Australian Standard®

Manual of uniform traffic control devices

Part 8: Freeways

This Australian Standard was prepared by Committee MS/12, Road Signs and Traffic Signals. It was approved on behalf of the Council of Standards Australia on 27 June 1990 and published on 8 October 1990.

The following interests are represented on Committee MS/12:

ACT Administration
Australian Automobile Association
Australian Local Government Association
Australian Road Research Board
Austroads
Confederation of Australian Industry
Department of Transport and Communications
Department of Road Transport, South Australia
Local Government Engineers Association of Victoria
Main Roads Department, Queensland
Railways of Australia Committee
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Part 8: Freeways

First published as part of AS 1742.1—1975. AS 1742.1 withdrawn 1987. AS 1742.2 first published 1978. Withdrawn 1987. AS 1742.1—1975 and AS 1742.2—1978 revised, amalgamated and redesignated in part as AS 1742.8—1990.

PREFACE

This Standard was prepared by the Standards Australia Committee on Road Signs and Traffic Signals. It is one in a series of thirteen Standards which will supersede AS 1742.1, Manual of uniform traffic control devices, Part 1—1975, Description and use of elemental traffic control devices and AS 1742.2 Part 2—1978, Application of traffic control devices to traffic situations. When completed the series will comprise the following Standards:

AS

- 1742 Manual of uniform traffic control devices
- 1742.1 General introduction and index of signs
- 1742.2 Traffic control devices for general use
- 1742.3 Traffic control devices for works on roads
- 1742.4 Speed controls
- 1742.5 Street name and community facility name signs
- 1742.6 Service and tourist signs for motorists
- 1742.7 Railway crossings
- 1742.8 Freeways (this Standard)
- 1742.9 Bicycle facilities
- 1742.10 Pedestrian control and protection
- 1742.11 Parking controls
- 1742.12 Bus, transit and truck lanes
- 1742.13 Local area traffic management

Each Standard will consist of specific material from AS 1742.1—1975 and AS 1742.2—1978 relevant to the particular traffic situation and will incorporate any amendments to this material that have been issued for public comment and approved by the Committee for publication.

This Standard deals with traffic control for freeways. The information it contains replaces that previously given in Clause 5.7 of AS 1742.1—1975 and Section 10 of AS 1742.2—1978. In the years following publication of these earlier Standards there has been a very substantial gain in experience among Australian State road authorities in the signing, marking and delineation of both urban and rural freeways. This is reflected in the present Standard which is a major review and expansion of the material given in the earlier documents. Changes in practice of particular note are given below.

Use of a separate shade of green for the backgrounds of freeway direction signs is discontinued. This decision of the Committee arises from the introduction by most road authorities of the use of a reflectorized green colour for all direction sign backgrounds and the resulting difficulty in finding two reflectorized green colours sufficiently different to be easily identifiable in practical situations. The single colour now adopted is that formerly referred to by names such as 'Worboys', 'Brunswick', 'Moss' Green, and is now designated in AS 1743—1989 as 'Standard Green'.

The use of downward pointing arrows on overhead direction signs to indicate individual lanes has been discontinued. In many common cases upward arrows showing only the general direction of travel have been found satisfactory and they reduce the visual complexity of the sign. Where individual lane indications are essential, individual upward arrows over each lane have again been found satisfactory and have the advantage of greatly simplifying the signing of shared lanes at freeway exits by use of double-headedarrows.

Post mounted delineation is now prescribed for rural and outer urban unlit freeways. When the draft Standard was issued for comment, there was almost unanimous agreement from responding road authorities that the additional long range delineation provided by such devices was of greater importance than roadside maintenance or safety objections.

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STANDARDS AUSTRALIA

Australian Standard Manual of uniform traffic control devices

Part 8: Freeways

SECTION 1 SCOPE AND GENERAL

- **1.1 SCOPE** This Standard specifies traffic control devices for use on freeways. Devices for use on other roads in the vicinity of a freeway which pertain to, or are required due to the presence of the freeway are also included.
- **1.2 APPLICATION** The Standard is applicable to freeways conforming with the definition given in AS 1348.1, i.e. full control of access between interchanges, and all intersections, grade separated. It may also be applied to those sections of expressways and similar facilities which conform to that description.
- 1.3 REFERENCED DOCUMENTS The following documents are referred to in this Standard:

| I.S KEF | ERENCED DOCUMENTS The following documents are referred to in |
|------------------------------------|--|
| AS 1348 1348.1 1348.2 | Road and traffic engineering—Glossary of terms Road design and construction Traffic management |
| 1742 1742.1 1742.2 1742.6 | Manual of uniform traffic control devices General introduction and index Traffic control devices for general use Service and tourist signs for motorists |
| 1743 | Road signs—Specifications |
| 1744 | Standard alphabets for road signs |
| 1906 1906.1 1906.2 | Retroreflective materials and devices for road traffic control purposes Retroreflective materials Retroreflective devices (non-pavement application) |

- 1906.3 Raised pavement markers (retroreflective and non-retroreflective)
- 2342 The design and use of graphic symbols and public information symbol signs
- 2342.3 Test procedures for evaluating graphic symbols and symbol signs
- **1.4 DEFINITIONS** For the purpose of this Standard the definitions in AS 1348.1 and AS 1348.2 and the following apply:
- **1.4.1 Traffic control device**—any sign, signal, pavement marking or other installation placed or erected by a public authority or official body having the necessary jurisdiction, for the purpose of regulating, warning or guiding road users.
- **1.4.2 85th percentile speed (V_{85} km/h)**—the speed at or below which 85 percent of vehicles are observed to travel under free-flowing conditions past a nominated point. A vehicle is considered to be operating under free-flowing conditions when the preceding vehicle has at least 6 s headway and there is no apparent attempt to overtake the vehicle ahead.

NOTE: For the purpose of this Standard it is normal to include all types of vehicle on the road and to aggregate the results of measurements unless specifically noted otherwise. Speed measurements are desirably made by unobtrusive means such as suitably hidden radar or timing devices. Where such devices are not available, the 85th percentile speed can often be estimated by travelling the route and attempting to match the average speed of the faster group of vehicles, such speed being an approximation of the 85th percentile speed. Such an estimate may not be reliable where there are substantial differences among observed speeds within this group. Where the Standard indicates application of an 85th percentile speed to the approach to a hazard, it should be measured well in advance of the point where the hazard itself begins to influence travel speeds.

- **1.5 SPECIFICATION OF SIGNS AND DEVICES** For detailed specifications for the materials and manufacture of the devices in this Standard, reference should be made to AS 1743, AS 1744, AS 1906.1, AS 1906.2 and AS 1906.3.
- **1.6 RESPONSIBILITY AND AUTHORITY FOR INSTALLATION** Attention is drawn to the fact that it is necessary to obtain approval of the appropriate authority before installing any traffic control device. In the case of freeways, this will normally be the State road authority, and because of the special characteristics of freeways, it is likely that precise and stringent controls will be imposed over all devices used. Specific approvals are required in most States and Territories for the installation or removal of certain regulatory signs and devices.