

**Betooni, mördi ja süstmördi lisandid -
Teimimismeetodid - Osa 12: Leelisesisalduse
määramine lisandis**

Admixtures for concrete, mortar and grout - Test methods -
Part 12: Determination of the alkali content of admixtures

EESTI STANDARDI EESSÕNA

NATIONAL FOREWORD

Käesolev Eesti standard EVS-EN 480-12:2000 sisaldab Euroopa standardi EN 480-12:1997 ingliskeelset teksti.

Standard on kinnitatud Eesti Standardikeskuse 19.07.2000 käskkirjaga ja jõustub sellekohase teate avaldamisel EVS Teatajas.

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ICS 91.100.10, 91.100.30

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English version

Admixtures for concrete, mortar and grout

Test methods

Part 12: Determination of the alkali content of admixtures

Adjuvants pour béton, mortier et
coulis – Méthodes d'essai –
Partie 12: Détermination de la teneur
en alcalins dans les adjuvants

Zusatzmittel für Beton, Mörtel und
Einpreßmörtel – Prüfverfahren –
Teil 12: Bestimmung des Alkali-
gehalts von Zusatzstoffen

This European Standard was approved by CEN on 1997-04-03.

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CEN

European Committee for Standardization
Comité Européen de Normalisation
Europäisches Komitee für Normung

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Foreword

This European Standard has been prepared by Technical Committee CEN/TC 104 "Concrete (performance, production, placing and compliance criteria)", the secretariat of which is held by DIN.

This Standard had been prepared by Subcommittee 3 (SC 3) of TC 104 "Admixtures for concrete, mortar and grout".

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

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of an identical text or by endorsement, at the latest by April 1998, and conflicting national standards shall be withdrawn at the latest by April 1998.

According to the CEN/CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard: Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and the United Kingdom.

1 Scope

This European Draft Standard specifies a method for the determination of the alkali (sodium and potassium) content of admixtures for concrete, mortar and grouts in accordance with the series EN 934.

2 Normative references

This European Standard incorporates by dated or undated reference, provisions from other publications. These normative references are cited at the appropriate places in the text and the publications are listed hereafter. For dated references, subsequent amendments to or revisions of any of these publications apply to this European Draft Standard only when incorporated in it by amendment or revision. For undated references the latest edition of the publication referred to applies.

EN 196-21

Methods of testing cement – Determination of the chloride, carbon dioxide and alkali content of cement

EN 934-2

Admixtures for concrete, mortar and grout – Part 2: Concrete admixtures – Definitions and requirements

ISO 648

Laboratory glassware – One-mark pipettes

ISO 1042

Laboratory glassware – One-mark volumetric flasks

3 Principle

An atomic absorption spectrophotometer is used to measure the sodium and potassium in dilute nitric acid extracts from admixtures. The extract is nebulised into an air/acetylene flame and the absorption of sodium or potassium radiation as it passes through the flame is measured. The amount of absorption is directly proportional to the sodium or potassium content of the extract at low concentrations. The sodium and potassium contents are separately measured and their sum, proportioned by molecular mass, is reported as the total equivalent Na_2O (alkali) content.