# Proposal for amendments to UN Regulation No. 58

The text reproduced below was prepared by the experts from CLCCR (International Association of the Body and Trailer Building Industry), to propose amendments to UN Regulation No. 58. The modifications to the current text of UN Regulation No. 58.02 are marked in bold for new or strikethrough for deleted characters.

## I. Proposal

Annex 1.

Item 9, amend to read

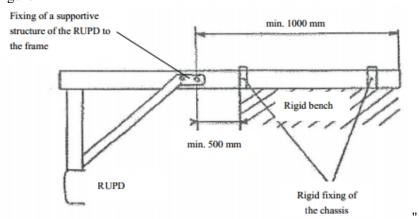
- "9. **Restrictions on application** 
  - **a.** Vehicles on which the device may be installed (if applicable) ......
  - b. Characteristics of the chassis to which the device may be installed (e.g. stiffness, profile dimensions, ...) (if applicable) ......"

Annex 5,

Paragraph 1.1.3., amend to read:

"1.1.3. On a rigid test bench using side rails representative of the chassis of vehicles for which the underrun protection system is intended (see Figure 1, representing the minimum requirements to be fulfilled).

Figure 1



*Insert a new paragraph 1.1.3.1., to read:* 

"The Communication document according to Annex 1 (item 9) of this Regulation shall include information about the characteristics of the chassis to which the underrun protection system may be installed with respect to the test conditions to which the underrun protection system was subjected."

Paragraph 3.1., amend to read:

"... which the forces are applied may be specified by the manufacturer.

The device used to distribute the test force over the stated flat surface shall be connected to the force actuator through a swivel joint. The arrangement of the force actuator, whether pulling or pushing, shall be arranged such that it does not add any stiffness or stability to the underrun protection system structure, i.e. it shall neither increase the instability threshold force nor decrease the maximum deflection of the underrun protection system."

#### II. Justification

Annex 1 item 9.

When detailing the test set-up to account for the actual vehicles to which the RUPS may be installed some description of the applicable limitations may be needed.

### Annex 5 Paragraph 1.1.3.

This paragraph shall be kept in the regulation. In order to account for the differences between possible chassis the paragraph need to be elaborated. Representative side rails shall be used. This paragraph is necessary in order to avoid for specialized component manufacturers manufacturing RUPS to test all different combinations of RUPS, OEM product lines and specific applications. Applying only paragraphs 1.1.1. and 1.1.2 would result in thousands of combinations being tested by each specialized component manufacturer. Allowing only paragraphs 1.1.1. and 1.1.2. will possibly be applicable for OEM (including trailer manufacturers) that manufacture their own dedicated RUPS.

#### Annex 5 paragraph 1.1.3.1.

The limitations that the use of representative side rails put on the specific installations shall be stated in order to avoid RUPS being installed on weaker chassis where the measured and documented deflections do not apply. Multiple tests using different representative side rails may be documented. In this way a broader span of chassis may be included.

#### Annex 5 paragraph 3.1.

There is a big difference between using an actuator or a pulling device that is completely rigid and at the other extreme having a swivel joint. With a flat surface completely rigid and perpendicular to the line of action of an actuator the point of application of the test load will move during the applications of the load. E.g. while testing the outer test points the force application will move towards the vehicle centerline plane. That will enable the device under test to resist higher loads. In order to avoid those anomalies it shall be assured that the force application equipment itself does not influence the test results in a significant way, i.e. the test results shall be repeatable between different test set-ups.