

**Economic and Social Council**Distr.: General
14 August 2024

Original: English

Economic Commission for Europe**Inland Transport Committee****Working Party on the Transport of Dangerous Goods****116th session**

Geneva, 5-8 November 2024

Item 4 (a) of the provisional agenda

**Proposals for amendments to annexes A and B of ADR:
construction and approval of vehicles****Section 9.7.6 – Rear protection of vehicles****Transmitted by the Government of the United Kingdom of Great
Britain and Northern Ireland****Summary*

Executive summary:	Proposals to clarify the requirements of ADR 9.7.6 in respect to the rear protection of vehicles and the minimum distance required between the rear of a tank and the rear of the bumper to ensure a uniform interpretation.
Action to be taken:	Amend ADR 9.7.6.
Related documents:	ECE/TRANS/WP.15/2020/5 and informal document INF.16 (108th session); ECE/TRANS/WP.15/2021/7 and informal document INF.5 (109th session); ECE-TRANS/WP.15/253 paragraphs 19-22; ECE/TRANS/WP.15/AC.1/158/Add.1 (item 9); ECE/TRANS/WP.15/2023/1 and informal document INF.9 (113th session); ECE/TRANS/WP.15/262; ECE/TRANS/WP.15/2023/13 and informal document INF.22 (114th session); ECE/TRANS/WP.15/2024/6; ECE/TRANS/WP.15/267.

* A/78/6 (Sect. 20), table 20.5.



I. Background

1. Proposals submitted to the 108th, 109th, 113th, 114th and 115th sessions of the Working Party sought to clarify the reference points for measurement of the distance between the rear of a tank and the rear of the bumper which is set out in ADR 9.7.6. It should be noted that previous attempts have been made to clarify this distance over many years.

2. The report of the 115th session (ECE/TRANS/WP.15/267) of April 2024 includes the following regarding the most recent (document ECE/TRANS/WP.15/2024/6) proposal from the United Kingdom:

“The majority of delegations were in favour of the first option proposed by the United Kingdom, i.e. having the same minimum distance required between the tank and the bumper bar for all tanks.

The Working Party agreed that certain points still needed to be clarified, in particular concerning the values kept in square brackets and the references to UN Regulation No. 58.

The Working Party noted that the United Kingdom would present a revised proposal at the next session, taking into account the comments received.”

3. The proposals contained in this paper have been developed with input from other contracting parties and industry representatives.

II. Justification

4. The Working Party asked the United Kingdom to present proposals to the April 2024 session offering delegates a choice between complex or more straightforward changes to 9.7.6. During lengthy discussions the majority were in favour of a simple proposal that offered the same minimum distance requirement between the tank and the bumper for all tanks.

5. Based on feedback from delegations during 115th session strong support exists for all tanks, irrespective of their construction, to have a bumper positioned at least 150 mm from the rearmost face of the bumper to the rearmost point of the tank (see figures 9.7.6.1.1 and 9.7.6.1.2 below). This proposal would offer a consistent measurement across all types of tanks and give a clear interpretation regarding standards and approvals.

6. As the definition is now described as ‘from the rearmost face of the bumper to the rearmost point of the tank’ this would cause a possible reduction in the measurement to the tank from the bumper for some contracting parties, equally for other contracting parties this may result in a small increase.

7. To set a clear requirement for the resistance of the bumper to impact from the rear, it is proposed that the provisions of UN Regulation No. 58 (Rear Underrun Protection Device) are applied by ADR 9.7.6. This will set a harmonised strength requirement for the protection afforded by bumpers at the rear of the tank.

8. It should be noted that the proposed amendments use the term ‘Tank’ in describing the reference point, given that this includes both the shell and any service equipment. In respect to double wall tanks, a note has been included to which takes onboard the interpretation provided by the Autumn 2020 session of the Working Group on tanks; the distance to be considered for such tanks is from the outermost wall of the tank.

9. It should also be noted that 9.8.5 (Rear protection of MEMUs) includes a requirement for a bumper sufficiently resistant to rear impact as per requirements in 9.7.6 and therefore consideration should also be given to amending 9.8.5 at this time.

III. Proposals

Proposal 1

10. Amend ADR 9.7.6 to read as follows:

“9.7.6 Rear protection of vehicles

9.7.6.1 A bumper shall be fitted to the rear of the vehicle. The bumper construction shall meet the technical requirements of UN Regulation No. 58 (Rear Underrun Protection Device) as amended by at least the 03 series of amendments at the time of registration, or when entering service if registration is not mandatory.

The rearmost face of the bumper shall be positioned at least 150 mm from the rearmost part of the tank (or of its projecting fittings in contact with the substance being carried). This shall be measured as specified in figure 9.7.6.1.1, figure 9.7.6.1.2 and 9.7.6.3.

Figure 9.7.6.1.1

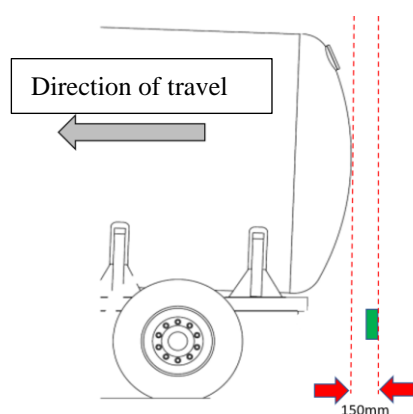
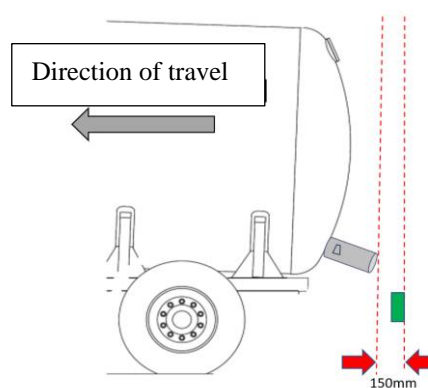


Figure 9.7.6.1.2



9.7.6.2 Tanks with a filling or discharge opening at the rear of the tank, such as vacuum operated waste tanks or tilting tanks intended for powdery or granular substances may as an alternative to the position requirements for the bumper, have additional protection for any rear fittings of the tank. The additional protection shall be provided by a metal profile which has a section modulus of at least 20 cm³ in the weakest section.

9.7.6.3 For double wall tanks the rear of the tank shall be taken to be the rear of the outermost wall of the tank.

9.7.6.4 The provisions of 9.7.6.1 and 9.7.6.2 do not apply to vehicles used for the carriage of dangerous goods in tank-containers, MEGCs or portable tanks.

9.7.6.5 For the protection of tanks against damage by lateral impact or overturning, see 6.8.2.1.20 and 6.8.2.1.21 or, for portable tanks, 6.7.2.4.3 and 6.7.2.4.5.”

Proposal 2

11. Provide the following transitional measure in section 1.6.5:

“Vehicles registered or entering service if registration is not mandatory before 1 January 2029, which do not conform with the requirements of 9.7.6 applicable from 1 January 2027, may continue to be used,”

IV. Conclusion

12. These amendments will ensure a uniform interpretation of the measurement that is required between the rear of the tank and the rear bumper. It will also apply the technical requirements of UN Regulation No. 58 (Rear Underrun Protection Device) and therefore

ensure that the rear bumper meets specific requirements. As new technical specifications are being applied, and likely to have been previous misinterpretations, a transitional measure is proposed to enable existing vehicles to continue to be used.

13. As discussions have been ongoing for several years on this subject, and differing interpretations in the construction of vehicles is creating a lack of harmonisation, we believe an agreed interpretation should be reached as soon as possible.

V. Transport and the Sustainable Development Goals

14. The aim of this document is to clarify the application of 9.7.6 of ADR. Ensuring a more systematic approach and a better rationale in ADR helps to develop clearer legal texts and avoid different interpretation among different ADR Contracting Parties, and thus helps to implement the United Nations Sustainable Development Goal 16, *Peace, justice and strong institutions*.
