

Australian Standard<sup>®</sup>

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**Specification and methods of  
test for packaged concrete mixes**

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This Australian Standard was prepared by Committee BD/49, Manufacture of Concrete. It was approved on behalf of the Council of Standards Australia on 18 June 1993 and published on 13 September 1993.

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The following interests are represented on Committee BD/49:

Australasian Slag Association  
AUSTROADS  
Cement and Concrete Association of Australia  
Department of Administrative Services — Australian Construction Services  
Housing Industry Association  
Master Builders Construction and Housing Association Australia  
Metal Trades Industry Association of Australia  
National Ready Mixed Concrete Association  
Public Works Department, N.S.W.  
Royal Australian Institute of Architects  
The Association of Consulting Engineers Australia  
University of New South Wales  
University of Sydney

Additional interests participating in preparation of Standard:

Australian Cement Manufacturers  
Bemac Laboratories  
Hardware Retailers Association of N.S.W.

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## PREFACE

This Standard was prepared by the Standards Australia Committee on Manufacture of Concrete. Its preparation was initiated by the cement manufacturing industry as a means of promoting a uniform measure of quality of the product on a national scale, and to provide a degree of assurance to the user that the required quality is achieved if the supplied product complies with this Standard.

It is intended that the concrete made from the contents of each package is to be used in domestic situations for making small items (e.g. a 600 mm × 600 mm × 50 mm thick garden paving block) and for other applications, such as patching, where a particular concrete strength is not an essential consideration. It is not intended that the concrete is to be used in any way for structural purposes.

A number of Appendices are included which detail appropriate methods of test for assessing if the package and its contents satisfy specific requirements of the Standard. Also included as an Appendix are examples of suggested 'Instructions for use'.

It should be noted that the number of samples specified for each test is the minimum number necessary for establishing a meaningful result for that test. More samples may be required for quality assurance purposes.

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## STANDARDS AUSTRALIA

**Australian Standard****Specification and methods of test for packaged concrete mixes**

**1 SCOPE** This Standard specifies minimum requirements for the solid ingredients of dense weight concrete and for packaging appropriate proportions of these which, when mixed with water, will produce a volume of plastic concrete not exceeding 20 L (0.020 m<sup>3</sup>) from each pack. Relevant methods of test are given in the Appendices.

This Standard does not apply to packaged mixtures of sand and cement intended for use as mortar or plaster, or to mixtures of ingredients for concrete required to comply with AS 3600.

NOTE: Methods for demonstrating compliance with this Standard are given in Appendix A.

**2 REFERENCED DOCUMENTS** The following documents are referred to in this Standard:

## AS

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|---------|---|
| 1012    | Methods of testing concrete   |
| 1012.3  | Method 3: Methods for the determination of properties related to the consistency of concrete  |
| 1012.5  | Method 5: Method for the determination of mass per unit volume of freshly mixed concrete  |
| 1012.8  | Method 8: Method for making and curing concrete compression, indirect tensile and flexure test specimens, in the laboratory or in the field |
| 1012.9  | Method 9: Method for the determination of the compressive strength of concrete specimens  |
| 1012.18 | Method 18: Method for the determination of setting time of fresh concrete, mortar and grout (metric units)                                  |
| 1012.20 | Method 20: Determination of chloride and sulfate in hardened concrete and concrete aggregates   |
| 1141    | Methods for sampling and testing aggregates   |
| 1141.2  | Part 2: Basic testing equipment   |
| 1141.6  | Method 6: Bulk density and water absorption of coarse aggregate   |
| 1141.11 | Method 11: Particle size distribution by dry sieving  |
| 1141.22 | Method 22: Wet/dry strength variation   |
| 1152    | Test sieves   |
| 1199    | Sampling procedures and tables for inspection by attributes   |
| 1399    | Guide to AS 1199—Sampling procedures and tables for inspection by attributes  |
| 1478    | Chemical admixtures for concrete  |
| 2582    | Complete, filled transport packages—Methods of test   |
| 2582.4  | Method 4: Vertical impact test by dropping  |
| 2758    | Aggregates and rock for engineering purposes  |
| 2758.1  | Part 1: Concrete aggregates   |