Proposal for a Supplement to UN Regulation No. 152
(Advanced Emergency Braking Systems for M₁ and N₁ vehicles)

Submitted by the expert from the International Organization of Motor Vehicle Manufacturers*

The text reproduced below was prepared by the experts from the International Organization of Motor Vehicle Manufacturers. It is based on informal document GRVA-05-64, presented during the fifth session of Working Party on Automated/Autonomous and Connected Vehicles (GRVA). The modifications to the existing text of the Regulation are marked in bold for new or strikethrough for deleted characters.

* In accordance with the programme of work of the Inland Transport Committee for 2020 as outlined in proposed programme budget for 2020 (A/74/6 (part V sect. 20) para 20.37), the World Forum will develop, harmonize and update UN Regulations in order to enhance the performance of vehicles. The present document is submitted in conformity with that mandate.
I. Proposal

Paragraphs 5.4.2. to 5.4.2.2., amend to read

5.4.2. When the vehicle is equipped with a means to automatically deactivate the AEBS function, for instance in situations such as off-road use, being towed, being operated on a dynamometer, being operated in a washing plant, in case of a non-detectable misalignment of sensors, or when the Electronic Stability Control is switched off, the following conditions shall apply as appropriate:

5.4.2.1. The vehicle manufacturer shall provide a list of situations and corresponding criteria where the AEBS function is automatically deactivated to the technical service at the time of type approval and it shall be annexed to the test report.

5.4.2.2. The AEBS function shall be automatically reactivated as soon as the conditions that led to the automatic deactivation are not present anymore.

II. Justification

Automatic AEBS deactivation

1. When the Electronic Stability Control (ESC) is switched off by the driver, this could result in unsafe vehicle behaviour during an emergency braking situation under certain circumstances, which is why many Advanced Emergency Braking System (AEBS) on the market deactivate themselves when the ESC is unavailable.

2. The proposal aims to clarify that a deactivation of the system as a response to an unsuitable vehicle state, i.e. deactivation of the ESC, is considered an automatic and not a manual deactivation.

3. The intention of the driver action is to switch off the ESC, not the AEBS, the AEBS deactivation is just the automatic system response.

4. As the Regulation states, this automatic deactivation will be indicated to the driver and the driver will always be aware of the current unavailability of the AEBS system.