Proposal for Supplement 26 to the 02 series of amendments to Regulation No. 7 (Position, stop and end-outline lamps)

Submitted by the Working Party on Lighting and Light-Signalling*


* In accordance with the programme of work of the Inland Transport Committee for 2016–2017 (ECE/TRANS/254, para. 159 and ECE/TRANS/2016/28/Add.1, cluster 3.1), 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.
Supplement 26 to the 02 series of amendments to Regulation No. 7 (Position, stop and end-outline lamps)

Title of the Regulation, amend to read:

"Uniform provisions concerning the approval of front and rear position lamps, stop-lamps and end-outline marker lamps for motor vehicles and their trailers"

Paragraph 1.6., amend to read:

"1.6. "Front and rear position lamps, stop-lamps and end-outline marker lamps of different type" means lamps which differ in such essential respects as:

(a) The trade name or mark:

(i) Lamps bearing the same trade name or mark but produced by different manufacturers shall be considered as being of different types;

(ii) Lamps produced by the same manufacturer differing only by the trade name or mark shall be considered as being of the same type.

(b) The characteristics …"

Insert a new paragraph 2.2.6., to read:

"2.2.6. In the case of a type of lamp differing only by the trade name or mark from a type that has already been approved it shall be sufficient to submit:

2.2.6.1. A declaration by the lamp manufacturer that the type submitted is identical (except in the trade name or mark) with and has been produced by the same manufacturer as, the type already approved, the latter being identified by its approval code;

2.2.6.2. Two samples bearing the new trade name or mark or equivalent documentation."

Insert a new paragraph 2.2.7., to read:

"2.2.7. In the case of a non-replaceable filament lamp(s) or light source module(s) equipped with non-replaceable filament lamp(s): the documents according to paragraph 5.11. of this Regulation."

Paragraph 3.4., amend to read:

"3.4. In the case of lamps with an electronic light source control gear or a variable intensity control and/or non-replaceable light sources and/or light source module(s), shall bear the marking of the rated voltage or range of voltage;"

Paragraph 3.6.3., amend to read:

"3.6.3. The marking of the rated voltage or range of voltage."

Paragraph 5., amend to read:

"5. General specifications"
The requirements contained in sections 5. "General specifications" and 6. "Individual specifications" and in the Annexes referenced in the said sections of Regulations Nos. 48, 53, 74 or 86, and their series of amendments in force at the time of application for the lamp type approval shall apply to this Regulation.

The requirements pertinent to each lamp and to the category/ies of vehicle on which the lamp is intended to be installed shall be applied, where its verification at the moment of lamp type approval is feasible.

5.1. . . .

Insert a new paragraph 5.11., to read:

"5.11. In the case of non-replaceable filament lamp(s) or light source module(s) equipped with non-replaceable filament lamp(s), the applicant shall annex to the type approval documentation a report (by the light source manufacturer indicated in the type approval documentation), acceptable to the Authority responsible for type approval, that demonstrates compliance of these non-replaceable filament lamp(s) with the requirements as specified in paragraph 4.11. of IEC 60809, Edition 3."

Paragraph 6.1., amend to read:

"6.1. The light emitted by each of the two lamps supplied shall be in the reference axis, of not less than the minimum intensity and of not more than the maximum intensity specified below:

<table>
<thead>
<tr>
<th>Paragraph</th>
<th>Minimum luminous intensity in cd</th>
<th>Maximum luminous intensity in cd when used as</th>
</tr>
</thead>
<tbody>
<tr>
<td>6.1.1.</td>
<td>Front position lamps, front end-outline marker lamp A or AM</td>
<td>4</td>
</tr>
<tr>
<td>6.1.2.</td>
<td>Front position lamps incorporated in a headlamp or front fog lamp</td>
<td>4</td>
</tr>
<tr>
<td>6.1.3.</td>
<td>Rear position lamps, rear end-outline marker lamp</td>
<td></td>
</tr>
<tr>
<td>6.1.3.1.</td>
<td>R, R1 or RM1 (steady)</td>
<td>4</td>
</tr>
<tr>
<td>6.1.3.2.</td>
<td>R2 or RM2 (variable)</td>
<td>4</td>
</tr>
<tr>
<td>6.1.4.</td>
<td>Stop-lamps</td>
<td></td>
</tr>
<tr>
<td>6.1.4.1.</td>
<td>S1 (steady)</td>
<td>60</td>
</tr>
<tr>
<td>6.1.4.2.</td>
<td>S2 (variable)</td>
<td>60</td>
</tr>
<tr>
<td>6.1.4.3.</td>
<td>S3 (steady)</td>
<td>25</td>
</tr>
<tr>
<td>6.1.4.4.</td>
<td>S4 (variable)</td>
<td>25</td>
</tr>
</tbody>
</table>

Paragraph 6.1.6., amend to read:

"6.1.6. When an assembly of two independent lamps to be type approved as lamps marked "D" having the same function is deemed to be a single lamp, it shall comply with the requirements for:
(a) Maximum intensity if all lamps together are lit;
(b) Minimum intensity if either lamp has failed."

**Paragraph 6.1.7.**, amend to read:

"6.1.7. Failure of a single lamp containing more than one light source

6.1.7.1. In a single lamp containing more than one light source, 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.

6.1.7.2. In case of failure of any one light source in a single lamp containing more than one light source, at least one of the following provisions shall apply:

(a) The light intensity complies with the minimum intensity required in the table of standard light distribution in space as shown in Annex 4, or

(b) A signal for activation of a tell-tale indicating failure, as indicated in paragraphs 6.7.8., 6.9.8, 6.10.8. and 6.13.8. of Regulation No. 48, is produced, provided that the luminous intensity in the axis of reference is at least 50 per cent of the minimum intensity required. In this case a note in the communication form states that the lamp is only for use on a vehicle fitted with a tell-tale indicating failure."

**Paragraph 9.1.**, amend to read:

"9.1. Lamps shall be so manufactured as to conform to the type approved under this Regulation. The compliance with the requirements set forth in paragraphs 6 and 8 above shall be verified as follows: … ”

**Paragraph 9.2. (former)**, renumber as paragraph 9.1.1.

**Paragraph 9.3. (former)**, renumber as paragraph 9.1.2.

**Paragraph 9.4. (former)**, renumber as paragraph 9.2.

*Insert a new paragraph 9.3*, to read:

"9.3. In the case of non-replaceable filament lamp(s) or light source module(s) equipped with non-replaceable filament lamps, a report (by the light source manufacturer indicated in the type approval documentation) shall demonstrate compliance of these non-replaceable filament lamp(s) with lifetime requirements and, in the case of colour coated filament lamps, also with colour endurance requirements, as specified in paragraph 4.11. of IEC 60809, Edition 3."

**Annex 5**, **Paragraphs 1.2. to 1.3.**, amend to read:

"1.2. With respect to photometric performances, the conformity of mass-produced lamps shall not be contested if, when testing according to paragraph 7. of this Regulation, the photometric performances as set forth in Paragraph 6. of this Regulation of any lamp chosen at random:

1.2.1. No measured value deviates unfavourably by more than 20 per cent from the values prescribed in this Regulation.

For the minimum values required throughout the fields specified in Annex 1 the respective maximum deviations of the measured values shall correspond to the values shown in the table below:
Required minimum value | Equivalent 20 per cent | Equivalent 30 per cent
--- | --- | ---
0.3 | 0.1 | 0.2
0.05 | 0.02 | 0.03

1.2.2. In the case of a lamp equipped with a replaceable light source, if results of the test described above do not meet the requirements, tests shall be repeated using another standard light source.

1.3. With respect to colorimetric performance, the requirements set out in paragraph 8. of this Regulation shall be complied with.

*Insert new paragraphs 1.4. to 1.4.2.*, to read:

"1.4. In the case of non-replaceable filament lamp(s) or light source module(s) equipped with non-replaceable filament lamps, at any conformity of production check:

1.4.1. The holder of the approval mark shall demonstrate the use in normal production and show the identification of the non-replaceable filament lamp(s) as indicated in the type approval documentation;

1.4.2. In the case where doubt exists in respect to compliance of the non-replaceable filament lamp(s) with lifetime requirements and/or, in the case of colour coated filament lamps, with colour endurance requirements, as specified in paragraph 4.11. of IEC 60809, Edition 3, conformity shall be checked (by the light source manufacturer indicated in the type approval documentation) as specified in paragraph 4.11. of IEC 60809, Edition 3."

Annex 6,

*Paragraph 1.2.*, amend to read:

"1.2. With respect to photometric performance, the conformity of mass-produced lamps shall not be contested if, when testing according to paragraph 7. of this Regulation, the photometric performances as set forth in Paragraph 6. of this Regulation of any lamp chosen at random:"

*Paragraph 1.2.1.*, amend to read:

"1.2.1. According to the requirements in paragraph 1.2.1. of Annex 5 to this Regulation are met."

*Paragraph 2. to 5.*, amend to read:

"2. First sampling

In the first sampling four lamps are selected at random. The first sample of two is marked A, the second sample of two is marked B.

2.1. The conformity of mass-produced lamps shall not be contested if the deviation of any specimen of samples A and B (all four lamps) is not more than 20 per cent.

In the case, that the deviation of both lamps of sample A is not more than 0 per cent the measurement can be closed.

2.2. The conformity of mass-produced lamps shall be contested if the deviation of at least one specimen of samples A or B is more than 20 per cent.

The manufacturer shall be requested to bring his production in line with the requirements (alignment) and a repeated sampling according to paragraph 3."
below shall be carried out within two months' time after the notification. The samples A and B shall be retained by the Technical Service until the entire Conformity of Production process is finished.

3. First repeated sampling

A sample of four lamps is selected at random from stock manufactured after alignment.

The first sample of two is marked C, the second sample of two is marked D.

3.1. The conformity of mass-produced lamps shall not be contested if the deviation of any specimen of samples C and D (all four lamps) is not more than 20 per cent.

In the case, that the deviation of both lamps of sample C is not more than 0 per cent, the measurement can be closed.

3.2. The conformity of mass-produced lamps shall be contested if the deviation of at least:

3.2.1. One specimen of samples C or D is more than 20 per cent but the deviation of all specimen of these samples is not more than 30 per cent.

The manufacturer shall be requested again to bring his production in line with the requirements (alignment).

A second repeated sampling according to paragraph 4. below shall be carried out within two months' time after the notification. The samples C and D shall be retained by the Technical Service until the entire Conformity of Production process is finished.

3.2.2. One specimen of samples C or D is more than 30 per cent.

In this case the approval shall be withdrawn and paragraph 5. below shall be applied.

4. Second repeated sampling

A sample of four lamps is selected at random from stock manufactured after alignment.

The first sample of two is marked E, the second sample of two is marked F.

4.1. The conformity of mass-produced lamps shall not be contested if the deviation of any specimen of samples E and F (all four lamps) is not more than 20 per cent.

In the case, that the deviation of both lamps of sample E is not more than 0 per cent, the measurement can be closed.

4.2. The conformity of mass-produced lamps shall be contested if the deviation of at least one specimen of samples E or F is more than 20 per cent.

In this case the approval shall be withdrawn and paragraph 5. below shall be applied.

5. Approval withdrawn

Approval shall be withdrawn according to paragraph 10. of this Regulation."

*Figure 1, shall be deleted.*