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NATIONAL FOREWORD

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EUROPEAN STANDARD
NORME EUROPÉENNE
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EN 480-13:2009+A1

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Supersedes EN 480-13:2009

English Version

Admixtures for concrete, mortar and grout - Test methods - Part
13: Reference masonry mortar for testing mortar admixtures

Adjuvants pour béton, mortier et coulis - Méthodes d'essai -
Partie 13: Mortier à maçonner de référence pour les essais
menés sur les adjuvants de mortier

Zusatzmittel für Beton, Mörtel und Einpressmörtel -
Prüfverfahren - Teil 13: Referenz-Baumörtel für Prüfung
von Zusatzmitteln für Mauerwerksmörtel

This European Standard was approved by CEN on 10 August 2009 and includes Amendment 1 approved by CEN on 12 May 2011.

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Foreword

This document (EN 480-13:2009+A1:2011) has been prepared by Technical Committee CEN/TC 104 "Concrete and related 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of an identical text or by endorsement, at the latest by December 2011, and conflicting national standards shall be withdrawn at the latest by December 2011.

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.

This document includes Amendment 1, approved by CEN on 2011-05-12.

This document supersedes □₁ EN 480-13:2009 □₁.

The start and finish of text introduced or altered by amendment is indicated in the text by tags □₁ □₁.

This document has been prepared by Subcommittee 3 (SC 3) of TC 104 "Admixtures for concrete".

The present standard is applicable together with the standards of the EN 480 and EN 934 series.

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, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland and United Kingdom.

1 Scope

This standard specifies the constituent materials, the composition and the mixing procedure to produce a reference masonry mortar with a prescribed consistence for testing mortar admixtures as defined in EN 934-3. It also describes the determination of the water reduction of the test mix compared to the control mix.

2 Normative references

The following referenced documents are indispensable for the application 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 196-1, *Methods of testing cement — Part 1: Determination of strength*

EN 196-2, *Methods of testing cement — Part 2: Chemical analysis of cement*

EN 196-6, *Methods of testing cement — Part 6: Determination of fineness*

EN 197-1, *Cement — Part 1: Composition, specifications and conformity criteria for common cements*

EN 934-3, *Admixtures for concrete, mortar and grout — Part 3: Admixtures for masonry mortar — Definitions, requirements, conformity, marking and labelling*

EN 1008, *Mixing water for concrete — Specification for sampling, testing and assessing the suitability of water, including water recovered from processes in the concrete industry, as mixing water for concrete*

EN 1015-4, *Methods of test for mortar for masonry — Part 4: Determination of consistence of fresh mortar (by plunger penetration)*

EN 1015-7, *Methods of test for mortar for masonry — Part 7: Determination of air content of fresh mortar*

3 Constituent materials

3.1 Cement

The reference masonry mortar shall be made with CEM I cement of strength class 42.5 or 52.5, conforming to EN 197-1.

The cement used shall have a C₃A content of 7 % to 11 % by mass calculated from chemical analysis according to EN 196-2 A1 and a specific surface of (3 600 to 4 600) cm²/g determined according to EN 196-6. A1

3.2 Sand

A natural sand of normal density (relative density 2,5 – 2,8) shall be used. The size fractions of the sand shall comply with Table 1. The sand shall be used in an oven dry condition.