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COUNCIL REGULATION (EEC) No 3821/85
of 20 December 1985
on recording equipment in road transport
(OJ L 370, 31.12.1985, p. 8)

Amended by:

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► <u>M1</u> Commission Regulation (EEC) No 3314/90 of 16 November 1990	L 318	20	17.11.1990
► <u>M2</u> Council Regulation (EEC) No 3572/90 of 4 December 1990	L 353	12	17.12.1990
► <u>M3</u> Commission regulation (EEC) No 3688/92 of 21 December 1992	L 374	12	22.12.1992
► <u>M4</u> Commission Regulation (EC) No 2479/95 of 25 October 1995	L 256	8	26.10.1995
► <u>M5</u> Commission Regulation (EC) No 1056/97 of 11 June 1997	L 154	21	12.6.1997
► <u>M6</u> ► <u>C1</u> Council Regulation (EC) No 2135/98 of 24 September 1998 ◀	L 274	1	9.10.1998

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► <u>A1</u> Act of Accession of Austria, Sweden and Finland	C 241	21	29.8.1994
(adapted by Council Decision 95/1/EC, Euratom, ECSC)	L 1	1	1.1.1995

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- **C1** Corrigendum, OJ L 49, 25.2.1999, p. 46 (2135/98/EEC)



COUNCIL REGULATION (EEC) No 3821/85
of 20 December 1985
on recording equipment in road transport

THE COUNCIL OF THE EUROPEAN COMMUNITIES,

Having regard to the Treaty establishing the European Economic Community, and in particular Article 75 thereof,

Having regard to the proposal from the Commission ⁽¹⁾,

Having regard to the opinion of the European Parliament ⁽²⁾,

Having regard to the opinion of the Economic and Social Committee ⁽³⁾,

Whereas Regulation (EEC) No 1463/70 ⁽⁴⁾ as last amended by Regulation (EEC) No 2828/77 ⁽⁵⁾ introduced recording equipment in road transport;

Whereas, taking into account the amendments set out hereinafter, in order to clarify matters, all the relevant provisions should be brought together in a single text, and in consequence thereof, Regulation (EEC) No 1463/70 of the Council should be repealed; whereas, however, the exemptions set out in Article 3 (1) for certain passenger services should be maintained in force for a certain time;

Whereas the use of recording equipment that may indicate the periods of time referred to in Regulation (EEC) No 3820/85 on the harmonization of certain social legislation relating to road transport ⁽⁶⁾ is intended to ensure effective checking on that social legislation;

Whereas the obligation to use such recording equipment can be imposed only for vehicles registered in Member States; whereas furthermore certain of such vehicles may, without giving rise to difficulty, be excluded from the scope of this Regulation;

Whereas the Member States should be entitled, with the Commission's authorization, to grant certain vehicles exemptions from the provisions of the Regulation in exceptional circumstances; whereas, in urgent cases, it should be possible to grant these exemptions for a limited time without prior authorization from the Commission;

Whereas, in order to ensure effective checking, the equipment must be reliable in operation, easy to use and designed in such a way as to minimize any possibility of fraudulent use; whereas to this end recording equipment should in particular be capable of providing, on separate sheets for each driver and in a sufficiently precise and easily readable form, recorded details of the various periods of time;

Whereas automatic recording of other details of a vehicle's journey, such as speed and distance covered, will contribute significantly to road safety and will encourage sensible driving of the vehicle; whereas, consequently, it appears appropriate to provide for the equipment also to record those details;

Whereas it is necessary to set Community construction and installation standards for recording equipment and to provide for an EEC approval procedure, in order to avoid throughout the territory of the Member States any impediment to the registration of vehicles fitted with such recording equipment, to their entry into service or use, or to such equipment being used;

Whereas, in the event of differences of opinion between Member States concerning cases of EEC type approval, the Commission should be

⁽¹⁾ OJ No C 100, 12. 4. 1984, p. 3, and OJ No C 223, 3. 9. 1985, p. 5.

⁽²⁾ OJ No C 122, 20. 5. 1985, p. 168.

⁽³⁾ OJ No C 104, 25. 4. 1985, p. 4, and OJ No C 303, 25. 11. 1985, p. 29.

⁽⁴⁾ OJ No L 164, 27. 7. 1970, p. 1.

⁽⁵⁾ OJ No L 334, 24. 12. 1977, p. 11.

⁽⁶⁾ See page 1 of this Official Journal.

▼B

empowered to take a decision on a dispute within six months if the States concerned have been unable to reach a settlement;

Whereas it would be helpful in implementing this Regulation and preventing abuses to issue drivers who so request with a copy of their record sheets;

Whereas, in order to achieve the aims hereinbefore mentioned of keeping a check on work and rest periods, it is necessary that employers and drivers be responsible for seeing that the equipment functions correctly and that they perform with due care the operations prescribed;

Whereas the provisions governing the number of record sheets that a driver must keep with him must be amended following the replacement of the flexible week by a fixed week;

Whereas technical progress necessitates rapid adaptation of the technical specifications set out in the Annexes to this Regulation; whereas, in order to facilitate the implementation of the measures necessary for this purpose, provision should be made for a procedure establishing close cooperation between the Member States and the Commission within an Advisory Committee;

Whereas Member States should exchange the available information on breaches established;

Whereas, in order to ensure that recording equipment functions reliably and correctly, it is advisable to lay down uniform requirements for the periodic checks and inspections to which the equipment is to be subject after installation,

HAS ADOPTED THIS REGULATION:

CHAPTER I

Principles and scope*Article 1*

Recording equipment within the meaning of this Regulation shall, as regards construction, installation, use and testing, comply with the requirements of this Regulation ►**M6** and of Annexes I or IB and II thereto ◀, which shall form an integral part of this Regulation.

Article 2

For the purposes of this Regulation the definitions set out in Article 1 of Regulation (EEC) No 3820/85 shall apply.

Article 3

1. Recording equipment shall be installed and used in vehicles registered in a Member State which are used for the carriage of passengers or goods by road, except the vehicles referred to in Articles 4 and 14 (1) of Regulation (EEC) No 3820/85.
2. Member States may exempt vehicles mentioned in Article 13 (1) of Regulation (EEC) No 3820/85 from application of this Regulation. Member States shall inform the Commission of any exemption granted under this paragraph.
3. Member States may, after authorization by the Commission, exempt from application of this Regulation vehicles used for the transport operations referred to in Article 13 (2) of Regulation (EEC) No 3820/85. In urgent cases they may grant a temporary exemption for a period not exceeding 30 days, which shall be notified immediately to the Commission. The Commission shall notify the other Member States of any exemption granted pursuant to this paragraph.
4. In the case of national transport operations, Member States may require the installation and use of recording equipment in accordance with this Regulation in any of the vehicles for which its installation and use are not required by paragraph 1.

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CHAPTER II

Type approval*Article 4*▼ **M6**

For the purposes of this Chapter, the words ‘recording equipment’ shall mean ‘recording equipment or its components’.

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Applications for EEC approval of a type of recording equipment or of a model record sheet ► **M6** or memory card ◀ shall be submitted, accompanied by the appropriate specifications, by the manufacturer or his agent to a Member State. No application in respect of any one type of recording equipment or of any one model record ► **M6** or memory card ◀ sheet may be submitted to more than one Member State.

Article 5▼ **M6**

A Member State shall grant EC component type-approval to any type of recording equipment, to any model record sheet or memory card which conforms to the requirements laid down in Annex I or IB to this Regulation, provided the Member State is in a position to check that production models conform to the approved type.

The system's security must comply with the technical requirements laid down in Annex IB. The Commission, acting in accordance with the procedure laid down in Article 18, shall ensure that the said Annex stipulates that recording equipment may not be granted EC component type-approval until the whole system (the recording equipment itself, driver card and electrical gearbox connections) has demonstrated its capacity to resist attempts to tamper with or alter the data on driving times. The tests necessary to establish this shall be carried out by experts familiar with up to date tampering techniques.

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Any modifications or additions to an approved model must receive additional EEC type approval from the Member State which granted the original EEC type approval.

Article 6

Member States shall issue to the applicant an EEC approval mark, which shall conform to the model shown in Annex II, for each type of recording equipment or model record sheet ► **M6** or memory card ◀ which they approve pursuant to Article 5.

Article 7

The competent authorities of the Member State to which the application for type approval has been submitted shall, in respect of each type of recording equipment or model record sheet ► **M6** or memory card ◀ which they approve or refuse to approve, either send within one month to the authorities of the other Member States a copy of the approval certificate accompanied by copies of the relevant specifications, or, if such is the case, notify those authorities that approval has been refused; in cases of refusal they shall communicate the reasons for their decision.

Article 8

1. If a Member State which has granted EEC type approval as provided for in Article 5 finds that certain recording equipment or record sheets ► **M6** or memory cards ◀ bearing the EEC type approval mark which it has issued do not conform to the prototype which it has approved, it shall take the necessary measures to ensure that production models conform to the approved prototype. The measures taken may, if necessary, extend to withdrawal of EEC type approval.

2. A Member State which has granted EEC type approval shall withdraw such approval if the recording equipment or record sheet

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►M6 or memory card ◀ which has been approved is not in conformity with this Regulation or its Annexes or displays in use any general defect which makes it unsuitable for the purpose for which it is intended.

3. If a Member State which has granted EEC type approval is notified by another Member State of one of the cases referred to in paragraphs 1 and 2, it shall also, after consulting the latter Member State, take the steps laid down in those paragraphs, subject to paragraph 5.

4. A Member State which ascertains that one of the cases referred to in paragraph 2 has arisen may forbid until further notice the placing on the market and putting into service of the recording equipment or record sheets ►M6 or memory cards ◀. The same applies in the cases mentioned in paragraph 1 with respect to recording equipment or record sheets ►M6 or memory cards ◀ which have been exempted from EEC initial verification, if the manufacturer, after due warning, does not bring the equipment into line with the approved model or with the requirements of this Regulation.

In any event, the competent authorities of the Member States shall notify one another and the Commission, within one month, of any withdrawal of EEC type approval or of any other measures taken pursuant to paragraphs 1, 2 and 3 and shall specify the reasons for such action.

5. If a Member State which has granted an EEC type approval disputes the existence of any of the cases specified in paragraphs 1 or 2 notified to it, the Member States concerned shall endeavour to settle the dispute and the Commission shall be kept informed.

If talks between the Member States have not resulted in agreement within four months of the date of the notification referred to in paragraph 3 above, the Commission, after consulting experts from all Member States and having considered all the relevant factors, e.g. economic and technical factors, shall within six months adopt a decision which shall be communicated to the Member States concerned and at the same time to the other Member States. The Commission shall lay down in each instance the time limit for implementation of its decision.

Article 9

1. An applicant for EEC type approval of a model record sheet shall state on his application the type or types of recording equipment on which the sheet in question is designed to be used and shall provide suitable equipment of such type or types for the purpose of testing the sheet.

2. The competent authorities of each Member State shall indicate on the approval certificate for the model record sheet the type or types of recording equipment on which that model sheet may be used.

Article 10

No Member State may refuse to register any vehicle fitted with recording equipment, or prohibit the entry into service or use of such vehicle for any reason connected with the fact that the vehicle is fitted with such equipment, if the equipment bears the EEC approval mark referred to in Article 6 and the installation plaque referred to in Article 12.

Article 11

All decisions pursuant to this Regulation refusing or withdrawing approval of a type of recording equipment or model record sheet ►M6 or memory card ◀ shall specify in detail the reasons on which they are based. A decision shall be communicated to the party concerned, who shall at the same time be informed of the remedies available to him under the laws of the Member States and of the time-limits for the exercise of such remedies.

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CHAPTER III

Installation and inspection*Article 12*

1. Recording equipment may be installed or repaired only by fitters or workshops approved by the competent authorities of Member States for that purpose after the latter, should they so desire, have heard the views of the manufacturers concerned.

▼ **M6**

The period of administrative validity of approved workshop and fitter cards shall not exceed one year.

If a card issued to an approved workshop or fitter is to be extended, is damaged, malfunctions, is lost or is stolen, the authority shall supply a replacement card within five working days of receiving a detailed request to that effect.

Where a new card is issued to replace an old one, the new card shall bear the same 'workshop' information number, but the index shall be increased by one. The authority issuing the card shall maintain a register of lost, stolen or defective cards.

Member States shall take any measure necessary to prevent the cards distributed to approved fitters and workshops from being falsified.

2. The approved fitter or workshop shall place a special mark on the seals which it affixes and, in addition, shall enter for recording equipment in conformity with Annex IB, the electronic security data for carrying out, in particular, the authentication checks. The competent authorities of each Member State shall maintain a register of the marks and electronic security data used and of approved workshop and fitter cards issued.

3. The competent authorities of the Member States shall forward to the Commission the lists of approved fitters and workshops and the cards issued to them and shall forward to it copies of the marks and of the necessary information relating to the electronic security data used.

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4. For the purpose of certifying that installation of recording equipment took place in accordance with the requirements of this Regulation an installation plaque affixed as provided in ► **M6** Annexes I and IB ◀ shall be used.

▼ **M3**

5. Any seal may be removed by the fitters or workshops approved by competent authorities under paragraph 1 of this Article, or in the circumstances described in Annex I, Chapter V, paragraph 4 ► **M6** or in Annex IB section VI(c) ◀ to this Regulation.

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CHAPTER IV

Use of equipment▼ **M6***Article 13*

The employer and drivers shall ensure the correct functioning and proper use of, on the one hand, the recording equipment and, on the other, the driver card where a driver is required to drive a vehicle fitted with recording equipment in conformity with Annex IB.

▼ **B***Article 14*▼ **M6**

1. The employer shall issue a sufficient number of record sheets to drivers of vehicles fitted with recording equipment in conformity with Annex I, bearing in mind the fact that these sheets are personal in

▼M6

character, the length of the period of service and the possible obligation to replace sheets which are damaged, or have been taken by an authorised inspecting officer. The employer shall issue to drivers only sheets of an approved model suitable for use in the equipment installed in the vehicle.

Where the vehicle is fitted with recording equipment in conformity with Annex IB, the employer and the driver shall ensure that, taking into account the length of the period of service, the printing on request referred to in Annex IB can be carried out correctly in the event of an inspection.

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2. The undertaking shall keep the record sheets in good order for at least a year after their use and shall give copies to the drivers concerned who request them. The sheets shall be produced or handed over at the request of any authorized inspecting officer.

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3. The driver card as defined in Annex IB shall be issued, at the request of the driver, by the competent authority of the Member State where the driver has his normal residence.

A Member State may require any driver subject to the provisions of Regulation (EEC) No 3820/85 and normally resident on its territory to hold a driver card.

(a) For the purposes of this Regulation 'normal residence' means the place where a person usually lives, that is for at least 185 days in each calendar year, because of personal and occupational ties, or, in the case of a person with no occupational ties, because of personal ties which show close links between that person and the place where he is living.

However, the normal residence of a person whose occupational ties are in a different place from his personal ties and who consequently lives in turn in different places situated in two or more Member States shall be regarded as being the place of his personal ties, provided that such person returns there regularly. This last condition need not be met where the person is living in a Member State in order to carry out a fixed-term assignment.

(b) Drivers shall give proof of their place of normal residence by any appropriate means, such as their identity card or any other valid document.

(c) Where the competent authorities of the Member State issuing the driver card have doubts as to the validity of a statement as to normal residence made in accordance with point (b), or for the purpose of certain specific controls, they may request any additional information or evidence.

(d) The competent authorities of the issuing Member State shall, as far as this can be done, ensure that the applicant does not already hold a valid driver card.

4. (a) The competent authority of the Member State shall personalise the driver card in accordance with the provisions of Annex IB.

For administrative purposes, the driver card may not be valid for more than five years.

The driver may hold one valid driver card only. The driver is authorised to use only his own personalised driver card. The driver shall not use a driver card which is defective or which has expired.

When a new driver card is issued replacing the old, the new card shall bear the same driver card issue number but the index shall be increased by one. The issuing authority shall keep records of issued, stolen, lost or defective driver cards for a period at least equivalent to their period of administrative validity.

If the driver card is damaged, malfunctions or is lost or stolen, the authority shall supply a replacement card within five working days of receiving a detailed request to that effect.

▼ **M6**

In the event of a request for the renewal of a card whose expiry date is approaching, the authority shall supply a new card before the expiry date provided that the request was sent to it within the time limits laid down in the second subparagraph of Article 15(1).

- (b) Driver cards shall be issued only to applicants who are subject to the provisions of Regulation (EEC) No 3820/85.
- (c) The driver card shall be personal. It may not, during its official period of validity, be withdrawn or suspended for whatever reason unless the competent authority of a Member State finds that the card has been falsified, or the driver is using a card of which he is not the holder, or that the card held has been obtained on the basis of false declarations and/or forged documents. If such suspension or withdrawal measures are taken by a Member State other than the Member State of issue, the former shall return the card to the authorities of the Member State which issued it and shall indicate the reasons for returning it.
- (d) Driver cards issued by Member States shall be mutually recognised.

Where the holder of a valid driver card issued by a Member State has established his normal place of residence in another Member State, he may ask for his card to be exchanged for an equivalent driver card; it shall be the responsibility of the Member State which carries out the exchange to verify if necessary whether the card produced is actually still valid.

Member States carrying out an exchange shall return the old card to the authorities of the Member State of issue and indicate the reasons for so doing.

- (e) Where a Member State replaces or exchanges a driver card, the replacement or exchange, and any subsequent replacement or renewal, shall be registered in that Member State.
- (f) Member States shall take all the necessary measures to prevent any possibility of driver cards being falsified.

5. Member States shall ensure that data needed to monitor compliance with Regulation (EEC) No 3820/85 and Council Directive 92/6/EEC of 10 February 1992 on the installation and use of speed limitation devices for certain categories of motor vehicles in the Community ⁽¹⁾ which are recorded and stored by recording equipment in conformity with Annex IB to this Regulation can be made available for at least 365 days after the date of their recording and that they can be made available under conditions that guarantee the security and accuracy of the data.

Member States shall take any measures necessary to ensure that the resale or decommissioning of recording equipment cannot detract, in particular, from the satisfactory application of this paragraph.

▼ **B***Article 15*

1. Drivers shall not use dirty or damaged record sheets ► **M6** or driver cards ◀. The sheets ► **M6** or driver cards ◀ shall be adequately protected on this account.

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Where a driver wishes to renew his driver card, he shall apply to the competent authorities of the Member State in which he has his normal residence not later than 15 working days before the expiry date of the card.

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In case of damage to a sheet bearing recordings ► **M6** or driver card ◀, drivers shall attach the damaged sheet ► **M6** or driver card ◀ to the spare sheet used to replace it.

⁽¹⁾ OJ L 57, 2.3.1992, p.27.

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If the driver card is damaged, malfunctions or is lost or stolen, the driver shall apply within seven calendar days for its replacement to the competent authorities of the Member State in which he has his normal residence.





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2. Drivers shall use the record sheets ► **M6** or driver cards ◀ every day on which they are driving, starting from the moment they take over the vehicle. The record sheet ► **M6** or driver card ◀ shall not be withdrawn before the end of the daily working period unless its withdrawal is otherwise authorized. No record sheet ► **M6** or driver card ◀ may be used to cover a period longer than that for which it is intended.

When, as a result of being away from the vehicle, a driver is unable to use the equipment fitted to the vehicle, the periods of time indicated in paragraph 3, second indent (b), (c) and (d) below shall be entered on the sheet, either manually, by automatic recording or other means, legibly and without dirtying the sheet.

Drivers shall amend the record sheets as necessary should there be more than one driver on board the vehicle, so that the information referred to in Chapter II (1) to (3) of Annex I is recorded on the record sheet of the driver who is actually driving.

3. Drivers shall:

- ensure that the time recorded on the sheet agrees with the official time in the country of registration of the vehicle,
- operate the switch mechanisms enabling the following periods of time to be recorded separately and distinctly:
 - (a) under the sign  : driving time;
 - (b) under the sign  : all other periods of work;
 - (c) under the sign  : other periods of availability, namely:
 - waiting time, i.e. the period during which drivers need remain at their posts only for the purpose of answering any calls to start or resume driving or to carry out other work,
 - time spent beside the driver while the vehicle is in motion,
 - time spent on a bunk while the vehicle is in motion;
 - (d) under the sign  : breaks in work and daily rest periods.

4. Each Member State may permit all the periods referred to in paragraph 3, second indent (b) and (c) to be recorded under the sign  on the record sheets used on vehicles registered in its territory.

5. Each crew member shall enter the following information on his record sheet:

- (a) on beginning to use the sheet — his surname and first name;
- (b) the date and place where use of the sheet begins and the date and place where such use ends;
- (c) the registration number of each vehicle to which he is assigned, both at the start of the first journey recorded on the sheet and then, in the event of a change of vehicle, during use of the sheet;
- (d) the odometer reading:
 - at the start of the first journey recorded on the sheet,
 - at the end of the last journey recorded on the sheet,
 - in the event of a change of vehicle during a working day (reading on the vehicle to which he was assigned and reading on the vehicle to which he is to be assigned);
- (e) the time of any change of vehicle.

▼ M6

5a. The driver shall enter in the recording equipment in conformity with Annex IB the symbols of the countries in which he begins and ends his daily work period. However, a Member State may require drivers of

▼M6

vehicles engaged in transport operations inside its territory to add more detailed geographic specifications to the country symbol provided that the Member State has notified them to the Commission before 1 April 1998 and that they do not number more than 20.

The above data entries shall be activated by the driver, and may be entirely manual or automatic if the recording equipment is linked to a satellite tracking system.

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6. The ►**M6** recording equipment defined in Annex I ◀ shall be so designed that it is possible for an authorized inspecting officer, if necessary after opening the equipment, to read the recordings relating to the nine hours preceding the time of the check without permanently deforming, damaging or soiling the sheet.

The equipment shall, furthermore, be so designed that it is possible, without opening the case, to verify that recordings are being made.

▼M6

7. Where the driver drives a vehicle fitted with recording equipment in conformity with Annex I, he must be able to produce, whenever an inspecting officer so requests:

- the record sheets for the current week and, in any event, the sheet for the last day on which he drove during the previous week,
- the driver card if he holds one, and
- print-outs from the recording equipment defined in Annex IB relating to the periods of time indicated in paragraph 3, second indent, (a), (b), (c) and (d) if he drove a vehicle fitted with such recording equipment during the period referred to in the first indent of this paragraph.

Where the driver drives a vehicle fitted with recording equipment in conformity with Annex IB, he must be able to produce, whenever an inspecting officer so requests:

- the driver card of which he is the holder,
- the record sheets corresponding to the same period as the one referred to in the first indent of the previous subparagraph during which he drove a vehicle fitted with recording equipment in conformity with Annex I.

An authorised inspecting officer may check compliance with Regulation (EEC) No 3820/85 by analysis of the record sheets, of the displayed or printed data which have been recorded by the recording equipment or by the driver card or, failing this, by analysis of any other supporting document that justifies non-compliance with a provision, such as those laid down in Article 16(2) and (3).

8. It shall be forbidden to falsify, suppress or destroy data recorded on the record sheet, stored in the recording equipment or on the driver card, or print-outs from the recording equipment as defined in Annex IB. The same applies to any manipulation of the recording equipment, record sheet or driver card which may result in data and/or printed information being falsified, suppressed or destroyed. No device which could be used to this effect shall be present on the vehicle.

▼B*Article 16*

1. In the event of breakdown or faulty operation of the equipment, the employer shall have it repaired by an approved fitter or workshop, as soon as circumstances permit.

If the vehicle is unable to return to the premises within a period of one week calculated from the day of the breakdown or of the discovery of defective operation, the repair shall be carried out *en route*.

Measures taken by Member States pursuant to Article 19 may give the competent authorities power to prohibit the use of the vehicle in cases where breakdown or faulty operation has not been put right as provided in the foregoing subparagraphs.

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2. While the recording equipment is unserviceable or malfunctioning, drivers shall mark on the record sheet or sheets, or on a temporary sheet to be attached to the record sheet or to the driver card, on which he shall enter data enabling him to be identified (driver's card number and/or name and/or driving licence number), including his signature, all information for the various periods of time which are no longer recorded or printed out correctly by the recording equipment.

If a driver card is damaged, malfunctions or is lost or stolen, the driver shall, at the end of his journey, print out the information relating to the periods of time recorded by the recording equipment and mark on that document the details that enable him to be identified (the driver card number and/or name and/or driving licence number), including his signature.

3. If a driver card is damaged or if it malfunctions, the driver shall return it to the competent authority of the Member State in which he has his normal residence. Theft of the driver card shall be the subject of a formal declaration to the competent authorities of the State where the theft occurred.

Loss of the driver card must be reported in a formal declaration to the competent authorities of the State that issued it and to the competent authorities of the Member State of normal residence where they are different.

The driver may continue to drive without a driver card for a maximum period of 15 calendar days or for a longer period if this is necessary for the vehicle to return to its premises, provided he can prove the impossibility of producing or using the card during this period.

Where the authorities of the Member State in which the driver has his normal residence are different from those which issued his card and where the latter are requested to renew, replace or exchange the driver card, they shall inform the authorities which issued the old card of the precise reasons for its renewal, replacement or exchange.

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CHAPTER V

Final provisions**▼M6***Article 17*

1. The amendments necessary to adapt the Annexes to technical progress shall be adopted in accordance with the procedure laid down in Article 18.

2. The technical specifications relating to the following sections of Annex IB shall be adopted as soon as possible and if possible before 1 July 1998 by the same procedure:

(a) Chapter II

— (d) 17:

displaying and printing of faults in the recording equipment,

— (d) 18:

displaying and printing of faults in the driver card,

— (d) 21:

displaying and printing of summary reports;

(b) Chapter III

— (a) 6.3:

standards for the protection of vehicle electronics against electrical interference and magnetic fields,

— (a) 6.5:

protection (security) of the total system,

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- (c) 1:
warning signals indicating the internal malfunctioning of the recording equipment,
 - (c) 5:
format of the warnings,
 - (f):
maximum tolerances;
- (c) Chapter IV, A:
- 4:
standards,
 - 5:
security, including data protection,
 - 6:
temperature range,
 - 8:
electrical characteristics,
 - 9:
logical structure of the driver card,
 - 10:
functions and commands,
 - 11:
elementary files;
- and Chapter IV, B;
- (d) Chapter V:
printer and standard print-outs.

Article 18

1. Where reference is made to the procedure laid down in this Article, the Commission shall be assisted by a committee composed of the representatives of the Member States and chaired by the representative of the Commission.

2. The representative of the Commission shall submit to the committee a draft of the measures to be taken. The committee shall deliver its opinion on the draft within a time limit which the chairman may lay down according to the urgency of the matter. The opinion shall be delivered by the majority laid down in Article 148(2) of the Treaty in the case of decisions which the Council is required to adopt on a proposal from the Commission. The votes of the representatives of the Member States within the committee shall be weighted in the manner set out in that Article. The chairman shall not vote.

3. (a) The Commission shall adopt the measures envisaged if they are in accordance with the opinion of the committee.

(b) If the measures envisaged are not in accordance with the opinion of the committee, or if no opinion is delivered, the Commission shall, without delay, submit to the Council a proposal relating to the measures to be taken. The Council shall act by a qualified majority.

If, on the expiry of a period of three months from the date of referral to the Council, the Council has not acted, the proposed measures shall be adopted by the Commission.

▼B*Article 19*

1. Member States shall, in good time and after consulting the Commission, adopt such laws, regulations or administrative provisions as may be necessary for the implementation of this Regulation.

Such measures shall cover, *inter alia*, the reorganization of, procedure for, and means of carrying out, checks on compliance and the penalties to be imposed in case of breach.

2. Member States shall assist each other in applying this Regulation and in checking compliance therewith.

3. Within the framework of this mutual assistance the competent authorities of the Member States shall regularly send one another all available information concerning:

- breaches of this Regulation committed by non-residents and any penalties imposed for such breaches,
- penalties imposed by a Member State on its residents for such breaches committed in other Member States.

Article 20

Regulation (EEC) No 1463/70 shall be repealed.

However, Article 3 (1) of the said Regulation shall, until 31 December 1989, continue to apply to vehicles and drivers employed in regular international passenger services in so far as the vehicles used for such services are not fitted with recording equipment used as prescribed in this Regulation.

▼M2*Article 20a*

This Regulation shall not apply until 1 January 1991 to vehicles registered in the territory of the former German Democratic Republic before that date.

This Regulation shall not apply until 1 January 1993 to such vehicles where they are engaged only in national transport operations in the territory of the Federal Republic of Germany. However, this Regulation shall apply as from its entry into force to vehicles engaged in the carriage of dangerous goods.

▼B*Article 21*

This Regulation shall enter into force on 29 September 1986.

This Regulation shall be binding in its entirety and directly applicable in all Member States.

▼B

ANNEX I

**REQUIREMENTS FOR CONSTRUCTION, TESTING, INSTALLATION
AND INSPECTION**

I. DEFINITIONS

In this Annex:

(a) Recording equipment means:

equipment intended for installation in road vehicles to show and record automatically or semi-automatically details of the movement of those vehicles and of certain working periods of their drivers;

(b) Record sheet means:

a sheet designed to accept and retain recorded data, to be placed in the recording equipment and on which the marking devices of the latter inscribe a continuous record of the information to be recorded;

(c) The constant of the recording equipment means:

the numerical characteristic giving the value of the input signal required to show and record a distance travelled of one kilometre; this constant must be expressed either in revolutions per kilometre ($k = \dots \text{ rev/km}$), or in impulses per kilometre ($k = \dots \text{ imp/km}$);

(d) Characteristic coefficient of the means:

the numerical characteristic giving the value of the output signal emitted by the part of the vehicle linking it with the recording equipment (gearbox output shaft or axle) while the vehicle travels a distance of one measured kilometre under normal test conditions (see Chapter VI, point 4 of this Annex). The characteristic coefficient is expressed either in revolutions per kilometre ($w = \dots \text{ rev/km}$) or in impulses per kilometre ($w = \dots \text{ imp/km}$);

(e) Effective circumference of wheel tyres means:

the average of the distances travelled by the several wheels moving the vehicle (driving wheels) in the course of one complete rotation. The measurement of these distances must be made under normal test conditions (see Chapter VI, point 4 of this Annex) and is expressed in the form: $l = \dots \text{ mm}$.

II. GENERAL CHARACTERISTICS AND FUNCTIONS OF RECORDING
EQUIPMENT

The equipment must be able to record the following:

1. distance travelled by the vehicle;
2. speed of the vehicle;
3. driving time;
4. other periods of work or of availability;
5. breaks from work and daily rest periods;
6. opening of the case containing the record sheet;

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7. for electronic recording equipment which is equipment operating by signals transmitted electrically from the distance and speed sensor, any interruption exceeding 100 milliseconds in the power supply of the recording equipment (except lighting), in the power supply of the distance and speed sensor and any interruption in the signal lead to the distance and speed sensor.

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For vehicles used by two drivers the equipment must be capable of recording simultaneously but distinctly and on two separate sheets details of the periods listed under 3, 4 and 5.

III. CONSTRUCTION REQUIREMENTS FOR RECORDING EQUIPMENT

(a) General points

1. *Recording equipment shall include the following:*
 - 1.1. Visual instruments showing:
 - distance travelled (distance recorder),
 - speed (speedometer),

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— time (clock).

1.2. Recording instruments comprising:

- a recorder of the distance travelled,
- a speed recorder,
- one or more time recorders satisfying the requirements laid down in Chapter III (c) 4.

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1.3. A means of marking showing on the record sheet individually:

- each opening of the case containing that sheet,
- for electronic recording equipment, as defined in point 7 of Chapter II, any interruption exceeding 100 milliseconds in the power supply of the recording equipment (except lighting), not later than at switching-on the power supply again,
- for electronic recording equipment, as defined in point 7 of Chapter II, any interruption exceeding 100 milliseconds in the power supply of the distance and speed sensor and any interruption in the signal lead to the distance and speed sensor.

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2. Any inclusion in the equipment of devices additional to those listed above must not interfere with the proper operation of the mandatory devices or with the reading of them.

The equipment must be submitted for approval complete with any such additional devices.

3. *Materials*

- 3.1. All the constituent parts of the recording equipment must be made of materials with sufficient stability and mechanical strength and stable electrical and magnetic characteristics.
- 3.2. Any modification in a constituent part of the equipment or in the nature of the materials used for its manufacture must, before being applied in manufacture, be submitted for approval to the authority which granted type-approval for the equipment.

4. *Measurement of distance travelled*

The distances travelled may be measured and recorded either:

- so as to include both forward and reverse movement, or
- so as to include only forward movement.

Any recording of reversing movements must on no account affect the clarity and accuracy of the other recordings.

5. *Measurement of speed*

- 5.1. The range of speed measurement shall be as stated in the type approval certificate.
- 5.2. The natural frequency and the damping of the measuring device must be such that the instruments showing and recording the speed can, within the range of measurement, follow acceleration changes of up to 2 m/s^2 , within the limits of accepted tolerances.

6. *Measurement of time (clock)*

- 6.1. The control of the mechanism for resetting the clock must be located inside a case containing the record sheet; each opening of that case must be automatically recorded on the record sheet.
- 6.2. If the forward movement mechanism of the record sheet is controlled by the clock, the period during which the latter will run correctly after being fully wound must be greater by at least 10 % than the recording period corresponding to the maximum sheet-load of the equipment.

7. *Lighting and Protection*

- 7.1. The visual instruments of the equipment must be provided with adequate non-dazzling lighting.
- 7.2. For normal conditions of use, all the internal parts of the equipment must be protected against damp and dust. In addition they must be made proof against tampering by means of casings capable of being sealed.

▼B**(b) Visual instruments**

1. *Distance travelled indicator (distance recorder)*
 - 1.1. The value of the smallest grading on the instrument showing distance travelled must be 0,1 kilometres. Figures showing hectometres must be clearly distinguishable from those showing whole kilometres.
 - 1.2. The figures on the distance recorder must be clearly legible and must have an apparent height of at least 4 mm.
 - 1.3. The distance recorder must be capable of reading up to at least 99 999,9 kilometres.
2. *Speed indicators (speedometer)*
 - 2.1. Within the range of measurement, the speed scale must be uniformly graduated by 1, 2, 5 or 10 kilometres per hour. The value of a speed graduation (space between two successive marks) must not exceed 10 % of the maximum speed shown on the scale.
 - 2.2. The range indicated beyond that measured need not be marked by figures.
 - 2.3. The length of each space on the scale representing a speed difference of 10 kilometres per hour must not be less than 10 millimetres.
 - 2.4. On an indicator with a needle, the distance between the needle and the instrument face must not exceed three millimetres.
3. *Time indicator (clock)*

The time indicator must be visible from outside the equipment and give a clear, plain and unambiguous reading.

(c) Recording instruments

1. *General points*
 - 1.1. All equipment, whatever the form of the record sheet (strip or disc) must be provided with a mark enabling the record sheet to be inserted correctly, in such a way as to ensure that the time shown by the clock and the time-marking on the sheet correspond.
 - 1.2. The mechanism moving the record sheet must be such as to ensure that the latter moves without play and can be freely inserted and removed.
 - 1.3. For record sheets in disc form, the forward movement device must be controlled by the clock mechanism. In this case, the rotating movement of the sheet must be continuous and uniform, with a minimum speed of seven millimetres per hour measured at the inner border of the ring marking the edge of the speed recording area.

In equipment of the strip type, where the forward movement device of the sheets is controlled by the clock mechanism the speed of rectilinear forward movement must be at least 10 millimetres per hour.
 - 1.4. Recording of the distance travelled, of the speed of the vehicle and of any opening of the case containing the record sheet or sheets must be automatic.
2. *Recording distance travelled*
 - 2.1. Every kilometre of distance travelled must be represented on the record by a variation of at least one millimetre on the corresponding coordinate.
 - 2.2. Even at speeds reaching the upper limit of the range of measurement, the record of distances must still be clearly legible.
3. *Recording speed*
 - 3.1. Whatever the form of the record sheet, the speed recording stylus must normally move in a straight line and at right angles to the direction of travel of the record sheet.

However, the movement of the stylus may be curvilinear, provided the following conditions are satisfied:

 - the trace drawn by the stylus must be perpendicular to the average circumference (in the case of sheets in disc form) or to the axis (in the case of sheets in strip form) of the area reserved for speed recording,
 - the ratio between the radius of curvature of the trace drawn by the stylus and the width of the area reserved for speed recording must be not less than 2,4 to 1 whatever the form of the record sheet,
 - the markings on the time-scale must cross the recording area in a curve of the same radius as the trace drawn by the stylus. The spaces between

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the markings on the time-scale must represent a period not exceeding one hour.

- 3.2. Each variation in speed of 10 kilometres per hour must be represented on the record by a variation of at least 1,5 millimetres on the corresponding coordinate.

4. *Recording time*

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- 4.1. Recording equipment must be so constructed that the period of driving time is always recorded automatically and that it is possible, through the operation where necessary of a switch device to record separately the other periods of time as indicated in Article 15 (3), second indent (b), (c) and (d) of the Regulation.

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- 4.2. It must be possible, from the characteristics of the traces, their relative positions and if necessary the signs laid down in Article 15 of the Regulation to distinguish clearly between the various periods of time.

The various periods of time should be differentiated from one another on the record by differences in the thickness of the relevant traces, or by any other system of at least equal effectiveness from the point of view of legibility and ease of interpretation of the record.

- 4.3. In the case of vehicles with a crew consisting of more than one driver, the recordings provided for in point 4.1 must be made on two separate sheets, each sheet being allocated to one driver. In this case, the forward movement of the separate sheets must be effected either by a single mechanism or by separate synchronized mechanisms.

(d) Closing device

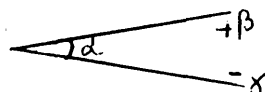
1. The case containing the record sheet or sheets and the control of the mechanism for resetting the clock must be provided with a lock.
2. Each opening of the case containing the record sheet or sheets and the control of the mechanism for resetting the clock must be automatically recorded on the sheet or sheets.

(e) Markings

1. The following markings must appear on the instrument face of the equipment:
 - close to the figure shown by the distance recorder, the unit of measurement of distance, indicated by the abbreviation 'km',
 - near the speed scale, the marking 'km/h',
 - the measurement range of the speedometer in the form 'Vmin ... km/h, Vmax ... km/h', This marking is not necessary if it is shown on the descriptive plaque of the equipment.

However, these requirements shall not apply to recording equipment approved before 10 August 1970.

2. The descriptive plaque must be built into the equipment and must show the following markings, which must be visible on the equipment when installed:
 - name and address of the manufacturer of the equipment,
 - manufacturer's number and year of construction,
 - approval mark for the equipment type,
 - the constant of the equipment in the form 'k = ... rev/km' or 'k = ... imp/km',
 - optionally, the range of speed measurement, in the form indicated in point 1,
 - should the sensitivity of the instrument to the angle of inclination be capable of affecting the readings given by the equipment beyond the permitted tolerances, the permissible angle expressed as:



where α is the angle measured from the horizontal position of the front face (fitted the right way up) of the equipment for which the instrument is calibrated, while β and γ represent respectively the maximum

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permissible upward and downward deviations from the angle of calibration α .

(f) Maximum tolerances (visual and recording instruments)

1. On the test bench before installation:
 - (a) distance travelled:

1 % more or less than the real distance, where that distance is at least one kilometre;
 - (b) speed:

3 km/h more or less than the real speed;
 - (c) time:

\pm two minutes per day with a maximum of 10 minutes per seven days in cases where the running period of the clock after rewinding is not less than that period.
2. On installation:
 - (a) distance travelled:

2 % more or less than the real distance, where that distance is at least one kilometre;
 - (b) speed:

4 km/h more or less than the real speed;
 - (c) time:

\pm two minutes per day, or
 \pm 10 minutes per seven days.
3. In use:
 - (a) distance travelled:

4 % more or less than the real distance, where that distance is at least one kilometre;
 - (b) speed:

6 km/h more or less than the real speed;
 - (c) time:

\pm two minutes per day, or
 \pm 10 minutes per seven days.
4. The maximum tolerances set out in points 1, 2 and 3 are valid for temperatures between 0° and 40 °C, temperatures being taken in close proximity to the equipment.
5. Measurement of the maximum tolerances set out in points 2 and 3 shall take place under the conditions laid down in Chapter VI.

IV. RECORD SHEETS**(a) General points**

1. The record sheets must be such that they do not impede the normal functioning of the instrument and that the records which they contain are indelible and easily legible and identifiable.

The record sheets must retain their dimensions and any records made on them under normal conditions of humidity and temperature.

In addition it must be possible to write on the sheets, without damaging them and without affecting the legibility of the recordings, the information referred to in Article 15 (5) of the Regulation.

Under normal conditions of storage, the recordings must remain clearly legible for at least one year.
2. The minimum recording capacity of the sheets, whatever their form, must be 24 hours.

If several discs are linked together to increase the continuous recording capacity which can be achieved without intervention by staff, the links between the various discs must be made in such a way that there are no breaks in or overlapping of recordings at the point of transfer from one disc to another.

▼B**(b) Recording areas and their graduation**

1. The record sheets shall include the following recording areas:
 - an area exclusively reserved for data relating to speed,
 - an area exclusively reserved for data relating to distance travelled,
 - one or more areas for data relating to driving time, to other periods of work and availability to breaks from work and to rest periods for drivers.
2. The area for recording speed must be scaled off in divisions of 20 kilometres per hour or less. The speed corresponding to each marking on the scale must be shown in figures against that marking. The symbol 'km/h' must be shown at least once within the area. The last marking on the scale must coincide with the upper limit of the range of measurement.
3. The area for recording distance travelled must be set out in such a way that the number of kilometres travelled may be read without difficulty.
4. The area or areas reserved for recording the periods referred to in point 1 must be so marked that it is possible to distinguish clearly between the various periods of time.

(c) Information to be printed on the record sheets

Each sheet must bear, in printed form, the following information:

- name and address or trade name of the manufacturer,
- approval mark for the model of the sheet,
- approval mark for the type or types of equipment in which the sheet may be used,
- upper limit of the speed measurement range, printed in kilometres per hour.

By way of minimal additional requirements, each sheet must bear, in printed form a time-scale graduated in such a way that the time may be read directly at intervals of fifteen minutes while each five minute interval may be determined without difficulty.

(d) Free space for hand written insertions

A free space must be provided on the sheets such that drivers may as a minimum write in the following details:

- surname and first name of the driver,
- date and place where use of the sheet begins and date and place where such use ends,
- the registration number or numbers of the vehicle or vehicles to which the driver is assigned during the use of the sheet,
- odometer readings from the vehicle or vehicles to which the driver is assigned during the use of the sheet,
- the time at which any change of vehicle takes place.

V. INSTALLATION OF RECORDING EQUIPMENT

1. Recording equipment must be positioned in the vehicle in such a way that the driver has a clear view from his seat of speedometer, distance recorder and clock while at the same time all parts of those instruments, including driving parts, are protected against accidental damage.
2. It must be possible to adapt the constant of the recording equipment to the characteristic coefficient of the vehicle by means of a suitable device, to be known as an adaptor.

Vehicles with two or more rear axle ratios must be fitted with a switch device whereby these various ratios may be automatically brought into line with the ratio for which the equipment has been adapted to the vehicle.

3. After the equipment has been checked on installation, an installation plaque shall be affixed to the vehicle beside the equipment or in the equipment itself and in such a way as to be clearly visible. After every inspection by an approved fitter or workshop requiring a change in the setting of the installation itself, a new plaque must be affixed in place of the previous one.

The plaque must show at least the following details:

- name, address or trade name of the approved fitter or workshop,
- characteristic coefficient of the vehicle, in the form 'w = ... rev/km' or 'w = ... imp/km',
- effective circumference of the wheel tyres in the form 'l = ... mm',

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— the dates on which the characteristic coefficient of the vehicle was determined and the effective measured circumference of the wheel tyres.

4. *Sealing*

The following parts must be sealed:

- (a) the installation plaque, unless it is attached in such a way that it cannot be removed without the markings thereon being destroyed;
- (b) the two ends of the link between the recording equipment proper and the vehicle;
- (c) the adaptor itself and the point of its insertion into the circuit;
- (d) the switch mechanism for vehicles with two or more axle ratios;
- (e) the links joining the adaptor and the switch mechanism to the rest of the equipment;
- (f) the casings required under Chapter III (a) 7.2;

▼M3

- (g) any cover giving access to the means of adapting the constant of the recording equipment to the characteristic coefficient of the vehicle.

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In particular cases, further seals may be required on approval of the equipment type and a note of the positioning of these seals must be made on the approval certificate.

►**M3** The seals mentioned in (b), (c) and (e) are authorized to be removed:

- in case of emergency,
- to install, to adjust or to repair a speed limitation device or any other device contributing to road safety,

provided that the recording equipment continues to function reliably and correctly and is resealed by an approved fitter or workshop immediately after fitting the speed limitation device or any other device contributing to road safety or within seven days in other cases ◀; for each occasion that these seals are broken a written statement giving the reasons for such action must be prepared and made available to the competent authority.

▼M4

5. The cables connecting the recording equipment to the transmitter must be protected by a continuous plastic-coated rust-protected steel sheath with crimped ends except where an equivalent protection against manipulation is guaranteed by other means (for example by electronic monitoring such as signal encryption) capable of detecting the presence of any device, which is unnecessary for the correct operation of the recording equipment and whose purpose is to prevent the accurate operation of the recording equipment by short circuiting or interruption or by modification of the electronic data from the speed and distance sensor. A joint, comprised of sealed connections, is deemed to be continuous within the meaning of this Regulation.

The aforementioned electronic monitoring may be replaced by an electronic control which ensures that the recording equipment is able to record any movement of the vehicle, independent from the signal of the speed and distance sensor.

▼M5

For the purpose of the application of the present point, M 1 and N 1 vehicles are those defined in Part A of Annex II to Council Directive 70/156/EEC ⁽¹⁾. For those vehicles that are equipped with tachographs in compliance with the Regulation and are not designed to install an armoured cable between the distance and speed sensors and the recording equipment, then an adaptor shall be fitted as close as possible to the distance and speed sensors.

The armoured cable shall be fitted from the adaptor to the recording equipment.

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VI. CHECKS AND INSPECTIONS

The Member States shall nominate the bodies which shall carry out the checks and inspections.

⁽¹⁾ OJ No L 42, 23. 2. 1970, p. 1.

▼B1. *Certification of new or repaired instruments*

Every individual device, whether new or repaired, shall be certified in respect of its correct operation and the accuracy of its readings and recordings, within the limits laid down in Chapter III (f) 1, by means of sealing in accordance with Chapter V (4) (f).

For this purpose the Member States may stipulate an initial verification, consisting of a check on and confirmation of the conformity of a new or repaired device with the type-approved model and/or with the requirements of the Regulation and its Annexes, or may delegate the power to certify to the manufacturers or to their authorized agents.

2. *Installation*

When being fitted to a vehicle, the equipment and the whole installation must comply with the provisions relating to maximum tolerances laid down in Chapter III (f) 2.

The inspection tests shall be carried out by the approved fitter or workshop on his or its responsibility.

3. *Periodic inspections*

(a) Periodic inspections of the equipment fitted to vehicles shall take place at least every two years and may be carried out in conjunction with roadworthiness tests of vehicles.

These inspections shall include the following checks:

- that the equipment is working correctly,
- that the equipment carries the type approval mark,
- that the installation plaque is affixed,
- that the seals on the equipment and on the other parts of the installation are intact,
- the actual circumference of the tyres.

(b) An inspection to ensure compliance with the provision of Chapter III (f) 3 on the maximum tolerances in use shall be carried out at least once every six years, although each Member State may stipulate a shorter interval or such inspection in respect of vehicles registered in its territory. Such inspections must include replacement of the installation plaque.

4. *Measurement of errors*

The measurement of errors on installation and during use shall be carried out under the following conditions, which are to be regarded as constituting standard test conditions:

- vehicle unladen, in normal running, order
- tyre pressures in accordance with the manufacturer's instructions,
- tyre wear within the limits allowed by law,
- movement of the vehicle: the vehicle must proceed, driven by its own engine, in a straight line and on a level surface, at a speed of 50 ± 5 km/h; provided that it is of comparable accuracy, the test may also be carried out on an appropriate test bench.

▼ **M6**

ANNEX I(B)

**REQUIREMENTS FOR CONSTRUCTION, TESTING, INSTALLATION,
AND INSPECTION**

I. DEFINITIONS

In this Annex:

- (a) **‘recording equipment’ means:**
the total equipment intended for installation in road vehicles to show, record and store automatically or semi-automatically details of the movement of such vehicles and of certain work periods of their drivers. This equipment includes cables, sensors, an electronic driver information device, one (two) card reader(s) for the insertion of one or two driver memory card(s), an integrated or separate printer, display instruments, facilities for downloading the data memory, facilities to display or print information on demand and facilities for the input of the places where the daily work period begins and ends;
- (b) **‘data memory’ means:**
an electronic storage system built into the recording equipment, capable of storing at least 365 calendar days from the recording equipment. The memory should be protected in such a way as to prevent unauthorised access to and manipulation of the data and detect any such attempt;
- (c) **‘driver card (with memory)’ means:**
a removable information transfer and storage device allocated by the authorities of the Member States to each individual driver for the purposes of identification of the driver and storage of essential data. The format and technical specifications of the driver card (with memory) shall meet the requirements laid down in Chapter IV of this Annex;
- (d) **‘the constant of the recording equipment’ means:**
the numerical characteristic giving the value of the input signal required to show and record a distance travelled of one kilometre; this constant must be expressed either in revolutions per kilometre ($k = \dots \text{ rev/km}$) or in impulses per kilometre ($k = \dots \text{ imp/km}$);
- (e) **‘characteristic coefficient of the vehicle’ means:**
the numerical characteristic giving the value of the output signal emitted by the part of the vehicle linking it with the recording equipment (gearbox output shaft or axle) while the vehicle travels a distance of one kilometre under normal test conditions (see Chapter VII(e)). The characteristic coefficient is expressed either in revolutions per kilometre ($w = \dots \text{ rev/km}$) or in impulses per kilometre ($w = \dots \text{ imp/km}$);
- (f) **‘effective circumference of the wheel tyres’ means:**
the average of the distances travelled by each of the wheels moving the vehicle (driving wheels) in the course of one complete rotation. The measurement of these distances must be made under normal test conditions (see Chapter VII(e)) and is expressed in the form ‘ $l = \dots \text{ mm}$ ’; where appropriate measurement of these distances may be based on a theoretical calculation which takes into account the distribution of the maximum authorised weight on the axles;
- (g) **‘test station card’ means:**
a removable data transfer and storage device for use in the card reader of the recording equipment, issued by the authorities of the Member States to their authorised bodies. The test station card identifies the body and allows for testing, calibration and programming of the recording equipment;
- (h) **‘control card’ means:**
a removable data transfer and storage device for use in the card reader of the recording equipment, issued by the authorities of the Member States to competent authorities to get access to the data stored in the data memory or in the driver cards for reading, printing and/or downloading;
- (i) **‘company data card’ means:**
a removable data transfer and storage device issued by the Member State's authorities to the owner of vehicles fitted with recording equipment.
The company data card allows for displaying, downloading and printing of the data stored in the (item of) recording equipment fitted in the company's vehicle(s);

▼M6**(j) 'calendar day' means:**

a day ranging from 00.00 hours to 24.00 hours. All calendar days relate to UTC time (universal time coordinated);

(k) 'downloading' means:

copy of a part or of a complete set of data stored in the data memory of the vehicle or in the memory of the driver card.

Downloading may not alter or delete any stored data.

Downloaded data are protected in such a way as to make attempts to data manipulation detectable; origin of downloaded data must be authenticatable.

Downloaded data are kept in a format that can be used by any authorised person;

(l) 'vehicle identification' means:

number(s) identifying the vehicle on the basis of its VIN and/or its VRN.

II. GENERAL CHARACTERISTICS AND FUNCTIONS OF RECORDING EQUIPMENT

The equipment must be able to record, store, display and print the following:

(a) recording and storing in the data memory

1. distance travelled by the vehicle with an accuracy of 1 km;
2. speed of the vehicle;
- 2.1. momentary speed of the vehicle at a frequency of 1 s for the last 24 hours of use of the vehicle;
- 2.2. exceeding the authorised speed of the vehicle, defined as any period of more than 1 minute during which the vehicle speed exceeds 90 km/h for N_3 vehicles or 105 km/h for M_3 vehicles (with time, date, maximum speed of the overspeeding, average speed during the period concerned);
3. periods of driving time (times and dates), with an accuracy of 1 minute;
4. other periods of work or of availability (times and dates) with an accuracy of 1 minute;
5. breaks from work and daily rest periods (times and dates) with an accuracy of 1 minute;
6. for electronic recording equipment which is equipment operated by signals transmitted electrically from the distance and speed sensor, any interruption exceeding 100 milliseconds in the power supply of the recording equipment (except lighting), in the power supply of the distance and speed sensor and any interruption in the signal lead to the distance and speed sensor, with date, time, duration and driver card issue number;
7. the driver card issue number with times and dates of insertion and removal;
8. for each driver card that is inserted for the first time after it was used in another item of recording equipment:
 - current driving time since the last break or rest period,
 - driving time for the day after the last rest period of at least eight hours,
 - driving times for the day between two rest periods of at least eight hours for the preceding 27 calendar days with date, time and duration,
 - total of the driving times for the current week and the preceding week and the total of the driving times of the two completed preceding weeks,
 - rest periods of at least eight hours' duration for the day and the preceding 27 calendar days in each case with date, time and duration,
 - the VRN of the vehicles driven;
9. date, time and duration of driving without an inserted or a functioning driver card;

▼M6

10. data recorded on the places at which the daily work period began and ended;
11. automatically identifiable system faults of the recording equipment with date, time and driver card issue number;
12. faults in the driver card with date and time and driver card issue number;
13. workshop card number of the authorised fitter or workshop with date of at least the last installation inspection and/or periodic inspection of the recording equipment in accordance with Chapter VII(c) and (d);
14. control card number with date of control card insertion and type of control (display, printing, downloading). In case of downloading, period downloaded should be recorded;
15. time adjustment with date, time and card issue number;
16. driving status (single/crew driving — driver/co-driver);

(b) storing on the driver card

1. the essential data for the periods listed under point (a)(3), (4) and (5) for a period of at least the last 28 calendar days combined with the 'VRN' identification of the vehicle driven and the data under point (a)(10), (14) and (16);
2. the events and faults according to point (a)(6), (11) and (15) with the 'VRN' identification of the vehicle driven;
 - 2.1. date and time of insertion and removal of the driver card and distance travelled during the corresponding period;
 - 2.2. date and time of insertion and removal of the co-driver card with issue number;
3. data must be recorded and stored on the driver card in such a way as to rule out any possibility of falsification;

(c) recording and storing in the case of two drivers

for vehicles used by two drivers the driving time listed under point (a)(3) must be recorded and stored on the driver card of the driver who is driving the vehicle. The equipment must record and store in the data memory and on the two driver cards simultaneously but distinctly details of the information listed under point (a)(4) and (5);

(d) displaying or printing on request for an authorised user

1. driver card issue number, expiry date of the card;
2. the surname and first name of the driver who is the cardholder;
3. current driving time since the last break or rest period;
4. driving time for the day after the last rest period of at least eight hours;
5. driving times for the day between two rest periods of at least eight hours for the preceding 27 calendar days on which the driver has driven, with date, time and duration;
6. total of the driving times for the current week and the preceding week and the total times for the two completed preceding weeks;
7. the other periods of work and availability;
8. rest periods of at least eight hours' duration for the day and the preceding 27 days in each case with date, time and duration;
9. 'VRN' identification of vehicles driven for at least the last 28 calendar days with the distance travelled per vehicle and day, time of first insertion and last removal of the driver card and the time of change of vehicle;
10. time adjustment with date, time and card issue number;
11. interruption of power supply to the recording equipment with date, time, duration and driver card issue number (as defined in point (a)(6));
12. sensor interruption with date, time, duration and driver card issue number (as defined in point (a)(6));

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13. the 'VIN' and/or 'VRN' identification of the vehicle driven;
14. driving without driver card as defined in point (a)(9) for the last 28 calendar days;
15. details of the information stored concerning the driver (as defined in point (c));
16. recorded data on the places where the daily work period began and ended;
17. the automatically identifiable system faults of the recording equipment with date, time and driver card issue number;
18. the faults in the driver card with date and time and driver card issue number;
19. control card number with date of control card insertion and type of control (display, printing, downloading). In the case of downloading, period downloaded should be recorded;
20. exceeding the authorised speed as defined in point (a)(2.2), with date, time and driver card issue number for the current week and in any case including the last day of the previous week;
21. summary reports whereby compliance with Regulations (EEC) No 3820/85 and (EEC) No 3821/85 and Directive 88/599/EEC can be checked.

III. CONSTRUCTION AND FUNCTIONAL REQUIREMENTS FOR RECORDING EQUIPMENT

(a) General points

- 1.1. Any inclusion in or connection to the recording equipment of any device, or devices, approved or otherwise, must not interfere with, or be capable of interfering with, the proper operation of the recording equipment. The recording equipment must be submitted for approval complete with any such included devices.
- 1.2. The recording equipment must be capable of operating correctly in all the climatic conditions normally encountered in Community territory.
2. *Materials*
 - 2.1. All the constituent parts of the recording equipment must be made of materials of sufficient stability and mechanical strength and with stable electrical and magnetic characteristics.
 - 2.2. Any modification in a constituent part of the equipment or in the nature of the materials used for its manufacture must, before being used, be submitted for approval to the authority which granted type-approval for the recording equipment.
3. *Measurement of distance travelled*

The distance travelled may be measured and recorded either:

 - so as to include both forward and reverse movements, or
 - so as to include only forward movement.

Any recording of reversing movements must on no account affect the clarity and accuracy of the other recordings.
4. *Measurement of speed*
 - 4.1. The range of speed measurement must be as stated in the type-approval certificate.
 - 4.2. The natural frequency and the damping of the measuring device must be such that the instruments showing and recording the speed can, within the range of measurements, follow acceleration changes of up to 2 m/s², within the limits of accepted tolerances.
5. *Measurement of time (clock)*

Time is digital. Update is performed (if necessary) at the authorised workshop. The internal clock time is UTC. The driver can change the offset of the time displayed on the display screen.

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- 5.1. The measurement of time is effected automatically in the recording equipment.
- 5.2. The clock time in the memory can be reset only when an authorised workshop card is inserted.
6. *Lighting and protection*
 - 6.1. The visual instruments of the equipment must be provided with adequate non-dazzling lighting.
 - 6.2. For normal conditions of use, all the internal parts of the equipment must be protected against damp and dust. In addition, they must be made tamper-proof by means of casings capable of being sealed.
 - 6.3. Protection against electrical interference and magnetic fields must be provided complying with standards for electronics in vehicles.
 - 6.4. The cables connecting the recording equipment to the transmitter must be protected by electronic monitoring, such as signal encryption, capable of detecting the presence within that part of the system of any device, not otherwise necessary for the correct operation of the recording equipment, which is capable of preventing the accurate operation of the recording equipment by any short circuit, interruption or modification of the electronic data from the speed and distance sensor, or by the duplication of any other approved devices, when that device is connected and put into operation.
 - 6.5. The total system, including the connections to the speed and distance sensor must be tamper-proof.
 - 6.6. The recording equipment must self-detect faults.

(b) Visual instruments

Indications must be visible from outside the recording equipment and give a clear, plain and unambiguous reading including where there are two drivers.

The display instrument must enable the information referred to in Chapter II(d) to be displayed on request. The request can take place selectively or sequentially.

(c) Warning signals

1. A warning to the driver of at least 30 seconds if the vehicle is driven:
 - without the driver card in place,
 - with a malfunctioning card,
 - with the driver card in the wrong slot,
 - when the recording equipment has detected one or more cases of internal malfunctioning, in particular those referred to in Chapter II(d)(17) and (18),
 - above the speed limit as defined in Chapter II(a)(2.2).
2. A warning to the driver before exceeding four and a half hours driving time per period of driving time and nine hours daily driving time, 15 minutes before and at the time of exceeding the limit.
3. A warning to the driver, 15 minutes before and at the time of failing to observe the required eight hours daily rest period within the last 24 hours.
4. Additional warnings may be installed at the request of the vehicle owner.
5. *Format of the warnings*

Warnings may be either auditory or visual, or a combination of both and must be clearly recognisable by the user.

(d) Memory

1. The periods of time referred to in Chapter II(a)(3), (4) and (5) must be stored whenever there is any change of activity or status.
2. The period of driving time must always be stored automatically when the vehicle is in motion.

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3. The other periods of time as indicated in Article 15(3), second indent (b), (c) and (d) of the Regulation must always be stored separately through the operation where necessary of an activity selection device.

(e) Markings

1. The following details must appear on the instrument face of the recording equipment:
 - near the figure indicating the distance, the unit of measurement of distance, indicated by the abbreviation 'km',
 - near the figure showing the speed, the entry 'km/h'.
2. The descriptive plaque must be visible on the recording equipment and must show the following details:
 - name and address of the manufacturer of the equipment,
 - manufacturer's number and year of manufacture of the equipment,
 - approval mark for the recording equipment type,
 - the constant of the recording equipment in the form 'k = ... rev/km' or 'k = ... imp/km',
 - optionally, the range of speed measurements, in the form indicated in 1.

This information may also be shown on demand by the recording equipment.

(f) Maximum tolerances (display and recording instruments)

1. The maximum tolerances relate to distance travelled, speed and time and are measured on the dynamometer before installation and, under the circumstances referred to in Chapter VII, on installation, during periodic inspection and in use.
2. The maximum tolerances set out in 1 are valid for extreme temperatures corresponding to climatic conditions normally encountered in Community territory.

IV. CARDS WITH MEMORY

A. DRIVER CARD (WITH MEMORY)

1. **Insertion/removal**

The recording equipment must be so designed that the driver card (with memory) is locked in position on its proper insertion into the card reader and that the relevant driver card data are automatically stored in the data memory of the recording equipment. The release of the driver card may function only when the vehicle is stationary and after the relevant data have been stored on the driver card.

2. **Memory capacity of the driver card**

The capacity of the driver card must be sufficient to store at least 28 calendar days of data referred to in Chapter II(c) for the actual driver. Should the data card be full the new data will replace the oldest data.

3. **Visible data**

Page 1 will contain:

- (a) the words 'Driver card' printed in large type in the official language or languages of the Member State issuing the card;

'Driver card' in the other official languages of the Community, printed to form the background of the licence:

es:	TARJETA DEL CONDUCTOR
dk:	FØRERKORT
de:	FAHRERKARTE
el:	ΚΑΡΤΑ ΟΔΗΓΟΥ
en:	DRIVER CARD
fr:	CARTE DE CONDUCTEUR
ga:	CÁRTA TIOMÁNAÍ
it:	CARTA DEL CONDUCENTE

▼ **M6**

nl:	BESTUURDESKAART
pt:	CARTÃO DE CONDUTOR
fi:	KULJETTAJAKORTTI
sv:	FÖRARKORT;

- (b) the name of the Member States issuing the card (optional);
- (c) the distinguishing sign of the Member States issuing the card, printed in negative in a blue rectangle and encircled by 12 yellow stars; the distinguishing signs shall be as follows:

B	Belgium
DK	Denmark
D	Germany
GR	Greece
E	Spain
F	France
IRL	Ireland
I	Italy
L	Luxembourg
NL	The Netherlands
A	Austria
P	Portugal
FIN	Finland
S	Sweden
UK	The United Kingdom

- (d) information specific to the card issued, numbered as follows:
1. surname of the holder;
 2. first name(s) of the holder;
 3. date and place of birth;
 4. (a) date of issue of the card;
 - (b) date of expiry of the card;
 - (c) the name of the issuing authority (may be printed on page 2);
 - (d) a different number from the one under heading 5, for administrative purposes (optional);
 5. (a) driving licence number including number of replacement issue;
 - (b) driver card issue number including index number of replacement issue;
 6. photograph of the holder;
 7. signature of the holder;
 8. normal place of residence, or postal address of the holder (optional).

The data referred to in 1, 2, 3, 4(b) and 5(a) and (b) will also be stored in the driver card memory.



Page 2 will contain:

- (a) an explanation of the numbered items which appear on pages 1 and 2 of the card;
- (b) with the specific written agreement of the holder, information which is not related to the administration of the driver card may also be added, such addition will not alter in any way the use of the model as a driver card.





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COMMUNITY MODEL DRIVER CARD

Page 1 Page 2

<div style="border: 1px solid black; padding: 5px;"> <div style="display: flex; justify-content: space-between; align-items: center;"> <div style="text-align: center;">  <p>DRIVER CARD</p> </div> <div style="text-align: right;"> <p>MEMBER STATE</p> </div> </div> <ol style="list-style-type: none"> 1. 2. 3. 4a. 4c. 4b. (4d.) 5a. 5b. 7. <div style="border: 1px solid black; width: 60px; height: 40px; margin: 5px 0;">6.</div> <p style="text-align: right;">(8.)</p> </div>	<div style="border: 1px solid black; padding: 5px;"> <div style="display: flex; align-items: center;">  <ol style="list-style-type: none"> 1. Surname 2. Name 3. Date and place of birth 4a. Card issuing date 4b. Administrative expiry date of card 4c. Issuing authority (4d.) No for national administrative purposes 5a. Driving licence number 5b. Driver card number 6. Photograph 7. Signature (8.) Address </div> <p style="text-align: center; font-size: small;">Please return to:</p> <div style="border: 1px solid black; padding: 2px; text-align: center; font-weight: bold;">NAME OF AUTHORITY AND ADDRESS</div> </div>
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SPECIMEN COMMUNITY MODEL DRIVER CARD: BELGIAN CARD
(For information)

<div style="border: 1px solid black; padding: 5px;"> <div style="display: flex; justify-content: space-between; align-items: center;"> <div style="text-align: center;">  <p>BESTUURERSKAART</p> </div> <div style="text-align: right;"> <p>KONINKRIJK BELGIË</p> </div> </div> <ol style="list-style-type: none"> 1. Ruyter 2. Georges 3. 01.04.73 Milano 4a. 01.07.98 4c. B-9000 Gent 4b. 30.06.03 5a. DA 003 360 5b. 11 ABC 334455 7.  <div style="border: 1px solid black; width: 60px; height: 40px; margin: 5px 0;">6. FOTO</div> </div>	<div style="border: 1px solid black; padding: 5px;"> <div style="display: flex; justify-content: space-between; align-items: center;"> <div style="text-align: center;">  <p>CARTE DE CONDUCTEUR</p> </div> <div style="text-align: right;"> <p>ROYAUME DE BELGIQUE</p> </div> </div> <ol style="list-style-type: none"> 1. Jeanneaux 2. Herald 3. 01.03.74 B-7000 Mons 4a. 01.09.98 4c. B-1180 Uccle 4b. 30.08.03 5a. DB 004 380 5b. 11 ABD 223344 7.  <div style="border: 1px solid black; width: 60px; height: 40px; margin: 5px 0;">6. PHOTO</div> </div>
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4. **Standards**

The driver card and recording equipment must conform to the following standards:

- ISO 7810,
- ISO 7816-1,
- ISO 7816-2,
- ISO 7816-3,
- draft ISO 7816-4,
- draft ISO 10373,
- the detailed functional specifications defined within systems of identification cards intended for use in surface transport.

5. **Security, including data protection**

The various components of the driver card are intended to exclude any falsification or tampering and to detect any attempt of that kind.

6. **Temperature range**

The driver card must be capable of operating correctly in all the climatic conditions normally encountered in Community territory.

7. **Lifetime**

The card must be capable of operating correctly for a five-year period if used within the environmental and electrical specifications.

▼M6**8. Electrical characteristics**

The electrical characteristics of the card must correspond to the specifications applicable to electronics in vehicles.

9. Logical structure of the driver card

The logical structure of the card must be defined in such a way as to guarantee its proper operation and its compatibility with any recording equipment complying with this Annex.

10. Functions and commands

The card's functions and commands must cover all the functions referred to in Chapter I(c) and Chapter II(b).

11. Elementary files

The specifications of elementary files must be within the framework of the standards referred to in 4.

12. Special provisions

After consulting the Commission, Member States may add colours or markings, such as national symbols and security features, without prejudice to the other provisions of this Annex.

B. TEST STATION CARD (WITH MEMORY), CONTROL CARD (WITH MEMORY) AND COMPANY DATA CARD (WITH MEMORY)

The specifications of the test station, control and company data cards (with memory) must be such that they operate correctly when used as provided for in Chapter I(g), (h) and (i) and are compatible with any recording equipment complying with this Annex. The structure of the cards must be so designed as to give access only to the authorised user and only for the exercise of the functions which each card is intended to fulfil.

V. PRINTER AND STANDARD PRINT-OUTS

1. Printers must be so designed as to produce the print-outs referred to in Chapter II(d) with a degree of definition likely to avoid any ambiguity when they are read. Print-outs must remain clearly legible and identifiable under normal conditions of storage for at least one year.

They must retain their dimensions and recordings under normal conditions of humidity and temperature.

It must also be possible to add handwritten notes, such as the driver's signature, to these documents.

2. The minimum capacity of print-outs, whatever their form, must be sufficient to allow the printing of the information referred to in Chapter II(d).

If several print-outs have to be linked together to increase printing capacity, the links between the various documents must be made in such a way that there are no breaks in the data at the points linked which could jeopardise interpretation of the data.

VI. INSTALLATION OF RECORDING EQUIPMENT**(a) Installation**

1. The recording equipment must be protected against accidental damage.
2. It must be possible for authorised agents to adapt the constant of the recording equipment to the characteristic coefficient of the vehicle by means of a suitable device, to be known as an adaptor.

Vehicles with two or more axle ratios must be fitted with a switch device whereby these various ratios will automatically be brought into line with the ratio for which the equipment has been adapted to the vehicle by the adaptor.

(b) Installation plaque

After the equipment has been checked on installation, an installation plaque which is clearly visible must be affixed on, in or beside the equipment. After every inspection by an approved fitter or workshop requiring a change in the

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calibration of the installation, a new plaque must be affixed in place of the previous one.

The plaque must bear at least the following details:

- name, address or trade name of the approved fitter or workshop,
- characteristic coefficient of the vehicle, in the form 'w = ... rev/km' or 'w = ... imp/km',
- effective circumference of the wheel tyres in the form 'l = ... mm',
- the date on which the characteristic coefficient of the vehicle was determined and the effective circumference of the wheel tyres measured,
- the last eight digits of the chassis number of the vehicle.

(c) Sealing

1. The following parts must be sealed:
 - (a) any connection which, if disconnected, would cause undetectable alterations to be made or data to be lost;
 - (b) any cover giving access to the circuits or mechanisms, any alteration of which would affect the proper operation of the recording equipment or which would allow unauthorised alteration of the equipment's characteristics;
 - (c) the installation plaque, unless it is attached in such a way that it cannot be removed without the markings thereon being destroyed.
2. In all cases, the location of the seals must be mentioned on the type-approval certificate and their effectiveness tested as part of the type-approval procedures.
3. The seals mentioned in 1(b) may be removed:
 - in case of emergency,
 - to install, to adjust or to repair a speed limitation device or any other device contributing to road safety, provided that the recording equipment continues to function reliably and correctly and is resealed by an approved fitter or workshop (in accordance with Chapter VII) immediately after fitting the speed limitation device or any other device contributing to road safety or within seven days in other cases.

On each occasion that these seals are broken a written statement giving the reasons for such action must be prepared and made available to the competent authority.

VII. CHECKS AND INSPECTIONS**(a) Approval of test stations (fitters and workshops)**

The Member States will nominate the bodies to carry out the checks and inspections.

(b) Certification of new or repaired instruments

Every individual device, whether new or repaired, must be certified in respect of its proper operation and the accuracy of its readings and recordings, within the limits laid down in Chapter III(f)(1) by means of sealing in accordance with Chapter VI(c)(1) or equivalent digital information in the data memory of the recording equipment.

(c) Installation inspection and programming

1. When being fitted to a vehicle, the recording equipment and the whole installation must comply with the provisions relating to maximum tolerances laid down in Chapter III(f)(2).
2. The following programming of the recording equipment must be carried out:
 - the date of the installation test,
 - the universal time coordinated (UTC),
 - the 'VIN' and 'VRN' vehicle identification,
 - the number of the workshop card of the approved fitter or approved workshop.

(d) Periodic inspections

1. Periodic inspections of the equipment fitted to vehicles must take place after any repair of the equipment or after any alteration of the

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characteristic coefficient of the vehicle or of the effective circumference of the tyres or at least once within two years of the last inspection; they may be carried out in conjunction with roadworthiness tests on vehicles.

These inspections must include at least the following checks:

- that the recording equipment is working properly, including the downloading of data to and from the workshop card,
 - that compliance with the provisions of Chapter III(f)(2) on the maximum tolerances on installation is ensured,
 - that the recording equipment carries the type-approval mark,
 - that the installation plaque is affixed,
 - that the seals on the equipment and on the other parts of the installation are intact,
 - the actual circumference of the tyres.
2. The following programming of the recording equipment must be carried out:
- the date of the periodic inspection,
 - the universal time coordinated (UTC),
 - the 'VIN' and 'VRN' vehicle identification,
 - the number of the card of the approved workshop.
3. Such inspections must include replacement of the installation plaque or equivalent digital information in the data memory of the recording equipment.

(e) Measurement of errors

The measurement of errors on installation and during use must be carried out under the following conditions, which are to be regarded as constituting standard test conditions:

- vehicle unladen, in normal running order,
- tyre pressures in accordance with the manufacturer's instructions,
- tyre wear within the limits allowed by national law,
- vehicle movement: the vehicle must advance under its own engine power in a straight line on level ground and at a speed of 50 ± 5 km/h. The measuring distance must be at least 1 000 m,
- provided that it is of comparable accuracy, an appropriate dynamometer may also be used for the test.

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ANNEX II

APPROVAL MARK AND CERTIFICATE

I. APPROVAL MARK

1. The approval mark shall be made up of:

- a rectangle, within which shall be placed the letter 'e' followed by a distinguishing number or letter for the country which has issued the approval in accordance with the following conventional signs:

Belgium	6,
Denmark	18,
Germany	1,
Greece	GR,
Spain	9,
France	2,
Ireland	IRL,
Italy	3,
Luxembourg	13,
Netherlands	4,
Portugal	21,
United Kingdom	11,

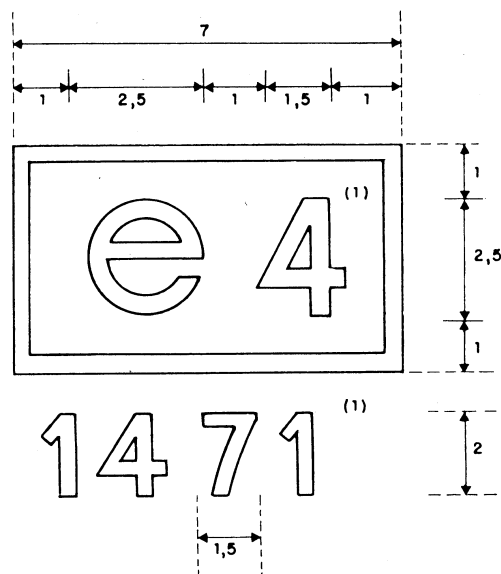
▼A1

Austria	12,
Finland	17,
Sweden	5,

▼B

and

- an approval number corresponding to the number of the approval certificate drawn up for prototype of the recording equipment or the record sheet, placed at any point within the immediate proximity of this rectangle.
2. The approval mark shall be shown on the descriptive plaque of each set of equipment and on each record sheet. It must be indelible and must always remain clearly legible.
3. The dimensions of the approval mark drawn below are expressed in millimetres, these dimensions being minima. The ratios between the dimensions must be maintained.



(1) These figures are shown for guidance only.

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II. APPROVAL CERTIFICATE

A State having granted approval shall issue the applicant with an approval certificate, the model for which is given below. When informing other Member States of approvals issued or, if the occasion should arise, withdrawn, a Member State shall use copies of that certificate.

APPROVAL CERTIFICATE

Name of competent administration

Notification concerning (1):

- approval of a type of recording equipment
 - withdrawal of approval of a type of recording equipment
 - approval of a model record sheet
 - withdrawal of approval of a record sheet
-

Approval No

1. Trade mark or name

2. Name of type or model

3. Name of manufacturer

4. Address of manufacturer

5. Submitted for approval on

6. Tested at

7. Date and number of test report

8. Date of approval

9. Date of withdrawal of approval

10. Type or types of recording equipment in which sheet is designed to be used

11. Place

12. Date

13. Descriptive documents annexed

14. Remarks

.....
(Signature)

(1) Delete items not applicable.