



Vehicles—Rear marker plates

Part 1: Reflective rear marker plates— Classification and manufacturing requirements



This Australian Standard® was prepared by Committee ME-053, Heavy Road Vehicles. It was approved on behalf of the Council of Standards Australia on 29 August 2017. This Standard was published on 23 October 2017.

The following are represented on Committee ME-053:

- Australian Industry Group
- Australian Road Research Board
- Australian Trucking Association
- Austroads
- Commercial Vehicle Industry Association of Australia
- Department of Infrastructure and Regional Development (Australian Government)
- Heavy Vehicle Industry Association
- Municipal Works Operations Association
- National Heavy Vehicle Regulator
- Queensland University of Technology
- Society of Automotive Engineers, Australasia

Additional Interests:

- Reflective material and plates manufacturers
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Australian Standard®

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Part 1: Reflective rear marker plates— Classification and manufacturing requirements

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PREFACE

This Standard was prepared by the Joint Standards Australia/Standards New Zealand Committee ME-053, Heavy Road Vehicles, to supersede AS 4001.1—2003, *Motor vehicles—Rear marker plates, Part 1: Manufacturing and classification requirements for Class 1A and Class 1 reflective plates*.

After consultation with stakeholders in both countries, Standards Australia and Standards New Zealand decided to develop this Standard as an Australian Standard rather than an Australian/New Zealand Standard.

The objective of this Standard is to provide vehicle rear marker plate manufacturers with manufacturing requirements that specify materials, production processes, graphics and text design, and performance requirements.

This revision upgrades the Australian performance requirements for reflective rear marker plates to those retroreflective performance classes used for road signage on highways within Australia. This sees the removal of Class 2 retroreflective materials and AS 4001.3. Increasing the minimum retroreflective sheeting performance level increases the visibility distance of the rear marker plates when mounted on vehicles, thus increasing the safety of the vehicle itself and other road users.

This Standard is Part 1 of AS 4001, *Vehicles—Rear marker plates*, which is published in Parts as follows:

AS

4001.1 Part 1: Reflective rear marker plates—Classification and manufacturing requirements (this Standard)

4001.2 Part 2: Reflective rear marker plates—Fitting requirements

During the 1980s, the then Australian Federal Office of Road Safety initiated a program to improve the night time visibility of vehicles over 12 t Gross Vehicle Mass. Subsequently, rear marker plates were introduced in Australian Design Rules, and as outlined in the 2003 edition of this Standard, could be manufactured from retroreflective materials of Class 2 (now Class 100), Class 1 (now Class 400) or Class 1A performance classes.

The term ‘informative’ has been used in this Standard to define the application of the appendix to which it applies. An ‘informative’ appendix is only for information and guidance.

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STANDARDS AUSTRALIA

Australian Standard

Vehicles—Rear marker plates

Part 1: Reflective rear marker plates—Classification and manufacturing requirements

S E C T I O N 1 S C O P E A N D G E N E R A L

1.1 SCOPE

This Standard specifies manufacturing requirements for Class 1A, Class 400 and UN R70 performance reflective rear marker plates intended for use on road vehicles. It defines materials, production processes, graphics and text design, and performance requirements.

NOTES:

- 1 Appendix A gives guidelines on necessary durability under user maintenance conditions.
- 2 Part 2 of this Standard (AS 4001.2) specifies fitting requirements on vehicles including the location of Class 1A, Class 400 and UN R70 performance reflective rear marker plates.

1.2 REFERENCED DOCUMENTS

The following documents are referred to in this Standard:

AS

- | | |
|--------|--|
| 1744 | Standard alphabets for road signs |
| 4001 | Vehicles—Rear marker plates |
| 4001.2 | Part 2: Reflective rear marker plates—Fitting requirements |

AS/NZS

- | | |
|--------|---|
| 1734 | Aluminium and aluminium alloys—Flat sheet, coiled sheet and plate |
| 1906 | Retroreflective materials and devices for road traffic control purposes |
| 1906.1 | Part 1: Retroreflective materials |
| 1906.2 | Part 2: Retroreflective devices (non-pavement application) |

UN

- | | |
|-----|--|
| R70 | United Nations Regulation No. 70 - Rev.1—Uniform provisions concerning the approval of rear marking plates for heavy and long vehicles |
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1.3 DEFINITIONS

For the purpose of this Standard, the definitions below apply.

1.3.1 Backing material

Either—

- (a) a rigid plate, the surface of which has been prepared prior to the application of the retroreflective material; or
- (b) a properly cleaned surface of a motor vehicle or trailer.

1.3.2 Plate manufacturer

The manufacturer of the rear marker plate.