E/ECE/324 E/ECE/TRANS/505 } Rev.1/Add.81

29 August 1989

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

Addendum 81: Regulation No. 82

Date of entry into force as an annex to the Agreement: 17 March 1989

UNIFORM PROVISIONS CONCERNING THE APPROVAL OF MOPED HEADLAMPS EQUIPPED WITH FILAMENT HALOGEN LAMPS (HS₂ LAMPS)



UNITED NATIONS

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Regulation No. 82

UNIFORM PROVISIONS CONCERNING THE APPROVAL OF MOPED HEADLAMPS EQUIPPED WITH FILAMENT HALOGEN LAMPS (HS2 LAMPS)

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Regulation No. 82

UNIFORM PROVISIONS CONCERNING THE APPROVAL OF MOPED HEADLAMPS EQUIPPED WITH FILAMENT HALOGEN LAMPS (HS² LAMPS)

1. SCOPE

This regulation applies to the approval of headlamps equipped with halogen lamps (HS_2 lamps), which are provided for the equipment of mopeds and vehicles treated as such.

2. DEFINITION OF "TYPE"

Headlamps of different "types" means headlamps which differ in such essential respects as:

- 2.1 The trade name or mark,
- 2.2 The characteristics of the optical systems,
- 2.3 The inclusion or elimination of components capable of altering the optical effects by reflection, refraction or absorption. A change in the colour of the beams emitted by headlamps whose other characteristics are not changed does not constitute a change of headlamp type. The same approval number shall accordingly be assigned to such headlamps.
- 3. APPLICATION FOR APPROVAL
- 3.1 The application for approval shall be submitted by the holder of the trade name or mark or by his duly accredited representative.
- 3.2 Any application for approval shall be accompanied by:
- 3.2.1 Drawings in triplicate, sufficiently detailed to permit identification of the type (see paragraphs 4.2 and 5.3) and showing the headlamp in cross-(vertical) section and in front elevation, with details of the flutings, if any, of the lens,
- 3.2.2 A brief technical description,
- 3.2.3 Samples, as follows:
- 3.2.3.1 Two samples with colourless lenses,
- 3.2.3.2 For the testing of a coloured filter or coloured screen (or of a coloured lens): two samples.
- 3.3 The competent authority shall verify the existence of satisfactory arrangements for ensuring effective control of the conformity of production before type approval is granted.

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- 4. MARKINGS 1/
- 4.1 Headlamps submitted for approval shall bear the trade name or mark of the applicant, this mark must be clearly legible and be indelible.
- 4.2 A space of sufficient size to accommodate the approval mark shall be provided both on the lens and on the main body 1/ of every headlamp, these spaces shall be shown on the drawings referred to in paragraph 3.3.1 above.
- 5. APPROVAL
- 5.1 If all the samples of a type of headlamp which are submitted in accordance with paragraph 3.3.3 above meet the requirements of this Regulation, approval shall be granted.
- 5.2 An approval number shall be assigned to each type approved. Its first two digits (at present 00 for the Regulation in its original form) shall indicate the series of amendments incorporating the most recent major technical amendments made to the Regulation at the time of issue of the approval. The number so assigned shall not be assigned by the same Contracting Party to another type of headlamp covered by this Regulation. 2/
- 5.3 Notice of approval or of extension or refusal of approval of a type of headlamp pursuant to this Regulation shall be communicated to the Parties to the 1958 Agreement applying this Regulation, by means of a form conforming to the model in annex 1 to this Regulation.
- 5.4 There shall be placed on every headlamp conforming to a type approved under this Regulation, in the spaces referred to in paragraph 4.2 above, in addition to the mark prescribed in paragraph 4.1 above, an international approval mark <u>3</u>/ consisting of:

^{1/} If the lens cannot be separated from the main body, the provision of such a space on the lens will suffice.

^{2/} A change in the colour of the beams emitted by headlamps whose other characteristics are not changed does not constitute a change of headlamp type. The same approval number shall accordingly be assigned to such headlamps (see paragraph 2.3).

^{3/} If different types of headlamps have an identical lens or an identical reflector, the lens and the reflector may bear the various approval marks of these types of headlamps, on condition that the approval number granted for the specific type submitted can be identified without ambiguity.

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- 5.4.1 A circle surrounding the letter "E" followed by the distinguishing number of the country which has granted approval; <u>4</u>/
- 5.4.2 The approval number.
- 5.5 The marks referred to in paragraph 5.4 above shall be clearly legible and be indelible.
- 5.6 Annex 2 to this Regulation gives examples of the arrangement of the approval marks referred to above.
- 6. GENERAL SPECIFICATIONS
- 6.1 Each sample shall conform to the specifications set forth in paragraph 7 below.
- 6.2 Headlamps shall be so designed and made that, in normal use, in spite of the vibration to which they may then be subjected, their satisfactory operation continues to be ensured and they retain the characteristics prescribed by this Regulation.
- 6.3 The components by which the halogen lamp is fixed to the reflector shall be so made that, even in darkness, the halogen lamp can be fixed in no position but the correct one.
- 7. SPECIAL SPECIFICATIONS
- 7.1 The correct position of the lens in relation to the optional system shall be unequivocally marked and be blocked against rotation.
- 7.2 For the measurement of the illumination produced by the headlamps, a measuring screen as described in annex 3 of this Regulation and a standard halogen filament lamp with a smooth and colourless bulb according to HS² category of Regulation/No. 37 shall be used.

^{4/ 1} for the Federal Republic of Germany, 2 for France, 3 for Italy, 4 for the Netherlands, 5 for Sweden, 6 for Belgium, 7 for Hungary, 8 for Czechoslovakia, 9 for Spain, 10 for Yugoslavia, 11 for the United Kingdom, 12 for Austria, 13 for Luxembourg, 14 for Switzerland, 15 for the German Democratic Republic, 16 for Norway, 17 for Finland, 18 for Denmark, 19 for Romania, 20 for Poland, 21 for Portugal and 22 for the Union of Soviet Socialist Republics. Subsequent numbers shall be assigned to other countries in the chronological order in which they ratify or accede to the Agreement concerning the Adoption of Uniform Conditions of Approval and Reciprocal Recognition of Approval for Motor Vehicle Equipment and Parts, and the numbers thus assigned shall be communicated by the Secretary-General of the United/Nations to the Contracting Parties to the Agreement.

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> The standard halogen filament lamp shall be adjusted to the applicable reference luminous flux according to values prescribed for these lamps of Regulation No. 37 for a rated voltage of six volts. The passing beam shall have a cut-off sufficiently sharp in order that satisfactory aiming can practically be achieved with its aid.

7.3 The cut-off shall be as straight and horizontal as possible over a horizontal length of at least $\pm 2,250$ mm measured at a distance of 25 m.

When aimed 5/ according to annex 3, the headlamps shall meet the requirements specified in it.

- 7.4 The beam pattern shall not present any lateral variations detrimental to good visibility.
- 7.5 The screen illumination values shall be measured by means of a photoreceptor, the effective area of which shall be contained within a square of 65. mm side.
- 8. CONFORMITY OF PRODUCTION
- 8.1 Every headlamp bearing an approval mark as prescribed under this Regulation shall conform to the type approved and the requirements of this Regulation.
- 8.2 Nevertheless, in the case of a device picked at random from series production, the requirements as to maximum and minimum intensities of the light emitted (measured with a standard halogen lamp as referred to in paragraph 7.2 above) shall be at least 80% of the minimum values and not exceed 120% of the maximum values specified in annex 3.
- 9. PENALTIES FOR NON-CONFORMITY OF PRODUCTION
- 9.1 The approval granted in respect of a type of headlamp pursuant to this Regulation may be withdrawn if the requirements set forth above are not met.
- 9.2 If a Contracting Party to the Agreement applying this Regulation withdraws an approval it has previously granted, it shall forthwith so notify the other Contracting Parties applying this Regulation, by means of a communication form conforming to the model in annex 1 to this Regulation.

5/ It shall be possible to adjust the vertical angle of the headlamp.

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10. MODIFICATION AND EXTENSION OF APPROVAL OF A TYPE OF HEADLAMP

- 10.1 Every modification of the type of headlamp shall be notified to the administrative department which approved the type of headlamp. The department may then either:
- 10.1.1 Consider that the modifications made are unlikely to have an appreciable adverse effect and that in any case the headlamp still complies with the requirements; or
- 10.1.2 Require a further test report from the technical service responsible for conducting the tests.
- 10.2 Confirmation or refusal of approval, specifying the alterations shall be communicated by the procedure specified in paragraph 5.3 above to the Parties to the Agreement applying this Regulation.
- 10.3 The competent authority issuing the extension of approval shall assign a series number for such an extension and inform thereof the other Parties to the 1958/Agreement applying this Regulation by means of a communication form conforming to the model in annex 1 to this Regulation.
- 11. PRODUCTION DEFINITELY DISCONTINUED

If the holder of the approval completely ceases to manufacture a type of headlamp approved in accordance with this Regulation, he shall so inform the authority which granted the approval. Upon receiving the relevant communication that authority shall inform thereof the other Parties to the 1958 Agreement applying this Regulation by means of a communication form conforming to the model in annex 1 to this Regulation.

12. NAMES AND ADDRESSES OF TECHNICAL SERVICES RESPONSIBLE FOR CONDUCTING APPROVAL TESTS AND OF ADMINISTRATIVE DEPARTMENTS

The Parties to the 1958 Agreement applying this Regulation shall communicate to the United Nations Secretariat the names and addresses of the technical services responsible for conducting approval tests and of the administrative departments which grant approval and to which forms certifying approval or extension or refusal or withdrawal of approval, issued in other countries, are to be sent.

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<u>Annex 1</u>

(maximum format: A4 (210 x 297 mm)

COMMUNICATION

issued by: Name of

administration:



.....

.....

concerning: <u>2</u>/ APPROVAL GRANTED

APPROVAL EXTENDED

APPROVAL REFUSED

APPROVAL WITHDRAWN

PRODUCTION DEFINITIVELY DISCONTINUED

of a type of headlamp pursuant to Regulation No. 82.

Approval No. Extension No. 1. Headlamp type Headlamp emitting, with a colourless lamp, a colourless beam/a selective 2. yellow beam 2/ Trade name or mark 3. 4. Manufacturer's name and address If applicable, name and address of manufacturer's representative 5. б. Submitted for approval on E/ECE/324 E/ECE/TRANS/505 Regulation No. 82 page 8 Annex 1

15. The list of documents filed with the administration service which has/granted approval and available on request is annexed to this communication.

<u>Notes</u>

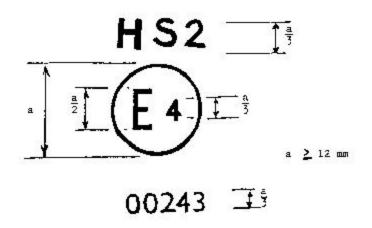
1/ Distinguishing number of the country which has granted/extended/ refused/withdrawn approval (see approval provisions in the Regulation).

2/ Strike out what does not apply.

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<u>Annex 2</u>
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ARRANGEMENT OF APPROVAL MARK



The headlamp bearing the above approval mark has been approved in the Netherlands (E/4) pursuant to Regulation No./82 under approval number 00243. The first two digits of the approval number indicate that the approval was granted in accordance with the requirements of this Regulation in its original form.

<u>Annex 3</u>

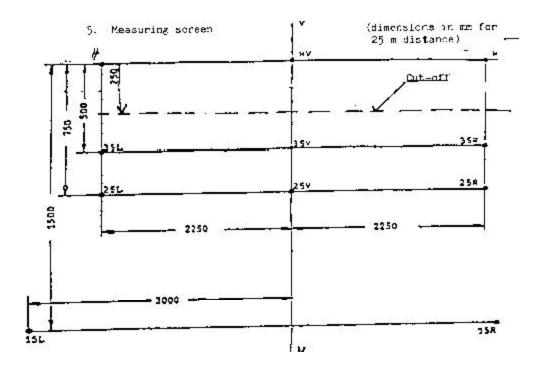
Photometric Tests

- 1. For measurements, the measuring screen shall be located at a distance of 25/m in front of the headlamp and perpendicular to the line joining the filament of the lamp and the point HV; the line H-H shall be horizontal.
- 2. Laterally, the headlamp shall be so aimed that the centre of the beam is on the vertical line V-V.
- 3. Vertically, the headlamp shall be so aimed that the "cut-off" is situated 250/mm below the line H-H. It shall be as horizontal as possible.

Measuring point	Illumination E/Lux
Any point on and above the line H-H	0.7
Any point on the line 35L-35R except 35V	1
Point 35V	2
Any point on the line 25L-25R	2
Any point on the line 15L-15R	0.5

4. The headlamp when aimed according to paragraphs 2 and 3 above, shall meet the following conditions:

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<u>Annex 4</u>

Colour of the Light Emitted

1.	The headlamps may emit white or selective yellow light.	
2.	The trichromatic co-ordinates of the selective yellow colour are:	
	limit towards red y 0.138 + 0.580 x	
	limit towards green y .1.29 x - 0.100	
	limit towards white $y - x + 0.966$	
	limit towards spectral value $y - x + 0.992$	
3.	The trichromatic co-ordinates for white light are:	
	limit towards blue x 0.310	
	limit towards yellow x 0.500	
	limit towards green y 0.150 + 0.640 x	

limit towards green y 0.440 limit towards purple y 0.050 + 0.750 x limit towards red y 0.382

<u>Note</u>

Article 3 of the Agreement to which this Regulation is annexed shall not prevent the Contracting Parties from prohibiting headlamps emitting either white or selective yellow light on vehicles approved by them.
