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**NATIONAL STANDARD OF THE
PEOPLE'S REPUBLIC OF CHINA**

GB/T 30190-2026

Replacing GB/T 30190-2013

Concrete with limestone powder

石灰石粉混凝土

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Foreword

This document was issued on 30 July 2026 by the State Administration for Market Regulation; Standardization Administration of the PRC and takes effect on 1 February 2027.

It is a GB/T standard: recommended rather than compulsory, but it is the text a Chinese reviewer applies.

It is classified under ICS 91.100.30 and Chinese classification Q 13.

The document runs to 19 pages. The identification, the dates, the classification and the table of contents on this page are taken from the cover and the printed contents of the standard itself.

This document was drafted in accordance with GB/T 1.1-2020 "Directives for standardization - Part 1: Rules for the structure and drafting of standardizing documents".

This document replaces GB/T 30190-2013 "Concrete with limestone powder". Compared with the 2013 edition, apart from structural adjustments and editorial changes, the main technical changes are as follows:

a) the definition of the term "concrete with limestone powder" has been changed (see 3.2; 3.2 of the 2013 edition);

- b) the terms "methylene blue value of limestone powder (MBF value)" and "mortar flow ratio of limestone powder at low water-binder ratio" have been added (see 3.3 and 3.4);
- c) the technical indices for the fineness, the MBF value and the calcium carbonate content of limestone powder have been changed, and an optional technical index for the mortar flow ratio at low water-binder ratio has been added (see Table 1; Table 1 of the 2013 edition);
- d) the provisions on cement, aggregate, admixtures and fly ash have been changed (see 4.2.1, 4.2.2, 4.2.4 and 4.2.5; the corresponding subclauses of the 2013 edition);
- e) the maximum content of limestone powder in prestressed reinforced concrete has been changed (see Table 3; Table 3 of the 2013 edition);
- f) requirements for the use of limestone powder in low temperature and sulfate attack environments have been added (see 4.3.6);
- g) influence coefficients for limestone powder at contents of 30 % and 35 % have been added (see Table 4);
- h) concrete strength grades have been added (see 5.1.1);
- i) provisions on the air content of the fresh concrete in freeze-thaw environments and in the general environment have been added (see 5.4);
- j) the provisions on the water-soluble chloride ion content of the fresh concrete have been changed (see Table 5; Table 8 of the 2013 edition);
- k) requirements for classifying the durability grade of concrete with limestone powder have been added (see 5.6.1);
- l) the test methods for the fineness and the MBF value of limestone powder have been changed (see 7.1.1 and 7.1.2; 7.1.1 and 7.1.5 of the 2013 edition);
- m) a test method for the mortar flow ratio of limestone powder at low water-binder ratio has been added (see 7.1.5);
- n) a test method for setting time has been added (see 7.2).

1 Scope

GB/T 30190 is the Chinese standard for concrete made with limestone powder as a mineral admixture. Limestone powder is the cheapest way to replace part of the cement in a mix, and replacing cement is where most of the carbon in concrete can be taken out, which is why this document matters commercially and environmentally at the same time. It specifies the raw materials and the mix proportion, the technical requirements, the preparation, the inspection rules and the ordering and delivery, and it describes the test methods. It applies to the production and inspection of limestone powder concrete for construction works, and

expressly not to hydraulic engineering concrete. Two normative annexes carry the test methods that are new in this edition: the methylene blue value of the powder, which measures the clay that comes with it, and the mortar flow ratio at low water-binder ratio. The 2026 edition replaces GB/T 30190-2013, adding strength grades, air content requirements, durability grading and the rules for using limestone powder at low temperature and under sulfate attack.

3 Terms and definitions

The following terms and definitions apply to this document.

3.1 limestone powder: a powdered material obtained by grinding limestone of a specified purity to a specified fineness.

3.2 concrete with limestone powder: concrete prepared using limestone powder as a mineral admixture.

3.3 methylene blue value of limestone powder (MBF value): the index, new in this edition, by which the clay content carried into the concrete with the limestone powder is measured. The test method is given in Annex A.

3.4 mortar flow ratio of limestone powder at low water-binder ratio: the index, also new in this edition, by which the effect of the powder on workability is measured under the low water-binder ratios used in high performance concrete. The test method is given in Annex B.