

Government of South Australia

Department of Planning, Transport and Infrastructure

Grain Trucks Crossing Warning Sign

2.24

Operational Instruction





Government of South Australia

Department of Planning, Transport and Infrastructure

TRAFFIC MANAGEMENT Operational Instructions

Grain Truck Crossing Warning Sign - 2.24

AMENDMENT RECORD

| Version | Page(s) | Date | Amendment Description | Init |
|---------|---------|----------|---------------------------|------|
| Ed1Rev0 | All | 02/99 | Draft (Prep by R. Dodson) | RD |
| Ver 2 | All | 21/05/08 | Format Changes | DW |
| Ver 3 | All | 21/10/10 | Minor Updating | DL |
| Ver 3 | All | 22/12/11 | Added Signature | DW |
| Ver 3 | All | 25/07/12 | Minor Updating & | AL.B |
| | | | Format Changes | |
| Ver 4 | All | 05/10/12 | Authorised | AL.B |

This document has been prepared by the Traffic and Access Standards Section. It has been approved and authorised for use by Department of Planning, Transport and Infrastructure and its authorised agents by:

Manager, Traffic and Access Standards Section 05 / 10 / 2012

asy

Extracts may be reproduced providing the subject is kept in context and the source is acknowledged. Every effort has been made to supply complete and accurate information. This document is subject to continual revision and may change.

For information regarding the interpretation of this document please contact: Traffic Regulation and Standards Unit Telephone: (08) 8343 2289 Facsimile: (08) 8343 2630

For additional copies or to confirm the current status of this document please contact: Traffic and Access Standards Section, Department of Planning, Transport and Infrastructure Telephone: (08) 8343 2849 Facsimile: (08) 8343 2630 Email: david.widdrington@sa.gov.au

CONTENTS

| 1. Scope4 | |
|---|------|
| 2. Background4 | |
| 3. Warning Signs4 | |
| 3.1 Description of Sign4 | |
| 3.2 Guideline to the Use of the Warning Signs | 2.24 |
| 3.3 Sizes of Signs5 | |
| 3.4 Installation of Signs5 | |
| 3.5 Operation of Signs | |
| 3.6 Application for Signs6 | |

1. Scope

This document discusses the use of the Grain Trucks Crossing waring sign (TES 9899) in order to provide a uniform approach to signing at various locations throughout the State. This document does not set out to describe installation or sign type requirements at intersections or private accesses other than bulk grain handling sites.

2. Background

The safety of both regular road users and grain truck operators during the grain harvest season has long been recognised by the Department and attempts have been made to address the issue. A number of different configurations of standard warning signs have been used in the past in addition to some specialised 'non-standard' designs developed by the then Traffic Engineering Section.

3. Warning Signs

3.1 Description of Sign

The part time use sign shall have a black symbolic single unit truck (used throughout Australia to symbolise all heavy vehicles) above black wording "GRAIN TRUCKS CROSSING". The sign is a folding type sign and is hinged through the centre horizontal axis and has padlock holes so that the sign can be locked in the closed position.



TES 9899

The new sign has been designed to replace all previous attempts at warning signs for this situation and shall be used regardless of the carrying capacity or truck/trailer configurations that use the bulk grain handling facility.

All of the other signs that were previously used for this application including the standard truck warning sign (W5-22) are no longer to be used at bulk grain handling facilities and should be phased out during routine maintenance replacement.

For the use of the full time permanent truck warning signs (W5-22) reference should be made to AS1742.2-2009 Clause 4.11.2.5.





UNCONTROLLED COPY WHEN PRINTED

3.2 Guideline to the Use of the Warning Signs

The sign is only to be used to warn of bulk grain handling depots, silos or bunker site entrances. In some circumstances the sign may be used in advance of a side road, however, this should only be done where that road is used exclusively for the entering and exiting of grain carrying vehicles from such sites.

Note: at locations such as Thevenard where the road is closed to general traffic at times when grain vehicles are accessing the bulk grain handling site, the warning sign shall **NOT** be used. In these circumstances the presence of the warning sign could divert road users attention from standard warning and regulatory signs that accompany a road closure and detour.

The sign shall be opened at the start of operations for that day such that the warning symbol and message are able to be seen by motorists. At the end of each day the sign shall be locked in the closed position. By displaying the sign only at times with trucks are likely to be present, the credibility and hence the effectiveness of the sign is maintained.

Before most warning signs are installed, it is normal practice to establish that there is some sight distance restriction. However, in this case, sight distance is not the governing factor for installation. A high volume of turning grain carrying vehicles, vehicles waiting to enter the grain facility, vehicles entering back onto the road (quite often needing extra turning circles) and vehicles crossing the paths of other vehicles will determine the need for warning signs.

Under no circumstances should the sign be used for intersections away from grain handling facilities. In such cased intersection warning signs should be considered where the stopping sight distance (AS1742.2-2009 Table 2.3) cannot be achieved.

3.3 Sizes of Signs

The sign TES 9899 is 1350mm x 900mm and can be used for all speed environments.

3.4 Installation of Signs

TES 9899 shall be erected prior to the entry and exit points used by the grain trucks along the main road, at a distance shown in Table 3.1.

| 85th percentile speed (km/h) | Distance (m) |
|------------------------------|--------------|
| <75 | 80-120 |
| 75-90 | 120-180 |
| >90 | 180-250 |

Table 3.1 – Location of Warning Signs

The sign size has been kept to a minimum so that is can be mounted on a single centre post. To keep costs to a minimum and to gain the greatest strength it is suggested that 2, 80×40 RHS posts bolted back to back to create an 80×80 post be used. The top of the sign shall be mounted level with the top of the post and

unfold downwards thus eliminating a post protruding above the sign. The clearance from the ground to the bottom of the sign when in the open position can be as low as 1.0m. This will enable the person who has to open/close the sign to do so without the aid of a ladder etc. The sign should not be positioned in locations where pedestrians are likely to be present.

Where the sign is located on a multi lane divided road, it may be duplicated on the road median if considered necessary.

3.5 Operation of Signs

The operation of the signs will be the responsibility of the bulk grain handling authority. It should ensure that any persons who operate the signs have been given safe work instructions in regard to opening or closing the sign and working near the road. It should also ensure that these persons are wearing high visibility garments at all times when engaged in this operation.

3.6 Application for Signs

All applications for signs on roads maintained by DPTI should be directed from the bulk grain handling authority to the relevant Regional Manager. All costs associated with the sign manufacture, installation, relocation and removal shall be met by DPTI.

The bulk grain handling authority should be advised in writing of the operating requirements, particularly emphasising the importance of the opening and closing discipline required for the sign to maintain its credibility and effectiveness.

2.24