

COMMISSION

COMMISSION DECISION of 23 January 2002

concerning draft national provisions notified by the Kingdom of the Netherlands under Article 95(5) of the EC Treaty on limitations on the marketing and use of creosote-treated wood

(notified under document number C(2002) 97)

(Only the Dutch text is authentic)

(Text with EEA relevance)

(2002/59/EC)

THE COMMISSION OF THE EUROPEAN COMMUNITIES,

Having regard to the Treaty establishing the European Community, and in particular Article 95(6) thereof,

Whereas:

I. FACTS

1. COMMUNITY LEGISLATION

- (1) Council Directive 76/769/EEC of 27 July 1976 on the approximation of the laws, regulations and administrative provisions of the Member States relating to restrictions on the marketing and use of certain dangerous substances and preparations ⁽¹⁾, as last amended by Commission Directive 2001/90/EC ⁽²⁾, provides for the prohibition and restriction of the use of certain dangerous substances and preparations. Directive 76/769/EEC is regularly amended to include in its Annex additional substances which are dangerous to man and the environment.
- (2) European Parliament and Council Directive 94/60/EC ⁽³⁾ amended Directive 76/769/EEC to harmonise amongst other things the use and marketing of creosote and similar coal tar distillates, as well as preparations containing them, by limiting the content of one specific component, Benzo[a]pyrene (hereinafter B[a]P), and water extractable phenols when used for wood treatment (point 32 in the Annex to Directive 94/60/EC). The limit for B[a]P is fixed at a maximum of 0,005 % by mass (= 50 ppm) and the limit for water extractable phenols is fixed at a maximum of 3 % by mass (= 30 g/kg). Wood treated with creosote or preparations containing creosote not respecting those limits may not be placed on the market.
- (3) However, by derogation, Directive 94/60/EC allows for the use of creosote and preparations containing creosote with up to 0,05 % B[a]P by mass (= 500 ppm) and water extractable phenols up to 3 % by mass (= 30 g/kg) for wood treatment in industrial installations. Such products may not be sold to the general public and containers have to be labelled with the phrase 'For use in industrial installations only'. Wood treated this way and placed on the market for the first time can only be used in industrial and professional applications, e.g. on railways, in electric power transmission and telecommunications, for fencing and in harbours and waterways, except in certain cases

⁽¹⁾ OJ L 262, 27.9.1976, p. 201.

⁽²⁾ OJ L 283, 27.10.2001, p. 41.

⁽³⁾ OJ L 365, 31.12.1994, p. 1.

where its use is excluded, e.g. inside buildings, in contact with products intended for human or animal consumption, in playgrounds and in other outdoor places for public pleasure or where there is a risk for contact with skin. Old treated wood commercialised for a second time can be used irrespective of the creosote-type applied except in the cases mentioned before.

- (4) On 26 October 2001, Directive 2001/90/EC adapting to technical progress for the seventh time Annex I to Directive 76/769/EEC on the approximation of the laws, regulations and administrative provisions of the Member States relating to restrictions on the marketing and use of certain dangerous substances and preparations was adopted.
- (5) According to the amended provisions, creosote may not be used in the treatment of wood and wood so treated may not be placed on the market. However by way of derogation, creosote may be used for wood treatment in industrial installations or by professional for *in-situ* retreatment only if they contain B[a]P at a concentration of less than 0,005 by mass and water extractable phenols at a concentration of less than 3 % by mass. Such substances and preparations may not be sold to consumers and may be placed on the market only in packaging of a capacity equal to or greater than 20 litres. The packaging has to be labelled with the phrase 'For use in industrial installations or professional treatment only'.
- (6) Wood treated this way or retreated *in-situ* is permitted for professional and industrial use only e.g. on railways, in electric power transmission and telecommunications, for fencing, for agricultural purposes and in harbours and waterways. Use is prohibited inside buildings, in playgrounds, in parks, in gardens and outdoor recreational and leisure facilities where there is a risk of frequent skin contact and in garden furniture or in contact with products intended for human or animal consumption. Wood that has been treated with creosote before the Directive applies may be placed on the second-hand market for reuse, except in the cases mentioned before.

2. EXISTING NATIONAL PROVISIONS APPROVED BY THE COMMISSION UNDER ARTICLE 95(4) OF THE TREATY

- (7) The Netherlands already obtained a derogation from the Commission to maintain national provisions incompatible with Directive 94/60/EC. The relevant request under Article 95(4) [ex-Article 100a(4)] received approval in Commission Decision 1999/832/EC ⁽⁴⁾.
- (8) The differences between Directive 94/60/EC and the national provisions in the Netherlands that were approved through the Commission Decision is summarised in the following table:

	Directive 94/60/EC	Existing Dutch legislation
B[a]P < 50 ppm	No restrictions on sale or use of creosote or new treated wood.	<p><i>Carbolineum</i>: No restrictions on sale. Private use only for treating wood. Explicit restrictions on use of treated wood. It may not be used:</p> <ul style="list-style-type: none"> — on toys; — inside buildings (used by humans or animals); — in spaces for storage of foodstuff; — in green- or glasshouses. <p><i>Creosote</i>: Permitted only for industrial use in special installations for treating wood by the vacuum and pressure method for:</p> <ul style="list-style-type: none"> — railway sleepers; — telephone and electricity poles; — excavation, road and water works; — fencing.

⁽⁴⁾ OJ L 329, 22.12.1999, p. 25.

	Directive 94/60/EC	Existing Dutch legislation
B[a]P < 50-500 ppm	<p>Restrictions on sale of creosote:</p> <ul style="list-style-type: none"> — no sale to private consumers; — use only permitted in industrial installations. Minimum drum size 200 l. Special labelling required. <p>Creosoted wood may only be used for professional and industrial applications:</p> <ul style="list-style-type: none"> — railways; — electricity poles; — fencing; — harbours and waterways. <p>Explicit restrictions on treated wood. It may not be used:</p> <ul style="list-style-type: none"> — inside buildings; — in contact with foodstuff; — for containers for growing purposes; — at playgrounds or other sites at risk of skin contact. 	Sale and use of creosote and treated products totally banned.
B[a]P > 500 ppm	Sale and use of creosote and treated products totally banned.	Sale and use of creosote and treated products totally banned.
Old treated wood	Use controlled as for wood treated with creosote containing B[a]P between 50 and 500 ppm.	No other regulations than for newly treated wood.

(9) In summary, the existing Dutch provisions are more restrictive than those contained in Directive 94/60/EC in several aspects:

- the B[a]P content of creosote is not permitted in the range of 50 to 500 ppm for the use in industrial installations;
- wood preservation has to be performed according to a specific technique (pressure/vacuum) in special installations;
- in certain cases, the use of creosote is excluded for wood preservation, even if its B[a]P content is below 50 ppm.

3. ENVISAGED NATIONAL PROVISIONS

(10) The Netherlands intend to adopt new national provisions going beyond the measures provided for under Directive 94/60/EC by amending the Decision on Coatings Containing Polycyclic Aromatic Hydrocarbons (Besluit PAK-houdende coatings) under the Chemical Substances Act (creosote-treated wood).

(11) Article 8a under a new Section 4a of the draft above legislation, provides that 'as from the date to be determined by Royal Decree, it shall be prohibited to import into the Netherlands, to use, or to supply to others, or to keep available for sale on the Dutch market, creosote-

treated wood for applications involving contact with surface water and groundwater'.

(12) The ban does not apply to creosote-treated wood which was put to use in its application before a point in time to be determined by Royal Decree, so long as the existing place of application is retained. Two other exceptions concern creosote-treated wood which:

- has been placed under a customs procedure and is intended for customs transit, placement in a customs warehouse or for temporary admission, in accordance with the provisions of Article 4(16) of Council Regulation (EEC) No 2913/92;
- originating from a Member State of the European Union, or an EEA State and is not intended for sale on the Dutch market.

(13) Article 8b of the draft Decision requires that anyone who imports, supplies, or keeps available for sale on the market, creosote-treated wood that does not come under the ban, keeps a record of that wood and show on demand that the creosote-treated wood in question is not intended for applications to which the ban relates. The record includes, at least:

- the name and address of the manufacturer or supplier from whom the creosote-treated wood was purchased;

- the date on which the creosote-treated wood was delivered by the manufacturer or supplier;
- the field of application for the creosote-treated wood;
- the name and address of the person to whom the creosote-treated wood was made available or delivered;
- the date of delivery of the creosote-treated wood;
- the quantity of creosote-treated wood received or delivered.

II. PROCEDURE

(14) Directive 94/60/EC was adopted on 20 December 1994. Member States had to adopt the measures necessary to comply with it no later than one year after its adoption, i.e. 20 December 1995, and to apply them from 20 June 1996.

(15) As indicated above, the Netherlands obtained approval through Decision 1999/832/EC to maintain existing national provisions on the use of creosote being more restrictive than Directive 94/60/EC.

(16) By letter of 23 January 2001, the Dutch Permanent Representation notified the Commission that the Netherlands, in accordance with Article 95(5) of the EC Treaty, intended to introduce provisions regarding creosote-treated wood going beyond those provided for in Directive 94/60/EC. The Netherlands deem it necessary to introduce such national measures in order to protect the environment in connection with a specific problem that arose in the Netherlands after the adoption of Directive 94/60/EC.

(17) By letter of 22 February 2001, the Commission informed the Dutch authorities that it had received the notification under Article 95(5) and that the six months period for its examination according to Article 95(6) started on 26 January 2001, the day following the one when the notification was received.

(18) By letter of 17 April 2001, the Commission informed the other Member States about the request received from the Netherlands. The Commission also published a notice regarding the request in the *Official Journal of the European Communities* (⁵) in order to inform other interested parties of the draft national measures that the Netherlands intend to adopt.

(19) Considering that the justification of the Dutch notification appeared *prima facie* to be a complex matter and not to involve a danger to human health, the Commission asked the Scientific Committee on Toxicity, Ecotoxicity and the Environment (hereinafter referred as CSTEE) to give an opinion on these issues. On 12 June

2001 the CSTEE (⁶) confirmed that the justification of the Dutch request is a complex issue and does not directly involve a danger to human health.

(20) Based on the CSTEE's opinion, on 13 July 2001 the Commission adopted Decision 2001/599/EC (⁷) pursuant to the third subparagraph of Article 95(6) of the Treaty, whereby it extended the six-month period referred to in the second subparagraph of Article 95(6) within which a decision must be adopted for a further period of six months in order to allow for a thorough evaluation of all evidence submitted. This decision was notified to the Netherlands on 13 July 2001.

(21) The Commission subsequently asked the CSTEE to give an opinion on the substance of the justification provided by the Netherlands. More specifically, the CSTEE was asked to give an opinion on whether the Netherlands have provided new scientific evidence showing that the use of creosote-treated wood in contact with surface water and groundwater presents environmental risks and, in the affirmative, whether these risks are specific to the Netherlands. The CSTEE delivered its opinion on 30 October 2001 (⁸).

(22) As indicated above, the provisions of Directive 76/769/EEC relating to creosote and creosote-treated wood have been amended by Directive 2001/90/EC and shall be applied by the Member States by 30 June 2003.

III. ASSESSMENT

1. CONSIDERATION OF ADMISSIBILITY

(23) The notification submitted by the Dutch authorities on 25 January 2001 intends to obtain approval to introduce national provisions incompatible with Directive 94/60/EC, which constitutes a harmonisation measure adopted on the basis of Article 95 of the Treaty.

(24) Article 95(5) of the Treaty provides that if, after the adoption by the Council or by the Commission of a harmonisation measure, a Member State deems it necessary to introduce national provisions based on new scientific evidence relating to the protection of the environment or the working environment on grounds of a problem specific to that Member State arising after the adoption of the harmonisation measure, it shall notify the Commission of the envisaged provisions as well as the grounds for introducing them.

(25) When comparing the provisions of Directive 94/60/EC and those that the Netherlands intend to adopt, it emerges that the national provisions are more restrictive than those contained in the Directive in the following aspects:

- the placing on the market and use of creosote-treated wood for applications involving contact with (ground)water is prohibited irrespective of the concentration of B[a]P or water-soluble phenols in the creosote-based products used for the treatment;

(⁶) Opinion on creosote — Notification of the Netherlands made under Article 95(5) of the Treaty expressed at the 24th CSTEE plenary meeting, Brussels, 12 June 2001.

(⁷) OJ C 210, 3.8.2001, p. 46.

(⁸) Opinion on: Justification of the Dutch request for derogation under Article 95(5) of the EC Treaty — provisions of the Directive 94/60/EC concerning creosote expressed at the 27th CSTEE plenary meeting, Brussels 30 October 2001.

- old creosote-treated wood is subject to the same prohibition if it is removed from the existing place of application.

(26) It has to be noted that Council Directive 76/464/EEC of 4 May 1976 on pollution caused by certain dangerous substances discharged into the aquatic environment⁽⁹⁾ applies to the placing by a person of creosote-treated wood into surface water⁽¹⁰⁾. However, this Directive is concerned with the prior authorisation of all discharges into *inter alia* inland surface water, territorial waters, internal coastal waters and does not cover the placing on the market of creosote-treated wood, nor does it provide for a general ban on the use of creosote-treated wood in contact with surface water. Therefore, a national measure seeking to ban completely the placing on the market and use of creosote-treated wood for applications involving contact with surface water would go beyond the measures provided for in Directive 76/464/EEC and would be incompatible with Directive 94/60/EC.

(27) Furthermore, Council Directive 80/68/EEC of 17 December 1979 on the protection of groundwater against pollution caused by certain dangerous substances⁽¹¹⁾ covers the placing by a person of creosote-treated wood into direct contact with ground water if polycyclic aromatic hydrocarbons (hereinafter referred to as PAHs) leaching out from treated wood are found in quantities or concentrations of concern. In these circumstances, the use of creosote-treated wood in contact with groundwater is prohibited under this Directive. However, this Directive does not provide for a total ban on the use of creosote-treated wood in contact with groundwater nor does it cover the placing on the market of creosote-treated wood. Therefore, a national measure seeking to prohibit the placing on the market and use of creosote-treated wood for applications involving contact with groundwater would go beyond the measures provided for in Directive 80/68/EEC and would be incompatible with Directive 94/60/EC.

(28) As required by Article 95(5) of the Treaty, the Netherlands notified the Commission of the actual wording of the provisions going beyond those provided in Directive 94/60/EC that they intend to introduce, accompanying the request by an explanation of the reasons which, in their opinion, justify the introduction of those provisions.

(29) The notification submitted by the Netherlands in order to obtain approval for the introduction of national provisions derogating from the provisions of Directive 94/60/EC is therefore to be considered admissible under Article 95(5) of the EC Treaty.

2. ASSESSMENT OF MERITS

(30) In accordance with Article 95 of the Treaty, the Commission has to ensure that all the conditions enabling a Member State to avail itself of the possibilities of derogation provided for in this Article are fulfilled.

(31) The Commission must therefore assess whether the conditions provided for by Article 95(5) of the Treaty are met. This Article requires that when a Member state deems it necessary to introduce national provisions derogating from a harmonisation measure, the Member State should base it on:

- (a) new scientific evidence relating to the protection of the environment or the working environment;
- (b) grounds of a problem specific to that Member State arising after the adoption of the harmonisation measure.

(32) In addition, pursuant to Article 95(6) of the Treaty, where it considers that the introduction of such national provisions is justified, the Commission must check whether or not those national provisions are a means of arbitrary discrimination or a disguised restriction on trade between Member States and whether or not they constitute an obstacle to the functioning of the internal market.

2.1. CREOSOTE — GENERAL INFORMATION

(33) Creosote is a complex mixture of over 200 chemical compounds, predominantly aromatic hydrocarbons, as well as phenolic and aromatic nitrogen and sulphur compounds. It is a mid-heavy distillate of coal tar (boiling point approximately 200-400 °C).

(34) Creosote can contain over 30 different polycyclic aromatic hydrocarbons (PAHs) with a possible total PAH content of 85 %. The most important ones are:

- acenaphthene,
- naphthalene,
- phenanthrene,
- anthracene,
- fluorene,
- fluoranthene,
- chrysene,
- triphenylene,
- benzo[a]anthracene,
- benzo[b]fluoranthene,
- benzo[k]fluoranthene,
- benzo[a]pyrene.

⁽⁹⁾ OJ L 129, 18.5.1976, p. 23.

⁽¹⁰⁾ European Court of Justice's judgement of 29 September 1999, delivered in case C-232/97 — ECR 1999 I, p. 6385.

⁽¹¹⁾ OJ L 20, 26.1.1980, p. 43.

(35) Benzo[a]pyrene (B[a]P) is one of the most thoroughly investigated PAHs and the B[a]P content is used as an indicator or marker substance for classification purposes and does not, in itself, reflect the total PAH content of creosote. Depending on the type of creosote concerned, the B[a]P content may vary between 0,003 and 0,3 % by weight (30 to 3 000 ppm). A refined distillation of coal tar and selection of the fractions can lead to lower B[a]P or phenol contents. Different industry standards have been developed by the Western European Institute for Wood Preservation, characterised mainly by different contents of specified distillation fractions and, most important in this context, different contents of B[a]P. Limiting values for classification standards are 500 ppm and 50 ppm.

(36) Modifications to both the physical and chemical properties of creosote are possible if they are required for use or environmental purposes. It is possible to create a lower viscosity product, better suited to brush application, by incorporating components with a lower boiling point, which is sometimes called carbolineum. Directive 94/60/EC does not make a distinction: it covers and treats in an identical way a whole range of different coal tar distillates, all of them specified by their names, Einecs- and CAS numbers.

(37) Creosote is principally and almost exclusively used as a wood preserving agent. Large-scale industrial and professional applications are by far the most important ones: railway sleepers, poles for electricity transport, hydraulic engineering (bank protection), fences, stakes for agriculture and fruit production. Creosote and similar products are also used by individual consumers for wood preserving purposes.

(38) The most important properties of creosote are:

- high fungicidal efficacy,
- high insecticidal efficacy,
- long-term persistence,
- resistance to leaching and weathering.

(39) A very small quantity of creosote is used in medicinal products for the treatment of certain skin diseases, e.g. psoriasis.

Ecotoxicological effects

(40) Environmental contamination by creosote has been reported in a number of countries, with old wood treatment facilities often being the source of the contamination. In fact, most information on the fate of creosote in the environment has been obtained from industrial creo-

sote spills and from contamination left from disused creosote plants. Environmental contamination has been traced by an analysis of selected PAH compounds, notably B[a]P.

(41) Creosote is toxic to certain organisms in the soil and highly toxic against aquatic organisms (with 96h LC-50 values often below 1 mg/l). Many of its components are bioaccumulating.

(42) The main characteristics of PAHs in the environment are:

- PAHs bind strongly to soil organic matter;
- the rate of degradation of PAHs in soil and other environmental compartments is usually slow. Creosote residues can persist for many years in the environment (> 20-30 years);
- the main breakdown processes are photodegradation (i.e. under irradiation from the sun) and microbial degradation (i.e. by certain bacteria). Microbial degradation can occur under aerobic and anaerobic conditions. PAHs compounds with four rings and more may be poorly degradable;
- PAHs reaching watercourses are rapidly transferred to sediment;
- in watercourses, most of the lower molecular weight PAHs are removed primarily by microbial degradation and the higher molecular weight compounds by photooxidation and sedimentation. Microbial degradation of the more water soluble PAHs occurs under aerobic and anaerobic conditions. The PAH constituents have been shown to bioaccumulate in aquatic species.

(43) Emissions of PAHs to air, water and soil can occur during the impregnation process and storage at the impregnation site, as well as during use of treated wood. However, PAHs found in the various environmental compartments are originating from a variety of sources (e.g. all combustion processes, traffic etc.) and it is often difficult to ascribe their levels to any particular source such as creosote treated wood.

(44) A study (12) in Sweden has shown that after 40 years in soil, creosote impregnated poles had lost a part of the compounds contained in creosote, especially those with the lowest boiling point (< 270 °C). The part of the poles above the ground lost the larger amount. However, mobility of the leached compounds was very low as they could only be detected in the soil in close contact with the poles. This is coherent with the observation that the mobility of PAHs in soil is extremely low due to their strong absorption to organic matter.

(45) The presence of elevated levels of PAH in aquatic environments has often been attributed to the presence of creosote-treated wood. Migration of creosote components from treated wood into water is higher into fresh water than into seawater and has been proven in many studies. Migration seems to be more limited in seawater; in one study, after ten years in the sea, marine pilings

(12) S. Holmroos, *Analys av kreosotstolpar i Simlångsdalen efter 40 års exponering i fält*. Rapport nr. M205-252.092. Älvkarleby: Vattenfall Utveckling, 1994.

retained 93 % of the original composition of creosote compounds⁽¹³⁾. The pollution of sediments by creosote leaching from waterbank protection has been documented in the Netherlands⁽¹⁴⁾ and also in studies on pollution from former impregnation facilities.

(46) As for human exposure, actually measured data on environmental pollution by PAHs originating in creosote are scarce.

2.2. THE POSITION OF THE NETHERLANDS

(47) A description is given of all the relevant arguments behind the notified draft provisions.

(48) The Netherlands take the view that new scientific findings concerning the protection of the environment in connection with a problem that arose in the Netherlands after the adoption of Directive 94/60/EC justify the introduction of the notified provisions.

(49) These new scientific findings are partly referred to in the Commission decisions 1999/832/EC⁽¹⁵⁾, 1999/833/EC⁽¹⁶⁾, 1999/834/EC⁽¹⁷⁾, 1999/835/EC⁽¹⁸⁾ on national provisions notified by, respectively, the Kingdom of the Netherlands, the Federal Republic of Germany, the Kingdom of Sweden and the Kingdom of Denmark, concerning limitations to the placing on the market and use of creosote. Furthermore, the Netherlands refer to a newly completed study⁽¹⁹⁾ in the Netherlands (hereinafter referred to as RIVM study) on the environmental risks arising from the use of creosote-treated wood in contact with water and soil, which provides further information in this regard.

(50) In the Decisions above the Commission pointed out certain potential risks to the aquatic environments resulting from leaching out of PAHs from creosote-treated wood in contact with water. Reference was also made to a Dutch study⁽²⁰⁾ made available in 1995 and its subsequent review carried out by a consultant mandated by the Commission⁽²¹⁾, showing that creosote compounds leaching out from waterbank protection

⁽¹³⁾ L.L. Ingram et. al, *Migration of Creosote and Its Components from Treated Piling Sections in a Marine Environment*, Proc. Ann. Meet. Am. Wood Preserv. Assoc. 78, 1982, p. 120. See also footnotes 8 and 18.

⁽¹⁴⁾ bkh consulting engineers, *Foundation of the appeal against the EC-directive on creosote*, Final report, Delft, 1 July 1995.

⁽¹⁵⁾ See footnote 4.

⁽¹⁶⁾ OJ L 329, 22.12.1999, p. 43.

⁽¹⁷⁾ OJ L 329, 22.12.1999, p. 63.

⁽¹⁸⁾ OJ L 329, 22.12.1999, p. 82.

⁽¹⁹⁾ Centrum voor Stoffen en Risicobeoordeling, CSR Adviesrapport: 08196A01, Creosoot — Milieurisico's ten gevolge van de toepassing van gecreosoteerd hout in contact met water en bodem — Auteurs: M.H.M.M. Monforts, E.W.M. Roex, and J.P. Rila, 5.12.2000 — RIVM (Research for man and environment) Rijksinstituut voor Volksgezondheid en Milieu (National Institute of public health and the environment).

⁽²⁰⁾ See footnote 14.

⁽²¹⁾ G. Grimmer, *Study on the Justification in Scientific Terms of Allowing The Netherlands to retain its National Laws on Creosote in Place of Council Directive 94/60/EC*. Final report, Biochemisches Institut für Umweltcarcinogene, Großhansdorf (Germany), December 1995.

have caused the pollution of aquatic sediments in the Netherlands.

(51) In Decision 1999/832/EC the Commission, based on these findings, concludes its assessment by recognising that 'The Dutch authorities have demonstrated that the specific geographic situation of The Netherlands, which necessitates extensive bank protection of watercourses, has lead to the highest consumption of creosote treated wood per surface in the European Union. Leaching of components from creosote into the watercourses has caused the pollution of the major part of sediments with PAH compounds beyond acceptable limits. Measures aiming at an enhanced reduction of the leaching of these compounds into the aquatic environment are therefore justified in the Netherlands'⁽²²⁾.

(52) The newly completed RIVM study contains an assessment of the risks arising from the creosote-treated wood as wood preservative in the Dutch environment. It sets out data on various constituents of creosote, i.e. six PAHs. In Directive 94/60/EC, B[a]P is taken as representative of the PAHs in creosote. The RIVM study, however, shows that more data are available for other PAHs in the environment.

(53) The risk assessment was based on the environmental quality standards set out in the Fourth Notice on Water Management [Vierde Nota Waterhuishouding] of 1997 and the publication entitled 'Stoffen en Normen' [Substances and Standards] published by the Ministry of Housing, Planning and the Environment in 1999. The 'Maximum Admissible Risk' [Maximaal Toelaatbaar Risiconiveau — MTR] is the minimum quality standard that surface water, sediment and soil must meet.

(54) In order to assess whether the levels set out in the environmental quality standards were being exceeded, the concentration of PAHs was determined for each of these on the basis of model calculations and monitoring data.

(55) The conclusions of the risk assessment for surface water, sediment and soil respectively are set out below.

Surface water

(56) The model calculations conducted in the study showed that the concentrations of most of the selected PAHs would exceed the MTR by many times if creosote-treated wood was used for bank protection. The levels calculated ranged from 18 to some 500 times the MTR in the

⁽²²⁾ Recital 102.

first three to five days of use. These model calculations were supported by the measured concentrations in the vicinity of recently placed bank protection, which ranged from around ten to many thousands of times greater than the MTR.

(57) The results obtained from samples taken at various distances from creosote-treated bank protection strongly indicated that creosote-treated wood is indeed the cause of the increased concentrations of PAHs. The conclusion has therefore been drawn that the use of creosote-treated wood for bank protection involves a threat to the quality of the surface water on a local scale.

(58) By means of model calculations, based on the length of the banks in kilometres and the percentage of this length that is protected by means of creosote-treated wood in a given water-authority management area, the amount of PAHs that would be released per year was calculated. It was found that, with the current length of creosote-treated bank protection in the management area in question, the MTR for fluoranthene would be substantially exceeded. Taking into account that also other MTRs are being exceeded not only in one water-authority management area, but also in various other parts of the country, such as West-Overijssel and Zuid-Holland, it has been concluded that this is a nation-wide problem.

Sediment

(59) The model calculations showed that the concentrations of most of the selected PAHs would exceed the MTR by five to ninety-five times. These model calculations were broadly speaking confirmed by the concentrations measured in the vicinity of recently placed bank protection, according to which the standards are exceeded by a maximum of three times.

(60) The results obtained from samples taken at various distances from the creosote-treated bank protection strongly indicate that creosote-treated wood is indeed the cause of the increased concentrations of PAHs. It can be concluded that the use of creosote-treated wood for bank protection involves a threat to the quality of sediment on a local scale.

(61) By means of model calculations, based on the length of the banks in kilometres and the percentage of this length that is protected by means of creosote-treated wood in a given water-authority management area, the amount of PAHs that would be released per year was calculated. It was found that, with the current length of bank that is protected by creosote-treated wood in the management area in question, the MTR for phenanthrene would be substantially exceeded.

(62) Given that this and other MTRs are being exceeded not only in one water-authority management area, but also in various parts of the country, such as West-Overijssel and Zuid-Holland, it has been concluded that this is a nation-wide problem.

Soil and groundwater

(63) The model calculations for soil and groundwater show that the MTRs for three of the six PAHs would be exceeded, by a maximum of forty-seven times. From the few measurements available it would appear that in practice, creosote does indeed leach out of treated wood and that the MTRs for soil are exceeded, particularly in the case of soil in the immediate vicinity of the treated wood.

(64) The model predicted that the groundwater standard of 0,1 µg/l would be exceeded in the immediate vicinity of the wood in the saturated phase, but there are no measurement data to support or contradict this prediction. Infiltration of ground water (at no great depth) by contaminated surface water is possible. In such a case, the soil (sediment) can even act as a filter. No measurement data are available to support these assumptions either.

(65) The Netherlands point out that the results of the RIVM study are to be read in the light of the special situation prevailing in the Netherlands, as recognised by the Commission in its Decision 1999/832/EC. Therefore, the environmental concerns identified above indicate that there is a specific problem in the Netherlands due to their specific geographical situation and the extensive use of creosote-treated wood in the aquatic environment compared to other Member States.

(66) The Netherlands finally observe that this specific problem has arisen after the adoption of the Directive. In fact, the exposure situation as well as the risks stemming thereof were not known at the time of adoption of Directive 94/60/EC.

2.3. EVALUATION OF THE POSITION OF THE NETHERLANDS

2.3.1. *The burden of proof*

(67) It has to be noted that, in the light of the time frame established by Article 95(6) of the Treaty, the Commission, when examining whether the draft national measures notified under Article 95(5) are justified, has to take as a basis 'the grounds' put forward by the Member State. This means that, under the Treaty, the responsibility of proving that these measures are justified, lies with the requesting Member State. Given the procedural framework established by Article 95, including in particular a strict deadline for a Decision to be adopted, the Commission normally has to limit itself to examining the relevance of the elements which are submitted by the requesting Member State, without having to seek itself possible justifications.

2.3.2. *New scientific evidence concerning the protection of the environment or the working environment*

(68) The Netherlands have provided a considerable amount of documents in support of their request. Reference has also been made to certain studies made available in the framework of the previous request submitted to the Commission in accordance with Article 95(4) of the Treaty [leading to Commission Decision 1999/832/EC (23)].

(69) The Dutch study submitted in the framework of the earlier request for derogation (24) and its subsequent review (25) already showed that the leaching of PAHs from creosote-treated wood used for extensive bank protection of watercourses in the Netherlands have resulted in unacceptable risks to a specific aquatic compartment, i.e. heavy contamination of sediments.

(70) As indicated above, all new documentation provided by the Netherlands was submitted to the CSTE for evaluation. The CSTE's review mainly focuses on the environmental risk assessment carried out by the Dutch authorities as documented in the RIVM study.

(71) In considering the submitted scientific documentation, the CSTE notes that the Dutch methodology differs from the methodology normally used in the development of risk assessments through the use of Predicted Effect Concentrations/Lowest Effect Concentration [PEC/L(E)C₅₀] rather than the normal Predicted Effect Concentration/Predicted No Effect Concentration (PEC/PNEC). However, it is observed that the methodology has been translated into the standard approach and that the calculated risk quotients are consistent with standard EU methodology. The CSTE is therefore of the opinion that the environmental standards methodology followed and the assumptions made in the environmental risk assessment are adequate and are consistent with the standard EU approach.

(72) The CSTE observes that the Dutch risk assessment for standard creosote (B[a]P concentration between 50 ppm and less than 500 ppm) for surface water and sediments resulted in the PNEC for specific PAHs being substantially exceeded. Interaction between PAHs has also been also assessed to be likely. As this has not been considered by the Dutch authorities, the CSTE observes that that the risks estimated could be even greater than indicated. The CSTE is thus of the opinion that for 'standard creosote', there are grounds for concern with regard to environmental effects.

(23) See footnote 4.

(24) See footnote 14.

(25) See footnote 21.

(73) Turning to 'modified creosote' (in which B[a]P is reduced to less than 50 ppm), the CSTE notes that the levels of anthracene and fluoroanthene (other substances found in creosote but not used as a marker) are not substantially reduced with respect to untreated creosote. As the Risk Quotients (PEC/PNEC) for these two PAHs in 'standard creosote' are well above 1, the CSTE does not believe that controls based on the B[a]P limit alone are adequate.

(74) On this basis, the CSTE considers that the Netherlands have demonstrated a substantial cause for concern with regard to environmental impacts to aquatic, sediment and groundwater compartments.

(75) In the light of the foregoing and of the fact that the environmental risks indicated above were not known at the time of adoption of Directive 94/60/EC, the conclusion can be drawn that the Netherlands have provided new scientific evidence relating to the protection of the environment as required by Article 95(5) of the Treaty.

2.3.3. *Problem specific to the Netherlands arising after the adoption of Directive 94/60/EC*

(76) It should first be noted that the environmental concerns indicated above are not necessarily specific to the Netherlands as they relate to a general situation in which creosote-treated wood is placed into contact with surface water and/or groundwater and therefore apply wherever this situation occurs. In its opinion of 30 October 2001, the CSTE emphasises that the specificity of the above concerns to the Netherlands depends upon the extent to which exposure scenarios in the Netherlands differ from those in other Member States.

(77) A careful evaluation of all the relevant information made available to the Commission is therefore necessary in order to determine whether the Netherlands have demonstrated that the abovementioned environmental concerns are of particular significance in the Netherlands as a result of particularly heavy exposure scenarios. The relevant information on the exposure situation for surface water and groundwater are examined separately.

Surface water

(78) In its Opinion of 30 October 2001, the CSTE recognises that the use of creosote-treated wood in contact with waterways is deployed extensively in the Netherlands as bank protection and that the subsequent risks for the aquatic environment within the Netherlands are likely to be extensive. Further comparative information made available in 1995 (26) indicate that the extensive

(26) See footnotes 14 and 21.

use of creosote-treated wood for bank protection in the Netherlands represents a major problem compared to other Member States. The RIVM study also gives an estimate of the general level of exposure to PAHs of the surface waters in the Netherlands as a result of the high use of creosote-treated wood for bank protection, which confirms that the risks to these waters are extensive.

(79) In the light of the foregoing and also taking into account that the above environmental concerns and their particular significance in the Netherlands came into light after adoption of Directive 94/60/EC, it can be concluded that a specific environmental problem arising after the adoption of that Directive exists in the Netherlands due to the extensive use of creosote-treated wood for bank protection of watercourses.

Groundwater

(80) The Netherlands have pointed out that their specific geographical situation combined with the extensive use of creosote-treated wood shows that a specific exposure scenario also exists with regard to groundwater.

(81) Current applications of creosote-treated wood may indeed involve contact with groundwater. Fences, fruit, electric power transmission and telecommunication poles and other creosote-treated wood products placed in the soil can reach groundwater and lead to its contamination by PAHs. This occurs predominantly, if not exclusively, where the groundwater underlying the surface soil is found at very low depth, i.e. close to the surface.

(82) Specific problems arising from the use of creosote-treated wood for the abovementioned applications therefore appear dependant on the extension of low-depth groundwater areas and the quantity of creosote-treated wood susceptible to contact with groundwater.

(83) Areas with groundwater levels very close to the surface cover a large part of the country in the Netherlands, especially in the polder areas. Also, during periods of heavy rains, groundwater can be found at very low depth underneath the surface soil. The Dutch groundwater compartment therefore appears to be particularly vulnerable to the above applications of creosote-treated wood.

(84) Taking into account the specific hydro-geographical situation of the Netherlands and the extensive use of creosote-treated wood for applications susceptible to contact with groundwater, the conclusion can therefore be drawn that a particularly heavy exposure scenario exists in the Netherlands also with regard to groundwater.

2.3.4. *Overall evaluation*

(85) The Netherlands have demonstrated on the basis of new scientific evidence relating to the protection of the environment that a specific problem arising after the adoption of Directive 94/60/EC exists in the Netherlands with regard to the pollution of surface water and groundwater by PAHs leaching out from creosote-treated wood used for bank protection of water courses and other applications susceptible to contact with groundwater.

(86) The Commission therefore considers that the request from the Netherlands for introducing national measures aimed at reducing exposure of the aquatic environment in the Netherlands to PAHs fulfils all the conditions specified in Article 95(5).

2.4. ABSENCE OF ARBITRARY DISCRIMINATION OR A DISGUISED RESTRICTION ON TRADE BETWEEN MEMBER STATES AND OBSTACLE TO THE FUNCTIONING OF THE INTERNAL MARKET

2.4.1. *Absence of arbitrary discrimination*

(87) Article 95(6) obliges the Commission to verify that the envisaged measures are not a means of arbitrary discrimination. According to the ruling of the Court of Justice, the absence of discrimination means that no different treatment should be given to similar situations, no similar treatment of different situations.

(88) The envisaged national provisions are general and are intended to apply to both national and imported creosote-treated wood for the applications concerned. As a result, there is no evidence that they can be used as a means of arbitrary discrimination between economic operators in the Community.

2.4.2. *Absence of a disguised restriction on trade*

(89) Envisaged more restrictive national measures in the area of limitations on the marketing and use of products derogating from the provisions of a Community Directive would normally constitute a barrier to trade. Products that can be legally placed on the market in the rest of the Community cannot be placed on the market in the Member State concerned. The concept enshrined in paragraph 6 of Article 95 is intended to prevent the envisaged restrictions based on the criteria set out in paragraph 5 being applied for inappropriate reasons, and in reality constituting economic measures to be introduced to impede the import of products from other Member States in order to protect indirectly national production.

(90) It was established before that there is a real concern with regard to the aquatic environment due to the specific overall exposure situation in the Netherlands. Therefore, the protection of the environment seems to be the goal of introducing the national provisions, and not the creation of disguised barriers to trade.

(91) In addition, in the intended legislation there is an exemption for creosote-treated wood intended for export. However, this exception is in line with the provisions of Directive 94/60/EC, which allows the placing on the market of creosote-treated wood in the aquatic environment.

(92) Overall, the Commission considers that there is no evidence indicating that the envisaged national provisions, once adopted, will be a disguised restriction on trade between Member States.

2.4.3. *Absence of obstacles to the functioning of the internal market*

(93) This condition cannot be interpreted in such a way that it prohibits the approval of any national measure likely to affect the establishment of the Internal Market. In fact, any national measure derogating from a harmonisation measure aiming at the establishment and operation of the Internal Market, constitutes in substance a measure that is likely to affect the Internal Market. Consequently, to preserve the useful character of the procedure for derogation provided for by Article 95 of the EC Treaty, the Commission considers that, in the context of the Article 95(6), the concept of obstacle to the functioning of the Internal Market has to be understood as a disproportionate effect in relation to the pursued objective.

(94) In the light of the environmental concerns identified above and also taking into account the specific exposure situation in the Netherlands, the Commission considers that there is no evidence indicating that the envisaged national provisions, once adopted, will constitute a disproportionate obstacle to the functioning of the Internal Market.

IV. CONCLUSION

(95) In the light of the foregoing, it can be concluded that the request by the Netherlands for introducing national provisions derogating from Directive 94/60/EC with regards to creosote-treated wood as submitted on 25 January 2001:

— is admissible;
— fulfils the conditions established by Article 95(5) of the Treaty;

and that the envisaged national provisions do not constitute either a means of arbitrary discrimination, a disguised restriction on trade between Member States, or a disproportionate obstacle to the functioning of the Internal Market.

(96) The Commission therefore considers that the envisaged national provisions can be approved in accordance with Article 95(6) of the Treaty.

(97) However, the national provisions to be approved, once adopted, would be incompatible with the provisions of Directive 2001/90/EC.

(98) In accordance with Article 95(7) of the Treaty, the Commission is already examining the appropriateness to adapt to technical progress for a second time the provisions of Directive 94/60/EC regarding creosote and creosote-treated wood on the basis of the scientific evidence provided by the Netherlands and the Opinion of the CSTEE given thereof,

HAS DECIDED AS FOLLOWS:

Article 1

Without prejudice to the obligations arising from Directive 2001/90/EC, the envisaged national provisions relating to the placing on the market and use of creosote-treated wood, which the Kingdom of the Netherlands notified to the Commission by letter dated 23 January 2001, are approved.

Article 2

This Decision is addressed to the Kingdom of the Netherlands.

Done at Brussels, 23 January 2002.

For the Commission

Erkki LIIKANEN

Member of the Commission