DIN EN 13791



ICS 91.080.40

Supersedes DIN EN 13791:2008-05 and DIN EN 13791/A20:2017-02

Assessment of in-situ compressive strength in structures and precast concrete components; English version EN 13791:2019, English translation of DIN EN 13791:2020-02

Bewertung der Druckfestigkeit von Beton in Bauwerken und in Bauwerksteilen; Englische Fassung EN 13791:2019,

Englische Übersetzung von DIN EN 13791:2020-02

Évaluation de la résistance à la compression sur site des structures et des éléments préfabriqués en béton;

Version anglaise EN 13791:2019,

Traduction anglaise de DIN EN 13791:2020-02

Document comprises 45 pages

Translation by DIN-Sprachendienst.

In case of doubt, the German-language original shall be considered authoritative.



A comma is used as the decimal marker.

National foreword

This document (EN 13791:2019) has been prepared by Technical Committee CEN/TC 104 "Concrete and related products" (Secretariat: SN, Norway).

The responsible German body involved in its preparation was *DIN-Normenausschuss Bauwesen* (DIN Standards Committee Building and Civil Engineering), Working Committee NA 005-07-05 AA "Test methods for concrete".

In order to identify rules for the assessment of in-situ compressive strength in structures and precast concrete components which are to be specified in national regulations according to this document or rules for applications which are not expressly included in the Scope of this document, a national annex may be required for the publication of this document as a standard.

EN 13791:2019 contains an error in Annex B which is marked and explained by a national footnote.

The DIN document corresponding to the international document referred to in this document is as follows:

ISO/IEC 17025 DIN EN ISO/IEC 17025

Amendments

This standard differs from DIN EN 13791:2008-05 and DIN EN 13791/A20:2017-02 as follows:

- a) the standard has been completely revised; but for continuity the methodological approaches and the Scope as well as the previous structure have been kept;
- b) the main focus is on the determination of the characteristic in-situ compressive strength for the application with EN 1990 and EN 1992-1-1;
- c) a more comprehensive guidance on applying the procedures has been provided, particularly with respect to defining a test result, a measurement, the volume of concrete, a limited test region and the test region;
- d) requirements for the specification of the purpose of the investigation, of the procedures to be applied and of the test locations and test regions to be defined prior to commencing the testing have been included:
- e) Clause 8 "Estimation of compressive strength for structural assessment of an existing structure" covers the previous requirements for the assessment of the characteristic in-situ compressive strength by testing cores or indirect methods;
- Clause 9 "Assessment of compressive strength class of concrete in case of doubt" covers the previous requirements for the assessment in cases where the conformity of concrete based on standard tests is in doubt;
- g) the Approaches A and B specified in EN 13791:2007 are no longer valid;
- h) EN 13791 has been aligned with the requirements of EN 206.

Previous editions

DIN EN 13791: 2008-05 DIN EN 13791/A20: 2017-02

National Annex NA (informative)

Bibliography

DIN EN ISO/IEC 17025, General requirements for the competence of testing and calibration laboratories

DIN	FN	12	791	.20	120	1_1	12

— This page is intentionally blank —

EUROPEAN STANDARD NORME EUROPÉENNE EUROPÄISCHE NORM

EN 13791

August 2019

ICS 91.080.40

Supersedes EN 13791:2007

English Version

Assessment of in-situ compressive strength in structures and precast concrete components

Évaluation de la résistance à la compression sur site des structures et des éléments préfabriqués en béton Bewertung der Druckfestigkeit von Beton in Bauwerken und in Bauwerksteilen

This European Standard was approved by CEN on 7 July 2019.

CEN members are bound to comply with the CEN/CENELEC Internal Regulations which stipulate the conditions for giving this European Standard the status of a national standard without any alteration. Up-to-date lists and bibliographical references concerning such national standards may be obtained on application to the CEN-CENELEC Management Centre or to any CEN member.

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.

CEN members are the national standards bodies of 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, Turkey and United Kingdom.



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

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

© 2019 CEN All rights of exploitation in any form and by any means reserved worldwide for CEN national Members.

Ref. No. EN 13791:2019 E