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Other business - Any other business

Proposal for Supplement 26 to the 01 Series of Regulation No. 6

Submitted by the expert from the International Automotive Lighting and Light Signalling Expert Group*

The text reproduced below was prepared by the expert from the International Automotive Lighting and Light Signalling Expert Group (GTB) to amend the requirements relating to failure indication by removing the differentiation between filament and LED light sources. The modifications to the existing text of the Regulation are marked in bold for new or strikethrough for deleted characters.

Please recycle

^{*} In accordance with the programme of work of the Inland Transport Committee for 2012–2016 (ECE/TRANS/224, para. 94 and ECE/TRANS/2012/12, programme activity 02.4), the World Forum will develop, harmonize and update Regulations in order to enhance the performance of vehicles. The present document is submitted in conformity with that mandate.

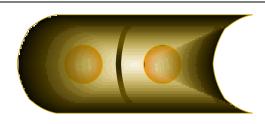
I. Proposal

Paragraph 6.2., amend to read:

- "6.2. In case of failure of single lamp of categories 1, 1a, 1b, 2a and 2b, containing more than one light source the following provisions shall apply:
- 6.2.1. A group of light sources, wired so that the failure of any one of them causes all of them to stop emitting light, shall be considered to be one light source.
- 6.2.2. A signal for activation of the tell-tale prescribed in paragraph 6.5.8. of Regulation No. 48 shall be produced if:
 - (a) Any one light source has failed, or
 - (b) In the case of a lamp designed for only two filament light sources, the intensity in the axis of reference is less than 50 per cent of the minimum intensity, or
 - (c) As a consequence of a failure of one or more light sources, the intensity in one of the following directions as indicated in Annex 4 to this Regulation is less than the minimum intensity required:
 - (i) $H=0^{\circ}, V=0^{\circ}$
 - (ii) $H=20^{\circ}$ to the outside of the vehicle, $V=+5^{\circ}$
 - (iii) $H=10^{\circ}$ to the inside of the vehicle, $V=0^{\circ}$."

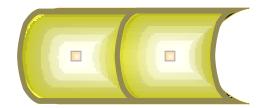
II. Justification

- 1. Currently the provisions in UN Regulation No. 6 treat the failure of a lamp equipped with filament light sources differently to one equipped with LEDs. Similar requirements in UN Regulation No. 7 do not include this differentiation.
- 2. This proposal is intended to remove the anomaly as there is no reason why UN Regulation No. 6 should differentiate between the light sources. This can be explained as follows:



Example 1

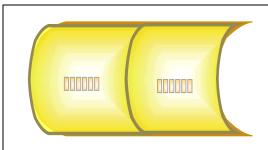
A rear direction indicator consisting of 1+1 filament light sources (e.g. 2 x 1 PY21W) according to the existing wording of UN Regulation No.6 paragraph 6.2.2 (b)



Example 2

A rear direction indicator consisting of 1+1 light sources that are not filament lamps

(e.g. 2 x 1 LED):



Example 3

A rear direction indicator consisting of 1+1 light sources that are not filament lamps (e.g. 2 x 6 LED's). Each of these 2 light sources comprises of 6 LED's connected in series as a 'single light source' (i.e. if 1 LED fails = all 6 LED's connected in series will fail):

These three examples show rear direction indicator lamps comprising different light source arrangements representing the same basic lighting performance concept, i.e.:

Example 1: 2 filament bulbs = 2 light sources

Example 2: 2 LED's = 2 light sources

Example 3: 2 groups of LED's, each one arranged as a "single light source"= 2 light

sources