



SLOVENSKI STANDARD SIST EN ISO 15912:2016

01-maj-2016

Nadomešča:

SIST EN ISO 15912:2006

SIST EN ISO 15912:2006/A1:2011

Zobozdravstvo - Polnila in refrakcijski materiali (ISO 15912:2016)

Dentistry - Refractory investment and die material (ISO 15912:2016)

Zahnheilkunde - Hochtemperaturbeständige Einbettmassen und Stumpfmaterien (ISO 15912:2016)

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Art dentaire - Revêtements et matériaux pour modèles réfractaires (ISO 15912:2016)

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11.060.10

Zobotehnični materiali

Dental materials

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EUROPEAN STANDARD
NORME EUROPÉENNE
EUROPÄISCHE NORM

EN ISO 15912

February 2016

ICS 11.060.10

Supersedes EN ISO 15912:2006

English Version

**Dentistry - Refractory investment and die material (ISO
15912:2016)**

Médecine bucco-dentaire - Revêtements et matériaux
pour modèles réfractaires (ISO 15912:2016)

Zahnheilkunde - Hochtemperaturbeständige
Einbettmassen und Stumpfmaterialeien (ISO
15912:2016)

This European Standard was approved by CEN on 24 October 2015.

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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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Contents

Page

European foreword.....	3
------------------------	---

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[SIST EN ISO 15912:2016](https://standards.iteh.ai/catalog/standards/sist/32dbfbac-1416-4c6e-9abc-38e2306aad08/sist-en-iso-15912-2016)

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European foreword

This document (EN ISO 15912:2016) has been prepared by Technical Committee ISO/TC 106 “Dentistry” in collaboration with Technical Committee CEN/TC 55 “Dentistry” 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of an identical text or by endorsement, at the latest by August 2016, and conflicting national standards shall be withdrawn at the latest by August 2016.

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

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INTERNATIONAL STANDARD

ISO
15912

Second edition
2016-01-15

Dentistry — Refractory investment and die material

*Médecine bucco-dentaire — Revêtements et matériaux pour
modèles réfractaires*

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Contents

Page

Foreword	v
1 Scope	1
2 Normative references	1
3 Terms and definitions	1
4 Classification	3
5 Requirements	3
5.1 General	3
5.2 Material consistency and freedom from contamination	3
5.3 Fluidity	3
5.4 Initial setting time	4
5.5 Compressive strength	4
5.6 Linear thermal dimensional change	4
5.7 Adequacy of expansion of Type 1 and Type 2 materials	4
6 Sampling, test conditions and mixing	4
6.1 Sampling	4
6.2 Test conditions	4
6.3 Mixing	5
6.3.1 Apparatus	5
6.3.2 Procedure	5
7 Test methods	5
7.1 Material consistency and freedom from contamination	5
7.1.1 Test procedure	5
7.1.2 Test report	5
7.2 Fluidity	5
7.2.1 Apparatus	5
7.2.2 Number of test-pieces	6
7.2.3 Test procedure	6
7.2.4 Evaluation of results	6
7.2.5 Test report	6
7.3 Initial setting time	7
7.3.1 Apparatus	7
7.3.2 Procedure	9
7.3.3 Number of determinations	9
7.3.4 Evaluation of results	10
7.3.5 Test report	10
7.4 Compressive strength	10
7.4.1 Apparatus	10
7.4.2 Number of test-pieces	10
7.4.3 Preparation of test-pieces	11
7.4.4 Test procedure	11
7.4.5 Evaluation of results	12
7.4.6 Test report	12
7.5 Linear thermal dimensional change	12
7.5.1 Apparatus	12
7.5.2 Number of test-pieces	13
7.5.3 Preparation of the test-piece	13
7.5.4 Test procedure for the measurement of linear thermal expansion of Types 1, 2 and 3 products	14
7.5.5 Test procedure for the measurement of linear thermal dimensional changes of a Type 4 product	15
7.5.6 Evaluation of results	15
7.5.7 Test report	16

ISO 15912:2016(E)

7.6	Adequacy of expansion of Type 1 and Type 2 products	16
7.6.1	General	16
7.6.2	Type 1 and Type 2 products intended for casting of dental metallic materials	17
7.6.3	Type 1 products intended for dental pressable-ceramic products	18
7.6.4	Evaluation of results	20
7.6.5	Test report	20
8	Manufacturer's instructions	20
8.1	General	20
8.2	Information for use	20
8.3	Physical properties	21
8.4	Safety labelling and instructions for a product containing silica	22
9	Marking	22
9.1	General	22
9.2	Powder container	22
9.2.1	Outer container	22
9.2.2	Individual packets	23
9.3	Liquid container	23
10	Packaging	23
10.1	Powder	23
10.2	Liquid	24
	Bibliography	25

iTeh STANDARD PREVIEW (standards.iteh.ai)

[SIST EN ISO 15912:2016](https://standards.iteh.ai/catalog/standards/sist/32dbfbac-1416-4c6e-9abc-38e2306aad08/sist-en-iso-15912-2016)

<https://standards.iteh.ai/catalog/standards/sist/32dbfbac-1416-4c6e-9abc-38e2306aad08/sist-en-iso-15912-2016>

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. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

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).

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. ISO shall not be held responsible for identifying any or all such patent rights. Details of any patent rights identified during the development of the document will be in the Introduction and/or on the ISO list of patent declarations received (see www.iso.org/patents).

Any trade name used in this document is information given for the convenience of users and does not constitute an endorsement.

For an explanation on the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the WTO principles in the Technical Barriers to Trade (TBT) see the following URL: [Foreword - Supplementary information \(standards.iteh.ai\)](http://Foreword - Supplementary information (standards.iteh.ai))

The committee responsible for this document is ISO/TC 106 *Dentistry*, Subcommittee SC2, *Prosthodontic Materials*.

This second edition ~~replaces the first edition (ISO 15912:2006)~~, which has been technically revised. It also incorporates the Amendment ISO 15912-1:2006/Amd 1:2011.

In this edition, dental pressable-ceramic investment materials are included in the Scope for the first time. These products are intended for the production of ceramic crowns and inlays and, as such, the same requirements as those for an investment product intended for the production of metallic crowns and inlays by casting are relevant (Type 1, according to the classification in this standard).

The previous edition contained requirements and test methods that had been developed for discontinued composition specific standards. In recent years products have been introduced that have other chemistries (for the binder and the refractory phase), specifically to minimize chemical reaction between the mould and the molten casting metallic material. A number of technical changes have been made to enable all dental casting investment products, regardless of their composition, to seek compliance with this International Standard and maintains the agreed philosophy that this International Standard should be inclusive, application-driven and not be limited by composition considerations.

Where appropriate, aspects of the test procedures have been changed to follow the manufacturer's instructions for use. The requirement for thermal dimensional change now takes into account the cooling of some products (after burn-out) to a lower casting temperature. The specification for the dilatometer has been changed for it to be compatible with the heating — and where relevant, the cooling after burn-out — of the product to the casting temperature.

The procedure for determining the initial setting time has been revised to harmonize with that present in the latest edition of the standard for dental gypsum products, ISO 6873:2013.^[1] Although substantially editorial, there are technical changes.

Information for use now requires a statement of the type of refractory phase(s) that is (are) present.

ISO 15912:2016(E)

Labelling requirements for products that contain silica have been revised to comply with the current United Nations Globally Harmonized System for Classification and Labelling of Chemicals (UN GHS)^[2] and recommendations for silica as a hazardous material.

Containers of liquid must be marked to indicate the use to which the liquid is put.

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