29 April 2010

### **AGREEMENT**

CONCERNING THE ADOPTION OF UNIFORM TECHNICAL PRESCRIPTIONS FOR WHEELED VEHICLES, EQUIPMENT AND PARTS WHICH CAN BE FITTED AND/OR BE USED ON WHEELED VEHICLES AND THE CONDITIONS FOR RECIPROCAL RECOGNITION OF APPROVALS GRANTED ON THE BASIS OF THESE PRESCRIPTIONS \*/

(Revision 2, including the amendments which entered into force on 16 October 1995)

Addendum 97: Regulation No. 98

**Revision 2 – Amendment 1** 

Supplement 12 to the original version of the Regulation: Date of entry into force: 24 October 2010

UNIFORM PROVISIONS CONCERNING THE APPROVAL OF MOTOR VEHICLE HEADLAMPS EQUIPPED WITH GAS-DISCHARGE LIGHT SOURCES



**UNITED NATIONS** 

Agreement Concerning the Adoption of Uniform Conditions of Approval and Reciprocal Recognition of Approval for Motor Vehicle Equipment and Parts, done at Geneva on 20 March 1958.

<sup>\*/</sup> Former title of the Agreement:

# Paragraph 5.2.1., amend to read:

"5.2.1. Headlamps shall be fitted ... be adjusted by other means.

Where a headlamp providing a principal passing beam and a headlamp providing a driving beam, each equipped with its own light source(s), are assembled to form a composite unit, the adjusting device shall enable each optical system individually to be duly adjusted. The same provision applies to headlamps providing a front fog lamp beam and a driving beam, and to headlamps providing a principal passing beam and a front fog lamp beam, and to headlamps providing these three beams."

### Paragraph 5.5.3., amend to read:

"5.5.3. either the principal passing beam or the driving beam can always be obtained without any possibility of the mechanism stopping in between the two positions;"

### Paragraph 5.8.1., amend to read:

"5.8.1. The gas-discharge light source(s) used in gas-discharge headlamps or in distributed lighting systems shall be replaceable and approved according to Regulation No. 99 and its series of amendments in force at the time of application for type approval. However, gas-discharge light source(s) not approved according to Regulation No. 99 can be used only in the case where they are a non-replaceable part of a light-generator. However, in the case of distributed lighting systems the light-generator can be replaceable without using special tools also in the case where the light-source used in it is not approved."

#### Paragraphs 6.3.3. to 6.3.3.2., amend to read:

- "6.3.3. The illumination produced on the screen by the driving beam shall meet the following requirements:
- 6.3.3.1. The point of intersection (HV) of the lines HH and VV shall be situated within the isolux representing 80 per cent of the maximum illuminance. This maximum illuminance, hereunder designated as  $E_{max}$ , shall lie between 70 and 345 lux.
- 6.3.3.2. The reference mark referred to in paragraph 4.2.2.7. above shall be obtained by means of the formula:

Reference mark =  $0.146 E_{max}$ 

This value shall be rounded off to the value: 17.5 - 20 - 25 - 27.5 - 30 - 37.5 - 40."

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## Paragraph 6.5.2., amend to read:

"6.5.2. Additional tests are made after the reflector has been tilted vertically upwards by the angle quoted in paragraph 2.1.4. or 2 degrees, whichever is smaller, by means of the headlamp aiming devices. The headlamp is then re-aimed downwards (by means of the goniometer), and the photometric specifications must be met at the following points:

Principal passing beam: HV and 75 R (75 L respectively)

Driving beam: E max, HV as percent of  $E_{max}$ 

If the aiming devices do not allow a continuous movement, the position nearest to 2 degrees is chosen."

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