



WORLD CUSTOMS ORGANIZATION
ORGANISATION MONDIALE DES DOUANES

Established in 1952 as the Customs Co-operation Council
Créée en 1952 sous le nom de Conseil de coopération douanière

SCIENTIFIC SUB-COMMITTEE

41.690 E

-
13th Session

(SSC/13/Dec. 97)

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O. Eng./Fr.

SC-4

Brussels, 19 December 1997.

REPORT OF THE SCIENTIFIC SUB-COMMITTEE

1. The Scientific Sub-Committee held its Thirteenth Session from 15 to 19 December 1997 at the Headquarters of the World Customs Organization (established as the Customs Co-operation Council) in Brussels, under the chairmanship of Mr. G.J. SLUIS (Netherlands).
2. The following 27 countries and two organizations were represented :

Countries

AUSTRIA	INDONESIA	NORWAY
BRAZIL	IRELAND	PAKISTAN
BULGARIA	JAPAN	SAUDI ARABIA
CANADA	KOREA (Rep. of)	SPAIN
DENMARK	MADAGASCAR	SRI LANKA
FINLAND	MALAYSIA	SWITZERLAND
FRANCE	MAURITANIA	THAILAND
GERMANY	MEXICO	UNITED KINGDOM
INDIA	NETHERLANDS	UNITED STATES

Organizations

EUROPEAN COMMUNITY (EC)
UNITED NATIONS INTERNATIONAL DRUG CONTROL PROGRAMME (UNDCP)

1. A list of participants in the meeting is reproduced at Annex E.

I. AGENDA

2. The Agenda of the Scientific Sub-Committee set out below serves as the "Table of Contents".

II. QUESTIONS EXAMINED BY THE SCIENTIFIC SUB-COMMITTEE

3. The comments made during the discussions and the conclusions reached by the Scientific Sub-Committee on the various Agenda items are set out in Annexes A to D.

III. RESTRUCTURING OF THE SECRETARIAT

4. Mr. KUSAHARA, Director of Nomenclature and Classification, informed the Sub-Committee about the restructuring of the Secretariat which would be effective from 1 January 1998. The new Directorate of Tariff and Trade Affairs would replace the existing Valuation Directorate and the Nomenclature and Classification Directorate and would be headed by the current Director, Nomenclature and Classification.

IV. STAFF CHANGES IN THE NOMENCLATURE AND CLASSIFICATION DIRECTORATE

5. Mr. KUSAHARA also informed the Sub-Committee that Mr. L. FORNSÄTER had been appointed as Senior Technical Officer (Supervisor) in November 1997, in place of Mr. KATTENBUSCH (Deputy Director) who had left the Secretariat in July 1997. He also said that Mr. G. BORSU had been appointed as Technical Officer in October 1997 and Mr. M.H. LEE from the Republic of Korea had joined the Secretariat as Technical Attaché in place of Mr. J. WOO who had left the Secretariat in September 1997.

V. DATES OF THE NEXT SESSION

6. Mr. Kusahara informed the Sub-Committee that the next session of the Sub-Committee will be held from Monday 18 May to Wednesday 20 May 1998 (the dates being subject to change at a later stage), if there were sufficient volume of work of urgent nature.

G.J. SLUIS
Chairman

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x x

ANNEX A

TECHNICAL QUESTIONS

Working Doc.	Subject	Classification Opinion	E.N. amendments	Nomenclature amendments
1	2	3	4	5
41.150 41.661	Report of the Working Group concerning amendments to heading 29.37 and its Explanatory Note.		<u>See Annex C/1.</u>	<u>See Annex C/1.</u>

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

- On the basis of Docs. 41.150 and 41.661, the Scientific Sub-Committee examined proposed amendments to heading 29.37 and to its Explanatory Note.
- Regarding proposed new Note 8 to Chapter 29, it was agreed that the square brackets around subparagraph (b) of that Note should be removed. Within that subparagraph, the Sub-Committee preferred to retain the expression "synthesis of products". Consequently, the expression "manufacture of other products" was deleted from the proposal.
- In the proposed Explanatory Note text, heading 29.37, first paragraph, Item (1), the Sub-Committee agreed to delete the expression "cellular" and retained the term "molecular". The Sub-Committee also agreed to delete the last sentence, which was placed in square brackets, in the third paragraph of the Explanatory Note. It was also agreed to retain the example of cortodoxone (INN) under Part (B), Item (1) (f), by deleting the square brackets around this item.
- The Sub-Committee agreed to the editorial modifications suggested by ALADI in Doc. 41.661. These were incorporated in the proposed texts, along with modifications to clarify that lists of examples in the Explanatory Note included not only the hormones covered there, but also their derivatives and analogues. However, the Sub-Committee did not consider that the Explanatory Note concerning halogenated derivatives of corticosteroid hormones (Part (B), Item (2)) required modification as suggested by ALADI. Finally, various other editorial amendments, including the insertion of IUPAC chemical names, INN designations, etc., were approved.
- The texts approved by the Sub-Committee are set out in Annex C/1 to this Report.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

6. The Chairman informed the Sub-Committee that he had received a communication from the Dutch pharmaceutical industry that four items in the "List of steroids used primarily for their hormone function" were, in fact, intermediates. The term "intermediate" was therefore inserted in square brackets against these items, leaving it to the HS Committee to decide based on information and comments from administrations.

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1	2
41.662	Possible creation of a new heading for biodegradable plastics and articles thereof.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. The Sub-Committee examined the Japanese proposal for creation of a new heading for biodegradable plastics and articles thereof, on the basis of Doc. 41.662.
2. The Delegate of Japan explained that it was important to separately identify biodegradable plastics and articles thereof in Chapter 39, in view of the environmental importance and potential growth of trade in these products. Some delegates, however, pointed out that recycling of plastics was becoming a common practice and, therefore, it was doubtful whether the volume of trade in biodegradable plastics in future would be sufficient to justify their separate identification.
3. As regards the proposal in paragraph 5 in Doc. 41.662, the Delegate of Japan said that the details indicated were based on the data available in Japan. He explained that “cellulose produced by bacteria” in Item (a) could be differentiated from other cellulose by examining the thickness of fibril under a scanning electron microscope. He also indicated that items listed in subparagraph 5 (b) should be modified to read as follows :
“(b) Thermoplastic substances consisting of starch blended with polyvinyl alcohol or polycaprolactone, thermoplastic substances based on starch derivatives, blended substances based on chitosan, cellulose and small amount of starch, blended substances consisting of cellulose acetate and triacetin.” The Delegate of Japan also explained that “polyvinyl alcohol with low molecular weight” included in subparagraph 5 (c) referred to the polyvinyl alcohol whose molecular weight was less than 30,000.
4. One delegate said that, although polyvinyl alcohol was water soluble it might not necessarily be environmentally friendly. In this context, the Sub-Committee agreed that the scope of biodegradable plastics should be limited to those destroyed by bacteria or micro-organisms.
5. Some delegates expressed doubts whether all of the substances included in the Japanese proposal were biodegradable, according to the definition in Annex II to Doc. 40.771. They also shared the Secretariat’s concern (paragraphs 7 of Doc. 41.662) that it was difficult to distinguish many of these items from normal plastics. Some delegates commented that precise composition of these products were necessary to describe them in the Nomenclature in order to avoid conflict with Subheading Note to Chapter 39. Furthermore, it must be confirmed that all grades of the named polymers (paragraph 5 of Doc. 41.662) are in fact biodegradable.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

6. As regards the location of the new category, the Delegate of Japan clarified that its intention was to separately identify biodegradable plastics in Chapter 39 and any of the methods proposed by the Secretariat in paragraph 8 in Doc. 41.662 would be acceptable. Some delegates were however not in favour of a new heading or subheading for biodegradable plastics. They preferred to have separate breakouts for specific primary products under relevant headings as appropriate. Regarding semi-manufactures and articles, some delegates were not in favour of having separate identification, since many of such products on the market were not classified in Chapter 39.

7. After this exchange of views, the Sub-Committee decided to re-examine this matter at the next session. In this context, the Japanese Administration was asked to provide more information concerning its proposal, particularly the basis for selecting biodegradable plastics for separate identification, criteria for distinguishing them from normal plastics and uses of the biodegradable plastics in question. Other administrations were also invited to submit comments on these issues to the Secretariat.

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x x

1	2	3	4
41.663 41.687	Possible amendments to the HS and the Explanatory Notes to clarify the classification of co-ordination compounds.	<u>See Annex C/2.</u>	<u>See Annex C/2.</u>

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. On the basis of Docs. 41.663 and 41.687, the Sub-Committee examined proposed amendments to the Nomenclature and Explanatory Notes concerning the future classification of co-ordination compounds in heading 29.42.
2. Regarding the proposed amendment to Note 5 (d) to Chapter 29, the Delegate of Ireland noted that the expression "alkali or alkaline-earth metals", though intended to exclude transition metal alcoholates from the coverage of the Note, also excluded other non-transition metals, such as aluminium. The Delegate of Canada agreed with this point and noted that his Administration wanted to include only transition metal compounds in heading 29.42. There was general consensus in this respect; so proposed Note 5 (d) was modified by replacing "Alcoholates of alkali metals or alkaline-earth metals" with "Metal alcoholates, other than alkoxides of transition metals".
3. In this connection, the Delegate of Germany noted that it would be useful to qualify the list of elements on pages 233 and 234 of the Explanatory Notes to Chapter 28 to indicate which elements were transition elements. However, the Sub-Committee noted that this was a question which could be considered at some time in the future.
4. Further, in connection with the amendment of Note 5 (d), the Delegate of the United Kingdom felt that a corresponding legal amendment would be needed for phenolates of transition metals. The Sub-Committee thus agreed to amend Note 5 (c) (1) to specify that transition metal phenolates were classifiable in heading 29.42.
5. It was also agreed that proposed new Note 8 to Chapter 29 should be modified to the effect that heading 29.42 would include compounds of organic acids (whether or not other functional groups were present) with the transition metals named in the proposal, on the understanding that other transition metal compounds were classifiable in Chapter 28 pursuant to Note 1 to Section VI.
6. The Sub-Committee agreed that the purpose of the exclusionary paragraph in the Explanatory Note to heading 29.20 was to exclude titanium tetra-*n*-butoxide from heading 29.20. That paragraph was therefore modified to replace the reference to heading 29.05 by a reference to heading 29.42.
7. As a result of the foregoing changes, the Sub-Committee agreed to insert an additional inclusionary example of "compounds of organic acids (whether or not other functional groups were present) with transition metals" in Part (A) (1) of the Explanatory Note to heading 29.42, along with the examples proposed by the Canadian Administration in Annex B to Doc. 41.687.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

8. Subject to the above and certain other editorial modifications, the Sub-Committee provisionally agreed to the texts proposed by the Secretariat in Doc. 41.687. The texts agreed are set out in Annex C/2 to this Report. However, it was agreed to retain these texts in square brackets so that administrations could consider the impact of the amendments during the intersession.

9. In this connection, Mr. Kusahara felt that it might be useful to insert references to examples of transition metal compounds which would fall in heading 29.42 in the General Explanatory Note to Chapter 29 (pages 345-346). The Sub-Committee agreed that the Secretariat could look into this matter during the intersession and present proposals in this regard at the next session.

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1	2
41.664	Inclusion of chemical structures in the Explanatory Notes to Chapter 29.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. On the basis of Doc. 41.664, the Sub-Committee examined the possible inclusion of chemical structures in the Explanatory Notes to Chapter 29.
2. Before starting the discussion, the Chairman drew the Sub-Committee's attention to a separate brochure entitled "Chemical Structures" compiled by the Japanese Administration and distributed to delegates. The Sub-Committee expressed its appreciation for this commendable work by Japan.
3. As regards the chemical structures in the draft list prepared by the Secretariat (Annex I to Doc. 41.664), the following suggestions were made by delegates :
 - (i) Item Nos. 226 to 304 representing examples of heterocyclic compounds should be retained. In this connection, the Secretariat was asked to check whether there was any repetition of the structures and, if so, to take them out of the list and make cross-references.
 - (ii) The structure in Item No. 337 should be replaced by another example for an ester (lactone) forming part of two rings and a new example of an amide (lactam) forming part of two rings should be added, in order to illustrate the principle of the Subheading Explanatory Notes to headings 29.32 and 29.33.
 - (iii) Item Nos. 349 (methylpyridine) and 351 (1-methyl-4-phenylpiperidine carboxylic acid) should be deleted since other similar examples were included against the same heading.
 - (iv) The chemical structures of 6 more products (hydrocortisone, prednisone, prednisolone, androstane, estrane and pregnane) should be inserted against heading 29.37, together with the skeleton structure of gonane numbering the carbon atoms.
 - (v) The name "barbituric acid" should be inserted between brackets against "malonylurea" in Item No. 355.
4. Finally, the Chairman drew attention of delegates to paragraph 11 of Doc 41.664 and asked them to provide further comments, if any, to the Secretariat by the end of January 1998. The Secretariat was asked to finalize the list, taking into account the views expressed by the delegates during the meeting and comments to be submitted by administrations and circulate it to administrations with a view to seeking approval by the HS Committee at its next session (March 1998).

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x x

1	2	
41.150 41.665 41.797	Classification of certain INN products.	<u>See Annex D.</u>

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. The Sub-Committee examined the classification of certain INN products on the basis of Docs. 41.150, 41.665 and 41.797.
2. The Sub-Committee first examined the conclusions of the Working Group (June 1997) on the classification of INNs set out at Annex II to Doc. 41.150. As regards the proposed modifications concerning the HS classification for INN products in WHO lists 1-69 (Part I of Annex II to Doc. 41.150), the Delegate of the US disagreed with the classification of teniposide in heading 29.38 as the literature referred by him indicated that it was a derivative of podophyllotoxin and not a natural glycoside. The Chairman clarified that the product should still be classified in subheading 2938.90 as the text of heading 29.38 included derivatives of natural glycosides.
3. The Sub-Committee finally agreed with all the classifications recommended by the Working Group for WHO lists 1-69 (Part I) and for WHO lists 74-76 (Part II). The lists of products and their classifications are set out in Annex D (Parts I and II) to this Report.
4. The Sub-Committee also agreed with the classification of all INN products in WHO list 77, as proposed by the EC and endorsed by the Secretariat in the Annex to Doc. 41.797. The list of INNs and their classifications are set out in Annex D (Part III) to this Report.
5. As regards new proposal by the EC for amendments to the HS classification for certain INN products in WHO lists 1-69 (Annex III to Doc. 41.665), the Sub-Committee agreed with the classification of all of the products proposed by the EC except for pentoxifylline and propentofylline. With regard to pentoxifylline and propentofylline, it was pointed out that they could be considered as derivatives of both theobromine and theophylline. It was therefore necessary to re-examine the scope of derivatives in the context of alkaloids of heading 29.39 especially as to whether the replacement of one of the two methyl groups by another group could be regarded as changing the essential characteristics of theophylline. The Secretariat was asked to study the matter for examination at the next session. In the meanwhile both classifications were placed in square brackets. The list of products and classifications (including those placed in square brackets) are set out in Annex D (Part IV) to this Report.
6. The Sub-Committee also re-examined the classification of certain INN products which was postponed at the previous session (Annex IV to Doc. 41.665). The conclusions of the Sub-Committee with respect to these products are summarized in Annex D (Part V) to this Report.

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x x

1	2
41.666	Possible amendment of heading 25.18.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. On the basis of Doc. 41.666, the Sub-Committee continued its examination of the questions posed by the Review Sub-Committee concerning possible amendment of heading 25.18.
 - (a) Whether the term “calcinée” only should be used in the French texts of heading 25.18 and subheadings 2518.10 and 2518.20 as the equivalent of “calcined” in the English version
2. The Delegate of Germany explained that, in order to be used as a refractory material, dolomite had to be heated to about 1700 ° C and tar was used to cover dolomite to prevent absorption of water. He noted that calcination of dolomite was done at much lower temperatures. In his view, it was necessary to retain the French term “frittée” which meant high temperature calcination or sintering, in the text of heading 25.18 and of subheadings 2518.10 and 2518.20. In this connection, he referred to heading 25.19 where the English term “sintered” was used as the equivalent of the French term “frittée”. Therefore, the English texts should be aligned on the French texts by inserting the term “sintered”. Another possible solution was to delete the terms “calcined” (English) and “frittée ou calcinée” (French) and to substitute the expression “heat treated” for both versions in the texts of heading 25.18 and subheadings 2518.10 and 2518.20.
3. Several other Delegates stated that the English term “calcined” as used in the English version could mean to cover both conventional calcination and high temperature calcination (sintering). Nevertheless, noting that the term “calcined” did not usually associate with high temperature calcining, they agreed that it would be more appropriate to align the English version on the French version by inserting the term “sintered”.
4. The Delegate of Canada, however, was of the opinion that addition of the term “sintering” to the text of heading 25.18 (and to the texts of subheadings 2518.10 and 2518.20, accordingly) would markedly change the scope of that heading. He therefore needed more time to consider the implications of the proposed amendment.
5. The Delegate of the US explained that processing of dolomite involved three levels : non-calcined dolomite, calcined dolomite (around 900 ° C) and sintered dolomite (around 1700 ° C to obtain refractory material). To avoid any complication regarding the meaning of the terms “calcined” and “sintered”, the Explanatory Note to heading 25.18 could possibly be amended by explicitly referring to these processing levels.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

6. After discussion, the Sub-Committee concluded that it would be appropriate to align the English texts of heading 25.18 and subheadings 2518.10 and 2518.20 on the French texts by inserting the term "sintered". In addition, it was also appropriate to amend the Explanatory Note to this heading to clarify its scope, taking into account the suggestion by the U.S. Delegate.
- (b) Whether the expression "pisé de dolomie" should be replaced by "dolomie agglomérée (y compris la dolomie goudronnée)" in the French texts of heading 25.18 and subheading 2518.30 as the equivalent of "agglomerated dolomite (including tarred dolomite)" in the English version; or, this latter expression in the English version should be replaced by "ramming material dolomite" or "dolomite mixed with binders [(including tarred dolomite)]" as the equivalent of "pisé de dolomie" in the French version
7. The Delegate of France explained that the expression "pisé de dolomie", as used by the French industry, referred to calcined or sintered dolomite mixed with binders and was in powder form. On the other hand, agglomerated dolomite referred to products shaped by agglomeration. Such products were, in his view, classifiable in heading 68.15 as indicated in Item (4) of the Explanatory Note to that heading (page 994). The Delegate of Germany added that the term "pisé" was a specific term used in France and in southern part of Germany to correctly describe a product obtained by a special technique. Both delegates, therefore, suggested that the expression "pisé de dolomie" be kept in the French texts and the English texts be aligned on that basis.
8. However, several other Delegates felt that replacing the expression "agglomerated dolomite (including tarred dolomite)" in the English version by "ramming material dolomite" or "dolomite mixed with binders [(including tarred dolomite)]" as suggested by the Secretariat, could change the scope of heading 25.18 and subheading 2518.30. Further, these expressions would not be equivalent to the expression "pisé de dolomie" in the French version. They, therefore, preferred to keep the status quo.
9. After discussion, the Sub-Committee agreed that the expression "pisé de dolomie" should be retained in the French texts. The expression "agglomerated dolomite (including tarred dolomite)" in the English texts of heading 25.18 and subheading 2518.30 had to be aligned with the French texts. The Secretariat was asked to prepare appropriate texts to reflect the fact that the products covered by subheading 2518.30 were made of sintered dolomite and were in powder (or granular) form as understood by the French text "pisé de dolomie".
- (c) Whether non-calcined dolomite could be used as a refractory material
10. In this respect, the Sub-Committee agreed with the point made by the Secretariat in paragraph 24 of the working document in that non-calcined dolomite could not be used as a refractory material. In this connection, it was concluded that the French version of the last sentence of the third paragraph of the Explanatory Note to heading 25.18 had to be amended accordingly.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

11. The Sub-Committee finally agreed to re-examine the whole question at its next session on the basis of a new document with draft amendments to the legal texts and Explanatory Notes to be prepared by the Secretariat taking into account the above conclusions. Administrations were invited to submit comments and proposals for amending the legal texts and Explanatory Notes to the Secretariat during the intersession.

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1	2
41.667	U.S. proposal concerning caramel colour.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. The Sub-Committee examined the possibility of establishing criteria for the distinction between “caramel colour” and “caramelised sugars” or molasses, on the basis of Doc. 41.667.
2. The Delegate of the United States noted that, though his Administration had suggested the “organoleptic” test method at the Review Sub-Committee’s 15th Session, this method could not be recommended from a scientific point of view. Following discussions with industry, it seemed possible to make a distinction based on sugar content. Caramel colours usually contained only 5-7 % residual sugar, whereas caramelised sugars contained 40-90 % sugar. He, therefore, proposed a maximum sugar content of 10 %, on a dry weight basis, be set up for caramel colours. With regard to the distinction between caramel colours and molasses, he noted that molasses contained reducing sugars which could easily be determined by the HPLC method.
3. Many delegates supported the 10 % threshold proposed by the Delegate of the U.S., together with a colour intensity criterion. It was however noted that such criteria might not cover the entire range of caramel colours, but should include the vast majority of such products and would be a practical approach to the matter.
4. Some delegates, however, felt that a distinguishing criterion based on sugar content was not so easy to apply and could cause problems in the future. It was also pointed out that caramel colours were typical products of the sugar industry and, therefore, they should remain in Chapter 17 and should not be transferred to Chapter 32.
5. After discussion, the Sub-Committee concluded that criteria based on a combination of sugar content and colour intensity were appropriate to distinguish between “caramel colour” and “caramelised sugars”. It, therefore, agreed to suggest to the Review Sub-Committee that the residual sugar content in “caramel colour” should be a maximum of 10 % calculated on a dry weight basis and that the colour intensity should be minimum 0.01 absorbance units (a.u.), as indicated in the Codex Alimentarius.
6. With regard to the distinction between caramel colour and molasses, it was noted that the molasses contained high amounts of reducing sugars and betaine (about 5 %) and, therefore, could be easily distinguished from caramel colour.
7. As to the analytical methods, it was agreed that the residual sugar content could be easily determined by the HPLC method. With regard to the method of determination of colour intensity, the Delegate of the United States indicated that he would submit additional information to the Secretariat. The Delegate of the UK indicated that any method for determining colour intensity should be an internationally accepted one.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

8. Referring to the United States proposal to transfer caramel colour to Chapter 32, the Delegate of Canada expressed the view that heading 32.04 would be more appropriate as it was a synthetic organic colouring matter, rather than heading 32.03 which covered natural colouring matter. The Delegate of the US felt that since caramel colour was a colouring matter of natural origin, it was proper to heading 32.03. The Sub-Committee, however, noted that this was a matter for the Review Sub-Committee to consider.

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x x

1	2	4
41.668	Draft amendments to the Explanatory Notes concerning narcotic drugs, psychotropic substances and their precursors.	<u>See Annex C/4.</u>

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. On the basis of Doc. 41.668, the Sub-Committee discussed draft amendments to the Explanatory Notes concerning narcotic drugs, psychotropic substances and their precursors.
2. With regard to the question of insertion of CAS Nos., many delegates were of the view that the proposed Explanatory Note amendment should be adopted with the available CAS Nos. and that missing CAS Nos. could be inserted in the future. In this connection, the representative of the UNDCP stated that his organization could make efforts to obtain the missing CAS Nos. at a later date. The Sub-Committee therefore decided to incorporate the available CAS Nos. in the proposed Explanatory Note.
3. The Sub-Committee agreed that all the resinate derivatives listed in paragraph 6 of Doc. 41.668 should be classified in heading 30.03. With regard to the classification at six-digit level it was agreed that subheading 3003.40 would apply when they contained alkaloids or derivatives thereof. Others should be classified in subheading 3003.90.
4. With regard to the EC proposal for modification of certain chemical names (paragraph 6 of Doc. 41.668), the Sub-Committee agreed with the Secretariat comments and adopted the following changes :
 - Codéine-N-oxide => N-Oxyde de codéine (French only)
 - Napsylate de dextropropoxyphene/Dextropropoxyphene napsylate => "napsilate"
 - Levo-A-acétylméthadol/Levo-A-acetylmethadol => Lévacétylméthadol/Levacetylmethadol
 - Morphine-N-oxide => N-Oxyde de morphine (French only)
 - Ethylsulfonate de piminodine/Piminodine ethylsulfonate => Esilate de piminodine/Piminodine esilate

Precursors :

- Diéthyl éther => Oxyde de diéthyle (diéthyléther) (French only)
- Ethyl ether => Diethyl ether (English only)
- Hydrochloric acid => Hydrogen chloride (hydrochloric acid) (English only)
- Méthyl éthyl cétone/Methyl ethyl ketone => Butanone (éthylméthylcétone)/Butanone (ethyl methyl ketone)
- 1-Phénylpropane-2-one/1-Phenyl-2-propanone => Phénylacétone (benzylméthylcétone, phénylpropane-2-one)/Phenylacetone (benzyl methyl ketone, phenylpropan-2-one)

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

In this connection, the Sub-Committee also agreed to substitute the term "methylsulfonate" by the term "mesilate" for a few other items listed in the proposed text for amending the Explanatory Notes.

5. The Sub-Committee also approved the change in classification of piperidine platinichloride, narcocodeine platinichloride and mescaline platinichloride to subheading 2843.90 as they were organic chemicals of precious metals (paragraph 8 to Doc. 41.668).
6. Concerning the classification of cathine (paragraph 9 of Doc. 41.668) in subheading 2939.49 as a derivative of pseudoephedrine, some delegates expressed concern that removal of a methyl group significantly changed the character of cathine to be considered as a derivative of pseudoephedrine. They said that the scope of derivatives in the Explanatory Note to heading 29.39 was quite unclear with regard to removal of characteristic groups or functional groups. In this connection, it was pointed out that the scope of derivatives was discussed at length at the previous sessions of the Sub-Committee and amendments to the Explanatory Notes were also adopted. Finally, the Sub-Committee confirmed the classification of cathine in subheading 2939.49 as a derivative of pseudoephedrine. It was noted that administrations which wished to further clarify the scope of derivatives in the context of alkaloids could submit proposals for consideration of the Sub-Committee in the future.
7. Finally, the Sub-Committee adopted, subject to the suitable modifications based on the above decisions, the draft amendment to the Explanatory Note proposed by the Secretariat in the Annex to Doc. 41.668. The texts adopted are set out in Annex C/4 to this Report.

x
x x

1	2
41.669	Proposal by the Canadian Administration for amendments to the Nomenclature concerning Canola seeds, Canola oil and Canola meal.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. On the basis of Doc. 41.669, the Sub-Committee examined the questions posed by the Review Sub-Committee in connection with the proposal by the Canadian Administration for amendments to the Nomenclature concerning canola seeds, canola oil and canola meal.
2. Some delegates pointed out that "canola" was a genetically altered variety of rape or colza seed for which there was no definition at international level since it was a registered trademark. They also noted that certain rape or colza seed oils with low erucic acid content, not derived from canola seeds, were available in the market and it was difficult to distinguish them from canola oil if a criterion of erucic acid limit was prescribed for defining canola products. They therefore preferred to avoid using the term "canola" in the legal texts and to use another description such as "low erucic acid rapeseed" with certain figures.
1. Referring to the Internet Web Site of the Canola Council of Canada, the Delegate of Germany indicated that this Council asked for a fee for using the name "canola" and that "canola" was a registered trademark in at least five countries.
2. The Delegate of Canada, supported by some other delegates, indicated that the questions posed by the Review Sub-Committee were technical in nature. However, the term "canola" was no longer a trademark but a generic term referring to low erucic acid and low glucosinolate varieties of rapeseed. The volume of world trade in canola products was very high, and the intention of the Canadian Administration was to recognize these products in the HS. The criteria proposed by Canada were in fact already used worldwide, including Europe. In this regard, one delegate suggested that the erucic acid content criterion alone would be sufficient for the easy identification of canola products, since determination of glucosinolate content was probably difficult. However, taking into account the fact that all available technical references described canola seeds on the basis of two criteria, namely, low erucic acid and low glucosinolate contents, the Sub-Committee agreed that it was appropriate to use both criteria as proposed by the Canadian Administration. The Sub-Committee also agreed with the Canadian Administration that an upper limit of 2 % erucic acid in canola oil and a maximum of 30 µmol/g glucosinolate level in the solid component were appropriate to distinguish canola meal from rape or colza seed meals.
3. As to the methods of analysis for determining these criteria, the Sub-Committee agreed that the AOAC methods summarized in paragraphs 11 to 16 of the working document were appropriate for determining the erucic acid content.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

4. In respect of the glucosinolate content, it was noted that High Performance Liquid Chromatography (HPLC) method (see paragraphs 17 to 19 of Doc. 41.669) could be applicable for testing the types of glucosinolate specified by Canada in the proposed new Subheading Note 1 to Chapter 12. In this connection, the Delegate of Canada explained that these specific glucosinolates were the major types commonly found in canola seeds. HPLC method was used by Canada, but some other methods were also available and applied by other countries. The Delegate of the UK indicated that the EC used the test methods specified in ISO - 91.671 and ISO - 91.672.
5. However, taking into account the fact that there were about ninety types of glucosinolates, the Sub-Committee agreed that X-Ray Fluorescence (XRF) method could be effectively used to determine the total glucosinolate content of canola seed and canola meal. In that case, it would be appropriate not to limit the scope to the types of glucosinolate specified by Canada in the proposed Subheading Note 1 to Chapter 12. It was finally agreed to use a general expression (e.g., "...less than 30 micromoles of glucosinolates per gram").
6. In the context of the proposed legal amendments, it was noted that most of the rape or colza seed varieties presently produced around the world were low in both erucic acid and glucosinolate contents and that the traditional varieties of high erucic content were probably not produced in larger quantities any longer. This aspect could be taken into consideration by the Review Sub-Committee while amending the legal texts. The text of heading 15.14 also required amendment to specify "canola oil" in a similar way as proposed for heading 12.05. [As for the texts of new subheadings, a choice between "canola" and another description was left to the Review Sub-Committee.]

x

x x

1	2
41.670	Classification of premixes containing antibiotics.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. On the basis of Doc. 41.670, the Sub-Committee examined (i) what kind of antibiotics could be allowed in the premixes of heading 23.09; (ii) the maximum amount (threshold %) of antibiotics allowed in premixes which would not make them preparations with therapeutic or prophylactic properties within the scope of Chapter 30; (iii) whether thresholds should be established by having regard to the concentration in the final animal feed; and (iv) whether any other criteria could be established for distinguishing between premixes of heading 23.09 and medicinal preparations of Chapter 30.
2. Many delegates indicated that lists of permitted antibiotics for premixes existed in their national regulations, but the type of antibiotics and their dosage depended on the kind of animals, age of animals and the purpose for which they were administered. After a brief exchange of views, the Sub-Committee agreed that, although lists of permitted antibiotics existed in many countries, it would not be possible to compile a common list of allowed antibiotics since the matter was regulated in each country.
3. With regard to maximum amount of antibiotics allowed in premixes of heading 23.09, the Sub-Committee concluded that it would not be possible to establish such a criterion since many of the premixes could be used both for regulating the growth of animals and for the treatment of diseases, depending on the administration of the dosage. It was pointed out that such dual use products could not be classified in different headings depending on the use, which was not known to Customs at the time of importation. In connection with this issue, reference was made to the Explanatory Note to heading 23.09 (page 188, Item (b) of the third paragraph) which indicated that basic preparations used in making "premixes" had an antibiotic content ranging generally between 8 % and 16 %.
4. The Sub-Committee also agreed that it would be difficult to establish thresholds of antibiotics having regard to the concentration in the final (mixed) animal feed, since the amount of active ingredients required depended on the kind of animal, its weight, age, etc. and the purpose for which the premix was used.
5. With regard to the question whether any other criteria could be established for distinguishing between premixes of heading 23.09 and medicinal preparations of Chapter 30, the Sub-Committee was of the view that general criteria were difficult and that classification would have to be determined on a case by case basis. In this regard, Mr. Kusahara asked the opinion of the Sub-Committee on the classification of several preparations listed in the Annex to Doc. 41.670. One delegate said that he would classify all those preparations in heading 23.09 as premixes. When classification of specific preparations such as "Tylan 40" (which could be used both for regulating growth and treatment of animals) and "Lincomix 110" (which was indicated as used for prevention or treatment of disease in animals) were discussed, the opinions were divided. Some delegates would classify both preparations as premixes in heading 23.09 while others preferred to classify them as medicaments of Chapter 30.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

6. The Delegate of the United Kingdom said that, in the EC legislation, these preparations were grouped into two categories. One group covered so-called "POM" (Prescriptive Medicine Only) preparations which could only be added to animal feed with the consent of a veterinarian. The other group covered so-called "PML" (Pharmaceutical Merchants List) preparations which could be added to animal feed by a licensed "mixer" only. In his view, these indications could be a guide for classification.

7. After discussion, the Sub-Committee concluded that for the time being generally applicable criteria for distinguishing between premixes of heading 23.09 and medicinal preparations of Chapter 30 could not be found and would require a thorough study if needed. However, the manner of presentation of such preparations, packing, concentration of active ingredients, type of carriers used in the preparation, indications of use and dosage, limitations as to the period of use, whether the preparation could be used for regulating growth of animals or for treatment purposes only, whether supervision of a veterinarian was required for use, etc., were parameters which could be taken into consideration when classifying such preparations. The Sub-Committee finally agreed that this issue could be re-examined at a later stage.

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x x

1	2
41.671	Classification of "Rozmrazovac - 80 °C".

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. The Sub-Committee examined three questions posed by the Harmonized System Committee concerning "Rozmrazovac 80 °C" (paragraph 3 of Doc. 41.671).
2. Concerning the first question, i.e., whether the substances, other than water and ethanol, in the preparation were simply denaturants or whether they rendered the preparation something other than denatured alcohol of heading 22.07, there was consensus that they were not simply denaturants. Opinions were divided, however, as to the role of these substances in the preparation.
3. In this connection, the Delegate of Finland took the view that the presence of a surfactant was not typical of de-icing preparations and that, instead of being a de-icer, "Rozmrazovac" was suitable for use as a windscreen washing preparation. As the product contained a surface-active agent, it was, in his view, a product of heading 34.02.
4. The Delegate of Canada supported this view, noting that the high ethanol concentration allowed the washing preparation to be used at low temperatures. He further noted that de-icing preparations usually contained little or no water, but instead consisted almost entirely of alcohols or mixtures of alcohols with glycols; such preparations were sprayed directly on the windscreen to facilitate the removal of ice. Windscreen washing preparations, on the other hand, generally contained about 50 percent alcohols, the remainder being water, surfactants and a blue dye; these preparations were kept in the windscreen washer reservoir year round and were used for cleaning the windscreen in hot or cold weather. He added that the ethylene glycol served to prevent the solution from freezing during cold weather.
5. The Delegate of Norway supported the Finnish and Canadian views and noted that, in the end, de-icing fluids served to facilitate the physical scraping of ice from the windscreen.
6. The Delegate of the United States expressed his opinion that, though the products were probably not deliberately denatured, they were nevertheless not potable. He agreed that the added substances were present for purposes other than as denaturants. He felt that, as presented (i.e., without further dilution with water), the products could be used as de-icing fluid.
7. The Delegate of Switzerland indicated that surface-active agents were typically found in de-icing fluids, though such preparations generally contained two or more alcohols, not just ethanol.
8. The Delegate of Germany noted that the purpose of the surfactant was to improve the wetting of the surface to give better contact between the de-icer and the ice. He also felt that ethylene glycol served to reduce the volatility of the ethanol in the preparation.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

9. Regarding the first question, therefore, the Sub-Committee concluded that the substances, other than ethanol and water, in "Rozmrazovac" rendered the preparation suitable for cleaning windscreens and that the ethylene glycol prevented water from freezing on the windshield during the washing process in cold weather.
10. Concerning the minimum concentration of ethanol necessary in "Rozmrazovac" for it to be suitable for windscreen de-icing, the Delegate of Japan pointed out that typical washing preparations contained 10 to 50 percent alcohols when diluted, whereas de-icing preparations contained 70 to 100 percent alcohols. He noted, however, that it would be very difficult to set a single threshold for ethanol content in this regard.
11. The US Delegate noted that the minimum ethanol content would depend on the formulation. Since many such formulations contained other alcohols or glycols, the ethanol content could vary widely. In the absence of other alcohols or glycols, he was of the view that the minimum ethanol content would have to be higher than 90 percent.
12. The German Delegate, however, pointed out that a preparation of water with only 10 percent of ethanol had a depressed freezing point, i.e., - 4.5 °C. Such preparations containing 20, 30 and 40 percent of ethanol froze at -10.9 °C, -21.4 °C and - 29.3 °C, respectively. Thus, he concluded that the minimum ethanol content in a de-icing preparation would depend on the climate where the preparation was used.
13. Following further discussion on this second question, the Sub-Committee concluded that it was not possible to determine a minimum ethanol content necessary for preparations like "Rozmrazovac" to be effective as de-icing preparations.
14. In response to the third question, i.e., what additives would render preparations particularly suitable as de-icing fluids, the Delegate of Austria pointed out that such fluids usually consisted almost entirely of mixtures of alcohols (70 to 80 percent) with glycols (20 to 30 percent). In other words, no additives were necessary to render these fluids suitable for use as de-icers. The Sub-Committee concurred with this view.

x

x x

1	2	4	5
41.673	Possible amendments to the legal texts and the Explanatory Notes to group together all concentrates of poppy straw in heading 29.39.	<u>See Annex C/5.</u>	<u>See Annex C/5.</u>

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. The Sub-Committee examined (i) how to distinguish between “opium” and “concentrates of poppy straw” and (ii) proposed amendments to the legal texts and Explanatory Notes, on the basis of Doc. 41.673.
2. The Observer for the UNDCP (United Nations International Drug Control Programme) informed the Sub-Committee that, in the 1961 Single Convention on Narcotic Drugs, opium was not regarded as an extract but rather a product of the opium poppy. Concentrate of poppy straw was defined as “the material extracted from the poppy straw by processes which concentrated the alkaloid content”. Concentrate of poppy straw was also referred to as “crude opium”. The typical range of alkaloids in concentrates of poppy straw in trade was between 60 and 80 %.
3. The Delegate of India said that opium was the sap or latex obtained from the poppy capsules and was not an extract. Concentrates of poppy straw had a higher content of alkaloids and could be distinguished from opium in laboratory analysis. Further, opium contained certain minor alkaloids and chemicals which could easily be determined by the HPLC method. He therefore felt that concentrates of poppy straw included extracts from poppy even without further purification. Several delegates supported this view and said that all extracts of poppy straw, regardless of purity, should be classified in heading 29.39, while only the opium sap of the poppy should remain in heading 13.02. This approach would facilitate the classification.
4. Other delegates, however, pointed out that the text of heading 13.02 covered vegetable saps and extracts and making a deviation with respect to opium extracts was not appropriate. Furthermore, extracts of poppy contained a small concentration of alkaloids and that concentrates of poppy straw were obtained by further purification of extracts in order to increase the alkaloid content. They also noted that simple extracts were not common in international trade.
5. In the ensuing discussions, it became clear that making a distinction between poppy extract and concentrates of poppy straw on the basis of chemical processes for concentration or purification was not adequate as it was difficult to identify the processes undergone at the point of importation. In this regard the Chairman recalled that the Sub-Committee, at a previous session, had agreed that all concentrates of poppy straw should fall in Chapter 29 as the products in trade usually contained a very high percentage of alkaloids. At that time it was agreed that the level of the total alkaloid content of not less than 50 % by weight for concentrates of poppy straw suggested by the UNDCP was acceptable. The Sub-Committee, however, at that time preferred not to specify the concentration of alkaloids as it was not felt necessary. In view of the potential difficulties in distinguishing between opium and concentrates of poppy straw based on chemical

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

processes, the Chairman suggested that the 50 % alkaloid content criterion be adopted for the purpose and it be incorporated in the new legal Note 1 (f) to Chapter 13.

6. The Sub-Committee agreed to the above suggestion of the Chairman and adopted the texts for amendment of the Nomenclature and Explanatory Notes. The texts adopted are set forth in Annex C/5 to this Report.

x

x x

1	2	4	5
41.480 (RSC/16) 41.674	Proposal to amend the Nomenclature and Explanatory Notes concerning polymers.	<u>See Annex C/3.</u>	<u>See Annex C/3.</u>

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. On the basis of Docs. 41.480 and 41.674, the Sub-Committee examined a proposal by Canada to amend the French version of the Nomenclature and Explanatory Notes concerning certain polymers.
2. The Delegate of Canada explained that there were problems with applying the Subheading Explanatory Note 1, concerning polymers, since homopolymers beginning with the prefix "poly" were not always named in that manner in the French version. For the moment, he felt that it was important to deal with these specific polymer names by replacing them with the proper IUPAC names; any systematic approach to insert IUPAC nomenclature for polymers in other parts of the HS, both in French and in English, could be addressed at a later stage on the basis of proposals by administrations. The Sub-Committee concurred with this approach.
3. Regarding the specific amendments proposed by Canada for the present (summarized in Annex B to Doc. 41.480), the Delegate of France expressed concerns about deleting from the French text of heading 39.05 common polymer names which were readily recognized in the industry. He suggested, therefore, that the IUPAC names could be inserted and the common names placed in parentheses immediately following.
4. However, the Delegates of Spain and Switzerland expressed a preference for using the IUPAC names. The Sub-Committee agreed and approved the draft amendments to the Nomenclature and Explanatory Notes proposed by the Canadian Administration (Annex B to Doc. 41.480).
5. The French Delegate also asked that he be given an opportunity to review the proposed French texts more carefully with a view to submitting technical comments to the Review Sub-Committee in January 1998, if necessary. He specifically noted that the term "poly(alcool de vinyle)" might more appropriately be called "poly(alcool vinylique)"; in these cases, the two options were left in square brackets subject to verification by the French Administration which was asked to submit its findings to the Review Sub-Committee.
6. The texts provisionally accepted by the Sub-Committee are set out in Annex C/3 to this Report.
7. The Sub-Committee recognized that other polymer names in both the French and English versions of the Nomenclature and Explanatory Notes were not consistently written according to IUPAC rules for naming polymers. Though this did not create any problems with classification or interpretation, it was agreed that a systematic review be carried out to update the legal texts and Explanatory Notes in this regard.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

8. In this connection, the Delegate of the US pointed out that certain polymer names beginning with the prefix "poly" (e.g., polyethylene glycols) had widely varying types and proportions of repeating monomer units; as such, they might not be named in the same manner as other polymers having the prefix "poly". Examples of such polymers were set out in paragraph 14 of Doc. 41.480. The Sub-Committee agreed that the US suggestion should be taken into account while undertaking the systematic review.
9. Finally, the Delegate of Canada stated that his Administration would submit proposals to the Sub-Committee for systematic amendment of the Harmonized System and its Explanatory Notes to reflect IUPAC polymer names.

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x x

1	2
41.575 (RSC/16) 41.675	Possible amendments to subheadings 2903.1 and 2903.2.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. On the basis of Docs. 41.575 and 41.675, the Sub-Committee revisited the question of amending the texts of subheadings of heading 29.03 to achieve better clarity.
2. It was noted that amendments already proposed by the Argentine Administration in this regard had not been supported by the Scientific Sub-Committee because they seemed to be misleading and could lead to confusion. With this in mind, the Secretariat had offered a compromise proposal to the Review Sub-Committee which was subsequently referred back to the Scientific Sub-Committee.
3. While certain delegates stated that they could accept the compromise texts proposed by the Secretariat, there was unanimous agreement in the Sub-Committee that the best course of action would be to retain the present texts, which were clear and caused no problems with classification or interpretation.

x

x x

1	2
41.676	Test methods for "rigid" and "flexible" polymers and copolymers vinyl chloride.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. On the basis of Doc. 41.676, the Sub-Committee examined the test methods for "rigid" and "flexible" polymers and copolymers vinyl chloride.
2. The Delegate of the United States clarified that the test method proposed by his Administration was the "standard method of test for stiffness of plastics by means of a cantilever beam" specified in ASTM D747-70.
3. As regards the suitability of the two test methods proposed by the US Administration and the EC to distinguish between "rigid" and "flexible" products of subheading 3920.4, the opinions were divided. Some delegates felt that the test method proposed by the US Administration was internationally accepted and provided reliable results. However the testing conditions (controlled temperature and humidity conditions) and the equipment were expensive causing difficulties to many administrations. In this context, the Delegate of the US stated that the rigidity test suggested by his Administration was usually carried out by manufacturers and that documents indicating specifications based on such tests could be obtained from the manufacturers and importers. It was, therefore, not essential to carry out the tests at the point of importation. However, it was generally felt that any test method recommended for HS purposes should be readily accessible to administrations and should be cost effective.
4. On the other hand, many delegates felt that the test method proposed by the EC was simple and could be carried out by any Customs officer. However the EC method did not have any scientific basis nor was it accepted internationally. The accuracy of the test was also in doubt as the result could vary depending on the nature of the sample, its shape and thickness. In effect, it might not indicate the inherent nature of the product as rigid or flexible.
5. The Delegate of Canada expressed a preference for using plasticiser content as a means of distinguishing between "rigid" and "flexible" products of subheading 3920.4.
6. After discussion, the Sub-Committee concluded that both test methods had advantages and disadvantages.
7. Concerning the question of whether the test methods in question were equivalent or otherwise in the coverage of products, many Delegates felt that the results obtained by these methods would not be the same because the US method was based on the rigidity of the products whereas the EC method was based on the flexibility of the products. Further, there was no data available for comparison of the test results.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

8. As for the question whether these test methods could be applied to all types of products of subheading 3920.4, one delegate said that the EC method could apply only to products in the form of sheets and films. The Delegate of the US explained that the ASTM method could be applied to all types of products except for thin films (e.g. films for food wrapping) which were usually flexible and needed no testing. The UK Delegate indicated that the test would measure the inherent tensile properties of the plastics; whether the sheet was rigid or not could depend upon its thickness.
9. Regarding the question of whether the methods were simpler or more complex compared to the test methods for zero tolerance of plasticisers, several delegates expressed their strong concerns whether products with zero tolerance of plasticisers existed. It was pointed out that small amounts of plasticisers were always found in products of subheading 3920.4 when analysed in a laboratory. It was also noted that there were difficulties in prescribing an upper limit of plasticisers for rigid products when the question was examined by the Sub-Committee in the past mainly because there was no clear definition of plasticisers.

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x x

1	2
41.672	Classification of aspartame.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. On the basis of comments by the Romanian Administration (Doc. 41.672), the Sub-Committee examined the classification of aspartame.
2. There was no support for the Romanian argument that the peptide link in aspartame was not an amide function, but simply an amine function with an accompanying oxygen function. Instead, the Sub-Committee unanimously agreed that the peptide link was an N-substituted amide function and, therefore, that aspartame was classifiable in heading 29.24.

x

x x

1	2
41.685	Classification of "topped crude" oils used as refinery feedstocks.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. On the basis of Doc. 41.685, the Sub-Committee examined the questions posed by the Harmonized System Committee concerning the classification of "topped crude" oils used as refinery feedstocks.

The nature and the scope of the term "topped crudes"

2. Referring to paragraph 5 (a) of the working document, the Delegate of Saudi Arabia indicated that "topped crude" could contain certain lighter fractions after atmospheric distillation.
3. The Delegate of the US expressed the view that the results of atmospheric distillation of crude oil given in paragraph 11 of the working document did not represent a typical example. He said that the percentage of residual oil that remained after atmospheric distillation depended on the nature of crude and its geographic origin. In his view, the range was much lower up to 25 % and the 55 % yield quoted in the example was the upper limit. He added that "topped crude" oil was the residual fraction after removal of lighter fractions such as petroleum gases, naphtha, kerosene and gas oil, by atmospheric distillation of whole crude oil. "Topped crude" oils normally did not contain any fractions which could be further removed by atmospheric distillation. They were traded as resid oils, according to information gathered by him from market sources.
4. The Chairman noted that according to information given in Modern Petroleum Technology (Fifth Edition, Part I, page 352) North Sea crude oil could yield as low as 38 % of residual oil.
5. After discussion, the Sub-Committee concluded that "topped crude", as understood in petroleum processing technology, referred to the residual oil fraction which remained after removal of gases, naphtha, kerosene and gas oil by atmospheric distillation (topped crude long residue).

Whether atmospheric distillation is allowed for the products of heading 27.09

6. The Delegate of Saudi Arabia was of the view that "minor" process referred to in item (7) of the Explanatory Notes to heading 27.09 should be interpreted to mean "basic" process which included atmospheric distillation. Although distillation was a refinery process, it was similar to other processes (items (1) to (6)) referred to in the said Explanatory Note, which were carried out not only for preparing the crude oils for marketing but also for separating by-products such as sulphur and petroleum gases.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

7. On the other hand, many delegates agreed that the processes mentioned in the Explanatory Note to heading 27.09 were well-head operations, performed at the oil extraction site in order to stabilise whole crude oils for handling, transportation and marketing. Atmospheric distillation, however, was a complex and major refinery operation requiring substantial investments. In this respect, Part (A) of the Explanatory Note to heading 27.10 (page 227) was clear enough to conclude that atmospheric distillation could not be considered as a "minor process" and thus could not be allowed for the products of heading 27.09.
8. After discussion, the Sub-Committee concluded that atmospheric distillation was not a process permitted for products of heading 27.09.
What process would deprive crude oils of their essential character as "crude oils" of heading 27.09
9. In this respect, the Delegate of Saudi Arabia believed that processes such as catalytic cracking, hydrocracking or visbreaking could change the essential character of crude oils.
10. However, several delegates pointed out that the characteristics of crude oils were determined by their composition represented by the proportion of components. Atmospheric distillation significantly changed the composition of crude oils and thus their essential character by removing a substantial part of the lighter constituents, such as naphtha, kerosene and gas oil.
11. The Sub-Committee concluded that atmospheric distillation would deprive crude oils of the essential character as crude oils of heading 27.09.
12. Finally, referring to paragraph 14 of the working document, the Sub-Committee agreed with the Secretariat that, if the Harmonized System Committee wished to transfer "topped crude" oils from headings 27.10 to 27.09, it would be appropriate to do so by suitably amending the legal texts.

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x x

1	2
41.686	Classification of certain bentonite based products.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. On the basis of Doc. 41.686, the Sub-Committee addressed questions by the Harmonized System Committee concerning certain bentonite based products.
2. There was a consensus that bentonite clay mixed with other substances could not be included in heading 25.08, since such mixtures were specifically excluded by Note 1 to Chapter 25. Further, it was pointed out by the Delegate of France that the Explanatory Note to heading 38.02 (page 557, Item (b) (3)) specifically described activated clays like those under consideration.
3. In this connection, the Delegate of Japan suggested that it might be useful to amend the Explanatory Notes or to issue a Classification Opinion to clarify specifically that natural bentonites were often treated with sodium carbonate to improve their swelling capacity.
4. Furthermore, the Delegate of Canada took the view that intermixtures of different clays of heading 25.08 likewise were not classifiable in heading 25.08. He cited the earlier classification (in the BTN) of "Veegum" products, which were mixtures of calcium and sodium bentonites : these products had been classified in heading 38.19 (BTN), and a Classification Opinion to that effect had been adopted. That Classification Opinion had been dropped from the Compendium when the Harmonized System was implemented, because the Harmonized System Committee felt that the classification of these products in the Harmonized System was clear enough without the need for a Classification Opinion. The Sub-Committee concurred with the Canadian Delegate's view in this regard.
5. Concerning the question of laboratory methods for distinguishing between natural sodium bentonite and sodium bentonite obtained by treating calcium bentonite with sodium carbonate, the Delegate of France informed the Sub-Committee that his Administration had examined some 20 different bentonite products at the request of the EC. He noted that, given the variable composition of natural bentonites, depending upon their source, it was not always possible to rely on a single criterion for making a distinction between a natural product and one obtained by deliberate treatment of calcium bentonite with sodium carbonate. However, he noted that, by considering several criteria taken together (such as pH, swelling capacity, sodium-ion content, exchangeable ion content, etc.), a natural product could usually be distinguished from one that was obtained by chemical treatment.
6. The Delegate of the United States wondered whether it might be possible to make the distinction on the basis of carbonate content. In this connection, several delegates noted that natural bentonites had a very low carbonate content. The Delegate of France pointed out that the carbonate content of natural bentonites might be up to 1.6 percent in the products examined by his laboratory, while activated bentonites (those treated with sodium carbonate) generally contained more than 2 percent of carbonates.
7. The Delegate of Canada added that, for the mixed products under examination, the detection of carbonates was relatively simple, but that, after addition of water, ion exchange took place and the carbonate determination became more difficult.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (contd.)

8. The Delegate of Switzerland noted that natural bentonites often contained other carbonate-containing minerals; so laboratory determinations of carbonate content might be misleading. However, the Delegate of Canada pointed out that carbonates in the natural product were usually in the form of calcium carbonate. Since calcium carbonate was insoluble, it would not interfere with the determination of soluble sodium carbonate present as the result of chemical treatment of natural bentonite.

9. Finally, the Delegate of France agreed to submit a tabular presentation of his Administration's laboratory results concerning bentonite products. He also informed the Sub-Committee that the full laboratory report might be submitted by the EC before the next Harmonized System Committee session. On behalf of the Sub-Committee, the Chairman thanked the Delegate of France for his Administration's efforts and co-operation in this regard.

x

x x

ANNEX B
GENERAL QUESTIONS

1	2
41.677	Technical assistance for the establishment or improvement of Customs laboratories.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. The Sub-Committee took note of the information provided in Doc. 41.677 concerning the technical assistance for the establishment or improvement of Customs laboratories.
2. The Delegate of Canada informed the Sub-Committee that Canada was currently conducting a training course for the Czech Customs laboratory personnel, and it was going to commence a training programme for the Slovakian Customs next year.
3. The Delegate of France also indicated that the French Customs Laboratory had been providing training to laboratory personnel from developing countries of Africa, especially in the detection of narcotic drugs and other aspects of laboratory work. During the current year it had accepted two chemists from Guinea-Bissau for three months each.

x

x x

1	2
41.678 41.688	Future edition of the Customs laboratory guide - Typical examples of analysis actually carried out by Customs laboratories.

OBSERVATIONS OF THE SCIENTIFIC SUB-COMMITTEE (O. Eng.)

1. The Sub-Committee took note of the information provided in Docs. 41.678 and 41.688 concerning the future edition of the Customs Laboratory Guide to include information on typical examples of analyses actually carried out by Customs laboratories.
2. Mr. Kusahara expressed the Secretariat's sincere appreciation to administrations which had provided necessary information. He explained that the intention was to incorporate as many real examples of Customs analyses as possible in a supplementary Chapter to the Customs Laboratory Guide, since those examples would be very useful to Customs laboratories of developing countries and would promote exchange of laboratory information between Customs laboratories. He encouraged Member administrations to send further information on real examples for inclusion in the Laboratory Guide.
3. It was pointed out that administrations were likely to report different analytical methods employed for same type of goods and that including such information in the Laboratory Guide might be misleading. In response, Mr. Kusahara explained that the idea was to provide as much information as possible and availability of different test methods for the same purpose would give a flexibility to administrations who intended to use the information so as to choose the appropriate method depending on the facilities available in the laboratory.

x

x x

ANNEXE C/1

AMENDEMENTS EVENTUELS CONCERNANT LE N° 29.37

(Voir annexe A/1 ci-dessus)

ANNEX C/1

PROPOSED AMENDMENTS CONCERNING HEADING 29.37

(See Annex A/1 above)

PROCEDURE DE L'ARTICLE 16

A. PROJET D'AMENDEMENTS A LA NOMENCLATURE

CHAPITRE 29.

Nouvelle Note 8.

Ajouter la nouvelle Note 8 suivante :

- “8. Pour l'application du n° 29.37 :
- a) la dénomination *hormones* comprend les facteurs libérateurs ou stimulateurs d'hormones, les inhibiteurs d'hormones et les antagonistes d'hormones (anti-hormones).
 - b) l'expression “utilisés principalement comme hormones” s'applique non seulement aux dérivés d'hormones et aux analogues structuraux d'hormones utilisés principalement pour leur action hormonale, mais également aux dérivés et analogues structuraux d'hormones utilisés principalement comme intermédiaires dans la synthèse des produits de cette position.”

N° 29.37.

Nouvelle rédaction :

“29.37 Hormones, prostaglandines, thromboxanes et leucotriènes, naturels ou reproduits par synthèse; leurs dérivés et analogues structuraux, y compris les polypeptides à chaîne modifiée, utilisés principalement comme hormones.

- Hormones polypeptidiques, hormones protéiques et hormones glycoprotéiques, leurs dérivés et analogues structuraux :

2937.11 -- Somatotropine, ses dérivés et analogues structuraux

2937.12 -- Insuline et ses sels

2937.19 -- Autres

- Hormones stéroïdes, leurs dérivés et analogues structuraux :

2937.21 -- Cortisone, hydrocortisone, prednisone (déhydrocortisone) et prednisolone (déhydrohydrocortisone)

2937.22 -- Dérivés halogénés des hormones corticostéroïdes

2937.23 -- Oestrogènes et progestogènes

2937.29 -- Autres

- Hormones de la catécholamine, leurs dérivés et analogues structuraux :

2937.31 -- Epinéphrine

ARTICLE 16 PROCEDURE

A. AMENDMENTS TO THE NOMENCLATURE

CHAPTER 29.

New Note 8.

Insert the following new Note 8 :

“8. For the purposes of heading 29.37 :

- (a) the term “hormones” includes hormone-releasing or hormone-stimulating factors, hormone inhibitors and hormone antagonists (anti-hormones);
- (b) the expression “used primarily as hormones” applies not only to hormone derivatives and structural analogues used primarily for their hormonal effect, but also to those derivatives and structural analogues used primarily as intermediates in the synthesis of products of this heading.”

Heading 29.37.

Delete and substitute :

“29.37 Hormones, prostaglandins, thromboxanes and leukotrienes, natural or reproduced by synthesis; derivatives and structural analogues thereof, including chain modified polypeptides, used primarily as hormones.

- Polypeptide hormones, protein hormones and glycoprotein hormones, their derivatives and structural analogues :

2937.11 -- Somatotropin, its derivatives and structural analogues

2937.12 -- Insulin and its salts

2937.19 -- Other

- Steroidal hormones, their derivatives and structural analogues :

2937.21 -- Cortisone, hydrocortisone, prednisone (dehydrocortisone) and prednisolone (dehydrohydrocortisone)

2937.22 -- Halogenated derivatives of corticosteroidal hormones

2937.23 -- Oestrogens and progestogens

2937.29 -- Other

- Catecholamine hormones, their derivatives and structural analogues :

2937.31 -- Epinephrine

2937.39 -- Autres

2937.40 - Dérivés des amino-acides

2937.50 - Prostaglandines, thromboxanes et leucotriènes, leurs dérivés et analogues structurels

2937.90 - Autres”.

B. MODIFICATIONS AUX NOTES EXPLICATIVES

CHAPITRE 29.

Page 342. Notes de Chapitre. Nouvelle Note 8.

Ajouter la nouvelle Note 8 suivante :

“8. Pour l’application du n° 29.37 :

- a) la dénomination *hormones* s’entend des facteurs libérateurs ou stimulateurs d’hormones, des inhibiteurs d’hormones et des antagonistes d’hormones (anti-hormones);
- b) l’expression “utilisés principalement comme hormones” s’applique non seulement aux dérivés d’hormones et aux analogues structurels d’hormones utilisés principalement pour leur action hormonale, mais également aux dérivés et analogues structurels d’hormones utilisés principalement comme intermédiaires dans la synthèse des produits de cette position.”

Pages 429 à 438. N° 29.37.

Nouvelle rédaction :

“29.37 HORMONES, PROSTAGLANDINES, THROMBOXANES ET LEUCOTRIENES, NATURELS OU REPRODUITS PAR SYNTHÈSE; LEURS DERIVES ET ANALOGUES STRUCTURELS, Y COMPRIS LES POLYPEPTIDES A CHAÎNE MODIFIÉE, UTILISÉS PRINCIPALEMENT COMME HORMONES.

- Hormones polypeptidiques, hormones protéiques et hormones glycoprotéiques, leurs dérivés et analogues structurels :

2937.11 -- **Somatotropine, ses dérivés et analogues structurels**

2937.12 -- **Insuline et ses sels**

2937.19 -- **Autres**

- Hormones stéroïdes, leurs dérivés et analogues structurels :

2937.21 -- **Cortisone, hydrocortisone, prednisone (déhydrocortisone) et prednisolone (déhydrohydrocortisone)**

2937.22 -- **Dérivés halogénés des hormones corticostéroïdes**

2937.39 -- Other

2937.40 - Amino-acid derivatives

2937.50 - Prostaglandins, thromboxanes and leukotrienes, their derivatives and structural analogues

2937.90 - Other”.

B. AMENDMENTS TO THE EXPLANATORY NOTES

CHAPTER 29.

Page 342. Chapter Notes. New Note 8.

Insert the following new Note 8 :

“8. For the purposes of heading 29.37 :

- (a) the term “hormones” includes hormone-releasing or hormone-stimulating factors, hormone inhibitors and hormone antagonists (anti-hormones);
- (b) the expression “used primarily as hormones” applies not only to hormone derivatives and structural analogues used primarily for their hormonal effect, but also to those derivatives and structural analogues used primarily as intermediates in the synthesis of products of this heading.”

Pages 429 to 438. Heading 29.37.

Delete and substitute :

“29.37 HORMONES, PROSTAGLANDINS, THROMBOXANES AND LEUKOTRIENES, NATURAL OR REPRODUCED BY SYNTHESIS; DERIVATIVES AND STRUCTURAL ANALOGUES THEREOF, INCLUDING CHAIN MODIFIED POLYPEPTIDES, USED PRIMARILY AS HORMONES.

- Polypeptide hormones, protein hormones and glycoprotein hormones, their derivatives and structural analogues :

2937.11 -- **Somatotropin, its derivatives and structural analogues**

2937.12 -- **Insulin and its salts**

2937.19 -- **Other**

- Steroidal hormones, their derivatives and structural analogues :

2937.21 -- **Cortisone, hydrocortisone, prednisone (dehydrocortisone) and prednisolone (dehydrohydrocortisone)**

2937.22 -- **Halogenated derivatives of corticosteroidal hormones**

2937.23 -- **Oestrogènes et progestogènes**

2937.29 -- **Autres**

- **Hormones de la catécholamine, leurs dérivés et analogues structurels :**

2937.31 -- **Epinéphrine**

2937.39 -- **Autres**

2937.40 - **Dérivés des amino-acides**

2937.50 - **Prostaglandines, thromboxanes et leucotriènes, leurs dérivés et analogues structurels**

2937.90 - **Autres**".

La présente position comprend :

- I) **Les hormones naturelles**, qui sont des substances actives produites par l'organisme de l'homme ou des animaux, susceptibles, à des doses extrêmement faibles, d'inhiber ou de stimuler le fonctionnement d'organes déterminés, soit en agissant directement sur ces organes soit en déclenchant la synthèse ou la sécrétion de systèmes hormonaux secondaires ou tertiaires. Une des caractéristiques fondamentales qui définissent les hormones est qu'elles se lient à un récepteur moléculaire stéréospécifique pour déclencher une réponse. Ces substances, généralement sécrétées par les glandes endocrines, sont régies par les systèmes sympathique et parasympathique. Les hormones sont véhiculées par le sang, la lymphe ou d'autres liquides de l'organisme. Elles peuvent également provenir de glandes à la fois endocrines et exocrines ou de divers tissus cellulaires. Pour qu'il y ait une réaction hormonale, le transport des hormones par le sang n'est pas considéré comme une condition nécessaire. Des réponses peuvent être déclenchées après libération des hormones dans le liquide interstitiel avec fixation des hormones sur des récepteurs dans les cellules voisines (contrôle paracrine) ou à des récepteurs situés sur la cellule qui libère l'hormone (contrôle autocrine).
- II) **Les prostaglandines, thromboxanes et leucotriènes naturels**, qui sont des composés sécrétés par l'organisme et se comportent comme des hormones ayant une action locale. Les prostaglandines constituent une catégorie d'hormones ou de substances assimilées à des hormones qui sont synthétisées par le tissu sur lequel elles agissent (ou qui agissent sur l'environnement cellulaire local). Ces prostaglandines se lient à des récepteurs cellulaires spécifiques et agissent en tant que modulateurs importants de l'activité cellulaire dans de nombreux tissus. Ces trois familles d'hormones chimiques apparentées (ce sont des dérivés de l'acide arachidonique) sont considérées comme ayant une action assimilable à celle des hormones.
- III) **Les hormones naturelles, prostaglandines, thromboxanes et leucotriènes, reproduits par synthèse (y compris par procédés biotechnologiques)**, c'est-à-dire qui présentent la même structure chimique que le produit naturel.
- IV) **Les dérivés d'hormones, prostaglandines, thromboxanes et leucotriènes, naturels ou reproduits par synthèse**, tels les sels, dérivés halogénés, acétals cycliques, esters, etc., y compris les dérivés mixtes (par exemple, esters de dérivés halogénés), **pour autant qu'ils** soient utilisés principalement comme hormones.

2937.23 -- **Oestrogens and progestogens**

2937.29 -- **Other**

- **Catecholamine hormones, their derivatives and structural analogues :**

2937.31 -- **Epinephrine**

2937.39 -- **Other**

2937.40 - **Amino-acid derivatives**

2937.50 - **Prostaglandins, thromboxanes and leukotrienes, their derivatives and structural analogues**

2937.90 - **Other”.**

This heading includes :

- (I) **Natural hormones**, which are active substances produced in the living tissues of man or animals, extremely small amounts of which are capable of inhibiting or stimulating the functioning of particular organs by acting directly on them or controlling the synthesis or secretion of secondary or tertiary hormone systems. A fundamental defining characteristic of a hormone is that it binds to a stereospecific molecular receptor to activate a response. The secretion of these substances, usually by the endocrine glands, is governed by the sympathetic and para-sympathetic systems. Hormones are carried by the blood, lymph or other fluids of the body. They may also originate in glands which are both endo- and exocrinal or in various cellular tissues. Transport in the blood is not a requisite for a hormonal response. Responses can occur after release of hormones into the interstitial fluid with binding to receptors in nearby cells (paracrine control) or to receptors on the cell that released the hormone (autocrine control).
- (II) **Natural prostaglandins, thromboxanes and leukotrienes**, compounds which are secreted by the body and behave like locally-acting hormones. Prostaglandins are a class of hormones or hormone-like substances which are synthesised by the tissue in which they act (or act in the local cellular environment) by binding to specific cellular receptors and act as important modulators of cell activity in many tissues. These three related chemical families (arachidonic acid derivatives) are said to have “hormone-like action”.
- (III) **Natural hormones, prostaglandins, thromboxanes and leukotrienes reproduced by synthesis (including biotechnological processes)**, that is, having the same chemical structure as the natural substance.
- (IV) **Derivatives of natural or synthetically reproduced hormones, prostaglandins, thromboxanes and leukotrienes**, such as salts, halogenated derivatives, cyclic acetals, esters, etc., including mixed derivatives (e.g., esters of halogenated derivatives), **provided that** they are used primarily as hormones.

- V) **Les analogues d'hormones, prostaglandines, thromboxanes et leucotriènes.** Le terme *analogues* vise les produits chimiques possédant une relation structurelle étroite avec le composé initial mais qui ne sont pas considérés comme des dérivés. Il couvre les composés qui possèdent une ressemblance structurelle avec les composés naturels mais dont un ou plusieurs atomes de la structure ont été remplacés par d'autres.
- a) Les analogues d'hormones polypeptidiques sont formés par addition, séparation, remplacement ou modification de certains amino-acides dans la chaîne polypeptidique naturelle. Ainsi le **somatrem** (DCI) (analogue de la somatotropine) est obtenu par addition d'un amino-acide terminal à la molécule de la somatotropine naturelle; l'**ornipressine** (DCI) (analogue de l'argipressine (DCI) et de la lypressine (DCI) naturelles) est obtenue par remplacement d'un amino-acide à l'intérieur de la molécule d'argipressine ou de lypressine; les gonadolibérines synthétiques comme la **buséreléline** (DCI), la **napharéline** (DCI), la **fertiréline** (DCI), la **leuproréline** (DCI) et la **lutréline** (DCI) (analogues de la gonadoréline (DCI)) sont obtenues par modification et remplacement de certains amino-acides de la chaîne polypeptidique de la **gonadoréline** (DCI) naturelle; la **giraactide** (DCI) (analogue de la corticotropine (DCI)) présente la structure des 18 premiers amino-acides de la corticotropine naturelle dans laquelle le premier amino-acide a été remplacé. La **saralasin** (DCI), qui contient trois amino-acides différents par rapport à la molécule de l'angiotensine II, doit être considérée comme un produit structurellement analogue à cette hormone, bien que ses effets soient antagonistes (la première a un effet hypotenseur et la seconde hypertenseur).
- b) Les analogues d'hormones stéroïdes doivent présenter la structure du gonane, qui peut être altérée par contraction ou extension des cycles ou par remplacement de certains atomes par d'autres (hétéroatomes). Le **domoprednate** (DCI) et l'**oxandrolone** (DCI) sont des exemples de ce type d'analogues. Dans ce groupe et celui des dérivés qui conservent la structure du gonane, on trouve de nombreux produits utilisés comme inhibiteurs et antagonistes des hormones (antihormones) comme la **cyprotérone** (DCI) (antiandrogène), le **danazol** (DCI) (antigonadotrope), l'**épostane** (DCI) (inhibiteur de la progestérone), etc.
- c) Les analogues de prostaglandines, thromboxanes et leucotriènes peuvent être formés par remplacement de certains atomes dans les chaînes, la formation ou la suppression de cycles. Par exemple, dans le **tilsuprost** (DCI), analogue des prostaglandines, des atomes d'oxygène et de carbone ont été remplacés par des atomes d'azote et de soufre et un cycle a été fermé.
- VI) Les **mélanges naturels d'hormones** ou de leurs dérivés ou de stéroïdes reconnus comme possédant une action hormonale (un mélange naturel d'hormones corticostéroïdes, ou d'oestrogènes conjugués, par exemple). En revanche, les mélanges intentionnels ou les préparations sont exclus (**n°s 30.03** ou **30.04** généralement).

Sont également compris dans la présente position les facteurs libérateurs ou stimulateurs d'hormones, les inhibiteurs d'hormones et les antagonistes d'hormones (anti-hormones) (voir la Note 8 du présent Chapitre). Cette position comprend également les dérivés et les analogues structurels, pour autant qu'ils soient à base d'hormones naturelles ou d'hormones reproduites par synthèse et agissent par des mécanismes similaires à ceux des hormones.

Une liste non exhaustive des produits de cette position, groupés selon leur structure chimique, est donnée ci-après.

- (V) **Analogues of hormones, prostaglandins, thromboxanes and leukotrienes.** The term “analogue” refers to chemicals having a close structural relationship to the parent compound, but which are not considered to be derivatives. It includes compounds which have a structural resemblance to the natural compounds, but have had one or more atoms in the structure replaced by others.
- (a) Analogues of polypeptide hormones are formed by adding, separating, replacing or altering certain amino acids in the natural polypeptide chain. **Somatrem** (INN), an analogue of the growth hormone somatotropin, is the result of adding a terminal amino acid to the natural somatotropin molecule. **Ornipressin** (INN), an analogue of natural argipressin (INN) and lypressin (INN), is the result of replacing an internal amino acid in the argipressin or lypressin molecule. The synthetic gonadoliborins, **buserelin** (INN), **nafarelin** (INN), **fertirelin** (INN), **leuprorelin** (INN) and **lutrelin** (INN), analogues of **gonadorelin** (INN) are the result of altering and replacing certain amino acids in the polypeptide chain of natural gonadorelin. **Giractide** (INN), an analogue of **corticotropin** (INN) has the same structure as the first 18 amino acids of natural corticotropin, with the first amino acid replaced. **Saralasin** (INN), which contains three different aminoacids in comparison to the molecule of angiotensin II, should be considered as a structural analogue of angiotensin II, although with antagonist effects (the former is a hypotensor and the latter an hypertensor).
- (b) Analogues of steroid hormones must have the gonane structure, which can be altered by ring contraction or extension or by replacing some atoms in the ring by others (hetero-atoms). **Domoprednate** (INN) and **oxandrolone** (INN) represent two examples of this kind of analogues. The family of analogues and derivatives, which retain the fundamental structure of the gonane described, contains a large number of substances used as hormone inhibitors and antagonists (anti-hormones). Examples are **cyproterone** (INN), an antiandrogen, **danazol** (INN), an antigonadotropin, **epostane** (INN), which inhibits progesterone production.
- (c) Analogues of prostaglandins, thromboxanes and leukotrienes may be formed by substitution of atoms in a chain, or formation or elimination of rings. In **tilsuprost** (INN), a prostaglandin analogue, oxygen and carbon atoms are replaced by nitrogen and sulphur atoms and one ring is closed.
- (VI) **Natural mixtures of hormones** or their derivatives or of steroids recognised as having a hormonal effect (e.g., a natural mixture of corticosteroid hormones or of conjugated oestrogens). Deliberate mixtures or preparations are excluded (generally **heading 30.03** or **30.04**).

Hormone-releasing factors (hormone-stimulating factors), hormone inhibitors and hormone antagonists (antihormones) are also included in this heading, (see Note 8 to this Chapter). The heading also includes derivatives and structural analogues of hormones, provided that they are based on natural hormones, or on those reproduced by synthesis, and that they act using mechanisms similar to those of hormones.

A list of the products of this heading, arranged according to chemical structure, is given below. This list is not exhaustive.

Liste de produits à considérer comme relevant du n° 29.37 (*)

A) HORMONES POLYPEPTIDIQUES, HORMONES PROTEIQUES ET HORMONES GLYCOPROTEIQUES, LEURS DERIVES ET ANALOGUES STRUCTURELS

Cette partie de la position comprend, notamment :

1) La somatotropine, ses dérivés et analogues structurels.

La **somatotropine** (hormones de croissance, GH, STH (hormone somatotrope)). Protéine soluble dans l'eau qui favorise la croissance des tissus et intervient pour régler d'autres phases du métabolisme des protéines. Elle est sécrétée par les cellules somatotropes du lobe antérieur de l'hypophyse. La sécrétion est régulée par un facteur de libération (hormone de libération des hormones de croissance) et par un facteur inhibiteur, la somatostatine. L'hormone de croissance humaine (hGH) est composée d'une chaîne polypeptidique unique de 191 amino-acides fabriqués presque exclusivement grâce à la technologie de recombinaison de l'ADN. Cette partie comprend également des dérivés et les analogues structurels, notamment le **somatrem** (DCI) (méthionyl hGH), l'**hGH acétylé**, le **désamido hGH** et le **somenopor** (DCI).

2) L'insuline et ses sels

L'insuline est un polypeptide contenant 51 groupes d'amino-acides qui est produit par les îlots de Langerhans du pancréas de nombreux animaux. L'insuline humaine peut être obtenue à partir de cet organe par extraction, par modification de l'insuline bovine ou porcine ou par des procédés biotechnologiques faisant appel à des bactéries ou à des levures pour produire de l'insuline humaine recombinante. L'insuline est un facteur de l'absorption cellulaire du glucose et autres éléments nutritifs circulant dans le sang ainsi que de leur emmagasinage sous forme de glycogène et de graisse. L'insuline pure se présente sous forme d'une poudre blanche amorphe et non hygroscopique ou sous forme de cristaux brillants solubles dans l'eau. Elle est utilisée cliniquement dans le traitement des diabètes. Les sels d'insuline comprennent notamment le chlorhydrate d'insuline.

3) La corticotropine (DCI) (ACTH (hormone adrénocorticotrope), adrénocorticotropine). Polypeptide soluble dans l'eau qui stimule une production accrue de stéroïdes adrénocorticaux. Le **giractide** (DCI) est un analogue de la corticotropine.

4) L'hormone lactogénique (LTH, galactine, hormone galactogène, lutéotrophine, mammothrophine, prolactine). Polypeptide qui peut être cristallisé. Active la sécrétion du lait et agit sur l'activité du corps jaune.

5) La thyrotrophine (DCI) (hormone thyroïdienne, TSH (hormone stimulant la thyroïde)). Glycoprotéine qui agit sur la glande thyroïde dans ses rapports avec le sang et dans l'élimination de l'iode. Elle agit sur la croissance et la sécrétion.

6) L'hormone folliculo-stimulante (FSH). Glycoprotéine soluble dans l'eau, qui exerce une action sur les fonctions sexuelles.

(*) Lorsqu'un nom figure dans la liste des dénominations communes internationales applicables aux substances pharmaceutiques que publie l'Organisation mondiale de la santé, ce nom figure en premier lieu et est suivi respectivement de la mention "(DCI)". La mention (DCIM) indique qu'il s'agit d'une dénomination commune internationale modifiée.

List of products which are to be classified as products of heading 29.37 *

(A) POLYPEPTIDE HORMONES, PROTEIN HORMONES AND GLYCOPROTEIN HORMONES, THEIR DERIVATIVES AND STRUCTURAL ANALOGUES

This part includes, *inter alia* :

(1) Somatotropin, its derivatives and structural analogues.

Somatotropin (growth hormone, GH, STH (somatotropic hormone)). Water soluble protein which promotes growth of tissues and is involved in the regulation of other phases of protein metabolism. It is secreted by the somatotropic cells of the anterior pituitary gland. Secretion is regulated by a releasing factor (growth hormone-releasing hormone) and by an inhibitory factor, somatostatin. Human growth hormone (hGH) is a single polypeptide chain of 191 amino-acids manufactured almost exclusively by recombinant DNA technology. This part also includes derivatives and analogues such as **somatrem** (INN) (methionyl hGH), **acetylated hGH**, **desamido hGH** and **somenopor** (INN).

(2) Insulin and its salts

Insulin is a polypeptide containing 51 amino-acid groups and is produced in the islets of Langerhans of the pancreas of numerous animals. Human insulin can be obtained by extraction from the pancreas, by modification of bovine or porcine insulin or by biotechnological processes involving bacteria or yeasts to produce recombinant human insulin. Insulin is a factor in the cellular uptake of circulating glucose and other nutrients, as well as their storage as glycogen and fat. Pure insulin is a white, non-hygroscopic amorphous powder or shiny crystals, soluble in water. Its clinical use is in the treatment of diabetes. Insulin salts include insulin hydrochloride.

(3) Corticotropin (INN) (ACTH (adrenocorticotropic hormone), adrenocorticotropin). A polypeptide, soluble in water. It stimulates increased production of adrenocortical steroids. **Giractide** (INN) is an analogue of corticotropin.

(4) Lactogenic hormone (LTH, galactin, galactogene hormone, luteotrophin, mammotrophin, prolactin). A polypeptide which can be crystallised. Activates milk secretion and influences the activity of the *corpus luteum*.

(5) Thyrotrophin (INN) (thyrotrophic hormone, TSH (thyroid-stimulating hormone)). A glycoprotein which intervenes in the action of the thyroid gland on the blood and in the removal of iodine. It affects growth and secretion.

(6) Follicle-stimulating hormone (FSH). A glycoprotein, soluble in water. It activates sexual functions.

* If a name is used in the International Nonproprietary Names or the International Nonproprietary Names (Modified) for pharmaceutical substances published by the World Health Organization, this name is mentioned first and marked (INN) or (INN.M), respectively.

- 7) **L'hormone lutéinostimulante** (LH, ICSH (hormone interstitielle stimulant les cellules), lutéinostimuline). Glycoprotéine, soluble dans l'eau, qui exerce une action sur les fonctions sexuelles en stimulant la sécrétion stéroïdique, l'ovulation et le développement cellulaire interstitiel.
- 8) **La gonadotrophine chorionique** (DCI) (hCG (gonadotrophine chorionique humaine)). Elaborée dans le placenta, cette glycoprotéine est extraite de l'urine des femmes enceintes. Cristaux blancs, formant avec l'eau des solutions peu stables. Exerce une action sur la maturation folliculaire.
- 9) **La gonadotrophine sérique** (DCI) (gonadotrophine chorionique équine (eCG)). Glycoprotéine stimulant les gonades produites dans le placenta et l'endomètre des juments gravides. Initialement appelée gonadotrophine sérique de juments gravides.
- 10) **L'oxytocine** (DCI) (α -hypophamine). Polypeptide soluble dans l'eau. Son action principale est de déclencher la contraction de l'utérus et de stimuler l'éjection du lait de la glande mammaire. Sont également compris dans ce groupe les analogues tels la **carbétocine** (DCI), la **démoxytocine** (DCI), etc.
- 11) **Les vasopressines : l'argipressine** (DCI) et la **lypressine** (DCI), leurs dérivés et analogues structuraux. Les vasopressines sont des polypeptides qui accroissent la pression sanguine et exercent une action sur la rétention d'eau par le rein. Sont compris dans ce groupe les analogues polypeptidiques comme la **terlipressine** (DCI), la **desmopressine** (DCI), etc.
- 12) **La calcitonine** (DCI), (TCA (thyrocalcitonine)). Polypeptide hypocalcémique et hypophosphatémique.
- 13) **Le glucagon** (DCI) (HGF (facteur glycolytique hyperglycémique)). Polypeptide qui a la propriété d'accroître la concentration du glucose dans le sang.
- 14) **La thyrolibérine** (TRF, TRH). Ce polypeptide stimule la sécrétion de la thyrotrophine.
- 15) **La gonadoréline** (DCI) (gonadolibérine, hormone libératrice de la gonadotrophine, LRF, GnRH). Polypeptide favorisant la sécrétion des hormones folliculo-stimulantes et des hormones lutéinostimulantes dans l'hypophyse. Sont également compris dans ce groupe les analogues polypeptidiques tels la **buséreléline** (DCI), la **goséreléline** (DCI), la **fertiréline** (DCI), la **sermoréline** (DCI), etc.
- 16) **La somatostatine** (DCI) (SS, SRIH, SRIF). Polypeptide qui inhibe la libération de l'hormone de croissance et de la TSH par l'hypophyse et qui possède une action neurotrophique.
- 17) **L'hormone natriurétique atriale** (ANH, ANF), une hormone polypeptidique sécrétée par les oreillettes du cœur. Lorsque les oreillettes cardiaques sont dilatées par une augmentation du volume sanguin, la sécrétion de l'ANH est stimulée. L'ANH augmente à son tour l'élimination du sodium et de l'eau et abaisse la pression sanguine.
- 18) **L'endothéline**, une hormone polypeptidique sécrétée par les cellules endothéliales de l'ensemble des vaisseaux sanguins. Bien que l'endothéline soit libérée dans la circulation sanguine, elle agit localement de façon paracrine afin de contracter les muscles lisses vascularisés adjacents et pour augmenter la pression sanguine.
- 19) **L'inhibine** et **l'activine**, des hormones qui se trouvent dans les tissus des gonades.

- (7) **Luteinising hormone** (LH, ICSH (interstitial-cell-stimulating hormone), luteinostimulin). A glycoprotein, soluble in water. It stimulates sexual functions by stimulating steroid secretion, ovulation and interstitial cell development.
- (8) **Chorionic gonadotrophin** (INN) (hCG (human chorionic gonadotrophin)). Formed in the placenta; it is a glycoprotein extracted from the urine of pregnant women. White crystals, relatively unstable in aqueous solution. Stimulates follicle maturity.
- (9) **Serum gonadotrophin** (INN) (equine chorionic gonadotropin (eCG)). It is a gonad-stimulating glycoprotein produced in the placenta and endometrium of pregnant mares. Originally called pregnant mare serum gonadotropin.
- (10) **Oxytocin** (INN) (α -hypophamin). A polypeptide, soluble in water. Its chief action is on the contraction of the uterus and on milk ejection from the mammary gland. Also included are the analogues **carbetocin** (INN), **demoxytocin** (INN), etc.
- (11) **Vasopressins** : **argipressin** (INN) and **lypressin** (INN), their derivatives and structural analogues. Vasopressins are polypeptides which raise blood pressure and cause an increase in water retention by the kidney. Also included here are polypeptide analogues such as **terlipressin** (INN), **desmopressin** (INN), etc.
- (12) **Calcitonin** (INN). (TCA (thyrocalcitonin)). A hypocalcaemic and hypophosphatemic polypeptide.
- (13) **Glucagon** (INN) (HGF (hyperglycaemic-glycogenolytic factor)). A polypeptide which has the property of increasing the blood-glucose concentration.
- (14) **Thyroliberin** (TRF, TRH). This polypeptide stimulates the secretion of thyrotropin.
- (15) **Gonadorelin** (INN) (gonadoliberin, gonadotrophin releasing hormone, LRF, GnRH). This polypeptide promotes the secretion of follicle-stimulating and lutein-stimulating hormones in the pituitary gland. Also included are the polypeptide analogues **buserilin** (INN), **goserilin** (INN), **fertirelin** (INN), **sermorelin** (INN), etc.
- (16) **Somatostatin** (INN) (SS, SRIH, SRIF). This polypeptide inhibits the release of growth hormone and TSH from the pituitary gland and has a neurotropic action.
- (17) **Atrial natriuretic hormone** (ANH, ANF), a polypeptide hormone secreted from the atria of the heart. When the cardiac atrium is stretched by increased blood volume, secretion of ANH is stimulated. ANH in turn increases salt and water excretion and reduces blood pressure.
- (18) **Endothelin**, a polypeptide hormone secreted by endothelial cells throughout the vasculature. Although endothelin is released into the blood circulation, it acts locally in a paracrine fashion to constrict adjacent vascular smooth muscle and to increase blood pressure.
- (19) **Inhibin** and **activin**, hormones found in gonadal tissue.

B) HORMONES STEROIDES, LEURS DERIVES ET ANALOGUES STRUCTURELS

- 1) **Les hormones corticostéroïdes**, sécrétées dans la zone corticale des glandes surrénales, jouent un rôle important dans les phénomènes du métabolisme de l'organisme. Elles sont également connues sous le nom de corticosurrénales ou corticoïdes et sont généralement divisées en deux groupes, suivant l'action physiologique qu'elles suscitent, à savoir : 1°) les glucocorticoïdes, qui régularisent le métabolisme des protéines et des hydrates de carbone et 2°) les minéralocorticoïdes, qui provoquent la rétention du sodium et de l'eau dans l'organisme et accélèrent l'élimination du potassium. Les propriétés des minéralocorticoïdes sont utilisées dans le traitement des déficiences rénales et de la maladie d'Addison. Il s'agit des hormones corticostéroïdes, dérivés et analogues, ci-après :
 - a) **La cortisone** (DCI). Glucocorticoïde qui régularise le métabolisme des protéines et des hydrates de carbone et qui possède également une action anti-inflammatoire locale.
 - b) **L'hydrocortisone** (DCI) (cortisol). Glucocorticoïde dont les effets sont analogues à ceux de la cortisone.
 - c) **La prednisone** (DCI) (déhydrocortisone). Glucocorticoïde. Dérivé de la cortisone.
 - d) **La prednisolone** (DCI) (déhydrohydrocortisone). Glucocorticoïde. Dérivé de l'hydrocortisone.
 - e) **L'aldostérone** (DCI). Minéralocorticoïde.
 - f) **La cortodoxone** (DCI).

Certains dérivés sont modifiés de manière à diminuer leur activité hormonale corticale au profit de leur activité anti-inflammatoire qui est considérée également comme une activité hormonale. Ce sont principalement des dérivés de la cortisone (DCI), de l'hydrocortisone (DCI), de la prednisone (DCI) et de la prednisolone (DCI), qui sont utilisées comme agents anti-inflammatoires et anti-rhumatismaux.

- 2) **Les dérivés halogénés des hormones corticostéroïdes** sont des stéroïdes dans lesquelles l'atome d'hydrogène se trouvant généralement dans les positions 6 ou 9 du cycle du gonane est remplacé par un atome de chlore ou de fluor (**dexaméthasone** (DCI), par exemple) et qui augmentent fortement l'activité glucocorticoïdique et anti-inflammatoire des corticoïdes dont ils sont issus. Ces dérivés sont souvent modifiés davantage et commercialisés sous forme d'esters, d'acétonides (**acétonide de fluocinolone** (DCI), par exemple), etc.
- 3) **Les oestrogènes et les progestogènes**. Il s'agit de deux groupes importants d'hormones sexuelles sécrétées par les organes génitaux masculins et féminins. Elles peuvent également être obtenues par synthèse. Ces hormones sont également appelées progestine et gestagène.

Les oestrogènes sont des hormones sexuelles féminines produites par les ovaires, les testicules, les glandes surrénales, le placenta et autres tissus producteurs de stéroïdes. Ils se caractérisent par leur propriété de provoquer l'oestrus chez les mammifères femelles. Les oestrogènes sont responsables du développement des caractéristiques sexuelles féminines et sont utilisées dans le traitement de la ménopause ou pour la préparation de produits anticonceptionnels. Ils comprennent les oestrogènes, dérivés et analogues, ci-après :

(B) STEROIDAL HORMONES, THEIR DERIVATIVES AND STRUCTURAL ANALOGUES

- (1) **Corticosteroid hormones**, secreted in the cortical zone of the adrenal glands, play an important role in the functioning of the body's metabolism. They are also known as adrenal cortical hormones or corticoids, and are generally divided into two groups, depending upon their physiological action : (i) glucocorticoids, which regulate protein and carbohydrate metabolism and (ii) mineralocorticoids, which cause the retention of sodium and water by the body and hasten the excretion of potassium. The properties of mineralocorticoids are utilised in the treatment of kidney deficiencies and of Addison's disease. These include the following corticosteroid hormones, derivatives and analogues :
- (a) **Cortisone** (INN). A glucocorticoid which regulates protein and carbohydrate metabolism and also has a local anti-inflammatory effect.
 - (b) **Hydrocortisone** (INN) (cortisol). A glucocorticoid with effects similar to those of cortisone.
 - (c) **Prednisone** (INN) (dehydrocortisone). Glucocorticoid. A derivative of cortisone.
 - (d) **Prednisolone** (INN) (dehydrohydrocortisone). Glucocorticoid. A derivative of hydrocortisone.
 - (e) **Aldosterone** (INN). A mineralocorticoid.
 - (f) **Cortodoxone** (INN).

Some derivatives are modified so as to suppress their cortical hormone effect in favour of their anti-inflammatory effect, which is regarded as being a hormonal effect. These are principally derivatives of cortisone (INN), hydrocortisone (INN), prednisone (INN) and prednisolone (INN), which are used as anti-inflammatory and antirheumatism agents.

- (2) **Halogenated derivatives of corticosteroid hormones** are steroids in which the hydrogen atom generally at the 6- or 9-position on the gonane ring is substituted by a chlorine or fluorine atom (e.g., **dexamethasone** (INN)) and which greatly enhance the glucocorticoid and anti-inflammatory effect of the corticoids from which they are derived. These derivatives are often further modified and marketed in the form of esters, acetonides (e.g., **flucinolone acetonide** (INN), etc.
- (3) **Oestrogens and progestogens**. These are two major groups of sex hormones secreted by the male and female genital organs. They may also be obtained by synthesis. These hormones are also called progestins and gestagens.

Oestrogens are female sex hormones produced by the ovaries, testes, adrenal glands, placenta and other steroid-producing tissues. They are characterised by their ability to produce oestrus in the female mammal. Oestrogens are responsible for the development of female sex characteristics and are used in the treatment of menopause or in the preparation of contraceptive drugs. They include the following oestrogens, derivatives and analogues :

- a) **l'estrone** (DCI). Le principal oestrogène chez les êtres humains.
- b) **l'estradiol** (DCI). Oestrogène naturel important.
- c) **l'estriol** (DCI). Oestrogène naturel.
- d) **l'éthinylestradiol** (DCI). Oestrogène de synthèse important qui est actif en prise orale et qui constitue le principal composant oestrogénique des produits anticonceptionnels oraux composites.
- e) **le mestranol** (DCI). Dérivé étherifié de l'éthinylestradiol. Utilisé comme produit anticonceptionnel oral.

Les progestogènes constituent une catégorie de stéroïdes ainsi nommés en raison de leur activité progestative. Il sont essentiels à la phase initiale et au développement de la grossesse. Ces hormones sexuelles féminines préparent l'utérus en vue de la gestation et pendant celle-ci. En raison de leur action inhibitrice sur l'ovulation, de nombreuses progestines entrent dans la composition des médicaments anticonceptionnels. Ils comprennent :

- a) **la progestérone** (DCI). C'est la progestine principale des êtres humains et un intermédiaire dans la production par biosynthèse des oestrogènes, des androgènes et des corticostéroïdes. Elle est produite par le *corpus luteum* (corps lutéal ou corps jaune) après l'ovulation et par les glandes surrénales, le placenta et les testicules.
- b) **le prégnandiol**. Progestine naturelle dont l'activité biologique est beaucoup plus faible que celle de la progestérone.

4) **Autres hormones stéroïdes**

Les androgènes constituent un groupe important d'hormones sexuelles non comprises ci-dessus qui sont sécrétées principalement par les testicules et, dans une moindre mesure, par les ovaires, les glandes surrénales et le placenta. Les androgènes sont responsables du développement des caractéristiques sexuelles masculines. Les androgènes influencent le métabolisme c'est-à-dire, qu'ils ont une activité anabolique. **La testostérone** (DCI) est l'un des androgènes les plus importants.

Ce groupe comprend également les stéroïdes de synthèse utilisés pour inhiber ou contrecarrer l'action des hormones tels que les anti-oestrogènes, les anti-androgènes et les anti-progestogènes (anti-progestines, anti-estagènes). Les anti-progestines stéroïdiques sont des antagonistes de progestine qui trouvent de nombreuses applications dans le traitement de certaines maladies. **L'onapristone** (DCI) et **l'aglepristone** (DCI) constituent des exemples de ce groupe de produits.

Les stéroïdes de cette catégorie qui présentent le plus d'importance dans le commerce international sont énumérés ci-après. Les différents produits sont cités dans l'ordre alphabétique de leur dénomination abrégée suivie de l'indication de leur fonction hormonale principale. Lorsqu'il existe plusieurs dénominations, on a retenu les dénominations communes internationales pour les préparations pharmaceutiques (DCI) publiées par l'Organisation mondiale de la santé ou les dénominations communes internationales modifiées (DCIM). Les **dénominations chimiques** données sont conformes aux règles de la nomenclature des stéroïdes établie en 1957 par l'UICPA.

- (a) **Estrone** (INN). A principal oestrogen in humans.
- (b) **Estradiol** (INN). An important natural oestrogen.
- (c) **Estriol** (INN). A natural oestrogen.
- (d) **Ethinyl estradiol** (INN). An important synthetic oestrogen which is orally active and used as a main oestrogenic component in combination oral contraceptives.
- (e) **Mestranol** (INN). Ether derivative of ethinyl estradiol. Used as an oral contraceptive.

Progestogens are a class of steroids named for their progestational effects, which are essential for the initiation and continuation of pregnancy. These female sex hormones prepare the uterus for pregnancy and for the maintenance of pregnancy. Because they suppress ovulation, many progestins are used as components of contraceptive drugs. They include :

- (a) **Progesterone** (INN). The primary progestin in humans and an intermediate in the biosynthetic pathways of oestrogens, androgens and corticosteroids. It is produced by the *corpus luteum* after release of the ovum and in the adrenal gland, the placenta and the testes.
 - (b) **Pregnandiol**. Naturally occurring progestin with a much weaker biological activity than that of progesterone.
- (4) **Other steroidal hormones.**

Androgens are a major group of sex hormones not included above, which are produced mainly by the testes and, to a lesser extent, by the ovaries, adrenal glands and placenta. Androgens are responsible for the development of male sex characteristics. Androgens influence metabolism, i.e., have an anabolic effect. **Testosterone** (INN) is one of the most important androgens.

This part also includes synthetic steroids used to inhibit or counteract the effects of hormones, such as anti-oestrogens, anti-androgens, and anti-progestogens (antiprogestins, antiestagens). Steroidal antiprogestins are progestin antagonists which have found many uses in the treatment of some diseases. Examples of this group include **onapristone** (INN) and **aglepristone** (INN).

The most important of these steroids in international trade are listed below. The products are cited in alphabetical order, according to their short names, followed by an indication of their main hormonal function. If several names exist, the name used is that of the International Nonproprietary Names for pharmaceutical preparations (INN) published by the World Health Organization or that of the International Nonproprietary Names Modified (INN^M). The **chemical names** given are in accordance with the IUPAC 1957 Rules for Nomenclature of Steroids.

**Liste des stéroïdes utilisés principalement
en raison de leur fonction hormonale**

Dénomination abrégée Nom chimique	Fonction hormonale principale
Adrénostérone androst-4-ène-3,11,17-trione	Androgène
Aldostérone (DCI) 11 β ,21-dihydroxy-3,20-dioxoprégn-4-ène-18-al	Corticostéroïde
AllylestrénoI (DCI) 17 α -allyloestr-4-ène-17 β -ol	Progestogène
(Pas de dénomination abrégée) 5 α -androstane-3,17-dione	Androgène [intermédiaire]
Androstanolone (DCI) 17 β -hydroxy-5 α -androstan-3-one	Androgène
Androstènediols androst-5-ène-3 β ,17 β -diol androst-5-ène-3 β ,17 α -diol	Anabolique [intermédiaire]
(Pas de dénomination abrégée) androst-4-ène-3,17-dione	Androgène [intermédiaire]
Androstérone 3 α -hydroxy-5 α -androstan-17-one	Androgène
Bêtaméthasone (DCI) 9 α -fluoro-11 β ,17 α ,21-trihydroxy-16 β -méthylprégna-1,4-diène-3,20-dione	Corticostéroïde
Bolastérone (DCI) 17 β -hydroxy-7 α ,17 α -diméthylandro-4-ène-3-one	Anabolique
Chlormadinone (DCI) 6-chloro-17 α -hydroxyprégna-4,6-diène-3,20-dione	Progestogène
Chloroprednisone (DCI) 6 α -chloro-17 α ,21-dihydroxyprégna-1,4-diène-3,11,20-trione	Corticostéroïde

**List of steroids used primarily
for their hormone function**

Short name Chemical name	Main hormonal function
Adrenosterone androst-4-ene-3,11,17-trione	Androgen
Aldosterone (INN) 11 β ,21-dihydroxy-3,20-dioxopregn-4-en-18-al	Corticosteroid
Allylestrenol (INN) 17 α -allyloestr-4-en-17 β -ol	Progestogen
(No short name) 5 α -androstane-3,17-dione	Androgen [intermediate]
Androstanolone (INN) 17 β -hydroxy-5 α -androstan-3-one	Androgen
Androstenediols androst-5-ene-3 β ,17 β -diol androst-5-ene-3 β ,17 α -diol	Anabolic [intermediate]
(No short name) androst-4-ene-3,17-dione	Androgen [intermediate]
Androsterone 3 α -hydroxy-5 α -androstan-17-one	Androgen
Betamethasone (INN) 9 α -fluoro-11 β ,17 α ,21-trihydroxy-16 β -methylpregna-1,4-diene-3,20-dione	Corticosteroid
Bolasterone (INN) 17 β -hydroxy-7 α ,17 α -dimethylandro-4-en-3-one	Anabolic
Chlormadinone (INN) 6-chloro-17 α -hydroxypregna-4,6-diene-3,20-dione	Progestogen
Chloroprednisone (INN) 6 α -chloro-17 α ,21-dihydroxypregna-1,4-diene-3,11,20-trione	Corticosteroid

Dénomination abrégée Nom chimique	Fonction hormonale principale
Clocortolone (DCI) 9 α -chloro-6 α -fluoro-11 β ,21-dihydroxy-16 α -méthylprégna-1,4- diène-3,20-dione	Corticostéroïde
Clostébol (DCI) 4-chloro-17 β -hydroxyandrost-4-ène-3-one	Anabolique
Corticostérone 11 β ,21-dihydroxyprégn-4-ène-3,20-dione	Corticostéroïde
Cortisol - voir Hydrocortisone	
Cortisone (DCI) 17 α ,21-dihydroxyprégn-4-ène-3,11,20-trione	Corticostéroïde
11-Déhydrocorticostérone 21-hydroxyprégn-4-ène-3,11,20-trione	Corticostéroïde
Déoxycorticostérone - voir Désoxycortone	
Désoxycortone (DCI) 21-hydroxyprégn-4-ène-3,20-dione	Corticostéroïde
Dexaméthasone (DCI) 9 α -fluoro-11 β ,17 α ,21-trihydroxy-16 α -méthylprégna-1,4-diène- 3,20-dione	Corticostéroïde
Dihydroandrostérone 5 α -androstane-3 α ,17 β -diol	Androgène [intermédiaire]
Dydrogestérone (DCI) 9 β ,10 α -prégna-4,6-diène-3,20-dione	Progestogène
Equilénine 3-hydroxyoestra-1,3,5(10),6,8-pentaène-17-one	Oestrogène
Equiline 3-hydroxyoestra-1,3,5(10),7-tetraène-17-one	Oestrogène
Estradiol (DCI) oestra-1,3,5(10)-triène-3,17 β -diol	Oestrogène

Short name Chemical name	Main hormonal function
Clocortolone (INN) 9 α -chloro-6 α -fluoro-11 β ,21-dihydroxy-16 α -methylpregna-1,4- diene-3,20-dione	Corticosteroid
Clostebol (INN) 4-chloro-17 β -hydroxyandrost-4-en-3-one	Anabolic
Corticosterone 11 β ,21-dihydroxypregn-4-ene-3,20-dione	Corticosteroid
Cortisol - see Hydrocortisone	
Cortisone (INN) 17 α ,21-dihydroxypregn-4-ene-3,11,20-trione	Corticosteroid
11-Dehydrocorticosterone 21-hydroxypregn-4-ene-3,11,20-trione	Corticosteroid
Deoxycorticosterone - see Desoxycortone	
Desoxycortone (INN) 21-hydroxypregn-4-ene-3,20-dione	Corticosteroid
Dexamethasone (INN) 9 α -fluoro-11 β ,17 α ,21-trihydroxy-16 α -methylpregna-1,4-diene- 3,20-dione	Corticosteroid
Dihydroandrosterone 5 α -androstane-3 α ,17 β -diol	Androgen [intermediate]
Dydrogesterone (INN) 9 β ,10 α -pregna-4,6-diene-3,20-dione	Progestogen
Equilenin 3-hydroxyoestra-1,3,5(10),6,8-pentaen-17-one	Oestrogen
Equilin 3-hydroxyoestra-1,3,5(10),7-tetraen-17-one	Oestrogen
Estradiol (INN) oestra-1,3,5(10)-triene-3,17 β -diol	Oestrogen

Dénomination abrégée Nom chimique	Fonction hormonale principale
Estriol (DCIM) oestra-1,3,5(10)-triène-3,16 α ,17 β -triol	Oestrogène
Estrone (DCI) 3-hydroxyoestra-1,3,5(10)-triène-17-one	Oestrogène
Ethinylestradiol (DCI) 17 α -éthynyoestra-1,3,5(10)-triène-3,17 β -diol	Oestrogène
Ethistérone (DCI) 17 α -éthynyl-17 β -hydroxyandrost-4-ène-3-one	Progestogène
Ethylestréno l (DCI) 17 α -éthylœstr-4-ène-17 β -ol	Anabolique
Etyndiol (DCI) 17 α -éthynyoestr-4-ène-3 β ,17 β -diol	Progestogène
Fludrocortisone (DCI) 9 α -fluoro-11 β ,17 α ,21-trihydroxypregn-4-ène-3,20-dione	Corticostéroïde
Flumétasone (DCI) 6 α ,9 α -difluoro-11 β ,17 α ,21-trihydroxy-16 α -méthylpregna-1,4-diène-3,20-dione	Corticostéroïde
Fluocinolone (DCIM) 6 α ,9 α -difluoro-11 β ,16 α ,17 α ,21-tétrahydroxypregna-1,4-diène-3,20-dione	Corticostéroïde
Fluocortolone (DCI) 6 α -fluoro-11 β ,21-dihydroxy-16 α -méthylpregna-1,4-diène-3,20-dione	Corticostéroïde
Fluorométholone (DCI) 9 α -fluoro-11 β ,17 α -dihydroxy-6 α -méthylpregna-1,4-diène-3,20-dione	Corticostéroïde
9α-Fluoroprednisolone 9 α -fluoro-11 β ,17 α ,21-trihydroxypregna-1,4-diène-3,20-dione	Corticostéroïde

Short name Chemical name	Main hormonal function
Estriol (INN) oestra-1,3,5(10)-triene-3,16 α ,17 β -triol	Oestrogen
Estrone (INN) 3-hydroxyoestra-1,3,5(10)-trien-17-one	Oestrogen
Ethinylestradiol (INN) 17 α -ethynyl-oestra-1,3,5(10)-triene-3,17 β -diol	Oestrogen
Ethisterone (INN) 17 α -ethynyl-17 β -hydroxyandrost-4-en-3-one	Progestogen
Ethylestrenol (INN) 17 α -ethyloestr-4-en-17 β -ol	Anabolic
Etyndiol (INN) 17 α -ethynyl-oestr-4-ene-3 β ,17 β -diol	Progestogen
Fludrocortisone (INN) 9 α -fluoro-11 β ,17 α ,21-trihydroxypregn-4-ene-3,20-dione	Corticosteroid
Flumetasone (INN) 6 α ,9 α -difluoro-11 β ,17 α ,21-trihydroxy-16 α -methylpregna-1,4-diene-3,20-dione	Corticosteroid
Fluocinolone (INN) 6 α ,9 α -difluoro-11 β ,16 α ,17 α ,21-tetrahydroxy-pregna-1,4-diene-3,20-dione	Corticosteroid
Fluocortolone (INN) 6 α -fluoro-11 β ,21-dihydroxy-16 α -methylpregna-1,4-diene-3,20-dione	Corticosteroid
Fluorometholone (INN) 9 α -fluoro-11 β ,17 α -dihydroxy-6 α -methylpregna-1,4-diene-3,20-dione	Corticosteroid
9α-Fluoroprednisolone 9 α -fluoro-11 β ,17 α ,21-trihydroxypregna-1,4-diene-3,20-dione	Corticosteroid

Dénomination abrégée Nom chimique	Fonction hormonale principale
Fluoxymestérone (DCI) 9 α -fluoro-11 β ,17 β -dihydroxy-17 α -méthylandrost-4-ène-3-one	Androgène
Fluprednidène (DCI) 9 α -fluoro-11 β ,17 α ,21-trihydroxy-16-méthylèneprégna-1,4- diène-3,20-dione	Corticostéroïde
Fluprednisolone (DCI) 6 α -fluoro-11 β ,17 α ,21-trihydroxyprégna-1,4-diène-3,20-dione	Corticostéroïde
Flurandrérolone 6 α -fluoro-11 β ,16 α ,17 α ,21-tétrahydroxyprégn-4-ène-3,20- dione	Corticostéroïde
Formocortal (DCI) 3-(2-chloroéthoxy)-9 α -fluoro-6-formyl-11 β ,21-dihydroxy- 16 α ,17-isopropylidènedioxyprégna-3,5-diène-20-one 21- acétate	Corticostéroïde
Gestonorone (DCIM) 17 β -éthyl-17 α -hydroxyoestr-4-ène-3,20-dione	Progestogène
Hydrocortisone (DCI) 11 β ,17 α ,21-trihydroxyprégn-4-ène-3,20-dione	Corticostéroïde
Hydroxyprogestérone (DCI) 17 α -hydroxyprégn-4-ène-3,20-dione	Progestogène
Lynestrénol (DCI) 17 α -éthynyloestr-4-ène-17 β -ol	Progestogène
Médroxyprogestérone (DCI) 17 α -hydroxy-6 α -méthylprégn-4-ène-3,20-dione	Progestogène
Mégestrol (DCI) 17 α -hydroxy-6-méthylprégna-4,6-diène-3,20-dione	Progestogène
Mestanolone (DCI) 17 β -hydroxy-17 α -méthyl-5 α -androstan-3-one	Anabolique

Short name Chemical name	Main hormonal function
Fluoxymesterone (INN) 9 α -fluoro-11 β ,17 β -dihydroxy-17 α -methylandro-4-en-3-one	Androgen
Fluprednidene (INN) 9 α -fluoro-11 β ,17 α ,21-trihydroxy-16-methylenepregna-1,4-diene-3,20-dione	Corticosteroid
Fluprednisolone (INN) 6 α -fluoro-11 β ,17 α ,21-trihydroxypregna-1,4-diene-3,20-dione	Corticosteroid
Flurandrenolone 6 α -fluoro-11 β ,16 α ,17 α ,21-tetrahydroxypregna-4-ene-3,20-dione	Corticosteroid
Formocortal (INN) 3-(2-chloroethoxy)-9 α -fluoro-6-formyl-11 β ,21-dihydroxy-16 α ,17-isopropylidenedioxypregna-3,5-dien-20-one 21-acetate	Corticosteroid
Gestonorone (INN) 17 β -ethyl-17 α -hydroxyoestr-4-ene-3,20-dione	Progestogen
Hydrocortisone (INN) 11 β ,17 α ,21-trihydroxypregna-4-ene-3,20-dione	Corticosteroid
Hydroxyprogesterone (INN) 17 α -hydroxypregna-4-ene-3,20-dione	Progestogen
Lynestrenol (INN) 17 α -ethynyloestr-4-en-17 β -ol	Progestogen
Medroxyprogesterone (INN) 17 α -hydroxy-6 α -methylpregna-4-ene-3,20-dione	Progestogen
Megestrol (INN) 17 α -hydroxy-6-methylpregna-4,6-diene-3,20-dione	Progestogen
Mestanolone (INN) 17 β -hydroxy-17 α -methyl-5 α -androstan-3-one	Anabolic

Dénomination abrégée Nom chimique	Fonction hormonale principale
Mestérolone (DCI) 17 β -hydroxy-1 α -méthyl-5 α -androstane-3-one	Androgène
Mestranol (DCI) 17 α -éthynyl-3-méthoxyoestra-1,3,5(10)-triène-17 β -ol	Oestrogène
Métandiénone (DCI) 17 β -hydroxy-17 α -méthylandrosta-1,4-diène-3-one	Anabolique
Métérolone (DCI) 17 β -hydroxy-1-méthyl-5 α -androstane-3-one	Anabolique
Méthandriol (DCI) 17 α -méthylandrosta-5-ène-3 β ,17 β -diol	Anabolique
2-Méthylhydrocortisone 11 β ,17 α ,21-trihydroxy-2 β -méthylprégn-4-ène-3,20-dione	Corticostéroïde
6α-Méthylhydrocortisone 11 β ,17 α ,21-trihydroxy-6 α -méthylprégn-4-ène-3,20-dione	Corticostéroïde
Méthylnortestostérone 17 β -hydroxy-17 α -méthylœstr-4-ène-3-one	Progestogène
17α-Méthylœstradiol 17 α -méthylœstra-1,3,5(10)-triène-3,17 β -diol	Oestrogène
Méthylprednisolone (DCI) 11 β ,17 α ,21-trihydroxy-6 α -méthylprégna-1,4-diène-3,20-dione	Corticostéroïde
Méthyltestostérone (DCI) 17 β -hydroxy-17 α -méthylandrosta-4-ène-3-one	Androgène
Nandrolone (DCI) 17 β -hydroxyœstr-4-ène-3-one	Anabolique
Noréthandrolone (DCI) 17 α -éthyl-17 β -hydroxyœstr-4-ène-3-one	Anabolique

Short name Chemical name	Main hormonal function
Mesterolone (INN) 17 β -hydroxy-1 α -methyl-5 α -androstan-3-one	Androgen
Mestranol (INN) 17 α -ethynyl-3-methoxyoestra-1,3,5(10)-trien-17 β -ol	Oestrogen
Metandienone (INN) 17 β -hydroxy-17 α -methylandrosta-1,4-dien-3-one	Anabolic
Metenolone (INN) 17 β -hydroxy-1-methyl-5 α -androstan-3-one	Anabolic
Methandriol (INN) 17 α -methylandrost-5-ene-3 β ,17 β -diol	Anabolic
2-Methylhydrocortisone 11 β ,17 α ,21-trihydroxy-2 β -methylpregn-4-ene-3,20-dione	Corticosteroid
6α-Methylhydrocortisone 11 β ,17 α ,21-trihydroxy-6 α -methylpregn-4-ene-3,20-dione	Corticosteroid
Methylnortestosterone 17 β -hydroxy-17 α -methyloestr-4-en-3-one	Progestogen
17α-Methyloestradiol 17 α -methyloestra-1,3,5(10)-triene-3,17 β -diol	Oestrogen
Methylprednisolone (INN) 11 β ,17 α ,21-trihydroxy-6 α -methylpregna-1,4-diene-3,20-dione	Corticosteroid
Methyltestosterone (INN) 17 β -hydroxy-17 α -methylandrost-4-en-3-one	Androgen
Nandrolone (INN) 17 β -hydroxyoestr-4-en-3-one	Anabolic
Norethandrolone (INN) 17 α -ethyl-17 β -hydroxyoestr-4-en-3-one	Anabolic

Dénomination abrégée Nom chimique	Fonction hormonale principale
Noréthistérone (DCI) 17 α -éthynyl-17 β -hydroxyoestr-4-ène-3-one	Progestogène
Norétynodrel (DCI) 17 α -éthynyl-17 β -hydroxyoestr-5(10)-ène-3-one	Progestogène
Norgestrel (DCI) 13 β -éthyl-17 α -éthynyl-17 β -hydroxygon-4-ène-3-one	Progestogène
Norméthandrone - voir Méthylnortestostérone	
Nortestostérone - voir Nandrolone	
Oxabolone (DCIM) 4,17 β -dihydroxyoestr-4-ène-3-one	Anabolique
Oxymestérone (DCI) 4,17 β -dihydroxy-17 α -méthylandrost-4-ène-3-one	Anabolique
Oxymétholone (DCI) 17 β -hydroxy-2-hydroxyméthylène-17 α -méthyl-5 α -androstan-3-one	Anabolique
Paraméthasone (DCI) 6 α -fluoro-11 β ,17 α ,21-trihydroxy-16 α -méthylprégna-1,4-diène-3,20-dione	Corticostéroïde
Prastérone (DCI) 3 β -hydroxyandrost-5-ène-17-one	Androgène
Prednisolone (DCI) 11 β ,17 α ,21-trihydroxyprégna-1,4-diène-3,20-dione	Corticostéroïde
Prednisone (DCI) 17 α ,21-dihydroxyprégna-1,4-diène-3,11,20-trione	Corticostéroïde
Prednylidène (DCI) 11 β ,17 α ,21-trihydroxy-16-méthylèneprégna-1,4-diène-3,20-dione	Corticostéroïde

Short name Chemical name	Main hormonal function
Norethisterone (INN) 17 α -ethynyl-17 β -hydroxyoestr-4-en-3-one	Progestogen
Noretynodrel (INN) 17 α -ethynyl-17 β -hydroxyoestr-5(10)-en-3-one	Progestogen
Norgestrel (INN) 13 β -ethyl-17 α -ethynyl-17 β -hydroxygon-4-en-3-one	Progestogen
Normethandrone - see Methylnortestosterone	
Nortestosterone - see Nandrolone	
Oxabolone (INN) 4,17 β -dihydroxyoestr-4-en-3-one	Anabolic
Oxymesterone (INN) 4,17 β -dihydroxy-17 α -methylandro-4-en-3-one	Anabolic
Oxymetholone (INN) 17 β -hydroxy-2-hydroxymethylene-17 α -methyl-5 α -androstan-3-one	Anabolic
Paramethasone (INN) 6 α -fluoro-11 β ,17 α ,21-trihydroxy-16 α -methylpregna-1,4-diene-3,20-dione	Corticosteroid
Prasterone (INN) 3 β -hydroxyandro-5-en-17-one	Androgen
Prednisolone (INN) 11 β ,17 α ,21-trihydroxypregna-1,4-diene-3,20-dione	Corticosteroid
Prednisone (INN) 17 α ,21-dihydroxypregna-1,4-diene-3,11,20-trione	Corticosteroid
Prednylidene (INN) 11 β ,17 α ,21-trihydroxy-16-methylenepregna-1,4-diene-3,20-dione	Corticosteroid

Dénomination abrégée Nom chimique	Fonction hormonale principale
Prégnénolone (DCI) 3 β -hydroxyprégn-5-ène-20-one	Corticostéroïde
Progesterone (DCI) prégn-4-ène-3,20-dione	Progestogène
Stanolone - voir Androstanolone	
Testostérone (DCI) 17 β -hydroxyandrost-4-ène-3-one	Androgène
Tiomestérone (DCI) 1 α ,7 α -di(acétylthio)-17 β -hydroxy-17 α -méthylandrost-4-ène-3-one	Anabolique
Triamcinolone (DCI) 9 α -fluoro-11 β ,16 α ,17 α ,21-tétrahydroxyprégna-1,4-diène-3,20-dione	Corticostéroïde

C) HORMONES DE LA CATECHOLAMINE, LEURS DERIVES ET ANALOGUES STRUCTURELS

Ce groupe d'hormones comprend celles qui se trouvent dans la zone médulaire des glandes surrénales.

- 1) **Epinéphrine** (DCI) (adrénaline ou alcool(-)-3,4-dihydroxy- α -[(méthylamino)méthyl] - benzylique) et **racépinéphrine** (DCI) (alcool (\pm)-3,4-dihydroxy- α -[(méthylamino) méthyl] - benzylique). La structure de ces deux hormones correspond au nom chimique 1-(3,4-dihydroxyphényl)-2-méthylaminoéthanol. L'épinéphrine, poudre cristalline blanche ou légèrement brunâtre, sensible à la lumière, peu soluble dans l'eau ou les solvants organiques, peut s'extraire des glandes surrénales du cheval; on l'obtient surtout par synthèse. Hormone hypertensive, elle stimule les terminaisons nerveuses du sympathique, accroît le nombre des globules et la teneur en sucre du sang; c'est en outre un vasoconstricteur puissant.
- 2) **Norépinéphrine** (DCI) (lévartérol, noradrénaline ou alcool (-)- α -aminométhyl-3,4 - dihydroxybenzylique). La norépinéphrine en cristaux blancs solubles dans l'eau a une action physiologique intermédiaire entre celle de l'adrénaline et celle de l'éphédrine.

Short name Chemical name	Main hormonal function
Pregnenolone (INN) 3 β -hydroxypregn-5-en-20-one	Corticosteroid
Progesterone (INN) pregn-4-ene-3,20-dione	Progestogen
Stanolone - see Androstanolone	
Testosterone (INN) 17 β -hydroxyandrost-4-en-3-one	Androgen
Tiomesterone (INN) 1 α ,7 α -di(acetylthio)-17 β -hydroxy-17 α -methylandrost-4-en-3-one	Anabolic
Triamcinolone (INN) 9 α -fluoro-11 β ,16 α ,17 α ,21-tetrahydroxypregna-1,4-diene-3,20-dione	Corticosteroid

(C) CATECHOLAMINE HORMONES, THEIR DERIVATIVES AND STRUCTURAL ANALOGUES

This group of hormones includes those found in the medullar zone of the adrenal glands.

- (1) **Epinephrine** (INN) (adrenaline or (-)-3,4-dihydroxy- α -[(methylamino)methyl]benzyl alcohol) and **racepinephrine** (INN) ((\pm)-3,4-dihydroxy- α -[(methylamino)methyl]benzyl alcohol). The structure of both of these hormones corresponds to the chemical name 1-(3,4-dihydroxyphenyl)-2-methylaminoethanol. Epinephrine is a light brown or nearly white crystalline powder, affected by light; it is slightly soluble in water and organic solvents. It may be derived from the adrenal glands of horses, but is obtained mostly by synthesis. A hypertension hormone, it stimulates the sympathetic nervous system, increases the number of corpuscles and the sugar content in blood; it also has a strong vasoconstrictive action.
- (2) **Norepinephrine** (INN) (levarterenol, noradrenaline or (-)-2-amino-1-(3,4-dihydroxyphenyl)ethanol). Norepinephrine occurs as white crystals, soluble in water. Its physiological activity is intermediate between that of adrenaline and of ephedrine.

D) DERIVES DES AMINO-ACIDES

- 1) **Lévothyroxine** (DCIM) et **DL-thyroxine** (3-[4-(4-hydroxy-3,5-diiodophénoxy)-3,5-diiodophényl]alanine ou 3,5,3',5'-tétraiodothyronine). La thyroxine, extraite des glandes thyroïdes ou obtenue par synthèse, est un amino-acide de la série aromatique, qui se présente sous forme de cristaux blancs ou jaunâtres, insolubles dans l'eau ou dans les solvants usuels. Elle accroît le métabolisme de base et la consommation de l'oxygène, exerce une action sur le système sympathique, régularise l'action des protéines ou des lipides et pourvoit au manque d'iode dans l'organisme. On l'emploie contre le goître et le crétinisme. L'isomère L est la forme active. Le sel de sodium est une poudre blanche faiblement soluble dans l'eau et dont l'action est analogue.
- 2) **Liothyronine** (DCI) et **rathyronine** (DCI) (DL-3,5,3'-triiodothyronine) (3-[4-(4-hydroxy-3-iodophénoxy)-3,5-diiodophényl]alanine). La triiodothyronine est également extraite des glandes thyroïdes; son action physiologique est plus élevée que celle de la thyroxine.

E) PROSTAGLANDINES, THROMBOXANES, LEUCOTRIENES, LEUR DERIVES ET ANALOGUES STRUCTURELS

Ces produits sont dérivés de l'acide arachidonique.

1) Prostaglandines

Les dérivés les plus importants de l'acide arachidonique sont les prostaglandines, substances endogènes opérant à doses minimes à l'instar des hormones et contenant la structure fondamentale de l'acide prostanoïque. Les prostaglandines influencent la régulation et la circulation sanguines, la fonction rénale et le système endocrinien (en réduisant la production de progestérone par le *corpus luteum* (corps jaune)); elles stimulent également la contraction des muscles lisses ou la dilatation des vaisseaux sanguins, préviennent l'agrégation des plaquettes sanguines et régularisent les sécrétions gastriques. Ils comprennent les prostaglandines, dérivés et analogues ci-après :

- a) **Alprostadil** (DCI) (prostaglandine E₁) Prostaglandine importante cristallisée à partir d'extraits biologiques. Elle est utilisée comme vasodilatateur. Elle sert également à stimuler la libération de l'érythropoïétine du cortex rénal et inhibe l'agrégation des plaquettes sanguines.
- b) **Alfaprostol** (DCI). Analogue de synthèse de la prostaglandine utilisé dans le traitement de l'infertilité des juments.
- c) **Tilsuprost** (DCI). Analogue de la prostaglandine dont un atome d'oxygène et un atome de carbone ont été remplacés par un atome d'azote et un atome de soufre avec fermeture du cycle.

Ce groupe comprend également d'autres produits de synthèse tels que le **prostalène** (DCI), le **dinoprost** (DCI), qui conservent la structure fondamentale des hormones naturelles et ont des actions physiologiques similaires à celles-ci.

(D) AMINO-ACID DERIVATIVES

- (1) **Levothyroxine** (INN) and **DL-thyroxine** (3-[4-(4-hydroxy-3,5-diiodophenoxy)-3,5-diiodophenyl]alanine or 3,5,3',5'-tetraiodothyronine). Thyroxine is extracted from the thyroid gland or obtained by synthesis. It is an aromatic amino-acid; it occurs as white or yellowish crystals, insoluble in water or in any of the common solvents. It increases the basic metabolic rate and oxygen consumption, acts on the sympathetic system, controls the action of proteins and fats and makes up any iodine deficiency in the organism; used to treat goitre and cretinism. The L-isomer is the active form. The sodium salt is a white powder, slightly soluble in water, with similar activity.
- (2) **Liothyronine** (INN) and **rathyronine** (INN) (DL-3,5,3'-triiodothyronine) (3-[4-(4-hydroxy-3-iodophenoxy)-3,5-diiodophenyl]alanine). Triiodothyronine is also extracted from the thyroid gland; its physiological activity is greater than that of thyroxine.

(E) PROSTAGLANDINS, THROMBOXANES AND LEUKOTRIENES, THEIR DERIVATIVES AND STRUCTURAL ANALOGUES

These products are derivatives of arachidonic acid.

(1) Prostaglandins.

The most important arachidonic acid derivatives are prostaglandins, endogenous substances operating in minute doses as hormones and containing the fundamental structure of prostanoic acid. Prostaglandins influence the regulation of blood circulation, kidney function and the endocrine system (e.g., by reducing the production of progesterone by the *corpus luteum*); they also stimulate the contraction of smooth muscles or dilation of blood vessels, prevent platelet aggregation and regulate gastric secretions. These include the following prostaglandins, derivatives and analogues :

- (a) **Alprostadil** (INN) (prostaglandin E₁). A primary prostaglandin crystallised from biological extracts. It is used as a vasodilator. It also functions to stimulate the release of erythropoietin from the renal cortex and inhibits blood platelet aggregation.
- (b) **Alfaprostol** (INN). A synthetic prostaglandin analogue used in the treatment of infertility in mares.
- (c) **Tilsuprost** (INN). A prostaglandin analogue which has had an oxygen and a carbon atom replaced by a nitrogen and a sulphur atom with ring closure.

This group also includes other synthetic products such as **prostalene** (INN), **dinoprost** (INN), etc., which retain the basic structure of natural products and have similar physiological activity.

2) **Thromboxanes et leucotriènes**

Les thromboxanes et les leucotriènes sont synthétisés comme les prostaglandines dans les cellules à partir de l'acide arachidonique. Bien que leur fonction soit comparable à celle des prostaglandines et que leur structure soit très similaire, elles ne contiennent pas la structure fondamentale de l'acide prostanolique. Les thromboxanes sont dérivés par biosynthèse des prostaglandines. Ils provoquent l'agrégation des plaquettes sanguines et la contraction des artères et sont d'importants régulateurs de l'action des acides gras polyinsaturés. Les leucotriènes sont dénommés ainsi en raison de leur origine dans les leucocytes et de leur structure conjuguée de triène. Ce sont des bronchoconstricteurs puissants qui jouent un rôle important dans les réactions d'hypersensibilité.

- a) **Thromboxane B₂**. Vasoconstricteur, bronchoconstricteur et inducteur de l'agrégation des plaquettes sanguines.
- b) **Leucotriène C₄**. Produit dont l'action est de 100 à 1000 fois plus puissante que l'histamine ou les prostaglandines sur les voies pulmonaires.

F) AUTRES HORMONES

Figurent ici les hormones ayant une structure chimique différente de celle des hormones énumérées précédemment. A titre d'exemple, on peut citer **la mélatonine**, qui est formée dans l'épiphyse et peut être considérée comme un dérivé d'indol.

EXCLUSIONS

Sont **exclus** de la présente position :

- 1) Produits n'ayant pas d'activité hormonale mais ayant une structure proche de celle des hormones :
 - a) Androst-5-ène-3 α ,17 α -diol, androst-5-ène-3 α ,17 β -diol (n° **29.06**) et leurs diacétates (n° **29.15**).
 - b) Adrénalone (DCI) (3',4'-dihydroxy-2-méthylaminoacétophénone) (n° **29.22**).
 - c) Les produits suivants qui relèvent du n° **29.22** :
 - 1°) 2-Amino-1-(3,4-dihydroxyphényl)butane-1-ol.
 - 2°) Corbadrine (DCI) (2-amino-1-(3,4-dihydroxyphényl)propane-1-ol, 3,4-dihydroxynoréphédrine, homoartérenol).
 - 3°) Déoxyépinéphrine (déoxyadrénaline, 1-(3,4-dihydroxyphényl)-2-méthylaminoéthane, épinine).
 - 4°) 3',4'-Dihydroxy-2-éthylaminoacétophénone (4-éthylaminoacétylpyrocatechine).
 - 5°) 1-(3,4-dihydroxyphényl)-2-méthylaminopropane-1-ol (3,4-dihydroxyéphédrine).
 - 6°) (\pm)-N-Méthylépinéphrine ((\pm)-1-(3,4-dihydroxyphényl)-2-diméthylaminoéthanol, méthadrène, (\pm)-N-méthyladrénaline).

(2) **Thromboxanes and leukotrienes.**

Thromboxanes and leukotrienes, like prostaglandins, are synthesised in cells from arachidonic acid; although their function is comparable to that of prostaglandins and their structure is very similar, they do not contain the fundamental structure of prostanoid acid. Thromboxanes are biosynthetically derived from prostaglandins. They cause platelet aggregation and contraction of arteries, and are important regulators of the actions of polyunsaturated fatty acids. Leukotrienes received their name because of their origin in leukocytes and their conjugated triene structure. They are potent bronchoconstrictors and play an important role in hypersensitivity reactions.

- (a) **Thromboxane B₂**. A vasoconstrictor, a bronchoconstrictor and an inducer of blood platelet aggregation.
- (b) **Leukotriene C₄**. Found to be 100 to 1000 times more potent than histamine or prostaglandins in their effects on pulmonary air passages.

(F) OTHER HORMONES

Classified here are other hormones whose structure differs from that of the hormones referred to above. An example is **melatonin**, which is found in the pineal gland and can be considered to be a derivative of indol.

EXCLUSIONS

The heading **excludes** :

- (1) Products not having a hormonal effect, but having a hormone-like structure :
 - (a) Androst-5-ene-3 α ,17 α -diol, androst-5-ene-3 α ,17 β -diol (**heading 29.06**) and their diacetates (**heading 29.15**).
 - (b) Adrenalone (INN) (3',4'-dihydroxy-2-methylaminoacetophenone) (**heading 29.22**).
 - (c) The following products which are classified in **heading 29.22** :
 - (i) 2-Amino-1-(3,4-dihydroxyphenyl)butan-1-ol.
 - (ii) Corbadrine (INN) (2-amino-1-(3,4-dihydroxyphenyl)propan-1-ol, 3,4-dihydroxynorephedrine, homoarterenol).
 - (iii) Deoxyepinephrine (deoxyadrenaline, 1-(3,4-dihydroxyphenyl)-2-methylaminoethane, epinin).
 - (iv) 3',4'-Dihydroxy-2-ethylaminoacetophenone (4-ethylaminoacetyl catechol).
 - (v) 1-(3,4-Dihydroxyphenyl)-2-methylaminopropan-1-ol (3,4-dihydroxyephedrine).
 - (vi) (\pm)-N-Methylepinephrine ((\pm)-1-(3,4-dihydroxyphenyl)-2-dimethylaminoethanol, methadrene, (\pm)-N-methyladrenaline).

Annexe C/1 au doc. 41.690 f
(SCS/13/déc. 97)

- 2) Produits synthétiques ayant une activité hormonale, mais pas de relation structurelle avec les hormones :
 - a) Diénestrol (DCI) (3,4-bis(*p*-hydroxyphényl)hexa-2,4-diène) (n° 29.07).
 - b) Hexestrol (DCI) (3,4-bis(*p*-hydroxyphényl)hexane) (n° 29.07).
 - c) Diéthylstilbestrol (DCI) (*trans*-3,4-bis(*p*-hydroxyphényl)hex-3-ène) (n° 29.07), son diméthyléther (n° 29.09), son dipropionate (n° 29.15) et son furoate (n° 29.32).
 - d) Clomifène (DCI) (antioestrogène) (n° 29.22).
 - e) Tamoxifène (DCI) (antioestrogène) (n° 29.22).
 - f) Flutamide (DCI) (antiandrogène) (n° 29.24).
- 3) Produits naturels ayant une activité hormonale mais non sécrétés par l'organisme de l'homme ou des animaux :
 - a) Zéaralénone, anabolisant (n° 29.32).
 - b) Asperlicine, antagoniste de la cholécistoquinine (n° 29.33).
- 4) Les produits considérés parfois comme hormones, mais qui n'ont pas de propriétés hormonales proprement dites :
 - a) Cystine, cystéine (DCI) et leurs chlorhydrates (n° 29.30).
 - b) Méthionine et ses composés calciques (n° 29.30).
 - c) Sérotonine (5-hydroxytryptamine ou 5-hydroxy-3-(β -aminoéthyl)indole) (n° 29.33).
 - d) Héparine (n° 30.01).
 - e) Produits immunologiques modifiés (n° 30.02).
- 5) Les régulateurs de croissance végétale naturels ou synthétiques (phytohormones, par exemple), qui sont classés :
 - A) Lorsqu'ils ne sont ni mélangés ni présentés pour la vente au détail, d'après leur constitution chimique, par exemple :
 - a) Acide α -naphtylacétique et son sel sodique (n° 29.16).
 - b) Acide 2,4-dichlorophénoxyacétique (2,4-D), acide 2,4,5-trichlorophénoxyacétique (2,4,5-T) et acide 4-chloro-2-méthylphénoxyacétique (MCPA) (n° 29.18).
 - c) Acide β -indolylacétique et son sel sodique (n° 29.33).
 - B) Lorsqu'ils sont présentés dans des formes ou emballages de vente au détail ou à l'état de préparations ou sous forme d'articles dans le n° 38.08.
- 6) Les préparations ayant le caractère de médicaments (n°s 30.03 ou 30.04); en particulier, les insulines-retard (insuline-zinc, insuline-protamine-zinc, insuline-globine, insuline-globine-zinc, insuline-histone).

X

X X

- (2) Products having a hormonal effect, but not having a hormone-like structure :
- (a) Dienestrol (INN) (3,4-bis(*p*-hydroxyphenyl)hexa-2,4-diene) (**heading 29.07**).
 - (b) Hexestrol (INN) (3,4-bis(*p*-hydroxyphenyl)hexane) (**heading 29.07**).
 - (c) Diethylstilbestrol (INN) (*trans*-3,4-bis(*p*-hydroxyphenyl)hex-3-ene) (**heading 29.07**), its dimethyl ether (**heading 29.09**), its dipropionate (**heading 29.15**) and its furoate (**heading 29.32**).
 - (d) Clomifene (INN) (anti-oestrogen) (**heading 29.22**).
 - (e) Tamoxifen (INN) (anti-oestrogen) (**heading 29.22**).
 - (f) Flutamide (INN) (anti-androgen) (**heading 29.24**).
- (3) Natural substances with hormonal effects, but which are not secreted in the bodies of humans or animals :
- (a) Zearalenone, an anabolic agent (**heading 29.32**)
 - (b) Asperlicin, a cholecistoquinine antagonist (**heading 29.33**).
- (4) The following products sometimes considered to be hormones but which have no real hormone activity :
- (a) Cystine, cysteine (INN) and their hydrochlorides (**heading 29.30**).
 - (b) Methionine and its calcium salts (**heading 29.30**).
 - (c) Serotonin (5-hydroxytryptamine or 5-hydroxy-3-(β -aminoethyl) indole) (**heading 29.33**).
 - (d) Heparin (**heading 30.01**).
 - (e) Modified immunological products (**heading 30.02**).
- (5) Plant-growth regulators (e.g., phytohormones), natural or synthetic, which are classified :
- (A) When unmixed and not put up for retail sale, according to their chemical composition, for instance :
 - (a) α -Naphthylacetic acid and its sodium salt (**heading 29.16**).
 - (b) 2,4-Dichlorophenoxyacetic acid (2,4-D), 2,4,5-trichlorophenoxyacetic acid (2,4,5-T) and 4-chloro-2-methyl-phenoxyacetic acid (MCPA) (**heading 29.18**).
 - (c) β -Indolylacetic acid and its sodium salt (**heading 29.33**).
 - (B) When put up in forms or packings for retail sale or as preparations or articles, in **heading 38.08**.
- (6) Medicaments of **heading 30.03** or **30.04**, in particular, " Retard Insulin " (zinc-insulin, protamin-zinc insulin, globin-insulin, zinc-globin insulin, histone-insulin).

X

X X

ANNEXE C/2

REMANIEMENTS A APPORTER EVENTUELLEMENT A LA NOMENCLATURE
ET AUX NOTES EXPLICATIVES EN VUE DE PRECISER LE CLASSEMENT
DES COMPOSES DE COORDINATION

(Voir annexe A/3 ci-dessus)

ANNEX C/2

POSSIBLE AMENDMENTS TO THE HS AND THE EXPLANATORY NOTES TO CLARIFY THE
CLASSIFICATION OF CO-ORDINATION COMPOUNDS

(See Annex A/3 above)

PROCEDURE DE L'ARTICLE 16

A. AMENDEMENT DE LA NOMENCLATURE

[CHAPITRE 29

Note 5 c) 1°).

Nouvelle rédaction :

"1°) Les sels inorganiques des composés organiques tels que les composés à fonction acide, à fonction phénol ou à fonction éinol, ou les bases organiques, des Sous-Chapitres I à X ou du n° 29.42, sont à classer dans la position dont relève le composé organique correspondant, sauf dans le cas des composés du phénol avec des métaux de transition, qui sont à classer dans le n° 29.42;".

Note 5 d).

Nouvelle rédaction :

"d) Les alcoolates métalliques, autres que les alkoxydes des métaux de transition, sont à classer dans la même position que les alcools correspondants, sauf dans le cas de l'éthanol (n° 29.05).".

Nouvelle Note 8.

Insérer la nouvelle Note de Chapitre suivante :

"8.- Le n° 29.42 comprend les composés des acides organiques (même comprenant d'autres groupes fonctionnels) avec des métaux de transition qui contiennent un cation de titane, de vanadium, de chrome, de manganèse, de fer, de cobalt, de nickel, de cuivre, de zirconium, de niobium, de molybdène, de hafnium, de tantale, de tungstène ou de rhénium.".

N° 29.42.

Nouvelle rédaction :

"29.42 2942.00 Composés de coordination, (autres que les produits du n° 29.36); autres composés organiques.".]

ARTICLE 16 PROCEDURE

A. AMENDMENTS TO THE NOMENCLATURE

[CHAPTER 29

Note 5 (c) (1).

Delete and substitute :

"(1) Inorganic salts of organic compounds such as acid-, phenol- or enol-function compounds or organic bases, of Sub-Chapters I to X or heading No. 29.42, are to be classified in the heading appropriate to the organic compound, except in the case of compounds of phenols with transition metals, which are classified in heading 29.42; and".

Note 5 (d).

Delete and substitute :

"(d) Metal alcoholates, other than alkoxides of transition metals, are to be classified in the same heading as the corresponding alcohols, except in the case of ethanol (heading No. 29.05).".

New Note 8.

Insert the following new Chapter Note :

"8.- Heading No. 29.42 includes compounds of organic acids (whether or not other functional groups are present) with transition metals containing one of the cations titanium, vanadium, chromium, manganese, iron, cobalt, nickel, copper, zirconium, niobium, molybdenum, hafnium, tantalum, tungsten or rhenium.".

Heading 29.42

Delete and substitute :

"29.42 2942.00 Co-ordination compounds (excluding products of heading No. 29.36); other organic compounds.".]

B. MODIFICATION DES NOTES EXPLICATIVES

[CHAPITRE 29.

Page 342.

1. Note 5 c) 1°).

Nouvelle rédaction :

"1°) Les sels inorganiques des composés organiques tels que les composés à fonction acide, à fonction phénol ou à fonction éinol, ou les bases organiques, des Sous-Chapitres I à X ou du n° 29.42, sont à classer dans la position dont relève le composé organique correspondant, sauf dans le cas des composés du phénol avec des métaux de transition, qui sont à classer dans le n° 29.42;"

2. Note 5 d).

Nouvelle rédaction :

"d) Les alcoolates de métaux, autres que les alkoxydes de métaux de transition, sont à classer dans la même position que les alcools correspondants, sauf dans le cas de l'éthanol (n° 29.05)."

3. Nouvelle Note 8.

Insérer la nouvelle Note de Chapitre suivante :

"8.- Le n° 29.42 comprend les composés des acides organiques (même comprenant d'autres groupes fonctionnels) avec des métaux de transition qui contiennent un cation de titane, de vanadium, de chrome, de manganèse, de fer, de cobalt, de nickel, de cuivre, de zirconium, de niobium, de molybdène, de hafnium, de tantale, de tungstène ou de rhénium."

Page 394. N° 29.20. Dernier paragraphe (exclusion).

Nouvelle rédaction :

"La présente position **ne couvre pas** les composés de coordination, y compris les alkoxydes de métaux de transition, comme par exemple le tétra-*n*-butoxyde de titane, dénommé également titanate de tétrabutyle (n° 29.42)."

B. AMENDMENTS TO THE EXPLANATORY NOTES

[CHAPTER 29

Page 342.

1. Note 5 (c) (1).

Delete and substitute :

"(1) Inorganic salts of organic compounds such as acid-, phenol- or enol-function compounds or organic bases, of Sub-Chapters I to X or heading No. 29.42, are to be classified in the heading appropriate to the organic compound, except in the case of compounds of phenols with transition metals, which are classified in heading 29.42; and".

2. Note 5 (d).

Delete and substitute :

"(d) Metal alcoholates, other than alkoxides of transition metals, are to be classified in the same heading as the corresponding alcohols, except in the case of ethanol (heading No. 29.05).".

3. New Note 8.

Insert the following new Chapter Note 8 :

"8. - Heading No. 29.42 includes compounds of organic acids (whether or not other functional groups are present) with transition metals containing one of the cations titanium, vanadium, chromium, manganese, iron, cobalt, nickel, copper, zirconium, niobium, molybdenum, hafnium, tantalum, tungsten or rhenium.".

Page 394. Heading 29.20. Last paragraph (exclusion).

Delete and substitute :

"This heading **excludes** co-ordination compounds, including transition metal alkoxides, e.g., titanium tetra-*n*-butoxide (also known as tetrabutyl titanate) (**heading 29.42**)."

Page 412. N° 29.31. Dernier paragraphe (exclusion).

Nouvelle rédaction :

“La présente position **ne comprend pas** :

- a) Les thiocomposés organiques dont la molécule comporte un ou plusieurs atomes de soufre directement liés à l'atome (aux atomes) de carbone (voir la Note 6 du présent Chapitre). Sont exclus les composés dont la molécule comporte, outre des atomes de soufre directement liés à l'atome (aux atomes) de carbone, d'autres éléments non métalliques ou métalliques directement liés à l'atome (aux atomes) de carbone (par exemple, le fonofos (ISO)) (n° 29.30).
- b) Les dérivés alkylés de métaux de transition, les fullerènes métalliques et les composés complexes de métaux (y compris les métallocènes et les métaux carbonyles, comme par exemple le ferrocène et le fer carbonyle) (n° 29.42).”

Page 446. N° 29.42.

Nouvelle rédaction :

“29.42 - COMPOSES DE COORDINATION (AUTRES QUE LES PRODUITS DU N° 29.36); AUTRES COMPOSES ORGANIQUES.”.

A- COMPOSES DE COORDINATION

Les composés de coordination (complexes) contiennent un ion central (d'ordinaire un métal de transition) et un ou plusieurs ligands organiques qui, ensemble, forment un complexe dont les liaisons ne sont ni covalentes ni ioniques mais intermédiaires entre ces deux types. Le complexe peut être cationique, anionique ou non-ionique suivant la somme des charges de l'atome central et du ou des ligands. Sont inclus dans la présente position les composés en cage, y compris les complexes internes et externes de fullerène.

Les composés de coordination couverts par la présente position couvrent notamment :

- 1) **Les composés complexes contenant de simples ligands donneurs** : le ligand partage une ou plusieurs paires d'électrons avec l'atome de métal. Les ligands peuvent comporter une seule liaison ou plusieurs liaisons. Un ligand comportant une seule liaison est relié au métal par un seul de ses atomes. Un ligand comportant plusieurs liaisons est relié au métal par plusieurs de ses atomes (composés complexes d'éthylènediamine, par exemple). Les composés de coordination dont les ligands comportent plusieurs liaisons sont appelés chélates.

La présente partie comprend notamment :

- a) **les composés complexes d'éthylènediamine**
- b) **les composés complexes de dicétonates chélatés**
- c) **les alkoxydes de métaux de transition**
- d) **les composés des acides organiques (même comprenant d'autres groupes fonctionnels)** avec des métaux de transition
- e) **les composés complexes** du fluorure de bore avec l'acide acétique, l'éther diméthylque ou le phénol
- f) **l'acéto-arsénite de cuivre** (*vert de Schweinfurt*)
- g) **les gluconates antimonio-sodiques** (antimoine tri- ou pentavalent).

Page 412. Heading 29.31. Last paragraph (exclusion).

Delete and substitute :

“This heading **excludes** :

- (a) Organo-sulphur compounds whose molecules have sulphur atom(s) directly linked to carbon atom(s) (see Note 6 to this Chapter). It excludes compounds whose molecules contain, in addition to sulphur atom(s) directly linked to carbon atom(s), other non-metal or metal atom(s) directly linked to carbon atom(s) (e.g., fonofos (ISO)) (**heading 29.30**).
- (b) Transition metal alkyls, metal fullerenes and metal complexes (including metallocenes and metal carbonyls, e.g., ferrocene, iron carbonyl) (**heading 29.42**).”

Page 446. Heading 29.42.

Delete and substitute :

“**29.42 - CO-ORDINATION COMPOUNDS (EXCLUDING PRODUCTS OF HEADING No. 29.36); OTHER ORGANIC COMPOUNDS.**”.

(A) CO-ORDINATION COMPOUNDS

Co-ordination (complex) compounds comprise a central atom or ion (usually a transition metal) and one or more organic ligands, which together form a complex with bonding that is neither covalent nor ionic, but intermediate between the two types. The complex may be cationic, anionic or non-ionic, depending on the sum of the charges of the central atom and the ligand. The heading also includes polytopal (cage) compounds, such as internal and external fullerene complexes.

The co-ordination compounds covered by this heading include :

- (1) **Complexes with simple donor ligands** : the ligand shares one or more electron pairs with the metal atom. Ligands can be unidentate or multidentate. A unidentate ligand is connected to the metal through only one of its atoms. A multidentate ligand is connected to the metal through more than one of its atoms (e.g., ethylenediamine complexes). Co-ordination compounds with multidentate ligands are known as chelates.

This part includes, *inter alia*:

- (a) **Ethylenediamine complexes.**
- (b) **Diketonate chelate complexes.**
- (c) **Alkoxides of transition metals.**
- (d) **Compounds of organic acids (whether or not other functional groups are present) with transition metals.**
- (e) **Boron trifluoride complexes** with acetic acid, dimethyl ether or phenol.
- (f) **Copper acetoarsenite** (Schweinfurt green).
- (g) **Sodium antimonylgluconate** and **sodium stibogluconate** (tri- or pentavalent antimony).

- 2) **Les complexes métalliques** : composés dans lesquels les électrons du ligand (des ligands) participent à la liaison. Le ligand donne des électrons au métal, mais comporte également des orbitales réceptrices qui peuvent accepter des électrons du métal (back-bonding). Comme ces ligands peuvent accepter des électrons, ils sont appelés ligands acides. Les molécules et ions organiques qui peuvent former des composés complexes métalliques comprennent notamment l'oxyde de carbone, les oléfines, les ions cyclopentadiényl (métallocènes) et les ions tropylium.

La présente partie couvre notamment :

- a) le ferrocène
- b) le fer carbonyle et autres métaux carbonyles

- 3) **Autres composés organométalliques** : autres composés à liaisons carbone - métal

La présente partie comprend notamment :

- a) les dérivés alkylés de métaux de transition
- b) les fullerènes métalliques

B.- AUTRES COMPOSES ORGANIQUES

La présente partie couvre les composés organiques de constitution chimique définie présentés isolément qui ne peuvent être classés ailleurs.

- 1) **Cétènes**. Comme les cétones, ils se caractérisent par un groupement carbonyle ($>C=O$). Toutefois, dans les cétènes, le groupement carbonyle est lié à l'atome de carbone voisin par une double liaison (cétène, diphénylcétène, par exemple).

La présente position **exclut** toutefois le dicétène qui est une lactone du n° 29.32.

- 2) **Di-iodure de dithymol**.
- 3) **Méthacrylochlorure de chrome** .

Toutefois, la présente position **ne comprend pas** les produits compris par la Note 1 de la Section VI ou d'autres composés de coordination du n° 29.36 tels que la vitamine B₁₂ et ses dérivés.".]

X

X X

- (2) **Metal complexes** : complexes in which the electron system of the ligand(s) is involved in bonding. The ligand donates electrons to the metal but also has acceptor orbitals which can accept electrons from the metal (back-bonding). Because these ligands can accept electrons, they are called acid ligands. Organic molecules and ions which can form metal complexes include carbon monoxide, olefins, cyclopentadienyl ions (metallocenes), tropylium ions, etc.

This part includes, *inter alia* :

- (a) **Ferrocene**.
(b) **Iron carbonyl, nickel carbonyl**, etc.
- (3) **Other organometallic compounds** : other compounds with carbon-metal bonds.

This part includes, *inter alia* :

- (a) **Transition metal alkyls**.
(b) **Metal fullerenes**.

(B) OTHER ORGANIC COMPOUNDS

This part covers separate chemically defined organic compounds not classified elsewhere.

- (1) **Ketenes**. Like ketones, these are characterised by a carbonyl group ($>C=O$). However, in ketenes, the carbonyl group is linked to the neighbouring carbon atom by a double bond (e.g., ketene, diphenylketene).

This heading however **excludes** diketene which is a lactone of **heading 29.32**.

- (2) **Dithymol di-iodide**.
(3) **Methacrylate chromic chloride**.

However, this heading **does not include** products covered by Note 1 to Section VI or other co-ordination compounds of **heading 29.36**, such as vitamin B₁₂ and its derivatives.".]

x

x x

ANNEXE C/3

PROJET DE REMANIEMENT DE LA NOMENCLATURE ET DES
NOTES EXPLICATIVES CONCERNANT DES POLYMERES

(Voir annexe A/13 ci-dessus).

ANNEX C/3

POSSIBLE AMENDMENTS TO THE NOMENCLATURE AND EXPLANATORY NOTES
CONCERNING POLYMERS

(See Annex A/13 above).

PROCEDURE DE L'ARTICLE 16

A. AMENDEMENT DE LA NOMENCLATURE

CHAPITRE 39.

N° 3905.1.

Remplacer "Acétate de polyvinyle :" par "Poly(acétate de vinyle) :".

N° 3905.30.

Remplacer "Alcool polyvinylique," par "[Poly(alcool de vinyle)][Poly(alcool vinylique)]".

N° 3920.91.

Remplacer "En butyral de polyvinyle" par "En poly(butyral de vinyle)".

B. MODIFICATION AUX NOTES EXPLICATIVES

CHAPITRE 39.

Page 592. Désignations abrégées de polymères .

1. Remplacer "Acétate de polyvinyle" par "Poly(acétate de vinyle)".
2. Remplacer "Polyalcool de vinyle (alcool polyvinylique)" par "[Poly(alcool de vinyle)][Poly(alcool vinylique)]".
3. Remplacer "Chlorure de polyvinyle (polychlorure de vinyle)" par "Poly(chlorure de vinyle)".

Page. 596. Cinquième paragraphe.

1. Deuxième ligne.

Remplacer "d'oxyde de polyxylylène" par "de poly(oxyxylylène)".

2. Troisième et quatrième lignes.

Remplacer "l'oxyde de polyxylylène" par "poly(oxyxylylène)".

Page 599. Note explicative de sous-positions. Note 1 de sous-positions. Alinéa A) 1).
Dernier paragraphe. Première et deuxième lignes.

Remplacer "alcools polyvinyliques" par "[poly(alcool de vinyle)][poly(alcool vinylique)]".

ARTICLE 16 PROCEDURE

A. AMENDMENTS TO THE NOMENCLATURE

CHAPTER 39.

Subheading 3905.1.

[French text only].

Subheading 3905.30.

[French text only].

N° 3920.91.

[French text only].

B. AMENDMENTS TO THE EXPLANATORY NOTES

CHAPITRE 39.

Page 592. Abbreviations for polymers.

1. [French text only].
2. [French text only].
3. [French text only].

Page. 596. Fifth paragraph.

1. [French text only].
2. [French text only]

Page 599. Subheading Explanatory Note. Subheading Note 1. Item (A) (1). Last paragraph.

[French text only].

Page 600. Note explicative de sous-positions. Note 1 de sous-positions. Alinéa A) 3).
Troisième paragraphe. Première ligne.

1. Remplacer "l'alcool polyvinylique" par "le [poly(alcool de vinyle)][poly(alcool vinylique)]".
2. Remplacer "de l'acétate de polyvinyle" par "du poly(acétate de vinyle)".

Page 605. N° 39.05.

1. N° 3905.1.

Remplacer "Acétate de polyvinyle :" par "Poly(acétate de vinyle) :".

2. N° 3905.30.

Remplacer "Alcool polyvinylique," par "[Poly(alcool de vinyle)][Poly(alcool vinylique)]".

3. Deuxième paragraphe.

Remplacer "esters vinyliques" par "esters de vinyle".

4. Troisième paragraphe.

- a) Première ligne.

Remplacer "L'alcool polyvinylique" par "Le [poly(alcool de vinyle)][poly(alcool vinylique)]".

- b) Deuxième ligne.

Remplacer "alcools polyvinyliques" par "[poly(alcools de vinyle)][poly(alcools vinyliques)]".

- c) Pénultième ligne.

Remplacer "alcools polyvinyliques" par "[poly(alcools de vinyle)][poly(alcools vinyliques)]".

Page 600. Subheading Explanatory Note. Subheading Note 1. Item (A) (3). Third paragraph.

[French text only].

Page 605. Heading 39.05.

1. Subheading 3905.1.

[French text only].

2. Subheading 3905.30.

[French text only].

3. Second paragraph.

[French text only].

4. Third paragraph.

[French text only].

5. Quatrième paragraphe.

a) Première ligne.

1. Remplacer “acétals polyvinyliques” par “poly(acétals de vinyle)”.
2. Remplacer “l’alcool polyvinylique” par “le [poly(alcool de vinyle)][poly(alcool vinylique)]”.

b) Deuxième et troisième lignes.

Remplacer “l’acétate de polyvinylique” par “le poly(acétate de vinyle)”.

Page 606. N° 39.05. Premier paragraphe.

Remplacer “éthers polyvinyliques” par “poly(éthers de vinyle)”.

Page 607. N° 39.07.

1. Alinéa 1). Troisième ligne.

Remplacer “acétals polyvinyliques” par “poly(acétals de vinyle)”.

2. Alinéa 2). Troisième ligne.

Remplacer “éthers polyvinyliques” par “poly(éthers de vinyle)”.

3. Alinéa 5).

a) Troisième et quatrième lignes.

Remplacer “esters polyvinyliques” par “poly(esters de vinyle)”.

b) Quatrième ligne.

Remplacer “esters polyacryliques” par “poly(esters acryliques)”.

4. Alinéa 5) b). Première ligne.

Remplacer “**esters polyallyliques**” par “**poly(esters d’allyle)**”.

5. Fourth paragraph.
[French text only].

Page 606. Heading 39.05. First paragraph.

[French text only].

Page 607. Heading 39.07.

1. Item (1).
[French text only].
2. Item (2).
[French text only].
3. Item (5).
[French text only].

4. Item (5) b).
[French text only].

Page 608. N° 39.07. Alinéa 5) d).

1. Premier paragraphe. Quatrième et cinquième lignes.

Remplacer “esters polyallyliques” par “poly(esters d’allyle)”.

2. Deuxième paragraphe. Deuxième ligne.

Remplacer “téréphtalate de polybutylène” par “poly(butylène téréphtalate)”.

Page 611. N° 39.11. Alinéa 4). Deuxième et troisième lignes.

Remplacer “cétones polyvinyliques” par “poly(cétones de vinyle)”.

Page 618. N° 3920.91.

Remplacer “**En butyral de polyvinyle**” par “**En poly(butyral de vinyle)**”.

x

x x

Page 608. Heading 39.07. Item (5) (d).

1. First paragraph.

[French text only].

2. Second paragraph.

[French text only].

Page 611. Heading 39.11. Item (4).

[French text only].

Page 618. Subheading 3920.91.

[French text only].

x

x x

(SCS/13/déc. 97)
(SSC/13/Dec. 97)

ANNEXE C/4

MODIFICATIONS A APPORTER EVENTUELLEMENT A LA LISTE DES
STUPEFIANTS ET DES SUBSTANCES PSYCHOTROPES FIGURANT
AUX PAGES 447 A 454 DES NOTES EXPLICATIVES ACTUELLES

(Voir annexe A/8 ci-dessus)

ANNEX C/4

PROPOSED MODIFICATIONS TO THE LIST OF NARCOTIC DRUGS
AND PSYCHOTROPIC SUBSTANCES FOUND ON PAGES 447 TO 454
OF THE PRESENT EXPLANATORY NOTES

(See Annex A/8 above)

PAR VOIE DE CORRIGENDUM

MODIFICATIONS DES NOTES EXPLICATIVES

CHAPITRE 29.

Pages 447 à 454.

Nouvelle rédaction :

" **LISTE DES STUPEFIANTS ET DES SUBSTANCES PSYCHOTROPES ENUMERES
PAR ORDRE ALPHABETIQUE ET PAR TYPE DE DROGUE**

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par
le Protocole de 1972**

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Acétorphine (DCI) Chlorhydrate d'acétorphine	2939.10	25333-77-1	4
Acétyldihydrocodéine Chlorhydrate d'acétyldihydrocodéine	2939.10	25333-78-2 3861-72-1	4 2
Acétylméthadol (DCI) Acétyl- α -méthylfentanyl	2922.19	509-74-0	1
Acétylmorphine 3-Acétylmorphine 6-Acétylmorphine	2933.39		4
Alfentanil (DCI) Chlorhydrate d'alfentanil	2939.10		1
Allyprodine (DCI) Chlorhydrate d'allyprodine	2939.10	2784-73-8	1
Alphacétylméthadol (DCI) L-Alphacétylméthadol Chlorhydrate d'alphacétylméthadol	2933.39	71195-58-9 69049-06-5	1 1
Alphaméprodine (DCI) Alphaméthadol (DCI) Alphaprodine (DCI) Chlorhydrate d'alphaprodine	2933.39	25384-17-2	1
Aniléridine (DCI) Dichlorhydrate d'aniléridine Phosphate d'aniléridine	2933.39		1
Benzéthidine (DCI) Bromhydrate de benzéthidine Chlorhydrate de benzéthidine	2933.39	17199-58-5	1
	2922.19		1
	2933.39	468-51-9	1
	2922.19	17199-54-1	1
	2933.39	77-20-3	1
	2933.39	561-78-4	1
	2933.39	144-14-9	1
	2933.39	126-12-5	1
	2933.39	4268-37-5	1
	2933.39	3691-78-9	1
	2933.39		1
	2933.39		1

TO BE MADE BY CORRIGENDUM

AMENDMENTS TO THE EXPLANATORY NOTES

CHAPTER 29.

Pages 447 to 454.

Delete and substitute :

" **LIST OF NARCOTIC DRUGS AND PSYCHOTROPIC SUBSTANCES ARRANGED
IN ALPHABETICAL ORDER BY TYPE OF DRUG**

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs,
1961, as amended by the 1972 Protocol**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Acetorphine (INN)	2939.10	25333-77-1	4
Acetorphine hydrochloride	2939.10	25333-78-2	4
Acetyldihydrocodeine	2939.10	3861-72-1	2
Acetyldihydrocodeine hydrochloride	2939.10		2
Acetylmethadol (INN)	2922.19	509-74-0	1
Acetyl-a-methylfentanyl	2933.39		4
Acetylmorphine	2939.10		1
3-Acetylmorphine	2939.10		1
6-Acetylmorphine	2939.10	2784-73-8	1
Alfentanil (INN)	2933.39	71195-58-9	1
Alfentanil hydrochloride	2933.39	69049-06-5	1
Allyprodine (INN)	2933.39	25384-17-2	1
Allyprodine hydrochloride	2933.39		1
Alphacetylmethadol (INN)	2922.19	17199-58-5	1
L-Alphacetylmethadol hydrochloride	2922.19		1
Alphameprodine (INN)	2933.39	468-51-9	1
Alphamethadol (INN)	2922.19	17199-54-1	1
Alphaprodine (INN)	2933.39	77-20-3	1
Alphaprodine hydrochloride	2933.39	561-78-4	1
Anileridine (INN)	2933.39	144-14-9	1
Anileridine dihydrochloride	2933.39	126-12-5	1
Anileridine phosphate	2933.39	4268-37-5	1
Benzethidine (INN)	2933.39	3691-78-9	1
Benzethidine hydrobromide	2933.39		1
Benzethidine hydrochloride	2933.39		1

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Benzoylmorphine	2939.10		1
Benzylmorphine	2939.10	14297-87-1	1
Chlorhydrate de benzylmorphine	2939.10	630-86-4	1
Mésilate de benzylmorphine	2939.10		1
Bétacétylméthadol (DCI)	2922.19	17199-59-6	1
Bétaméprodine (DCI)	2933.39	468-50-8	1
Bétaméthadol (DCI)	2922.19	17199-55-2	1
Bétaprodine (DCI)	2933.39	468-59-7	1
Chlorhydrate de bétaprodine	2933.39		1
Bézitramide (DCI)	2933.39	15301-48-1	1
Chlorhydrate de bézitramide	2933.39		1
Benzoylmorphine	2939.10		1
Butyrate de dioxaphétyl (DCI)	2934.90	467-86-7	1
Chlorhydrate de butyrate de dioxaphétyl	2934.90		1
Cannabis	1211.90		4
Extraits et teintures de cannabis	1302.19		
Huile de cannabis	1302.19		
Résine de cannabis	1301.90		
Cétobémidone (DCI)	2933.39	469-79-4	4
Chlorhydrate de cétobémidone	2933.39	5965-49-1	4
Clonitazène (DCI)	2933.90	3861-76-5	1
Chlorhydrate de clonitazène	2933.90		1
Mésilate de clonitazène	2933.90		1
Coca (feuille de)	1211.90		
Coca (pâte de)	1302.19		

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Benzoylmorphine	2939.10		1
Benzylmorphine	2939.10	14297-87-1	1
Benzylmorphine hydrochloride	2939.10	630-86-4	1
Benzylmorphine mesilate	2939.10		1
Betacetylmethadol (INN)	2922.19	17199-59-6	1
Betameprodine (INN)	2933.39	468-50-8	1
Betamethadol (INN)	2922.19	17199-55-2	1
Betaprodine (INN)	2933.39	468-59-7	1
Betaprodine hydrochloride	2933.39		1
Bezitramide (INN)	2933.39	15301-48-1	1
Bezitramide hydrochloride	2933.39		1
Benzoylmorphine	2939.10		1
Cannabis	1211.90		4
Cannabis extracts and tinctures	1302.19		
Cannabis oil	1302.19		
Cannabis resin	1301.90		
Clonitazene (INN)	2933.90	3861-76-5	1
Clonitazene hydrochloride	2933.90		1
Clonitazene mesilate	2933.90		1
Coca leaf	1211.90		
Coca paste	1302.19		

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Cocaïne	2939.90	50-36-2	1
Benzoate de cocaïne	2939.90		1
Borate de cocaïne	2939.90		1
Bromhydrate de cocaïne	2939.90		1
Chlorhydrate de cocaïne	2939.90	53-21-4	1
Citrate de cocaïne	2939.90		1
Foramte de cocaïne	2939.90		1
Iodhydrate de cocaïne	2939.90		1
Lactate de cocaïne	2939.90		1
Nitrate de cocaïne	2939.90	5913-62-2	1
Salicylate de cocaïne	2939.90	5913-64-4	1
Sulfate de cocaïne	2939.90		1
Tartrate de cocaïne	2939.90		1
d-Cocaïne	2939.90	478-73-9	
Codéine	2939.10	76-57-3	2
Acétate de codéine	2939.10		2
Allobarbiturate de codéine	2939.10		2
Barbiturate de codéine	2939.10		2
Bromhydrate de codéine	2939.10	125-25-7	2
Camphosulfonate de codéine	2939.10		2
Chlorhydrate de codéine	2939.10	1422-07-7	2
Citrate de codéine	2939.10	5913-73-5	2
Cyclobarbiturate de codéine	2939.10		2
Cyclopentobarbiturate de codéine	2939.10		2
6-Glucuronide de codéine	2939.10		2
Iodhydrate de codéine	2939.10	125-26-8	2
Méthylbromure de codéine	2939.10	125-27-9	2
N-Oxyde de codéine	2939.10	3688-65-1	
Chlorhydrate de N-oxyde de codéine	2939.10		
Phénobarbiturate de codéine	2939.10		2
Phosphate de codéine	2939.10	52-28-8	2
Résinate de codéine	3003.40		2
Salicylate de codéine	2939.10		2
Sulfate de codéine	2939.10	1420-53-7	2
Codoxime (DCI)	2939.10	7125-76-0	1
Concentré de paille de pavot	1302.11 2939.10		1

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Cocaine	2939.90	50-36-2	1
d-Cocaine	2939.90	478-73-9	
Cocaine benzoate	2939.90		1
Cocaine borate	2939.90		1
Cocaine citrate	2939.90		1
Cocaine formate	2939.90		1
Cocaine hydriodide	2939.90		1
Cocaine hydrobromide	2939.90		1
Cocaine hydrochloride	2939.90	53-21-4	1
Cocaine lactate	2939.90		1
Cocaine nitrate	2939.90	5913-62-2	1
Cocaine salicylate	2939.90	5913-64-4	1
Cocaine sulfate	2939.90		1
Cocaine tartrate	2939.90		1
Codeine	2939.10	76-57-3	2
Codeine acetate	2939.10		2
Codeine allobarbiturate	2939.10		2
Codeine barbiturate	2939.10		2
Codeine camphosulfonate	2939.10		2
Codeine citrate	2939.10	5913-73-5	2
Codeine cyclobarbiturate	2939.10		2
Codeine cyclopentobarbiturate	2939.10		2
Codeine 6-glucuronide	2939.10		2
Codeine hydrobromide	2939.10	125-25-7	2
Codeine hydrochloride	2939.10	1422-07-7	2
Codeine hydroiodide	2939.10	125-26-8	2
Codeine methylbromide	2939.10	125-27-9	2
Codeine phenobarbiturate	2939.10		2
Codeine phosphate	2939.10	52-28-8	2
Codeine resinate	3003.40		2
Codeine salicylate	2939.10		2
Codeine sulfate	2939.10	1420-53-7	2
Codeine-N-oxide	2939.10	3688-65-1	
Codeine-N-oxide hydrochloride	2939.10		
Codoxime (INN)	2939.10	7125-76-0	1
Concentrate of poppy straw	1302.11		1
	2939.10		

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Désomorphine (DCI)	2939.10	427-00-9	4
Bromhydrate de désomorphine	2939.10		4
Chlorhydrate de désomorphine	2939.10		4
Sulfate de désomorphine	2939.10		4
Dextromoramide (DCI)	2934.90	357-56-2	1
Chlorhydrate de dextromoramide	2934.90		1
Dichlorhydrate de dextromoramide	2934.90		1
Hydrogénotartrate de dextromoramide	2934.90	2922-44-3	1
Dextropropoxyphène (DCI)	2922.19	469-62-5	2
Chlorhydrate de dextropropoxyphène	2922.19	1639-60-7	2
Napsilate	2922.19	17140-78-2	2
Résinate de dextropropoxyphène	3003.90		2
Diampromide (DCI)	2924.29	552-25-0	1
Sulfate de diampromide	2924.29		1
Diéthylthiambutène (DCI)	2934.90	86-14-6	1
Chlorhydrate de diéthylthiambutène	2934.90	132-19-4	1
Difénoxine (DCI) 2933.39	28782-42-5	1	
Chlorhydrate de difénoxine 2933.39	35607-36-4	1	
Dihydrocodéine (DCI)	2939.10	125-28-0	2
Chlorhydrate de dihydrocodéine 2939.10	2		
Hydrogénotartrate de dihydrocodéine 2939.10	5965-13-9	2	
Phosphate de dihydrocodéine 2939.10	24204-13-5	2	
Résinate de dihydrocodéine	3003.40		2
Thiocyanate de dihydrocodéine 2939.10	2		
Dihydroisomorphine	2939.10		
6-Glucuronide de dihydroisomorphine	2939.10		

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Desomorphine (INN)	2939.10	427-00-9	4
Desomorphine hydrobromide	2939.10		4
Desomorphine hydrochloride	2939.10		4
Desomorphine sulfate	2939.10		4
Dextromoramide (INN)	2934.90	357-56-2	1
Dextromoramide dihydrochloride	2934.90		1
Dextromoramide hydrochloride	2934.90		1
Dextromoramide hydrogen tartrate (bitartrate)	2934.90	2922-44-3	1
Dextropropoxyphene (INN)	2922.19	469-62-5	2
Dextropropoxyphene hydrochloride	2922.19	1639-60-7	2
Napsilate	2922.19	17140-78-2	2
Dextropropoxyphene resinate	3003.90		2
Diampromide (INN)	2924.29	552-25-0	1
Diampromide sulfate	2924.29		1
Diethylthiambutene (INN)	2934.90	86-14-6	1
Diethylthiambutene hydrochloride	2934.90	132-19-4	1
Difenoxin (INN)	2933.39	28782-42-5	1
Difenoxin hydrochloride	2933.39	35607-36-4	1
Dihydrocodeine (INN)	2939.10	125-28-0	2
Dihydrocodeine hydrochloride	2939.10		2
Dihydrocodeine hydrogen tartrate (bitartrate)	2939.10	5965-13-9	2
Dihydrocodeine phosphate	2939.10	24204-13-5	2
Dihydrocodeine resinate	3003.40		2
Dihydrocodeine thiocyanate	2939.10		2
Dihydroisomorphin	2939.10		
Dihydroisomorphin 6-glucuronide	2939.10		

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Dihydromorphine	2939.10	509-60-4	2
Chlorhydrate de dihydromorphine	2939.10	1421-28-9	2
Iodhydrate de dihydromorphine	2939.10		2
Picrate de dihydromorphine	2939.10		2
Diménoxadol (DCI)	2922.19	509-78-4	1
Chlorhydrate de diménoxadol	2922.19	2424-75-1	1
Dimépheptanol (DCI)	2922.19	545-90-4	1
Chlorhydrate de dimépheptanol	2922.19		1
Diméthylthiambutène (DCI)	2934.90	524-84-5	1
Chlorhydrate de diméthylthiambutène	2934.90		1
Diphénoxyate (DCI)	2933.39	915-30-0	1
Chlorhydrate de diphénoxyate	2933.39	3810-80-8	1
Dipipanone (DCI)	2933.39	467-83-4	1
Bromhydrate de dipipanone	2933.39		1
Chlorhydrate de dipipanone	2933.39	75783-06-1	1
Drotébanol (DCI)	2933.40	3176-03-2	1
Ecgonine, ses esters et dérivés qui sont transformables en ecgonine ou cocaïne	2939.90	481-37-8	1
Chlorhydrate d'ecgonine	2939.90		1
Ecgonine benzoyléthyl ester	2939.90		1
Ecgonine benzoylpropyl ester	2939.90		1
Ecgonine cinnamoyleméthyl ester	2939.90		1
Ecgonine 2,6-diméthyl- benzoyl méthyl ester	2939.90		1
Ecgonine méthyl ester	2939.90		1
Chlorhydrate d'ecgonine méthyl ester	2939.90		1
Ecgonine phénylacétyl- méthyl ester	2939.90		1

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Dihydromorphine	2939.10	509-60-4	2
Dihydromorphine hydriodide	2939.10		2
Dihydromorphine hydrochloride	2939.10	1421-28-9	2
Dihydromorphine picrate	2939.10		2
Dimenoxadol (INN)	2922.19	509-78-4	1
Dimenoxadol hydrochloride	2922.19	242-75-1	1
Dimepheptanol (INN)	2922.19	545-90-4	1
Dimepheptanol hydrochloride	2922.19		1
Dimethylthiambutene (INN)	2934.90	524-84-5	1
Dimethylthiambutene hydrochloride	2934.90		1
Dioxaphetyl butyrate (INN)	2934.90	467-86-7	1
Dioxaphetyl butyrate hydrochloride	2934.90		1
Diphenoxylate (INN)	2933.39	915-30-0	1
Diphenoxylate hydrochloride	2933.39	3810-80-8	1
Dipipanone (INN)	2933.39	467-83-4	1
Dipipanone hydrobromide	2933.39		1
Dipipanone hydrochloride	2933.39	75783-06-1	1
Drotebanol (INN)	2933.40	3176-03-2	1
Ecgonine, its esters and derivatives which are convertible to ecgonine and cocaine	2939.90	481-37-8	1
Ecgonine benzoylethyl ester	2939.90		1
Ecgonine benzoylpropyl ester	2939.90		1
Ecgonine cinnamoylmethyl ester	2939.90		1
Ecgonine 2,6-dimethylbenzoylmethyl ester	2939.90		1
Ecgonine hydrochloride	2939.90		1
Ecgonine methyl ester	2939.90		1
Ecgonine methyl ester hydrochloride	2939.90		1
Ecgonine phenylacetyl-methyl ester	2939.90		1

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Ethylméthylthiambutène(DCI) Chlorhydrate	2934.90	441-61-2	1
d'éthylméthylthiambutène	2934.90		1
Ethylmorphine Bromhydrate	2939.10	76-58-4	2
d'éthylmorphine	2939.10		2
Camphosulfonate d'éthylmorphine	2939.10		2
Chlorhydrate d'éthylmorphine	2939.10	125-30-4	2
Méthyliodure d'éthylmorphine	2939.10		2
Phénobarbiturate d'éthylmorphine	2939.10		2
Etonitazène (DCI) Chlorhydrate	2933.90	911-65-9	1
d'étonitazène	2933.90	13764-49-3	1
Etorphine (DCI) Chlorhydrate d'etorphine	2939.10	14521-96-1	4
2939.10			4
Etorphine 3-méthyl éther	2939.10		4
Etoxéridine (DCI) Chlorhydrate	2933.39	469-82-9	1
d'étoxéridine	2933.39		1
Fentanyl (DCI) Citrate de fentanyl	2933.39	437-38-7	1
2933.39		990-73-8	1
p-Fluorofentanyl Chlorhydrate de	2933.39		4
p-fluorofentanyl	2933.39		4
Furéthidine (DCI) Bromhydrate de	2934.90	2385-81-1	1
furéthidine	2934.90		1
Méthyliodure de furéthidine	2934.90		1
Picrate de furéthidine	2934.90		1
Héroïne	2939.10	561-27-3	4
Chlorhydrate de héroïne	2939.10	1502-95-0	4
Méthyliodure de héroïne	2939.10		4

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Ethylmethylthiambutene (INN)	2934.90	441-61-2	1
Ethylmethylthiambutene hydrochloride	2934.90		1
Ethylmorphine	2939.10	76-58-4	2
Ethylmorphine camphosulfonate	2939.10		2
Ethylmorphine hydrobromide	2939.10		2
Ethylmorphine hydrochloride	2939.10	125-30-4	2
Ethylmorphine methyl iodide	2939.10		2
Ethylmorphine phenobarbiturate	2939.10		2
Etonitazene (INN)	2933.90	911-65-9	1
Etonitazene hydrochloride	2933.90		1
Etorphine (INN)	2939.10	14521-96-1	4
Etorphine hydrochloride	2939.10	13764-49-3	4
Etorphine 3-methyl ether	2939.10		4
Etoxadine (INN)	2933.39	469-82-9	1
Etoxadine hydrochloride	2933.39		1
Fentanyl (INN)	2933.39	437-38-7	1
Fentanyl citrate	2933.39	990-73-8	1
p-Fluorofentanyl	2933.39		4
p-Fluorofentanyl hydrochloride	2933.39		4
Furethidine (INN)	2934.90	2385-81-1	1
Furethidine hydrobromide	2934.90		1
Furethidine methyl iodide	2934.90		1
Furethidine picrate	2934.90		1
Heroin	2939.10	561-27-3	4
Heroin hydrochloride	2939.10	1502-95-0	4
Heroin methyl iodide	2939.10		4

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Hydrocodone (DCI)	2939.10	125-29-1	1
Chlorhydrate de hydrocodone	2939.10	25968-91-6	1
Citrate de hydrocodone	2939.10		1
Hydrogénotartrate de hydrocodone	2939.10	143-71-5	1
Iodhydrate de hydrocodone	2939.10		1
Méthyliodure de hydrocodone	2939.10		1
Phosphate de hydrocodone	2939.10	34366-67-1	1
Résinate de hydrocodone	3003.40		1
Téréphtalate de hydrocodone	2939.10		1
Hydromorphinol (DCI)	2939.10	2183-56-4	1
Chlorhydrate de hydromorphinol	2939.10		1
Hydrogénotartrate de hydromorphinol	2939.10		1
Hydromorphone (DCI)	2939.10	466-99-9	1
Chlorhydrate de hydromorphone	2939.10	71-68-1	1
Sulfate de hydromorphone	2939.10		1
Téréphtalate de hydromorphone	2939.10		1
β-Hydroxyfentanyl	2933.39		4
Chlorhydrate de β-Hydroxyfentanyl	2933.39		4
(+)-cis-β-Hydroxy-3-m-méthylfentanyl	2933.39		
β-Hydroxy-3-méthylfentanyl	2933.39		4
Chlorhydrate de β-Hydroxy-3-méthylfentanyl	2933.39		4
Hydroxypéthidine (DCI)	2933.39	468-56-4	1
Chlorhydrate de hydroxypéthidine	2933.39		1
Isométhadone (DCI)	2922.30	466-40-0	1
α-Isométhadone	2922.30		
l-Isométhadone	2922.30		
Bromhydrate d'isométhadone	2922.30		1
Chlorhydrate d'isométhadone	2922.30		1
Lévacétylméthadol (DCI)	2922.19	34433-66-4	1

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Hydrocodone (INN)	2939.10	125-29-1	1
Hydrocodone citrate	2939.10		1
Hydrocodone hydriodide	2939.10		1
Hydrocodone hydrochloride	2939.10	25968-91-6	1
Hydrocodone hydrogen tartrate (bitartrate)	2939.10	143-71-5	1
Hydrocodone methylidide	2939.10		1
Hydrocodone phosphate	2939.10	34366-67-1	1
Hydrocodone resinate	3003.40		1
Hydrocodone terephthalate	2939.10		1
Hydromorphinol (INN)	2939.10	2183-56-4	1
Hydromorphinol hydrochloride	2939.10		1
Hydromorphinol hydrogen tartrate (bitartrate)	2939.10		1
Hydromorphone (INN)	2939.10	466-99-9	1
Hydromorphone hydrochloride	2939.10	71-68-1	1
Hydromorphone sulfate	2939.10		1
Hydromorphone terephthalate	2939.10		1
β-Hydroxyfentanyl	2933.39		4
β-Hydroxyfentanyl hydrochloride	2933.39		4
(+)-cis-β-Hydroxy-3-m-methylfentanyl	2933.39		
β-Hydroxy-3-methylfentanyl	2933.39		4
β-Hydroxy-3-methylfentanyl hydrochloride	2933.39		4
Hydroxypethidine (INN)	2933.39	468-56-4	1
Hydroxypethidine hydrochloride	2933.39		1
Isomethadone (INN)	2922.30	466-40-0	1
α-Isomethadone	2922.30		
l-Isomethadone	2922.30		
Isomethadone hydrobromide	2922.30		1
Isomethadone hydrochloride	2922.30		1
Ketobemidone (INN)	2933.39	469-79-4	4
Ketobemidone hydrochloride	2933.39	5965-49-1	4
Levacetylmethadol (INN)	2922.19	34433-66-4	1

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Lévométhorphane (DCI) ¹	2933.40	125-70-2	1
Bromhydrate de lévométhorphane	2933.40		1
Hydrogénotartrate de lévométhorphane	2933.40		1
Lévomoramide (DCI)	2934.90	5666-11-5	1
Dichlorhydrate de lévomoramide	2934.90		1
Lévophénacylmorphane (DCI)	2933.40	10061-32-2	1
Chlorhydrate de lévophénacylmorphane	2933.40		1
Méthylsulfonate de lévophénacylmorphane	2933.40		1
Lévopropoxyphène (DCI)	2922.19	2338-37-6	
Lévorphanol (DCI) ²	2933.40	77-07-6	1
Chlorhydrate de lévorphanol	2933.40		1
Hydrogénotartrate de lévorphanol	2933.40	125-72-4	1
Métazocine (DCI)	2933.39	3734-52-9	1
Bromhydrate de métazocine	2933.39		1
Chlorhydrate de métazocine	2933.39		1
<i>l</i> -Méthadol	2922.19		
Méthadone (DCI)	2922.30	76-99-3	1
α -Méthadone	2922.30		
<i>l</i> -Méthadone	2922.30		1
Bromhydrate de méthadone	2922.30		1
Chlorhydrate de méthadone	2922.30	1095-90-5	1
Chlorhydrate de α -méthadone	2922.30		
Chlorhydrate de <i>l</i> -méthadone	2922.30		
Hydrogénotartrate de méthadone	2922.30		1
Hydrogénotartrate de <i>l</i> -méthadone	2922.30		1

¹ Dextrométhorphane (DCI) ((+)-3-méthoxy-N-méthylmorphinane) est spécifiquement exclue de cette liste.

² Dextrorphanol (DCI) ((+)-3-hydroxy-N-méthylmorphinane) est spécifiquement exclue de cette liste.

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Levomethorphan (INN) ¹	2933.40	125-70-2	1
Levomethorphan hydrobromide	2933.40		1
Levomethorphan hydrogen tartrate (bitartrate)	2933.40		1
Levomoramide (INN)	2934.90	5666-11-5	1
Levomoramide dihydrochloride	2934.90		1
Levophenacymorphan (INN)	2933.40	10061-32-2	1
Levophenacymorphan hydrochloride	2933.40		1
Levophenacymorphan methylsulfonate	2933.40		1
Levopropoxyphene (INN)	2922.19	2338-37-6	
Levorphanol (INN) ²	2933.40	77-07-6	1
Levorphanol hydrogen tartrate (bitartrate)	2933.40	125-72-4	1
Levorphanol hydrochloride	2933.40		1
Metazocine (INN)	2933.39	3734-52-9	1
Metazocine hydrobromide	2933.39		1
Metazocine hydrochloride	2933.39		1
<i>l</i> -Methadol	2922.19		
Methadone (INN)	2922.30	76-99-3	1
α -Methadone	2922.30		
<i>l</i> -Methadone	2922.30		1
Methadone hydrobromide	2922.30		1
Methadone hydrochloride	2922.30	1095-90-5	1
Methadone hydrogen tartrate (bitartrate)	2922.30		1
α -Methadone hydrochloride	2922.30		
<i>l</i> -Methadone hydrochloride	2922.30		
<i>l</i> -Methadone hydrogen tartrate (bitartrate)	2922.30		1

¹ Dextromethorphan (INN) ((+)-3-methoxy-N-methylmorphinan) is specifically excluded from this list.

² Dextrorphan (INN) ((+)-3-hydroxy-N-methylmorphinan) is specifically excluded from this list.

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Méthadone (DCI), intermédiaire de la 4-cyano-2-diméthylamino- 4-diphénylbutane ou 2-diméthylamino-4,4- diphényl-4-cyanobutane	2926.90		1
Méthyl-désorphine (DCI)	2939.10	16008-36-9	1
Chlorhydrate de méthyl-désorphine	2939.10		1
Méthyl-dihydromorphine (DCI)	2939.10	509-56-8	1
3-Méthylfentanyl 2933.39	4		
Chlorhydrate de 3-méthylfentanyl	2933.39		4
α-Méthylfentanyl	2933.39		4
Chlorhydrate de α-Méthylfentanyl	2933.39		4
α-Méthylthiofentanyl	2934.90		1
Chlorhydrate de α-méthylthiofentanyl	2934.90		1
3-Méthylthiofentanyl	2934.90		4
Chlorhydrate de 3-méthylthiofentanyl	2934.90		4
(+)- <i>cis</i> -3-Méthylthio-fentanyl	2934.90		4
Chlorhydrate de (+)- <i>cis</i> -3-Méthylthio- fentanyl	2934.90		
Métopon (DCI)	2939.10	143-52-2	1
Chlorhydrate de métopon	2939.10		1
Moramide, intermédiaire de	2934.90		1
Morphéridine (DCI)	2934.90	469-81-8	1
Dichlorhydrate de morphéridine	2934.90		1
Picrate de morphéridine	2934.90		1
Morphine	2939.10	57-27-2	1
Acétate de morphine	2939.10	596-15-6	1
Bromhydrate de morphine	2939.10	630-81-9	1
Chlorhydrate de morphine	2939.10	52-26-6	1
Citrate de morphine	2939.10		1
3,6-Digluconide de morphine	2939.10		1
Diméthyle éther de morphine	2939.10		
Gluconate de morphine	2939.10		1
3-Gluconide de morphine	2939.10		1
6-Gluconide de morphine	2939.10		1
3-B-D-Gluconide de morphine	2939.10		1

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Methadone (INN) intermediate 4-cyano-2-dimethylamino- 4,4-diphenylbutane or 2-dimethylamino-4,4- diphenyl-4-cyanobutane	2926.90		1
Methyldesorphine (INN)	2939.10	16008-36-9	1
Methyldesorphine hydro- chloride	2939.10		1
Methyldihydromorphine (INN)	2939.10	509-56-8	1
3-Methylfentanyl 2933.39	4		
3-Methylfentanyl hydrochloride	2933.39		4
a-Methylfentanyl	2933.39		4
a-Methylfentanyl hydrochloride	2933.39		4
a-Methylthiofentanyl	2934.90		1
a-Methylthiofentanyl hydrochloride	2934.90		1
3-Methylthiofentanyl	2934.90		4
3-Methylthiofentanyl hydrochloride	2934.90		4
(+)- <i>cis</i> -3-Methylthio- fentanyl	2934.90		4
(+)- <i>cis</i> -3-Methylthio- fentanyl hydrochloride	2934.90		
Metopon (INN)	2939.10	143-52-2	1
Metopon hydrochloride	2939.10		1
Moramide intermediate	2934.90		1
Morpheridine (INN)	2934.90	469-81-8	1
Morpheridine dihydrochloride	2934.90		1
Morpheridine picrate	2934.90		1
Morphine	2939.10	57-27-2	1
Morphine acetate	2939.10	596-15-6	1
Morphine citrate	2939.10		1
Morphine 3,6-diglucuronide	2939.10		1
Morphine dimethyl ether	2939.10		
Morphine gluconate	2939.10		1
Morphine 3-glucuronide	2939.10		1
Morphine 6-glucuronide	2939.10		1
Morphine 3-B-D-glucuronide	2939.10		1

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
6-B-D-Glucuronide de morphine	2939.10		1
Hypophosphite de morphine	2939.10		1
Iodhydrate de morphine	2939.10		1
Isobutyrate de morphine	2939.10		1
Lactate de morphine	2939.10		1
Méconate de morphine	2939.10		1
Méthylbromure de morphine	2939.10		1
Méthylchlorure de morphine	2939.10		1
Méthyliodure de morphine	2939.10		1
Méthylsulfonate de morphine	2939.10		1
Mucate de morphine	2939.10		1
Nitrate de morphine	2939.10	596-16-7	1
N-Oxyde de morphine	2939.10	639-46-3	1
Quinate de N-oxyde de morphine	2939.10		1
Phénylpropionate de morphine	2939.10		1
Phosphate de morphine	2939.10		1
Phtalate de morphine	2939.10		1
Stéarate de morphine	2939.10	64-31-3	1
Sulfate de morphine	2939.10		1
Tartrate de morphine	2939.10	302-31-8	1
Valérate de morphine	2939.10		1
MPPP	2933.39		4
Chlorhydrate de MPPP	2933.39		4
Myrophine (DCI)	2939.10	467-18-5	1
Chlorhydrate de myrophine	2939.10		1
Nicocodine (DCI)	2939.10	3688-66-2	2
Chlorhydrate de nicocodine	2939.10		2
Nicodicodine (DCI)	2939.10	808-24-2	2
Nicomorphine (DCI)	2939.10	639-48-5	1
Chlorhydrate de nicomorphine	2939.10		1
Noracyméthadol (DCI)	2922.19	1477-39-0	1
Chlorhydrate de noracyméthadol	2922.19		1
Gluconate de noracyméthadol	2922.19		1
Norcodéine (DCI)	2939.10	467-15-2	2
Acétate de norcodéine	2939.10		2
Chlorhydrate de norcodéine	2939.10	14648-14-7	2
Iodhydrate de norcodéine	2939.10		2
Nitrate de norcodéine	2939.10		2

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Morphine 6-B-D-glucuronide	2939.10		1
Morphine hydriodide	2939.10		1
Morphine hydrobromide	2939.10	630-81-9	1
Morphine hydrochloride	2939.10	52-26-6	1
Morphine hypophosphite	2939.10		1
Morphine isobutyrate	2939.10		1
Morphine lactate	2939.10		1
Morphine meconate	2939.10		1
Morphine methylbromide	2939.10		1
Morphine methylchloride	2939.10		1
Morphine methyliodide	2939.10		1
Morphine methylsulfonate	2939.10		1
Morphine mucate	2939.10		1
Morphine nitrate	2939.10	596-16-7	1
Morphine phenylpropionate	2939.10		1
Morphine phosphate	2939.10		1
Morphine phthalate	2939.10		1
Morphine stearate	2939.10		1
Morphine sulfate	2939.10	64-31-3	1
Morphine tartrate	2939.10	302-31-8	1
Morphine valerate	2939.10		1
Morphine-N-oxide	2939.10	639-46-3	1
Morphine-N-oxide quinate	2939.10		1
MPPP	2933.39		4
MPPP hydrochloride	2933.39		4
Myrophine (INN)	2939.10	467-18-5	1
Myrophine hydrochloride	2939.10		1
Nicocodine (INN)	2939.10	3688-66-2	2
Nicocodine hydrochloride	2939.10		2
Nicodicodine (INN)	2939.10	808-24-2	2
Nicomorphine (INN)	2939.10	639-48-5	1
Nicomorphine hydrochloride	2939.10		1
Noracymethadol (INN)	2922.19	1477-39-0	1
Noracymethadol gluconate	2922.19		1
Noracymethadol hydrochloride	2922.19		1
Norcodeine (INN)	2939.10	467-15-2	2
Norcodeine acetate	2939.10		2
Norcodeine hydriodide	2939.10		2
Norcodeine hydrochloride	2939.10	14648-14-7	2
Norcodeine nitrate	2939.10		2

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Platinichlorure de norcodéine	2843.90		2
Sulfate de norcodéine	2939.10		2
Norlévorphanol (DCI)	2933.40	1531-12-0	1
Bromhydrate de norlévorphanol	2933.40		1
Chlorhydrate de norlévorphanol	2933.40		1
Norméthadone (DCI)	2922.30	467-85-6	1
Bromhydrate de norméthadone	2922.30		1
Chlorhydrate de norméthadone	2922.30	847-84-7	1
2,6-Di-tert-butyl-naphthalènesulfonate de norméthadone	2922.30		1
Méthyliodure de norméthadone	2922.30		1
Oxalate de norméthadone	2922.30		1
Picrate de norméthadone	2922.30		1
Norméthadone (DCI), intermédiaire de la	2926.90		
Normorphine (DCI)	2939.10	466-97-7	1
Chlorhydrate de normorphine	2939.10		1
Norpipanone (DCI)	2933.39	561-48-8	1
Bromhydrate de norpipanone	2933.39		1
Chlorhydrate de norpipanone	2933.39		1
Opium	1302.11		1
Opium, alcaloïdes mélangés	1302.11 ¹		
	2939.10 ²		
Opium, préparé	1302.19		
	2939.10		
Oxycodone (DCI)	2939.10	76-42-6	1
Camphosulfonate d'oxycodone	2939.10		1
Chlorhydrate d'oxycodone	2939.10	124-90-3	1
Hydrogénotartrate d'oxycodone	2939.10		1

¹ Autres substances nonadditionnées.

² Mélanges naturels, constituants autre que des alcaloïdes ôtés, autres substances nonadditionnées.

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Norcodeine platinichloride	2843.90		2
Norcodeine sulfate	2939.10		2
Norlevorphanol (INN)	2933.40	1531-12-0	1
Norlevorphanol hydrobromide	2933.40		1
Norlevorphanol hydrochloride	2933.40		1
Normethadone (INN)	2922.30	467-85-6	1
Normethadone 2,6-di-tert-butyl-naphthalenedisulfonate	2922.30		1
Normethadone hydrobromide	2922.30		1
Normethadone hydrochloride	2922.30	847-84-7	1
Normethadone methyl iodide	2922.30		1
Normethadone oxalate	2922.30		1
Normethadone picrate	2922.30		1
Normethadone (INN) intermediate	2926.90		
Normorphine (INN)	2939.10	466-97-7	1
Normorphine hydrochloride	2939.10		1
Norpipanone (INN)	2933.39	561-48-8	1
Norpipanone hydrobromide	2933.39		1
Norpipanone hydrochloride	2933.39		1
Opium	1302.11		1
Opium, mixed alkaloids of	1302.11 ¹ 2939.10 ²		
Opium, prepared	1302.19 2939.10		
Oxycodone (INN)	2939.10	76-42-6	1
Oxycodone camphosulfonate	2939.10		1
Oxycodone hydrochloride	2939.10	124-90-3	1
Oxycodone hydrogen tartrate (bitartrate)	2939.10		1

¹ Other substances not added.

² Natural mixtures, constituents other than alkaloids sufficiently removed, other substances not added.

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Pectinate d'oxycodone	2939.10		1
Phénylpropionate d'oxycodone	2939.10		1
Phosphate d'oxycodone	2939.10		1
Téréphtalate d'oxycodone	2939.10		1
Oxymorphone (DCI)	2939.10	76-41-5	1
Chlorhydrate d'oxymorphone	2939.10	357-07-3	1
Paille de pavot	1211.90		
Papaver bracteatum	1211.90		
PEPAP	2933.39		4
Chlorhydrate de PEPAP	2933.39		4
Péthidine (DCI)	2933.39	57-42-1	1
Chlorhydrate de péthidine	2933.39	50-13-5	1
Péthidine (DCI), intermédiaire A de la -	2933.39		1
Péthidine (DCI), intermédiaire B de la -	2933.39		1
Bromhydrate de l'intermédiaire B de la péthidine	2933.39		1
Chlorhydrate de péthidine l'intermédiaire B de la péthidine	2933.39		1
Péthidine (DCI), intermédiaire C de la	2933.39		1
Phénadoxone (DCI)	2934.90	467-84-5	1
Chlorhydrate de phénadoxone	2934.90	545-91-5	1
Phénampromide (DCI)	2933.39	129-83-9	1
Chlorhydrate de phénampromide	2933.39		1
Phénazocine (DCI)	2933.39	127-35-5	1
Bromhydrate de phénazocine	2933.39		1
Chlorhydrate de phénazocine	2933.39	7303-75-5	1
Mésilate de phénazocine	2933.39		1

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Oxycodone pectinate	2939.10		1
Oxycodone phenylpropionate	2939.10		1
Oxycodone phosphate	2939.10		1
Oxycodone terephthalate	2939.10		1
Oxymorphone (INN)	2939.10	76-41-5	1
Oxymorphone hydrochloride	2939.10	357-07-3	1
Papaver bracteatum	1211.90		
PEPAP	2933.39		4
PEPAP hydrochloride	2933.39		4
Pethidine (INN)	2933.39	57-42-1	1
Pethidine hydrochloride	2933.39	50-13-5	1
Pethidine (INN) intermediate A	2933.39		1
Pethidine (INN) intermediate B	2933.39		1
Pethidine intermediate B hydrobromide	2933.39		1
Pethidine intermediate B hydrochloride	2933.39		1
Pethidine (INN) intermediate C	2933.39		1
Phenadoxone (INN)	2934.90	467-84-5	1
Phenadoxone hydrochloride	2934.90	545-91-5	1
Phenampramide (INN)	2933.39	129-83-9	1
Phenampramide hydrochloride	2933.39		1
Phenazocine (INN)	2933.39	127-35-5	1
Phenazocine hydrobromide	2933.39		1
Phenazocine hydrochloride	2933.39	7303-75-5	1
Phenazocine mesilate	2933.39		1

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Phénomorphane (DCI)	2933.40	468-07-5	1
Bromhydrate de phénomorphane	2933.40		1
Méthylbromure de phénomorphane	2933.40		1
Hydrogénotartrate de phénomorphane	2933.40		1
Phénopéridine (DCI)	2933.39	562-26-5	1
Chlorhydrate de phénopéridine	2933.39	3627-49-4	1
Pholcodine (DCI)	2939.10	509-67-1	2
Chlorhydrate de pholcodine	2939.10		2
Citrate de pholcodine	2939.10		2
Guaiacolsulfonate de pholcodine	2939.10		2
Hydrogénotartrate de pholcodine	2939.10		2
Phénylacétate de pholcodine	2939.10		2
Phosphate de pholcodine	2939.10		2
Sulfonate de pholcodine	2939.10		2
Tartrate de pholcodine	2939.10	7369-11-1	2
Piminodine (DCI)	2933.39	13495-09-5	1
Dichlorhydrate de piminodine	2933.39		1
Esilate de piminodine	2933.39	7081-52-9	1
Pir tramide (DCI)	2933.39	302-41-0	1
Proheptazine (DCI)	2933.90	77-14-5	1
Bromhydrate de proheptazine	2933.90		1
Chlorhydrate de proheptazine	2933.90		1
Citrate de proheptazine	2933.90		1
Propéridine (DCI)	2933.39	561-76-2	1
Chlorhydrate de propéridine	2933.39		1
Propiram (DCI)	2933.39	15686-91-6	2
Fumarate de propiram	2933.39		2

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Phenomorphan (INN)	2933.40	468-07-5	1
Phenomorphan hydrobromide	2933.40		1
Phenomorphan hydrogen tartrate (bitartrate)	2933.40		1
Phenomorphan methylbromide	2933.40		1
Phenoperidine (INN)	2933.39	562-26-5	1
Phenoperidine hydrochloride	2933.39	3627-49-4	1
Pholcodine (INN)	2939.10	509-67-1	2
Pholcodine hydrogen tartrate (bitartrate)	2939.10		2
Pholcodine citrate	2939.10		2
Pholcodine guaiacolsulfonate	2939.10		2
Pholcodine hydrochloride	2939.10		2
Pholcodine phenylacetate	2939.10		2
Pholcodine phosphate	2939.10		2
Pholcodine sulfonate	2939.10		2
Pholcodine tartrate	2939.10	7369-11-1	2
Piminodine (INN)	2933.39	13495-09-5	1
Piminodine dihydrochloride	2933.39		1
Piminodine esilate	2933.39	7081-52-9	1
Piritramide (INN)	2933.39	302-41-0	1
Poppy straw	1211.90		
Proheptazine (INN)	2933.90	77-14-5	1
Proheptazine citrate	2933.90		1
Proheptazine hydrobromide	2933.90		1
Proheptazine hydrochloride	2933.90		1
Properidine (INN)	2933.39	561-76-2	1
Properidine hydrochloride	2933.39		1
Propiram (INN)	2933.39	15686-91-6	2
Propiram fumarate	2933.39		2

I. **Stupéfiants réglementés par la Convention de 1961 sur les stupéfiants, amendée par le Protocole de 1972** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Racéméthorphane (DCI)	2933.40	510-53-2	1
Bromhydrate de racéméthorphane	2933.40		1
Hydrogénotartrate de racéméthorphane	2933.40		1
Racémoramide (DCI)	2934.90	545-59-5	1
Dichlorhydrate de racémoramide	2934.90		1
Hydrogénotartrate de racémoramide	2934.90		1
Tartrate de racémoramide	2934.90		1
Racémorphane (DCI)	2933.40	297-90-5	1
Bromhydrate de racémorphane	2933.40		1
Chlorhydrate de racémorphane	2933.40		1
Hydrogénotartrate de racémorphane	2933.40		1
Sufentanil (DCI)	2934.90	56030-54-7	1
Citrate de sufentanil	2934.90		1
Thébacone (DCI)	2939.10	466-90-0	1
Chlorhydrate de thébacone	2939.10	20236-82-2	1
Thébaïne	2939.10	115-37-7	1
Chlorhydrate de thébaïne	2939.10		1
Hydrogénotartrate de thébaïne	2939.10		1
Oxalate de thébaïne	2939.10		1
Salicylate de thébaïne	2939.10		1
Thiofentanyl	2934.90		4
Chlorhydrate de thiofentanyl	2934.90		4
Tilidine (DCI)	2922.49	20380-58-9	1
Chlorhydrate de tilidine	2922.49	27107-79-5	1
Trimépéridine (DCI)	2933.39	64-39-1	1
Chlorhydrate de trimépéridine	2933.39	125-80-4	1

I. **Narcotic Drugs Subject to Control under the Single Convention on Narcotic Drugs, 1961, as amended by the 1972 Protocol--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Racemethorphan (INN)	2933.40	510-53-2	1
Racemethorphan hydrobromide	2933.40		1
Racemethorphan hydrogen tartrate (bitartrate)	2933.40		1
Racemoramide (INN)	2934.90	545-59-5	1
Racemoramide dihydrochloride	2934.90		1
Racemoramide hydrogen tartrate (bitartrate)	2934.90		1
Racemoramide tartrate	2934.90		1
Racemorphan (INN)	2933.40	297-90-5	1
Racemorphan hydrobromide	2933.40		1
Racemorphan hydrochloride	2933.40		1
Racemorphan hydrogen tartrate (bitartrate)	2933.40		1
Sufentanil (INN)	2934.90	56030-54-7	1
Sufentanil citrate	2934.90		1
Thebacon (INN)	2939.10	466-90-0	1
Thebacon hydrochloride	2939.10	20236-82-2	1
Thebaine	2939.10	115-37-7	1
Thebaine hydrochloride	2939.10		1
Thebaine hydrogen tartrate (bitartrate)	2939.10		1
Thebaine oxalate	2939.10		1
Thebaine salicylate	2939.10		1
Thiofentanyl	2934.90		4
Thiofentanyl hydrochloride	2934.90		4
Tilidine (INN)	2922.49	20380-58-9	1
Tilidine hydrochloride	2922.49	27107-79-5	1
Trimeperidine (INN)	2933.39	64-39-1	1
Trimeperidine hydrochloride	2933.39	125-80-4	1

II. **Substances psychotropes réglementées par la Convention de 1971 sur les substances psychotropes**

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Allobarbital (DCI)	2933.51	52-43-7	4
Allobarbital aminophénazone	2933.51		4
Alprazolam (DCI)	2933.90	28981-97-7	4
Amfépramone (DCI)	2922.30	90-84-6	4
Chlorhydrate d'amfépramone	2922.30	134-80-5	4
Glutamate d'amfépramone	2922.42		4
Résinate d'amfépramone	3003.90		4
Amfétamine (DCI)	2921.49	300-62-9	2
Acétylsalicylate d'amfétamine	2921.49		2
Adipate d'amfétamine	2921.49		2
p-Aminophénylacétate d'amfétamine	2922.49		2
Aspartate d'amfétamine	2922.49		2
Chlorhydrate d'amfétamine	2921.49		2
p-Chlorophénoxyacétate d'amfétamine	2921.49		2
Hydrogénotartrate d'amfétamine	2921.49		2
Pentobarbiturate d'amfétamine	2933.51		2
Phosphate d'amfétamine	2921.49	139-10-6	2
Résinate d'amfétamine	3003.90		2
Sulfate d'amfétamine	2921.49	60-13-9	2
Tannate d'amfétamine	3201.90		2
Tartrate d'amfétamine	2921.49		2
Aminorex	2934.90	2207-50-3	4
Amobarbital (DCI)	2933.51	57-43-2	3
Amobarbital sodique	2933.51	64-43-7	3
Résinate d'amobarbital	3003.90		3
Barbital (DCI)	2933.51	57-44-3	4
Barbital calcium	2933.51		4
Barbital magnesium	2933.51		4
Barbital sodique	2933.51	144-02-5	4
Benzfétamine (DCI)	2921.49	156-08-1	4
Chlorhydrate de benzfétamine	2921.49	5411-22-3	4
Brolamfétamine (DCI) (DOB)	2922.29	64638-07-9	1
Chlorhydrate de brolamfétamine	2922.29		1
Bromazépam (DCI)	2933.39	1812-30-2	4
Brotizolam (DCI)	2934.90	57801-81-7	4

II. **Psychotropic Substances Subject to Control under the 1971 Convention on Psychotropic Substances**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Allobarbital (INN)	2933.51	52-43-7	4
Allobarbital aminophenazone	2933.51		4
Alprazolam (INN)	2933.90	28981-97-7	4
Amfepramone (INN)	2922.30	90-84-6	4
Amfepramone glutamate	2922.42		4
Amfepramone hydrochloride	2922.30	134-80-5	4
Amfepramone resinate	3003.90		4
Amfetamine (INN)	2921.49	300-62-9	2
Amfetamine acetylsalicylate	2921.49		2
Amfetamine adipate	2921.49		2
Amfetamine p-amino-phenylacetate	2922.49		2
Amfetamine aspartate	2922.49		2
Amfetamine p-chloro-phenoxyacetate	2921.49		2
Amfetamine hydrochloride	2921.49		2
Amfetamine hydrogen tartrate (bitartrate)	2921.49		2
Amfetamine pentobarbiturate	2933.51		2
Amfetamine phosphate	2921.49	139-10-6	2
Amfetamine resinate	3003.90		2
Amfetamine sulfate	2921.49	60-13-9	2
Amfetamine tannate	3201.90		2
Amfetamine tartrate	2921.49		2
Aminorex	2934.90	2207-50-3	4
Amobarbital (INN)	2933.51	57-43-2	3
Amobarbital resinate	3003.90		3
Amobarbital sodium	2933.51	64-43-7	3
Barbital (INN)	2933.51	57-44-3	4
Barbital calcium	2933.51		4
Barbital magnesium	2933.51		4
Barbital sodium	2933.51	144-02-5	4
Benzfetamine (INN)	2921.49	156-08-1	4
Benzfetamine hydrochloride	2921.49	5411-22-3	4
Brolamfetamine (INN) (DOB)	2922.29	64638-07-9	1
Brolamfetamine (DOB) hydrochloride	2922.29		1
Bromazepam (INN)	2933.39	1812-30-2	4
Brotizolam (INN)	2934.90	57801-81-7	4

II. **Substances psychotropes réglementées par la Convention de 1971 sur les substances psychotropes** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Buprénorphine (DCI)	2939.10	52485-79-7	3
Chlorhydrate de buprénorphine	2939.10	53152-21-9	3
Hydrogénotartrate de buprénorphine	2939.10		3
Sulfate de buprénorphine	2939.10		3
Butalbital (DCI)	2933.51	77-26-9	3
Butobarbital	2933.51	77-28-1	4
Camazépam (DCI)	2933.90	36104-80-0	4
Cathine (DCI)	2939.49	492-39-7	3
Chlorhydrate de cathine	2939.49	2153-98-2	3
Phénobarbiturate de cathine	2939.49		3
Résinate de cathine	3003.40		3
Sulfate de cathine	2939.49		3
Cathinone (DCI)	2939.90	71031-15-7	1
Chlordiazépoxyde (DCI)	2933.90	58-25-3	4
Chlorhydrate de chlordiazépoxyde	2933.90	438-41-5	4
Dibunate de chlordiazépoxyde	2933.90		4
Clobazam (DCI)	2933.79	22316-47-8	4
Clonazépam (DCI)	2933.90	1622-61-3	4
Clorazépate	2933.90		4
Clorazépate dipotassium	2933.90	57109-90-7	4
Clorazépate monopotassium	2933.90	5991-71-9	4
Clotiazépam (DCI)	2934.90	33671-46-4	4
Clozazolam (DCI)	2934.90	24166-13-0	4
Cyclobarbital (DCI)	2933.51	52-31-3	3
Cyclobarbital calcique	2933.51	5897-20-1	3
Délorazépam (DCI)	2933.90	2894-67-9	4
DET	2939.90	61-51-8	1
Chlorhydrate de DET	2939.90		1
Dexamfétamine (DCI)	2921.49	51-64-9	2
Adipate de dexamfétamine	2921.49		2
Carboxyméthylcellulose de dexamfétamine	3912.31		2
Chlorhydrate de dexamfétamine	2921.49	405-41-4	2
Hydrogénotartrate de dexamfétamine	2921.49		2
Pentobarbiturate de dexamfétamine	2933.51		2

II. Psychotropic Substances Subject to Control under the 1971 Convention on Psychotropic Substances--(Contd.)

Name	HS sub-heading	CAS No.	Convention Schedule No.
Buprenorphine (INN)	2939.10	52485-79-7	3
Buprenorphine hydrochloride	2939.10	53152-21-9	3
Buprenorphine hydrogen tartrate (bitartrate)	2939.10		3
Buprenorphine sulfate	2939.10		3
Butalbital (INN)	2933.51	77-26-9	3
Butobarbital	2933.51	77-28-1	4
Camazepam (INN)	2933.90	36104-80-0	4
Cathine (INN)	2939.49	492-39-7	3
Cathine hydrochloride	2939.49	2153-98-2	3
Cathine phenobarbiturate	2939.49		3
Cathine resinate	3003.40		3
Cathine sulfate	2939.49		3
Cathinone (INN)	2939.90	71031-15-7	1
Chlordiazepoxide (INN)	2933.90	58-25-3	4
Chlordiazepoxide dibunat	2933.90		4
Chlordiazepoxide hydrochloride	2933.90	438-41-5	4
Clobazam (INN)	2933.79	22316-47-8	4
Clonazepam (INN)	2933.90	1622-61-3	4
Clorazepate	2933.90		4
Clorazepate dipotassium	2933.90	57109-90-7	4
Clorazepate monopotassium	2933.90	5991-71-9	4
Clotiazepam (INN)	2934.90	33671-46-4	4
Clozapolam (INN)	2934.90	24166-13-0	4
Cyclobarbital (INN)	2933.51	52-31-3	3
Cyclobarbital calcium	2933.51	5897-20-1	3
Delorazepam (INN)	2933.90	2894-67-9	4
DET	2939.90	61-51-8	1
DET hydrochloride	2939.90		1
Dexamfetamine (INN)	2921.49	51-64-9	2
Dexamfetamine adipate	2921.49		2
Dexamfetamine carboxymethylcellulose	3912.31		2
Dexamfetamine hydrochloride	2921.49	405-41-4	2
Dexamfetamine hydrogen tartrate (bitartrate)	2921.49		2
Dexamfetamine pentobarbiturate	2933.51		2

II. **Substances psychotropes réglementées par la Convention de 1971 sur les substances psychotropes** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Phosphate de dexamfétamine	2921.49	7528-00-9	2
Résinate de dexamfétamine	3003.90		2
Saccharate de dexamfétamine	2921.49		2
Sulfate de dexamfétamine	2921.49	51-63-8	2
Tannate de dexamfétamine	3201.90		2
Diazépam (DCI)	2933.90	439-14-5	4
DMA	2922.29		1
Chlorhydrate de DMA	2922.29		1
DMHP	2932.99		1
DMT	2939.90	61-50-7	1
Chlorhydrate de DMT	2939.90		1
Méthylodure de DMT	2939.90		1
DOET	2922.29		1
Chlorhydrate de DOET	2922.29		1
Estazolam (DCI)	2933.90	29975-16-4	4
Ethchlorvynol (DCI)	2905.50	113-18-8	4
Ethinamate (DCI)	2924.29	126-52-3	4
N-Ethyl MDA	2932.99		1
Chlorhydrate de N-éthyl MDA	2932.99		1
Eticyclidine (DCI) (PCE)	2921.49	2201-15-2	1
Chlorhydrate d'éticyclidine	2921.49		1
Etilamfétamine (DCI)	2921.49	457-87-4	4
Chlorhydrate d'étilamfétamine	2921.49		4
Fencamfamine (DCI)	2921.49	1209-98-9	4
Chlorhydrate de fencamfamine	2921.49	2240-14-4	4
Fénétylline (DCI)	2939.50	3736-08-1	2
Chlorhydrate de fénétylline	2939.50	1892-80-4	2
Fenproporex (DCI)	2926.90	15686-61-0	4
Chlorhydrate de fenproporex	2926.90	18305-29-8	4
Diphénylacétate de fenproporex	2926.90		4
Résinate de fenproporex	3003.90		4
Fludiazépam (DCI)	2933.90	3900-31-0	4
Flunitrazépam (DCI)	2933.90	1622-62-4	4

II. **Psychotropic Substances Subject to Control under the 1971 Convention on Psychotropic Substances--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Dexamfetamine phosphate	2921.49	7528-00-9	2
Dexamfetamine resinate	3003.90		2
Dexamfetamine saccharate	2921.49		2
Dexamfetamine sulfate	2921.49	51-63-8	2
Dexamfetamine tannate	3201.90		2
Diazepam (INN)	2933.90	439-14-5	4
DMA	2922.29		1
DMA hydrochloride	2922.29		1
DMHP	2932.99		1
DMT	2939.90	61-50-7	1
DMT hydrochloride	2939.90		1
DMT methyl iodide	2939.90		1
DOET	2922.29		1
DOET hydrochloride	2922.29		1
Estazolam (INN)	2933.90	29975-16-4	4
Ethchlorvynol (INN)	2905.50	113-18-8	4
Ethinamate (INN) 2924.29	126-52-3	4	
Ethyl loflazepate (INN)	2933.90	29177-84-2	4
N-Ethyl MDA	2932.99		1
N-Ethyl MDA hydrochloride	2932.99		1
Eticyclidine (PCE) (INN)	2921.49	2201-15-2	1
Eticyclidine (PCE) hydrochloride	2921.49		1
Etilamfetamine (INN)	2921.49	457-87-4	4
Etilamfetamine hydrochloride	2921.49		4
Fencamfamin (INN)	2921.49	1209-98-9	4
Fencamfamin hydrochloride	2921.49	2240-14-4	4
Fenetylline (INN)	2939.50	3736-08-1	2
Fenetylline hydrochloride	2939.50	1892-80-4	2
Fenproporex (INN)	2926.90	15686-61-0	4
Fenproporex diphenylacetate	2926.90		4
Fenproporex hydrochloride	2926.90	18305-29-8	4
Fenproporex resinate	3003.90		4
Fludiazepam (INN)	2933.90	3900-31-0	4
Flunitrazepam (INN)	2933.90	1622-62-4	4

II. **Substances psychotropes réglementées par la Convention de 1971 sur les substances psychotropes** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Flurazépam (DCI)	2933.90	17617-23-1	4
Chlorhydrate de flurazépam	2933.90	36105-20-1	4
Dichlorhydrate de flurazépam	2933.90	1172-18-5	4
Glutéthimide (DCI)	2925.19	77-21-4	3
Halazépam (DCI)	2933.90	23092-17-3	4
Haloxazolam (DCI)	2934.90	59128-97-1	4
N-Hydroxy MDA	2932.99		1
Chlorhydrate de N-hydroxy MDA	2932.99		1
Kétazolam (DCI)	2934.90	27223-35-4	4
Léfétamine (DCI)	2921.49	7262-75-1	4
Chlorhydrate de léfétamine	2921.49	14148-99-3	4
Lévamfétamine (DCI)	2921.49	156-34-3	2
Alginate de lévamfétamine	3913.10		2
Succinate de lévamfétamine	2921.49	5634-40-2	2
Sulfate de lévamfétamine	2921.49		2
Lévométamfétamine	2939.90		2
Chlorhydrate de lévométamfétamine	2939.90		2
Loflazépate d'éthyle (DCI)	2933.90	29177-84-2	4
Loprazolam (DCI)	2933.59	61197-73-7	4
Mésilate de loprazolam	2933.59		4
Lorazépam (DCI)	2933.90	846-49-1	4
Acétate de lorazépam	2933.90		4
Mésilate de lorazépam	2933.90		4
Pivalate de lorazépam	2933.90		4
Lormétazépam (DCI)	2933.90	848-75-9	4
Lysergide (DCI), LSD, LSD-25	2939.69	50-37-3	1
Tartrate de (+)-lysergide	2939.69		1
Mazindol (DCI)	2933.90	22232-71-9	4
MDMA	2932.99		1
Chlorhydrate de MDMA	2932.99		1
Mécloqualone (DCI)	2933.59	340-57-8	2
Chlorhydrate de mécloqualone	2933.59		2
Médazépam (DCI)	2933.90	2898-12-6	4
Dibunatate de médazépam	2933.90		4
Chlorhydrate de médazépam	2933.90		4

II. **Psychotropic Substances Subject to Control under the 1971 Convention on Psychotropic Substances--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Flurazepam (INN)	2933.90	17617-23-1	4
Flurazepam dihydrochloride	2933.90	1172-18-5	4
Flurazepam hydrochloride	2933.90	36105-20-1	4
Glutethimide (INN)	2925.19	77-21-4	3
Halazepam (INN) 2933.90	23092-17-3	4	4
Haloxazolam (INN)	2934.90	59128-97-1	4
N-Hydroxy MDA	2932.99		1
N-Hydroxy MDA hydrochloride	2932.99		1
Ketazolam (INN)	2934.90	27223-35-4	4
Lefetamine (INN)	2921.49	7262-75-1	4
Lefetamine hydrochloride	2921.49	14148-99-3	4
Levamphetamine (INN)	2921.49	156-34-3	2
Levamphetamine alginate	3913.10		2
Levamphetamine succinate	2921.49	5634-40-2	2
Levamphetamine sulfate	2921.49		2
Levometamphetamine	2939.90		2
Levometamphetamine hydrochloride	2939.90		2
Loprazolam (INN)	2933.59	61197-73-7	4
Loprazolam mesilate	2933.59		4
Lorazepam (INN) 2933.90	846-49-1	4	4
Lorazepam acetate	2933.90		4
Lorazepam mesilate	2933.90		4
Lorazepam pivalate	2933.90		4
Lormetazepam (INN)	2933.90	848-75-9	4
Lysergide (INN), LSD, LSD-25	2939.69	50-37-3	1
(+)-Lysergide tartrate	2939.69		1
Mazindol (INN)	2933.90	22232-71-9	4
MDMA	2932.99		1
MDMA hydrochloride	2932.99		1
Mecloqualone (INN)	2933.59	340-57-8	2
Mecloqualone hydrochloride	2933.59		2
Medazepam (INN)	2933.90	2898-12-6	4
Medazepam dibunatate	2933.90		4
Medazepam hydrochloride	2933.90		4

II. **Substances psychotropes réglementées par la Convention de 1971 sur les substances psychotropes** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Méfénorex (DCI)	2921.49	17243-57-1	4
Chlorhydrate de méfénorex	2921.49		4
Méprobamate (DCI)	2924.10	57-53-4	4
Mescaline	2939.90	54-04-6	1
Aurichlorure de mescaline	2943.30		1
Chlorhydrate de mescaline	2939.90	832-92-8	1
Picrate de mescaline	2939.90		1
Platinichlorure de mescaline	2843.90		1
Sulfate de mescaline	2939.90	1152-76-7	1
Mésocarb	2934.90	34262-84-5	4
Métamfétamine (DCI)	2939.90	537-46-2	2
Chlorhydrate de métamfétamine	2939.90	51-57-0	2
Hydrogénotartrate de métamfétamine	2939.90		2
Racémate de métamfétamine	2939.90	4846-07-5	2
Sulfate de métamfétamine	2939.90		2
Méthqualone (DCI)	2933.59	72-44-6	2
Chlorhydrate de méthaqualone	2933.59	340-56-7	2
Résinate de méthaqualone	3003.90		2
Méthylaminorex	2934.90		1
Chlorhydrate de méthylaminorex	2934.90		1
Méthylphénidate (DCI)	2933.39	113-45-1	2
Chlorhydrate de méthylphénidate	2933.39	298-59-9	2
Méthylphénobarbital (DCI)	2933.51	115-38-8	4
Méthylphénobarbital sodique	2933.51		4
Méthylpyrrolone (DCI)	2933.79	125-64-4	4
Midazolam (DCI)	2933.90	59467-70-8	4
Chlorhydrate de midazolam	2933.90		4
Maléate de midazolam	2933.90		4
MMDA	2932.99		1
Chlorhydrate de MMDA	2932.99		1
Nimétazépam (DCI)	2933.90	2011-67-8	4
Nitrazépam (DCI)	2933.90	146-22-5	4
Nordazépam (DCI)	2933.90	1088-11-5	4
Oxazépam (DCI)	2933.90	604-75-1	4
Acétate d'oxazépam	2933.90		4
Hémisuccinate d'oxazépam	2933.90		4
Succinate d'oxazépam	2933.90		4
Valproate d'oxazépam	2933.90		4

II. **Psychotropic Substances Subject to Control under the 1971 Convention on Psychotropic Substances--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Mefenorex (INN)	2921.49	17243-57-1	4
Mefenorex hydrochloride	2921.49		4
Meprobamate (INN)	2924.10	57-53-4	4
Mescaline	2939.90	54-04-6	1
Mescaline aurichloride	2843.30		1
Mescaline hydrochloride	2939.90	832-92-8	1
Mescaline picrate	2939.90		1
Mescaline platinichloride	2843.90		1
Mescaline sulfate	2939.90	1152-76-7	1
Mesocarb	2934.90	34262-84-5	4
Metamfetamine (INN)	2939.90	537-46-2	2
Metamfetamine hydrochloride	2939.90	51-57-0	2
Metamfetamine hydrogen tartrate (bitartrate)	2939.90		2
Metamfetamine racemate	2939.90	4846-07-5	2
Metamfetamine sulfate	2939.90		2
Methaqualone (INN)	2933.59	72-44-6	2
Methaqualone hydrochloride	2933.59	340-56-7	2
Methaqualone resinate	3003.90		2
Methylaminorex	2934.90		1
Methylaminorex hydrochloride	2934.90		1
Methylphenidate (INN)	2933.39	113-45-1	2
Methylphenidate hydrochloride	2933.39	298-59-9	2
Methylphenobarbital (INN)	2933.51	115-38-8	4
Methylphenobarbital sodium	2933.51		4
Methyprylon (INN)	2933.79	125-64-4	4
Midazolam (INN)	2933.90	59467-70-8	4
Midazolam hydrochloride	2933.90		4
Midazolam maleate	2933.90		4
MMDA	2932.99		1
MMDA hydrochloride	2932.99		1
Nimetazepam (INN)	2933.90	2011-67-8	4
Nitrazepam (INN)	2933.90	146-22-5	4
Nordazepam (INN)	2933.90	1088-11-5	4
Oxazepam (INN)	2933.90	604-75-1	4
Oxazepam acetate	2933.90		4
Oxazepam hemisuccinate	2933.90		4
Oxazepam succinate	2933.90		4
Oxazepam valproate	2933.90		4

II. **Substances psychotropes réglementées par la Convention de 1971 sur les substances psychotropes** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Oxazolam (DCI)	2934.90	24143-17-7	4
Parahexyl	2932.99		1
Pémoline (DCI)	2934.90	2152-34-3	4
Pémoline cuivre	2934.90		4
Pémoline fer	2934.90		4
Pémoline magnésium	2934.90		4
Pémoline nickel	2934.90		4
Pentazocine (DCI)	2933.39	359-83-1	3
Chlorhydrate de pentazocine	2933.39		3
Lactate de pentazocine	2933.39	17146-95-1	3
Pentobarbital (DCI)	2933.51	76-74-4	3
Pentobarbital calcique	2933.51	7563-42-0	3
Pentobarbital sodique	2933.51	57-33-0	3
Phéncyclidine (DCI) (PCP)	2933.39	77-10-1	2
Bromhydrate de phéncyclidine	2933.39		2
Chlorhydrate dephéncyclidine	2933.39	956-90-1	2
Phéndimétrazine (DCI)	2934.90	634-03-7	4
Chlorhydrate de phéndimétrazine	2934.90		4
Hydrogénotartrate de phéndimétrazine	2934.90	50-58-8	4
Pamoate de phéndimétrazine	2934.90		4
Phénmétrazine (DCI)	2934.90	134-49-6	2
Chlorhydrate de phénmétrazine	2934.90	1707-14-8	2
Hydrogénotartrate de phénmétrazine	2934.90		2
Sulfate de phénmétrazine	2934.90		2
Téoclate de phénmétrazine	2939.50	13931-75-4	2
Phénobarbital (DCI)	2933.51	50-06-6	4
Phénobarbital ammonium	2933.51		4
Phénobarbital calcique	2933.51	58766-25-9	4
Phénobarbital diéthylamine	2933.51		4
Phénobarbital diéthylaminoéthanol	2933.51		4
Phénobarbital lysidine	2933.51		4
Phénobarbital magnésium	2933.51		4
Phénobarbital propyl-héxédrine	2933.51		4

II. **Psychotropic Substances Subject to Control under the 1971 Convention on Psychotropic Substances--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Oxazolam (INN)	2934.90	24143-17-7	4
Parahexyl	2932.99		1
Pemoline (INN)	2934.90	2152-34-3	4
Pemoline copper	2934.90		4
Pemoline iron	2934.90		4
Pemoline magnesium	2934.90		4
Pemoline nickel	2934.90		4
Pentazocine (INN)	2933.39	359-83-1	3
Pentazocine hydrochloride	2933.39		3
Pentazocine lactate	2933.39	17146-95-1	3
Pentobarbital (INN)	2933.51	76-74-4	3
Pentobarbital calcium	2933.51	7563-42-0	3
Pentobarbital sodium	2933.51	57-33-0	3
Phencyclidine (INN) (PCP)	2933.39	77-10-1	2
Phencyclidine hydrobromide	2933.39		2
Phencyclidine hydrochloride	2933.39	956-90-1	2
Phendimetrazine (INN)	2934.90	634-03-7	4
Phendimetrazine hydrochloride	2934.90		4
Phendimetrazine hydrogen tartrate (bitartrate)	2934.90	50-58-8	4
Phendimetrazine pamoate	2934.90		4
Phenmetrazine (INN)	2934.90	134-49-6	2
Phenmetrazine hydrochloride	2934.90	1707-14-8	2
Phenmetrazine hydrogen tartrate (bitartrate)	2934.90		2
Phenmetrazine sulfate	2934.90		2
Phenmetrazine teoclate	2939.50	13931-75-4	2
Phenobarbital (INN)	2933.51	50-06-6	4
Phenobarbital ammonium	2933.51		4
Phenobarbital calcium	2933.51	58766-25-9	4
Phenobarbital diethylamine	2933.51		4
Phenobarbital diethylamino-ethanol	2933.51		4
Phenobarbital lysidine	2933.51		4
Phenobarbital magnesium	2933.51		4
Phenobarbital propyl-hexedrine	2933.51		4

II. **Substances psychotropes réglementées par la Convention de 1971 sur les substances psychotropes** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Phénobarbital quinidine	2939.29		4
Phénobarbital sodium, magnésium	2933.51		4
Phénobarbital sodique (DCI)	2933.51	57-30-7	4
Phénobarbital spartéine	2939.90		4
Phénobarbital tétraméthyl- ammonium	2933.51		4
Phénobarbital yohimbine	2939.90		4
Phentermine (DCI)	2921.49	122-09-8	4
Chlorhydrate de phentermine	2921.49	1197-21-3	4
Résinate de phentermine	3003.90		4
Pinazépam (DCI)	2933.90	52463-83-9	4
Pipradrol (DCI)	2933.39	467-60-7	4
Chlorhydrate de pipradrol	2933.39	71-78-3	4
PMA	2922.29		1
Chlorhydrate de PMA	2922.29		1
Prazépam (DCI)	2933.90	2955-38-6	4
Psilocine, psilotsin	2939.90		1
Chlorhydrate de psilocine, psilotsin	2939.90		1
Psilocybine (DCI)	2939.90	520-52-5	1
Chlorhydrate de psilocybine	2939.90		1
Pyrovalérone (DCI)	2933.90	3563-49-3	4
Chlorhydrate de pyrovalérone	2933.90	1147-62-2	4
Rolicyclidine (DCI) (PHP, PCPY)	2933.90	2201-39-0	1
Secbutabarbital (DCI)	2933.51	125-40-6	4
Secbutabarbital sodium	2933.51	309-43-3	4
Sécobarbital (DCI)	2933.51	76-73-3	2
Résinate de sécobarbital	3003.90		2
Sécobarbital calcium	2933.51		2
Sécobarbital sodique	2933.51	309-43-3	2
STP, DOM	2922.29	15588-95-1	1
Chlorhydrate de STP, DOM	2922.29		1
Témazépam (DCI)	2933.90	846-50-4	4
Ténamfétamine (DCI) (MDA)	2932.99	51497-09-7	1
Chlorhydrate de ténamfétamine	2932.99		1

II. **Psychotropic Substances Subject to Control under the 1971 Convention on Psychotropic Substances--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Phenobarbital quinidine	2939.29		4
Phenobarbital sodium, magnesium	2933.51		4
Phenobarbital sodium (INN)	2933.51	57-30-7	4
Phenobarbital sparteine	2939.90		4
Phenobarbital tetramethyl-ammonium	2933.51		4
Phenobarbital yohimbine	2939.90		4
Phentermine (INN)	2921.49	122-09-8	4
Phentermine hydrochloride	2921.49	1197-21-3	4
Phentermine resinate	3003.90		4
Pinazepam (INN) 2933.90	52463-83-9	4	
Pipradrol (INN)	2933.39	467-60-7	4
Pipradrol hydrochloride	2933.39	71-78-3	4
PMA	2922.29		1
PMA hydrochloride	2922.29		1
Prazepam (INN)	2933.90	2955-38-6	4
Psilocine, psilotsin	2939.90		1
Psilocine, psilotsin hydrochloride	2939.90		1
Psilocybine (INN)	2939.90	520-52-5	1
Psilocybine hydrochloride	2939.90		1
Pyrovalerone (INN)	2933.90	3563-49-3	4
Pyrovalerone hydrochloride	2933.90	1147-62-2	4
Rolicyclidine (INN) (PHP, PCPY)	2933.90	2201-39-0	1
Secbutabarbital (INN)	2933.51	125-40-6	4
Secbutabarbital sodium	2933.51		4
Secobarbital (INN)	2933.51	76-73-3	2
Secobarbital calcium	2933.51		2
Secobarbital resinate	3003.90		2
Secobarbital sodium	2933.51	309-43-3	2
STP, DOM	2922.29	15588-95-1	1
STP, DOM hydrochloride	2922.29		1
Temazepam (INN)	2933.90	846-50-4	4
Tenamfetamine (INN) (MDA)	2932.99	51497-09-7	1
Tenamfetamine (MDA) hydrochloride	2932.99		1

II. **Substances psychotropes réglementées par la Convention de 1971 sur les substances psychotropes** (suite)

Nom	Sous-position du SH	N° CAS	N° du Tableau de la Convention
Ténocyclidine (DCI)	2934.90	21500-98-1	1
Chlorhydrate de ténocyclidine	2934.90		1
Tétrahydrocannabinols, tous les isomères	2932.99	plusieurs	2
d-9-Tétrahydrocannabinol	2932.99	1972-08-3	2
Tétrazépam (DCI)	2933.90	10379-14-3	4
TMA	2922.29		1
Chlorhydrate de TMA	2922.29		1
Triazolam (DCI)	2933.90	28911-01-5	4
Vinylbital (DCI)	2933.51	2430-49-1	4
Zipéprol	2933.59	34758-83-3	2

III. **Précurseurs**

Nom	Sous-position du SH	N° CAS
Acétone	2914.11	67-64-1
Acide N-acétylanthranilique	2924.22	89-52-1
Acide anthranilique	2922.43	118-92-3
Acide lysergique	2939.63	82-58-6
Acide phénylacétique	2916.34	103-82-2
Acide sulfurique	2807.00	7664-93-9
Anhydride acétique	2915.24	108-24-7
Butanone (éthylméthylcétone)	2914.12	78-93-3
Chlorure d'hydrogène (acide chlorhydrique)	2806.10	7647-01-0
Ephédrine	2939.41	299-42-3
Chlorhydrate d'éphédrine	2939.41	50-98-6
Nitrate d'éphédrine	2939.41	81012-98-8
Sulfate d'éphédrine	2939.41	134-72-5
Ergométrine (DCI)	2939.61	60-79-7
Chlorhydrate d'ergométrine	2939.61	74283-21-9
Hydrogénomaléate d'ergométrine	2939.61	129-51-1
Oxalate d'ergométrine	2939.61	
Tartrate d'ergométrine	2939.61	129-50-0
Ergotamine (DCI)	2939.62	113-15-5
Chlorhydrate d'ergotamine	2939.62	
Succinate d'ergotamine	2939.62	
Tartrate d'ergotamine	2939.62	379-79-3

II. **Psychotropic Substances Subject to Control under the 1971 Convention on Psychotropic Substances--(Contd.)**

Name	HS sub-heading	CAS No.	Convention Schedule No.
Tenocyclidine (INN)	2934.90	21500-98-1	1
Tenocyclidine hydrochloride	2934.90		1
Tetrahydrocannabinols, all isomers	2932.99	various	2
d-9-Tetrahydrocannabinol	2932.99	1972-08-3	2
Tetrazeepam (INN)	2933.90	10379-14-3	4
TMA	2922.29		1
TMA hydrochloride	2922.29		1
Triazolam (INN)	2933.90	28911-01-5	4
Vinylbital (INN)	2933.51	2430-49-1	4
Zipeprol	2933.59	34758-83-3	2

III. **Precursors**

Name	HS sub-heading	CAS No.
Acetic anhydride	2915.24	108-24-7
Acetone	2914.11	67-64-1
N-Acetylanthranilic acid	2924.22	89-52-1
Anthranilic acid	2922.43	118-92-3
Butanone (ethyl methyl ketone)	2914.12	78-93-3
Diethyl ether	2909.11	60-29-7
Ephedrine	2939.41	299-42-3
Ephedrine hydrochloride	2939.41	50-98-6
Ephedrine nitrate	2939.41	81012-98-8
Ephedrine sulfate	2939.41	134-72-5
Ergometrine (INN)	2939.61	60-79-7
Ergometrine hydrochloride	2939.61	74283-21-9
Ergometrine hydrogen maleate	2939.61	129-51-1
Ergometrine oxalate	2939.61	
Ergometrine tartrate	2939.61	129-50-0
Ergotamine (INN)	2939.62	113-15-5
Ergotamine hydrochloride	2939.62	
Ergotamine succinate	2939.62	
Ergotamine tartrate	2939.62	379-79-3
Hydrogen chloride (hydrochloric acid)	2806.10	7647-01-0

III. **Précurseurs** (suite)

Nom	Sous-position du SH	N° CAS
Isosafrole	2932.91	120-58-1
3,4-(Méthylenedioxy)phényl- propane-2-one	2932.92	4676-39-5
Oxyde de diéthyle (diéthyléther)	2909.11	60-29-7
Permanganate de potassium	2841.61	7722-64-7
Phénylacétone (benzylméthylcétone, phénylpropane-2-one)	2914.31	103-79-7
Pipéridine	2933.32	110-89-4
Aurichlorure de pipéridine Chlorhydrate de pipéridine	2843.30 2933.32	6091-44-7
Hydrogénotartrate de pipéridine	2933.32	6091-46-9
Nitrate de pipéridine	2933.32	6091-45-8
Phosphate de pipéridine	2933.32	
Picrate de pipéridine	2933.32	6091-49-2
Platinichlorure de pipéridine	2843.90	
Thiocyanate de pipéridine	2933.32	22205-64-7
Pipéronal	2932.93	120-57-0
Pseudoéphédrine (DCI) Chlorhydrate de pseudoéphédrine	2939.42 2939.42	90-82-4 345-78-8
Sulfate de pseudoéphédrine	2939.42	7460-12-0
Safrole	2932.94	94-59-7
Toluène	2902.30	108-88-3 "

x

x x

III. Precursors--Contd.

Name	HS sub-heading	CAS No.
Isosafrole	2932.91	120-58-1
Lysergic acid	2939.63	82-58-6
3,4-(Methylenedioxy)phenyl- 2-propanone	2932.92	4676-39-5
Phenylacetone (benzyl methyl ketone, phenylpropan-2-one)	2914.31	103-79-7
Phenylacetic acid	2916.34	103-82-2
Piperidine	2933.32	110-89-4
Piperidine aurichloride	2843.30	
Piperidine hydrochloride	2933.32	6091-44-7
Piperidine hydrogen tartrate (bitartrate)	2933.32	6091-46-9
Piperidine nitrate	2933.32	6091-45-8
Piperidine phosphate	2933.32	
Piperidine picrate	2933.32	6091-49-2
Piperidine platinichloride	2843.90	
Piperidine thiocyanate	2933.32	22205-64-7
Piperonal	2932.93	120-57-0
Potassium permanganate	2841.61	7722-64-7
Pseudoephedrine (INN)	2939.42	90-82-4
Pseudoephedrine hydrochloride	2939.42	345-78-8
Pseudoephedrine sulfate	2939.42	7460-12-0
Safrole	2932.94	94-59-7
Sulphuric acid	2807.00	7664-93-9
Toluene	2902.30	108-88-3 "

x

x x

ANNEXE C/5

PROJET DE REMANIEMENT DE LA NOMENCLATURE ET DES NOTES EXPLICATIVES

CONCERNANT LES CONCENTRES DE PAILLE DE PAVOT

(Voir annexe A/12 ci-dessus)

ANNEX C/5

POSSIBLE AMENDMENTS TO THE NOMENCLATURE AND EXPLANATORY NOTES

CONCERNING CONCENTRATES OF POPPY STRAW

(See Annex A/12 above)

PROCEDURE DE L'ARTICLE 16

A. PROJET D'AMENDEMENT DE LA NOMENCLATURE

CHAPITRE 13.

Notes de Chapitre. Nouvelle Note 1 f) du Chapitre.

Ajouter la nouvelle Note 1 f) du Chapitre suivante :

“f) les concentrés de paille de pavot contenant au moins 50 % en poids d’alcaloïdes (n° 29.39);”.

Les Notes 1 f) à 1 ij) du Chapitre actuelles deviennent 1 g) à 1 k), respectivement.

B. PROJET DE MODIFICATION DES NOTES EXPLICATIVES

CHAPITRE 13.

Page 95. Notes de Chapitre. Nouvelle Note 1 f) du Chapitre.

Ajouter la nouvelle Note 1 f) du Chapitre suivante :

“f) les concentrés de paille de pavot contenant au moins 50 % en poids d’alcaloïdes (n° 29.39);”.

Les Notes 1 f) à 1 ij) du Chapitre actuelles deviennent 1 g) à 1 k), respectivement.

ARTICLE 16 PROCEDURE

A. AMENDMENT TO THE NOMENCLATURE

CHAPTER 13.

Chapter Notes. New Note 1 (f).

Insert the following new Chapter Note 1 (f) :

“(f) Concentrates of poppy straw containing not less than 50 % by weight of alkaloids (heading No. 29.39);”.

Present Notes 1 (f) to 1 (ij) are renumbered as 1 (g) to 1 (k), respectively.

B. POSSIBLE AMENDMENTS TO THE EXPLANATORY NOTES

CHAPTER 13.

Page 95. Chapter Notes. New Note 1 (f).

Insert the following new Note 1 (f) :

“(f) Concentrates of poppy straw containing not less than 50 % by weight of alkaloids (heading No. 29.39);”.

Present Notes 1 (f) to 1 (ij) are renumbered as 1 (g) to 1 (k), respectively.

Page 97. N° 13.02. Alinéa A) 1). Nouvelle dernière phrase.

Ajouter la nouvelle dernière phrase suivante :

“Par contre, les concentrés de paille de pavot contenant au moins 50 % en poids d’alcaloïdes sont **exclus** de cette position (voir la Note 1 f) du présent Chapitre).”.

CHAPITRE 29

Page 441. N° 29.39. Partie A). Nouvel alinéa 13).

Ajouter le nouvel alinéa 13) suivant :

“13) **Concentrés de paille de pavot..** Mélange naturel d’alcaloïdes obtenu à partir de parties du pavot (*Papaver somniferum*), par extraction suivie d’une purification, contenant au moins 50 % en poids d’alcaloïdes.”.

Page 447. Liste des stupéfiants et des substances psychotropes.

Dans le n° 13.02, supprimer “**Concentré de paille de pavot** Stupéfiant”.

x

x x

Page 97. Heading 13.02. Item (A) (1). New last sentence.

Insert the following new last sentence :

“However, concentrates of poppy straw containing not less than 50 % by weight of alkaloids are **excluded** from this heading (see Note 1 (f) to this Chapter).”.

CHAPTER 29.

Page 441. Heading 29.39. Part (A). New Item (13).

Insert the following new Item (13) :

“13) **Concentrates of poppy straw**. A natural mixture of alkaloids obtained from parts of the poppy (*Papaver somniferum*) by extraction, followed by purification, and containing not less than 50 % by weight of alkaloids.”.

Page 447. List of narcotic drugs and psychotropic substances.

Under heading 13.02, delete “**Concentrate of poppy straw** Narcotic drug”.

x

x x

(SCS/13/déc. 97)
(SSC/13/Dec. 97)

ANNEXE D

CLASSEMENT DE CERTAINS PRODUITS PORTANT UNE DCI

(Voir annexe A/5 ci-dessus)

ANNEX D

CLASSIFICATION OF CERTAIN INN PRODUCTS

(See Annex A/5 above)

CONCLUSIONS DU SCS

I. MODIFICATION DU CLASSEMENT DE CERTAINS PRODUITS
PORTANT UNE DCI DES LISTES I-69 DE L'OMS.

<u>DCI</u>	<u>Code SH proposé</u>	<u>Observations du SCS</u>
busulfan	2905.39	Autre diol
tréosulfan	2905.49	Autre alcool polyhydrique
pétrichloral	2911.00	Hémi-acétal
chloralodol	2911.00	Hémi-acétal
toloxychlorinol	2911.00	Hémi-acétal
fluindarol	2914.70	Dérivé halogéné de cétone
isoprédnidène	2937.29	Glucocorticoïde
amadinone	2937.92	Progestogène
cloprédnol	2937.22	Dérivé halogéné d'hormones corticosurrénales
clofénoxyde	2914.70	Dérivé halogéné de cétone
quinbolone	2937.99	Séroïde anabolique
désaspidine	2914.50	Cétone-phénol
tocamphyl	2922.19	Amino-alcool
pleuromuline	2941.90	Antibiotique
fluocortine	2937.22	Dérivé halogéné d'hormones corticosurrénales
ubenimex	2941.90	Antibiotique
thiomersal	2930.90	Composé organo-sulfuré
mercaptomérine	2930.90	Composé organo-sulfuré
timerfonate de sodium	2930.90	Composé organo-sulfuré
thiocolchicoside	2939.90	Dérivé de la colchicine
merbromine	2932.99	Pas de possibilité d'une lactone car sous forme de sel (classement inchangé)
méraléine sodique	2932.99	Pas de possibilité d'une sultone car sous forme de sulfonate (classement inchangé)
méfésérpine	2939.90	Dérivé de la réserpine
métergoline	2939.69	Dérivé d'alcaloïdes de l'ergot de seigle
glaziovine	2939.90	Alcaloïde
rescimétol	2939.90	Dérivé de la réserpine
proterguride	2939.69	Dérivé d'alcaloïdes de l'ergot de seigle
chlorure de datelliptium	2939.90	Dérivé de la réserpine
rételliptine	2939.90	Dérivé de l'ellipticine
téniposide	2938.90	Dérivé de l'étoposide
acronine	2939.90	Alcaloïde
sécurinine	2939.90	Alcaloïde
rifabutine	2941.90	Antibiotique
disulergine	2939.69	Dérivé d'alcaloïdes de l'ergot de seigle
étisulergine	2939.69	Dérivé d'alcaloïdes de l'ergot de seigle

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Annexe D au Doc. 41.690
Annex to

(SCS/13/déc. 97)
(SSC/13/Dec. 97)

CONCLUSIONS OF THE SSC

I. AMENDMENT TO THE HS CODES FOR CERTAIN INN PRODUCTS IN WHO LISTS I-69

<u>INN</u>	<u>Proposed HS code</u>	<u>Observation of the SSC</u>
busulfan	2905.39	other diol
treosulfan	2905.49	other polyhydric alcohol
petrichloral	2911.00	hemiacetal
chloralodol	2911.00	hemiacetal
toloxychlorinol	2911.00	hemiacetal
fluindarol	2914.70	halogenated derivative of ketone
isoprednidene	2937.29	glucocorticoid
amadinone	2937.92	progestogen
cloprednol	2937.22	hologenated derivative of adrenal cortical hormone
clofenoxycide	2914.70	halogenated derivative of ketone
quinbolone	2937.99	anabolic steroid
desaspidin	2914.50	ketone-phenol
tocamphyl	2922.19	amino-alcohol
pleuromulin	2941.90	antibiotic
fluocortin	2937.22	hologenated derivative of adrenal cortical hormone
ubenimex	2941.90	antibiotic
thiomersal	2930.90	organo-sulphur compound
mercaptomerin	2930.90	organo-sulphur compound
sodium timerfonate	2930.90	organo-sulphur compound
thiocolchicoside	2939.90	derivative of colchicine
merbromin	2932.99	No possibility of a lactone because of its salt form. (No change in classification)
meralein sodium	2932.99	No possibility of a sultone because of its sulphonate form. (No change in classification)
mefeserpine	2939.90	derivative of reserpine
metergoline	2939.69	derivative of ergot alkaloid
glaziovine	2939.90	alkaloid
rescimetol	2939.90	derivative of reserpine
proterguride	2939.69	derivative of ergot alkaloid
datelliptium chloride	2939.90	derivative of reserpine
retelliptine	2939.90	derivative of ellipticine
teniposide	2938.90	derivative of etoposide
acronine	2939.90	alkaloid
securinine	2939.90	alkaloid
rifabutin	2941.90	antibiotic
disulergine	2939.69	derivative of ergot alkaloid
etisulergine	2939.69	derivative of ergot alkaloid

II. PRODUITS PORTANT UNE DCI FIGURANT DANS LES LISTES 74 A 76 DE L'OMS

A. Liste 74

<u>DCI</u>	<u>Code SH proposé</u>	<u>Observations du SCS</u>
abafungine	2941.90	
abiratérone	2933.39	N'est pas une hormone.
acide ranélique	2934.90	
alinastine	2933.39	
almurtide	2932.99	
améломétasone	2937.22	
apadoline	2934.30	
arcitumomab	3002.10	
asimadoline	2933.90	
atizoram	2933.59	
atiprofen	2934.90	
avoréline	2937.99	
bécaplermine	2937.99	
cariporide	2930.90	
cérvastatine	2933.39	
cétermine	2937.99	
zinc ciaftalan	2933.90	
dabélotine	2934.90	
danaparoïde sodique	3913.90	
dapitant	2933.90	
dexsotalol	2935.00	
droxinavir	2924.21	Uréine.
édaravone	2933.19	
édrécolomab	3002.10	
élériptan	2933.90	
émoctakine	3002.10	
fabésétron	2933.79	
fasidotril	2932.99	
féxofénadine	2933.39	
forasartan	2933.39	
furomine	2932.19	
gatifloxacine	2933.59	
glaspimod	2933.79	Lactame.
igovomab	3002.10	
indinavir	2933.59	
iropact	3002.10	
lévobupivacaïne	2933.39	
linétastine	2933.39	
lintitript	2934.10	
liréxapride	2933.39	
lurtotécan	2939.90	
mélagatran	2933.90	

II. INN PRODUCTS IN WHO LISTS 74 - 76.

A. List 74

<u>INN</u>	<u>HS code</u>	<u>Observations of the SSC</u>
abafungin	2941.90	
abiraterone	2933.39	Not a hormone.
anelic acid	2934.90	
alinastine	2933.39	
almurtide	2932.99	
amelometasone	2937.22	
apadoline	2934.30	
arcitumomab	3002.10	
asimadoline	2933.90	
atizoram	2933.59	
atiprofen	2934.90	
avorelin	2937.99	
becaplermin	2937.99	
cariporide	2930.90	
cerivastatin	2933.39	
cetermin	2937.99	
ciaftalan zinc	2933.90	
dabelotine	2934.90	
danaparoid sodium	3913.90	
dapitant	2933.90	
dexsotalol	2935.00	
droxinavir	2924.21	A ureine.
edaravone	2933.19	
edrecolomab	3002.10	
eletriptan	2933.90	
emoctakin	3002.10	
fabesetron	2933.79	
fasidotril	2932.99	
fexofenadine	2933.39	
forasartan	2933.39	
furomine	2932.19	
gatifloxacin	2933.59	
glaspimod	2933.79	A lactam.
igovomab	3002.10	
indinavir	2933.59	
iropilact	3002.10	
levobupivacaine	2933.39	
linetastine	2933.39	
linitript	2934.10	
lirexapride	2933.39	
lurtotecan	2939.90	
melagatran	2933.90	

milaméline	2933.39	
milodistim	3002.10	
miproxifène	2922.19	
népaprazole	2933.90	
osanétant	2933.39	
pagoclone	2933.79	
palinavir	2933.40	
palonosétron	2933.79	
pamaquéside	2938.90	Glycoside.
peldésine	2933.59	
pramlintide	2934.90	
quétiapine	2934.90	
raltitrexed	2934.90	
resocortol	2937.29	
révatropate	2933.39	
rismoréline	2937.99	
ritonavir	2934.10	
rupatadine	2933.39	
lexidronam de samarium (¹⁵³ Sm)	2844.40	
sampatrilat	2935.00	
sildénafil	2935.00	
sintrodil	2934.90	
sipatrigine	2933.59	
tilnoprofen arbamel	2934.90	
tivirapine	2933.90	
trafermine	2934.90	
trifosmine	2931.00	
valnémuline	2941.90	
xemilofiban	2925.20	
zinostatine stimalamer	[2941.90] [3003.20]	Renseignements complémentaires nécessaires. S'agit-il d'un antibiotique ou d'une préparation médicamenteuse ?
zolmitriptan	2934.90	

milameline	2933.39	
milodistim	3002.10	
miproxifene	2922.19	
nepaprazole	2933.90	
osanetant	2933.39	
pagoclone	2933.79	
palinavir	2933.40	
palonosetron	2933.79	
pamaqueside	2938.90	A glycoside.
peldesine	2933.59	
pramlintide	2934.90	
quetiapine	2934.90	
raltitrexed	2934.90	
resocortol	2937.29	
revatropate	2933.39	
rismorelin	2937.99	
ritonavir	2934.10	
rupatadine	2933.39	
samarium (¹⁵³ Sm)	2844.40	
lexidronam		
sampatrilat	2935.00	
sildenafil	2935.00	
sintrodil	2934.90	
sipatrigine	2933.59	
tilnoprofen	2934.90	
arbamel		
tivirapine	2933.90	
trafermin	2934.90	
trifosmin	2931.00	
valnemulin	2941.90	
xemilofiban	2925.20	
zinostatin	[2941.90]	Need for more information as to whether it is an antibiotic or a medical preparation.
stimalamer	[3003.20]	
zolmitriptan	2934.90	

B. Liste 75

<u>DCI</u>	<u>Code SH proposé</u>	<u>Observations du SCS</u>
agomératine	2924.29	
alatrofloxacine	2933.90	
anséculine	2934.90	
aripiprazole	2933.79	
arofylline	2939.50	
atiprimod	2933.90	
bectumomab	3002.10	
beloxépine	2934.90	
bémiparine sodique	3913.90	
cémadotine	2933.90	
choriogonadotropine alfa	2937.10	
clévidipine	2933.39	
deltibant	2933.90	
donépézil	2933.39	
dronédarone	2935.00	
écamsule	2914.70	
éfépristin	2941.90	Antibiotique.
elinafide	2925.19	
filaminast	2928.00	
flibansérine	2933.59	
follitropine beta	2937.10	
fomivirsén	2934.90	
foropafant	2934.10	
icopézil	2934.90	
ioflupane (¹²³ I)	2844.40	
ivabradine	2933.79	
lagatide	2933.90	
landiolol	2934.90	
léfradafiban	2933.79	
marimastat	2928.00	Dérivé d'hydroxylamine.
maxacalcitol	2909.49	
mazokalim	2934.90	
nifékalant	2933.59	
bésilate de nolpitantium	2933.39	
orbofiban	2933.79	
pranazépine	2933.90	
rizatriptan	2933.90	
sarédutant	2933.39	
sitafloracine	2933.40	
sulésomab	3002.10	
taltirelin	2933.59	

B. List 75

<u>INN</u>	<u>HS code</u>	<u>Observations of the SSC</u>
agomeratine	2924.29	
alatrofloxacin	2933.90	
anseculin	2934.90	
aripiprazole	2933.79	
arofylline	2939.50	
atiprimod	2933.90	
bectumomab	3002.10	
beloxepin	2934.90	
bemiparin sodium	3913.90	
cemadotin	2933.90	
choriogonadotropi n alfa	2937.10	
clevidipine	2933.39	
deltibant	2933.90	
donepezil	2933.39	
dronedarone	2935.00	
ecamsule	2914.70	
efepristin	2941.90	An antibiotic.
elinafide	2925.19	
filaminast	2928.00	
flibanserin	2933.59	
follitropin beta	2937.10	
fomivirsen	2934.90	
foropafant	2934.10	
icopezil	2934.90	
ioflupane (¹²³ I)	2844.40	
ivabradine	2933.79	
lagatide	2933.90	
landiolol	2934.90	
lefradafiban	2933.79	
marimastat	2928.00	A derivative of hydroxylamine.
maxacalcitol	2909.49	
mazokalim	2934.90	
nifekalant	2933.59	
nolpitantium besilate	2933.39	
orbofiban	2933.79	
pranazepide	2933.90	
rizatriptan	2933.90	
saredutant	2933.39	
sitafloracin	2933.40	
sulesomab	3002.10	
taltirelin	2933.59	

talviraline	2933.90	
pintumomab de technétium (^{99m} Tc)	2844.40	
terbogrel	2933.39	
tresperimus	2925.20	
vinflunine	2939.90	

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talviraline	2933.90	
technetium (^{99m} Tc) pintumomab	2844.40	
terbogrel	2933.39	
tresperimus	2925.20	
vinflunine	2939.90	

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C. Liste 76

<u>DCI</u>	<u>Code SH</u>	<u>Observations du SCS</u>
abacavir	2933.59	
almotriptan	2935.00	
amlintide	2934.90	
avitriptan	2935.00	
balapéridone	2933.59	
bamaquimast	2933.90	
basiliximab	3002.10	
bimoclomol	2933.39	
blonanserine	2933.59	
brasofensine	2933.39	
brinzolamide	2935.00	
céviméline	2934.90	
cizolirtine	2933.19	
dalcotidine	2933.39	
daniplestim	3002.10	
déxéfaroxan	2934.90	
élaclidar	2933.40	
eldacimibe	2922.50	
épérezolid	2934.90	
esaténolol	2924.29	
faralimomab	3002.10	
gacyclidine	2934.90	
ganaxolone	2914.40	
crofumaril d'hémoglobine	3002.10	
indisetron	2933.59	
insulin aspart	2937.99	
insulin glargine	2937.99	
iométopane (¹²³ I)	2844.40	
israpafant	2934.90	
kéliximab	3002.10	
lanotéplase	[2934.90] [30.01] [3504.00] [3507.90]	Renseignements complémentaires nécessaires. S'agit-il d'une enzyme, etc ?
lasinavir	2924.29	
ledoxantrone	2934.90	
linézolid	2934.90	
lintuzumab	3002.10	
métésind	2935.00	
milfasartan	2934.90	
minalrestat	2925.19	
nagrestipen	3002.10	
nelfinavir	2933.40	
nérelimomab	3002.10	

C. List 76

<u>INN</u>	<u>HS code</u>	<u>Observations of the SSC</u>
abacavir	2933.59	
almotriptan	2935.00	
amlintide	2934.90	
avitrriptan	2935.00	
balaperidone	2933.59	
bamaquimast	2933.90	
basiliximab	3002.10	
bimoclomol	2933.39	
blonanserin	2933.59	
brasofensine	2933.39	
brinzolamide	2935.00	
cevimeline	2934.90	
cizolirtine	2933.19	
dalcotidine	2933.39	
daniplestim	3002.10	
dexefaroxan	2934.90	
elacridar	2933.40	
eldacimibe	2922.50	
eperezolid	2934.90	
esatenolol	2924.29	
faralimomab	3002.10	
gacyclidine	2934.90	
ganaxolone	2914.40	
hemoglobin crosumaril	3002.10	
indiseton	2933.59	
insulin aspart	2937.99	
insulin glargine	2937.99	
iometopane (¹²³ I)	2844.40	
israpafant	2934.90	
keliximab	3002.10	
lanoteplase	[2934.90] [30.01] [3504.00] [3507.90]	Need for more information as to whether it is an enzyme, etc.
lasinavir	2924.29	
ledoxantrone	2934.90	
linezolid	2934.90	
lintuzumab	3002.10	
metesind	2935.00	
milfasartan	2934.90	
minalrestat	2925.19	
nagrestipen	3002.10	
nelfinavir	2933.40	
nerelimomab	3002.10	

Annexe D au doc. 41.690 f
(SCS/13/déc. 97)

omiloxetine	2934.90	
iodure d'opratonium	2924.10	
oprelvekin	3002.10	
osutidine	2935.00	
pélubiprofen	2918.30	
pumaprazole	2933.90	
quilostigmine	2933.40	
retigabine	2924.29	
sabcoméline	2933.39	
scopinast	2934.90	
sorétolide	2934.90	
tasonermine	[29.33]	Renseignements complémentaires nécessaires pour classement au niveau de la sous-position
merpentan- nofétumomab de technétium (^{99m} Tc)	2844.40	
temivérine	2922.19	
téserstigmine	2934.90	
ticolubant	2933.39	
valsopodar	2941.90	Dérivé d'antibiotique
védaclidine	2934.90	

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omiloxetine	2934.90	
opratonium iodide	2924.10	
oprelvekin	3002.10	
osutidine	2935.00	
pelubiprofen	2918.30	
pumaprazole	2933.90	
quilostigmine	2933.40	
retigabine	2924.29	
sabcomeline	2933.39	
scopinast	2934.90	
soretolide	2934.90	
tasonermin	[29.33]	Need for more information for subheading level classification.
technetium (^{99m} Tc) nofetumomab merpentan	2844.40	
temiverine	2922.19	
teserstigmine	2934.90	
ticolubant	2933.39	
valsopodar	2941.90	Antibiotic derivative
vedaclidine	2934.90	

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III. NOUVEAUX PRODUITS PORTANT UNE DCI DE LA LISTE 77 DE L'OMS

<u>DCI</u>	<u>code HS</u>	<u>Observations du SCS</u>
acide iocanlidique	2844.40	composé d'isotope radioactif artificiel
acrezast	2926.90	composé à fonction nitrile
aseripide	2934.10	cycle thiazolidine
avotermine	2937.99	facteur de croissance
cedelizumab	3002.10	immunoglobuline
ceftizoxime alapivoxil	2941.90	dérivé du ceftizoxime
celgosivir	2933.90	cycle indolizine
clenoliximab	3002.10	immunoglobuline
colesevelam	3911.90	autre polymère
eniluracil	2933.59	cycle pyrimidine
enlimomab pegol	3002.10	immunoglobuline
eplrenone	2932.29	lactone
felvizumab	3002.10	immunoglobuline
fudosteine	2930.90	dérivé de la cystéine
gavestinel	2933.90	cycle indole
glufosfamide	2940.00	ester de sucre
influximab	3002.10	immunoglobuline
interferon alfacon-1	3002.10	dérivé de l'interféron
lanepitant	2933.39	cycle pipéridine
licostinel	2933.90	autre composé N-hétérocyclique
lumefantrine	2922.19	amino-alcool
milacainide	2933.39	cycle pyridine
mivobulin	2933.90	autre composé N-hétérocyclique
nateglinide	2924.29	amide
nonacog alfa	3002.10	facteur de coagulation du sang
oberadilol	2933.90	cycle pyridazine
opanixil	2933.59	cycle pyrimidine
orazipone	2930.90	composé sulfonyl
pegmusirudin	3907.20	autre polyéther
pifonakin	3002.10	dérivé de l'interleukine
pleconaril	2934.90	autre composé hétérocyclique
pralmorelin	2937.99	composé "réline"
rituximab	3002.10	immunoglobuline
rivastigmine	2924.29	carbamate cyclique
roflumilast	2933.39	cycle pyridine
roxifiban	2934.90	cycle isoxazoline
sevelamer	3911.90	autre polymère
sibrafiban	2933.39	cycle pipéridine
tazomeline	2934.90	autre composé hétérocyclique
trecovirsén	2934.90	acide nucléique
upenazime	2928.00	oxime
urokinase alfa	3507.90	enzyme
vatanidipine	2933.59	cycle pipérazine

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III. NEW INN PRODUCTS IN WHO LIST 77

INN	HS code	Observations of the SSC
iocanlidic acid	2844.40	compound of artificial radioactive isotope
acrezost	2926.90	nitrile-function compound
aseripide	2934.10	thiazolidine ring
avotermin	2937.99	growth factor
cedelizumab	3002.10	immunoglobulin
ceftizoxime alapivoxil	2941.90	ceftizoxime derivative
celgosivir	2933.90	indolizine ring
clenoliximab	3002.10	immunoglobulin
colesevelam	3911.90	other polymer
eniluracil	2933.59	pyrimidine ring
enlimomab pegol	3002.10	immunoglobulin
eplerenone	2932.29	lactone
felvizumab	3002.10	immunoglobulin
fudosteine	2930.90	cystein derivative
gavestinel	2933.90	indole ring
glufosfamide	2940.00	sugar ester
infiximab	3002.10	immunoglobulin
interferon alfacon-1	3002.10	interferon derivative
lanepitant	2933.39	piperidine ring
licostinel	2933.90	other N-heterocyclic compound
lumefantrine	2922.19	amino-alcohol
milacainide	2933.39	pyridine ring
mivobulin	2933.90	other N-heterocyclic compound
nateglinide	2924.29	amide
nonacog alfa	3002.10	blood-coagulation factor
oberadilol	2933.90	pyridazine ring
opanixil	2933.59	pyrimidine ring
orazipone	2930.90	sulfonyl compound
pegmusirudin	3907.20	other polyether
pifonakin	3002.10	interleukin derivative
pleconaril	2934.90	other heterocyclic compound
pralmorelin	2937.99	"relin" compound
rituximab	3002.10	immunoglobulin
rivastigmine	2924.29	cyclic carbamate
roflumilast	2933.39	pyridine ring
roxifiban	2934.90	isoxazoline ring
sevelamer	3911.90	other polymer
sibrafiban	2933.39	piperidine ring
tazomeline	2934.90	other heterocyclic compound
trecovirsen	2934.90	nucleic acid
upenazime	2928.00	oxime
urokinase alfa	3507.90	enzyme
vatanidipine	2933.59	piperazine ring

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IV. NOUVELLE PROPOSITION DE LA CE VISANT A MODIFIER LES CODES SH DE CERTAINS PRODUITS PORTANT UNE DCI DES LISTES I-69 DE L'OMS

<u>DCI</u>	<u>Code SH</u>	<u>Observations du SCS</u>
pafénolol	2924.21	
embonate de pararosanine	3204.13	
ferrotrénine	2925.20	
tolindate	2930.20	
stibamine glucoside	2932.99	
thiopental sodique	2933.59	
sudoxicam	2934.90	
tétracosactide	2937.10	
codactide	2937.10	
tosactide	2937.10	
giractide	2937.10	
séractide	2937.10	
tricosactide	2937.10	
alsactide	2937.10	
éthylestrénol	2937.99	
pentoxifylline	[2939.50 ou 2939.90]	Renseignements complémentaires nécessaires. S'agit-il d'un dérivé de la théophylline?
propentofylline	[2939.50 ou 2939.90]	Renseignements complémentaires nécessaires. S'agit-il d'un dérivé de la théophylline?
pivmécellinam	2941.90	
bacmécellinam	2941.90	
brobactam	2941.90	
bétamicine	2941.90	
propikacine	2941.90	
étisomicine	2941.90	
nogalamycine	2941.90	
sucralox	3003.90	
glucalox	3003.90	

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IV. FRESH PROPOSAL BY THE EC FOR AMENDMENTS TO THE HS CODES FOR CERTAIN
INN PRODUCTS IN WHO LISTS I-69.

<u>INN</u>	<u>Proposed HS code</u>	<u>Observations of the SSC</u>
pafenolol	2924.21	
pararosaniline embonate	3204.13	
ferrotrenine	2925.20	
tolindate	2930.20	
stibamine glucoside	2932.99	
thiopental sodium	2933.59	
sudoxicam	2934.90	
tetracosactide	2937.10	
codactide	2937.10	
tosactide	2937.10	
giractide	2937.10	
seractide	2937.10	
tricosactide	2937.10	
alsactide	2937.10	
ethylestrenol	2937.99	
pentoxifylline	[2939.50 or 2939.90]	Need more information as to whether it is a derivative of theophylline
propentofylline	[2939.50 or 2939.90]	Need more information as to whether it is a derivative of theophylline
pivmecillinam	2941.90	
bacmecillinam	2941.90	
brobactam	2941.90	
betamicin	2941.90	
propikacin	2941.90	
etisomicin	2941.90	
nogalamycin	2941.90	
sucralox	3003.90	
glucalox	3003.90	

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V. PRODUITS PORTANT UNE DCI DONT LE CLASSEMENT A ETE REPORTE LORS DE LA
SESSION PRECEDENTE

<u>DCI</u>	<u>CODE SH</u>	<u>Observations</u>
Onapristone	2922.50	Le classement dépend de la portée des hormones du n° 29.37.
Ester de macrogol Polysorbates	[3402.13, 3404.20 ou 3907.20] Polysorbate 20 3402.13 Polysorbate 21 3402.13 Polysorbate 40 3402.13 Polysorbate 60 3402.13 Polysorbate 61 3402.13 Polysorbate 65 3907.20 Polysorbate 80 3402.13 Polysorbate 81 3402.13 Polysorbate 85 3402.13	Il faut disposer de renseignements complémentaires sur des produits précis. Selon les renseignements communiqués par le Japon
Tyloxapol	3402.13	Agent de surface non-ionique
Aglépristone	2922.50	Le classement dépend de la portée des hormones du n° 29.37
Epoétine epsilon	[ch. 29, 3002.10 ou 3504.00]	Classements retenus à défaut de renseignements complémentaires en ce qui concerne la fonction pharmacologique.
Insuline lispro	2934.90	Le classement dépend de la portée des hormones du n° 29.37
Tévérélix	2933.39	Le classement dépend de la portée des hormones du n° 29.37
Lexacalcitol	2909.49	Produit non utilisé comme vitamine.
Zinostatine Stimalamer	[2941.90 ou 3003.20]	Il faut disposer de renseignements complémentaires pour déterminer si ce produit est un antibiotique ou une préparation pharmaceutique.
Taltiréline	2933.59	Il faut disposer de renseignements complémentaires pour déterminer si ce produit est une hormone ou un dérivé utilisé essentiellement comme hormone
Lanotéplase	[2934.90, 30.01, 3504.00 ou 3509.90]	Il faut disposer de renseignements complémentaires pour déterminer si ce produit est une enzyme, etc.
Tasonermine	[29.33]	Il faut disposer de renseignements complémentaires.
Valspodar	2941.90	Dérivé d'antibiotique.

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V. INN PRODUCTS WHOSE CLASSIFICATION WAS POSTPONED AT THE PREVIOUS SESSION

<u>INN</u>	<u>HS Codes</u>	<u>Remarks</u>
Onapristone	2922.50	According to the scope of hormones of heading 29.37.
Macrogol ester	[3402.13, 3404.20 or 3907.20]	Need for more information on specific products.
Polysorbates	Polysorbate 20 3402.13 Polysorbate 21 3402.13 Polysorbate 40 3402.13 Polysorbate 60 3402.13 Polysorbate 61 3402.13 Polysorbate 65 3907.20 Polysorbate 80 3402.13 Polysorbate 81 3402.13 Polysorbate 85 3402.13	According to information from Japan.
Tyloxapol	3402.13	Non-ionic surface-active agent
Aglepristone	2922.50	According to the scope of hormones in heading 29.37.
Epoetin epsilon	[Ch. 29, 3002.10 or 3504.00]	In the absence of further information regarding pharmacological function.
Insulin lispro	2934.90	According to the scope of hormones in heading 29.37.
Teverelix	2933.39	According to the scope of hormones of heading 29.37.
Lexacalcitol	2909.49	Not used as a vitamin.
Zinostatin stimalamer	[2941.90 or 3003.20]	Need for more information as to whether it is an antibiotic or a medical preparation.
Taltirelin	2933.59	Need for more information as to whether it is a hormone or a derivative used primarily as hormone.
Lanoteplase	[2934.90, 30.01, 3504.00 or 3507.90]	Need for more information as to whether it is an enzyme, etc.
Tasonermin	[29.33]	Need for more information.
Valspodar	2941.90	Antibiotic derivative

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x x

ANNEX E
ANNEXE E

LIST OF PARTICIPANTS/

LISTE DES PARTICIPANTS

CHAIRMAN / PRESIDENT : Mr. G.J. SLUIS (Netherlands)

A. COUNTRIES/PAYS

AUSTRIA/AUTRICHE

Mrs. A. KAUBA

BRAZIL/BRESIL

Mr. M. DE MACELO MOURA

BULGARIA/BULGARIE

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Mr. J. NIEMINEN

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M. C. BRIFFAUT

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Dr. B. HÜNTEN

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(SSC/13/Dec. 97)

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INDONESIA/INDONESIE

Mr. N.R.M. NASRUN

IRELAND/IRLANDE

Mr. M. NANGLE

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Mr. T. KUMAZAWA,
Mr. H. MIZUTANI

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Mr. W.T. YI,
Mr. D-S. CHO

MADAGASCAR

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M. R. RAKOTONDRAZAKA

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Mr. I. KHAIRUDIN

MAURITANIA/MAURITANIE

M. H. OULD MOHAMED MAHFOUD

MEXICO/MEXIQUE

Dr. R.R. GUTIERREZ FLORES

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Mr. C.G. VAN DEN HEUVEL

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Ms. E.V. MAEHLUM

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Mr. A. AL TURKY

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Mr. A.M.L. ABEYKOON

SWITZERLAND/SUISSE

Dr. R. STEINER

THAILAND/THAILANDE

Mr. U. RATTANAWONGNARA

UNITED KINGDOM/ROYAUME-UNI

Mr. F. VAREY,
Mr. I. COHEN

UNITED STATES/ETATS-UNIS

Mr. I.S. REESE,
Mr. F. SCHOTTMAN

COMMISSION OF THE EUROPEAN COMMUNITIES/
COMMISSION DES COMMUNAUTES EUROPEENNES

M. S. FORCHERI,
M. M. DILLEN,
M. L. BROECKAERT,
M. J.J. BELLJARDO

UNITED NATIONS INTERNATIONAL DRUG CONTROL PROGRAMME (UNDCP)/PROGRAMME
DES NATIONS UNIES POUR LE CONTROLE INTERNATIONAL DES DROGUES (PNUCID)

Mr. H. STEAD

B. SECRETARIAT

Nomenclature and Classification Directorate/

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Direction de la nomenclature et de la classification

Director/Directeur

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Deputy Director/Directeur adjoint

Mr. N. SASIDHARAN

Senior Technical Officer (Supervisor)/Administrateur technique principal (cadre)

M. L. FORNSÄTER

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Mr. J. HINDSDAL

Technical Officers/Administrateurs techniques

M. G. BORSU
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Technical Attachés/Attachés techniques

Mr. K. OMOTO
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Interpreters/Interprètes

M. L. BELLAGAMBA
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