

Proposal for a supplement to the 02 series of amendments to UN Regulation No. 131 (Advanced Emergency Braking Systems (AEBS))

The text reproduced below was prepared by the expert from Australia proposing a supplement to the 02 series of amendments to United Nations Regulation No. 131 (Advanced Emergency Braking Systems (AEBS)). The proposed amendments seek to clarify requirements in the scope requesting for reciprocal recognition with UN Regulation No. 152 (Advanced Emergency Braking System (AEBS) for M₁ and N₁ vehicles). This proposal is based on informal document WP.29-191-23 presented at the 191st session of WP.29 in November 2023. This seeks to amend the formal document ECE/TRANS/WP.29/GRVA/2024/18 to be presented in the May 2024 session of GRVA. The modifications to the current text of the Regulation are marked in bold or strikethrough characters.

I. Proposal

Amend Section 1., to read:

1. Scope

~~This Regulation applies to the approval* of vehicles of Category M₂, M₃, N₂ and N₃¹ with regard to an on-board system to:~~

- ~~(a) Avoid or mitigate the severity of a rear-end in-lane collision with a preceding vehicle,~~
- ~~(b) Avoid or mitigate the severity of an impact with a pedestrian.~~

~~* For vehicles of category M₂, and for those of category M₃/N₂ with a maximum weight below or equal to 8t, equipped with hydraulic braking, Contracting Parties that are signatories to both UN Regulation No. 152 and this Regulation shall recognize approvals to either Regulation as equally valid.~~

This regulation applies to the following vehicles:

- **Vehicles of category M2, M3, N2 and N3.**
- **Alternatively, vehicles of categories M2 and for those of categories M3 and N2 with a maximum mass not exceeding 8,000 kg equipped with hydraulic brakes, may be approved to UN regulation No 152 instead of this regulation.**

When equipped with an on-board system to:

- (a) avoid or mitigate the severity of a rear-end in-lane collision with a passenger car.**
- (b) avoid or mitigate the severity of an impact with a pedestrian.**

¹ As defined in the Consolidated Resolution on the Construction of Vehicles (R.E.3.), document ECE/TRANS/WP.29/78/Rev.6, para. 2 - <https://unece.org/transport/standards/transport/vehicle-regulations-wp29/resolutions>

II. Justification

1. At the 191st session of WP.29, the representative of Australia sought to clarify the type-approval process concerning the reciprocal recognition of UN Regulation No. 131 – Advanced Emergency Braking Systems (AEBS), 02 series of amendments and UN Regulation No. 152 – Advanced Emergency Braking System (AEBS) for M₁ and N₁ vehicles.
2. UN Regulation No. 131, 02 series of amendments, includes references to UN Regulation No. 152 requiring Contracting Parties that are signatories to both Regulations to recognise approvals to either Regulation as equally valid for vehicles of category M₂, and for those of category M₃/N₂ with a maximum weight below or equal to 8t, equipped with hydraulic braking.
3. While supportive of the intent of recognising some UN Regulation No. 152 approvals for UN Regulation No. 131, the expert from Australia believes the operational details of this reciprocal recognition is unclear. This is because UN Regulation No. 131, applies to the approval of vehicles of categories M₂, M₃, N₂ and M₃, whereas UN Regulation No. 152 is only applicable to vehicles of category M₁ and N₁. This means that vehicles of categories M₂, M₃ and N₂ should not be able to recognise type-approvals to UN Regulation No. 152 or vice-versa, at least without clearer constraints between the relation between the vehicle approved to UN Regulation No. 152 and the vehicle to be approved to UN Regulation No. 131. Although the Australian representative expert does not believe it was the intent, reciprocal recognition of UN Regulation No. 131 as equivalent to UN Regulation No. 152 should not be allowed given the less stringent requirements of UN Regulation No. 131.
4. Additionally, the unit of mass of 8 tons is an imperial unit of measurement which equates to 12.2 metric tonne. Australian suggest using the appropriate SI unit to clarify the intended mass of 8 tonne or 8,000 kg.
5. To provide additional clarity to the conditions of the reciprocal recognition, the expert from Australia recommends to amend the scope of UN Regulation No. 131 by incorporating the footnote into the actual text of the scope to provide clarity.
6. The alternative option proposed is to repeal the reciprocal arrangement introduced in the 02 series of amendments by deleting the paragraph under * if these approval arrangements cannot be justified.