all International Standards undergo revision from time to time and that any reference made herein to any other International Standard implies its latest edition, unless otherwise stated.

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Building construction — Jointing products — Determination of extrudability of sealants using standardized apparatus

1 Scope and field of application

This International Standard specifies a method for the determination of extrudability of one-component or multi-component sealants regardless of the kind of packages in which they are supplied or from which they are applied to the joint in buildings.

NOTE — A method for the determination of the extrudability of one-component sealants from the packages in which they are supplied is given in ISO 8394.

2 References

ISO 228-1, *Pipe threads where pressure-tight joints are not made on the threads — Part 1: Designation, dimensions and tolerances.*

ISO 2009, *Slotted countersunk head screws (common head style) — Product grade A.*

ISO 2338, *Parallel pins, unhardened.*

ISO 6927, *Building construction — Jointing products — Sealants — Vocabulary.*

3 Definitions

For the purposes of this International Standard, the definitions given in ISO 6927 apply.

4 Principle

Extrusion of a defined volume of sealant from a standardized device under defined conditions by means of compressed air. Reporting of the extrudability as extruded volume per time unit, in the case of multi-component sealants by plotting a diagram.

5 Apparatus

5.1 Extrusion device, for pneumatic operation according to figures 1 and 2 for a test volume of approximately 250 or 400 ml and with an orifice diameter of 2, 4, 6 or 10 mm as stipulated in relevant requirement standards or as agreed.

5.2 Air compressor, with valve and pressure gauge to maintain the supply of compressed air at 200 ± 2,5 kPa and with an appropriate connection to the extrusion device.

5.3 Graduated glass cylinder, of 1 000 ml capacity.

5.4 Stop watch, calibrated in seconds.

6 Conditioning

The sealant to be tested and the apparatus shall be conditioned at 5 ± 2 °C and/or 23 ± 2 °C and at (50 ± 5) % relative humidity for at least 8 h.

7 Procedure

7.1 General

The test procedure shall be carried out at 23 ± 2 °C and at (50 ± 5) % relative humidity.

Fit the piston and ring of the extrusion device (5.1) together and insert in the cylinder with the ring towards the orifice. Fill the cylinder with the sealant without producing any bubbles. In the case of multi-component sealant the filling shall be done immediately after the components have been mixed according to the requirements of the manufacturer.

Flush the surface of the sealant before the orifice cap, slide bar and orifice plate are put on the cylinder.

Choose the cylinder volume and orifice diameter according to the stipulations of the relevant requirement standards or as agreed upon between the parties involved.

Where a sealant which has been conditioned at more than one of the temperatures stated in clause 6 is tested, the same cylinder volume and orifice diameter shall be used.

Set the filled extrusion device (5.1) under an air pressure of 200 ± 2,5 kPa (5.2) with the slide bar closed and keep it constantly under this pressure during the whole test.

Before starting measurement extrusion, extrude 2 or 3 cm of sealant to fill the orifice of the extrusion device.