

FOOD AND AGRICULTURE ORGANIZATION OF THE UNITED NATIONS ORGANISATION DES NATIONS UNIES POUR L'ALIMENTATION ET 'AGRICULTURE ORGANIZACION DE LAS NACIONES UNIDAS PARA LA AGRICULTURA Y LA ALIMENTACION

00100 Rome, Via delle Terme di Caraealla. Cables: FOODAGRI, Rom\*. Tel. 5797



WORLD HEALTH ORGANIZATION ORGANISATION MONDIALE DE LA SANTÉ

1211 Ganéve, 27 Avenue Appia. Câbles: UNISANTÉ, Geneve. Tel. 34 60 61

#### ECONOMIC COMMISSION FOR EUROPE

ALINORM 72/14

COMMITTEE ON AGRICULTURAL PROBLEMS

April 1972

Working; Party on Standardization

of Perishable Foodstuffs

\_AGRI/WP.1/737

### JOINT FAO/WHO FOOD STANDARDS PROGRAMME CODEX ALIMENTARIUS COMMISSION

Ninth Session, Rome, 7-17 November 1972

# REPORT OF THE NINTH SESSION OF THE JOINT ECE/CODEX ALIMENTARIUS GROUP OF EXPERTS ON STANDARDIZATION OF FRUIT JUICES

Rome, 20-24 March 1972

- The Joint ECE/Codex Alimentarius Group of Experts on Standardization of Fruit Juices held its Ninth Session at FAO Headquarters, Rome, from 20 to 24 March 1972, under the chairmanship of Professor W. Pilnik (Netherlands). The Group of Experts was welcomed on behalf of the Directors-General of FAO and WHO and the Executive Secretary of the Economic Commission for Europe by Mr. G.O. Kermode, Chief, Joint FAO/WHO Food Standards Programme.
- 2. The Session was attended by 84 participants, including the representatives and observers of 30 countries and observers from 3 international organizations. The list of participants is contained in Appendix I to this Report.

#### Adoption of the Agenda

3. The Group of Experts adopted the provisional agenda for the session with a slight rearrangement of the order of items relating to the subject of the Draft Standards for Concentrated Fruit Juices. The Draft Standard for Concentrated Grape Juice was considered first under the agenda item No. 5. The rest of the standards for concentrated juices were discussed as appeared in the provisional agenda.

#### Election of Rapporteur

4. Mr. L.M. Beachman of the U.S.A. agreed to accept the position of rapporteur for the meeting.

Matters arising from the Reports of (i) the Eighth. Session of the Codex Alimentarius Commission, (ii) the Eighth Session of the Codex Committee on Food Hygiene, (iii) the Sixth

## <u>Session of the Codex Committee on Methods of Analysis and Sampling and (iv) the Sixth Session of the Codex Committee on Food Labelling</u>

5. The Group of Experts was informed by the Secretariat of the main decisions of the Eighth Session of the Commission, particularly those concerning fruit juices. The Group of Experts was similarly informed of the nature of the observations regarding fruit juices contained in the reports of the above-mentioned Codex Committees.

### Reconsideration at Step 7 of the Draft Standard for Grape Juice Preserved Exclusively by Physical Means

- 6. The Group had before it Appendix III of the document ALINORM 71/14(A) (AGRI/VP.1/691), which contained the Draft Standard for Grape Juice Preserved Exclusively by Physical Means.
- 7. The Group noted that government comments had been sought as to whether the provisions elaborated for <u>Vitis labrusca</u> should be included in the standard for <u>Vitis vinifera</u> and its hybrids or in a separate standard. Many delegations considered that there should be two separate standards as they were in fact two quite distinctly dif- ferent types of grape juice. These standards would clearly distinguish between (a) <u>Vitis vinifera</u> and its hybrids and (b) <u>Vitis labrusca</u> and its hybrids, in which <u>vitis labrusca</u> characteristics predominate. The delegation of the U.S.A. considered that the standards should be for (a) grape juice other than Concord type and (b) Concord type grape juice.
- 8. The Group noted that the characteristic flavour of juice from <u>Vitis labrusca</u> types could be identified by analytical means. The high content of methyl anthranilate could be measured by a fluorescence technique, and other flavour constituents could probably be identified and measured by gas-liquid chromatography.
- 9. The Group agreed that a Scope Section should be added to each standard clearly defining which juices would be covered by the respective standards. The Group decided, in the light of government comments, that two different standards for grape juice should be elaborated.
- 10. The Group requested that the Secretariat ask the Executive Committee to consider whether the standard for the <u>vitis labrusca</u> type, after it had been re-edited, could be considered to be at Step 6 of the Procedure, in view of the fact that most of its criteria had already been examined by governments.

#### Need for a Label Declaration of Pure Precipitated Calcium Carbonate

11. In the light of the written comments by governments (cx/FJ 72/2 and its Addenda) the Group considered that the de-acidification by calcium carbonate did not necessitate a label declaration. The delegation of the United Kingdom reserved its position *on* this point as it considered that as a general principle a similar declaration as had been done for sugars, such as "acidity reduced" should be made on the label.

#### Acidifying Agents

12. The Group had before it a technical document prepared by Switzerland (CX/FJ 72/5) which dealt with the justification for adjustment of the acidity of grape juice by the use of tartaric acid, citric acid and malic acid. The Group noted that this paper had been prepared as a result of a proposal made at its last session for the inclusion of acidifying agents in grape juice (ALINORM 71/14(A), para. 28). The Group agreed that the question was whether grape juice

should be acidified and, if so, which acids should be permitted in the food additive section of the standard.

- 13. The delegation of Italy reserved its position against the inclusion of tartaric acid as an acidifying agent. The delegation of Finland stated that in its opinion tartaric acid should not be used. A majority of delegations were in favour of the use of tartaric acid and also for those acids which had been agreed for the standard for apricot, peach and pear nectars, namely citric acid and malic acid. As far as the list of ingredients was concerned, similar declarations should be made as had been agreed for sugars. The delegation of Argentina stated that these should be clearly specified in numerical form. The delegation of France stated that as no degree of acidity nor a level for sugars had been proposed, it reserved its position.
- 14. The Group agreed that the following acidifying agents, tartaric acid, citric acid and malic acid could be used in grape juice.
- 15. The delegation of the Federal Republic of Germany reserved its position against the addition of acids on the grounds that in its opinion there was no technological or natural need for their use.

#### Presence of Sulphur Dioxide (SO<sub>2</sub>)

- 16. The Group discussed the question of whether provision should be made in the draft standard for grape juice for the presence of  $SO_2$  and if so, what should be the maximum level. The attention of delegations was drawn to the report of the Eighth Session of the Joint Group where the reasons why a residue of  $SO_2$  might be present in grape juice were outlined (ALINORM 71/14(A), para. 29).
- 17. The Group took note that the majority of governments which had sent written comments had indicated that they were in favour of a maximum limit of 10 mg/kg total S0<sub>2</sub>. The delegations of France, Italy and Spain stated that although they could agree in principle that a maximum level of 10 mg/kg was desirable, they explained that for various economic and technological reasons they were not yet in a position to accept this figure and therefore proposed a maximum limit of 50 mg/kg with the understanding that this figure would be reduced to 10 mg/kg by 1976.
- 18. Some delegations thought that the figure of 10 mg/kg total SO<sub>2</sub> should be inserted into the standard and that the figure of 50 mg/kg could be mentioned in a footnote which would also indicate a time-limit (such as three years after the publication of the Standard) after which the 50 mg/kg would be reduced to 10 mg/kg. Other delegations thought that both figures and a time-limit should be mentioned in the text of the draft standard itself. Several delegations indicated that they were *in* principle against a high content of S02 as it did not conform to good manufacturing practice whilst It was noted that the government of Yugoslavia had stated in its written comments that SO<sub>2</sub> should absolutely not be permitted in grape juice.
- 19. The Group decided to put into the draft standard a sentence to the effect that a maximum figure of 50 mg/kg total SO<sub>2</sub> was allowed with the understanding that this figure would be reduced to 10 mg/kg by the 1st July 1976. The delegations of the R.F. of Germany and Poland reserved their position in favour of a maximum limit of 10 mg/kg.

### Consideration of a Draft Standard for Vinifera Type Grape Juice Preserved Exclusively by Physical Means

20. The Group recalled their decision to separate the <u>Vitis vinifera</u> and the <u>yetis labrusca</u> into two separate grape juice standards and that each standard would have a scope section, which

would clearly define its limitations (see para. 9 of this Report). It was also agreed that the references to the generic names in brackets throughout the standard should be deleted and reference would only be made to <u>Vinifera</u> type.

The Group decided to examine the standard and the amended version appears as Appendix II to this Report.

#### Scope

21. Some delegations stated that the manufacture of grape juice from hybrids of <u>Vitis vinifera</u> was not permitted in their countries. other delegations mentioned that this was not the case in their countries. In order to take into account both points of view, the Group agreed to amend the Scope Section as follows:

"This standard applies only to <u>Vinifera</u> type grape juices which are free from the essential flavour characteristics of the Concord type grapes."

#### **Description**

22. This section was slightly amended to allow that the juice could be partly deacidified. The words "clarifying and filtering" were deleted to take into account the decision of the Commission regarding Processing Aids (ALINORM 71/31, para. 110). The delegation of Spain reserved its position on the expression "partly de-acidified" and indicated its preference for the expression "acidity corrected". The Group agreed to the proposal of the delegation of Poland to add the words "preserved exclusively by physical means" at the end of the first sentence.

#### Orcranoleptic Properties

23. The delegation of Romania drew the attention of the Group to the recent decision of ISO to substitute the word "sensoric" for "organoleptic", as this word referred not only to quality but also to quantitative criteria. In view of the fact that this would affect not only fruit juices but many other products as well, it was pointed out that it would be necessary to know how the phrasing in the standard might need to be changed in order to fit into this decision of the ISO. The delegation of Romania agreed to prepare a paper on this subject.

#### Food Additives

24. The Group considered again the question of whether to include acidifying agents in the standard (see paras. 12 and 13 above). Some delegations favoured the inclusion of tartaric acid. The Group decided only to permit the use of citric and malic acids. The delegation of Italy reserved its position as regards the use of malic acid. The Group noted that a similar reservation had been made also by the delegation of France. The delegation of the Federal Republic of Germany reserved its position in relation to the addition of acids to fruit juices.

#### Processing Aids

25. The Group agreed to amend this section according to the decision of the Commission at its Eighth Session (ALINORM 71/31, para. 110).

#### **Contaminants**

26. The Group agreed to lower the figure for tin to 150 mg/kg as it applied only to grape juice of the <u>Vinifera</u> type. The delegations of the U.K. and the U.S.A. considered that this figure was too low. The delegation of Switzerland pointed out that this only applied to turbid juices. The

Group then decided to maintain the figure of 150 mg/kg with a footnote to the effect that this figure is currently under review and would be reexamined in 1973.

27. The Group decided, in the light of their general decision on sulphur dioxide (SO2) (see para. 19 of this Report) to amend the standard accordingly.

#### Hygiene

28. The Group agreed to amend this section in accordance with the decision of the Codex Committee on Food Hygiene (ALINORM 72/13, para, 28).

#### Weights and Measures

29. The delegation of the Federal Republic of Germany requested some clarification as regards the minimum fill of container as in their opinion the figure of 90% v/v was not sufficient. It was, however, pointed out that this allowed for the heated filling of containers, spillage and closing and that the figure was a realistic one. The Group agreed to maintain the existing text.

#### <u>List of Ingredients</u>

30. The Group noted that as there was no class name for acids in the list of ingredients, the names malic acid and citric acid would have to be used.

#### Country of Origin

31. The delegation of Switzerland stated that in their opinion a juice which had undergone processing and had changed its nature was no longer a juice and, therefore, reserved its position as regards sub-section 9.5.2. Several delegations considered that the intention of this sub-section was not clear. The Group agreed that the views of the Codex committee on Food Labelling should be sought as to what was the exact interpretation which should be given to this sub-section.

#### Additional Requirements

32. The Group agreed on the figure of 2 mg/kg for carbon dioxide and deleted the square brackets. The Group decided to require a declaration for the presence of sulphur dioxide only if it exceeded 10 mg/kg.

#### Status of the Standard

33. The Group agreed to advance the draft standard for <u>Vinifera</u> type grape juice to Step 8 of the Procedure.

### <u>Draft Standard for Concord and Concord Type Grape Juice Preserved Exclusively by Physical Means</u>

34. The Group decided that the title of the standard should be changed to read "Draft Standard for Concord and Concord Type Grape Juice Preserved Exclusively by Physical Means". The Group agreed to provide for a scope section which reads as follow:

"This standard applies only to grape juice which is made from Concord and Concord Type grapes and which has the essential flavour characteristics of these grapes".

#### Description

35. The Group agreed to amend this sentence in line with that for the standard for <u>Vinifera</u> type grape juice including the processes to allow for the possibility of partial aeacidification.

#### Sugars

36. The Group decided to allow for the addition of fructose although it had not yet been defined by the Codex Alimentarius Commission. The use of this nutritive sweetener should be brought to the attention of the Codex Committee on Sugars with a request that the Committee consider the possibility of elaborating a standard for fructose.

#### Food Additives

37. The delegation of the U.S.A. proposed that the addition of either acids or sugars should be permitted whenever the need arises for the use of one or the other. The delegations of Austria, France, the Federal Republic of Germany, Spain and Switzerland reserved their positions on the above proposal of the U.S.A. on the basis that the addition of acids should not be allowed to the Concord type juices and stated that the only addition should be sugar to adjust the sugar/acid ratio of the Concord type juice.

#### Status of the Standard

38. The Group agreed that the Executive Committee should be asked whether this standard could be given the status of a Step 6 standard in view of the fact that it had already been exemined by delegates and governments had already had the opportunity to make comments on it.

#### Lead Content in Fruit Juices

- 39. The Group had before it a paper prepared by the Federal Republic of Germany on lead contamination of fruit juices (CX/FJ 72/7). The Group also had before it, as conference room documents, various studies on lead submitted by the delegations of Italy, U.K. and the U.S.A.
- 40. The delegation of Poland pointed out that the level of tin content had a direct bearing on the lead content as lead content could increase if lacquered cans were used in order to decrease tin content. It was pointed out that other sources of lead contamination, such as those from the environment, also occurred. The delegation of the U.K. confirmed that the use of lacquered cans was not the solution and considered that at the moment there was insufficient up-to-date information to arrive at a satisfactory conclusion.
- 41. The delegation of the Federal Republic of Germany proposed that any data on levels should be accompanied by information as regards the source of the lead (e.g. location in relation to contaminated areas), history of processing, type of container and time of storage. The method of analysis applied should also be stated.
- 42. The delegation of Italy expressed its willingness to do additional research on this subject separating the figures for juices and for concentrates packed in cans and in bottles. The delegations of the U.K. and the U.S.A. also indicated that they would make available figures on lead content. The delegation of Spain agreed to furnish data, particularly on citrus juices.
- 43. The Group decided to maintain the present text of the standard, whilst noting the concern of delegations and agreed that more pertinent information regarding limits of contamination consistent with good manufacturing practice was necessary.

#### Draft Standard for Vinifera Type Concentrated Grape Juice

44. The Group had before it the Draft Standard for Concentrated Grape Juice preserved exclusively by physical means as contained in document CX/FJ 72/3 and government comments thereon as contained in document CX/FJ 72/6 and its addenda. The Group agreed,

in conformity with its decision on the single-strength juices as regards the Vinifera and Concord type grapes, to elaborate two separate standards for concentrated grape juices.

#### Scope

- 45. The Group agreed, in the light of written comments by governments, to consider only the first alternative scope section. The delegation of Switzerland inquired whether the wording of the text would exclude reconstituted products to be packed and passed through the hands of distributors before reaching the purchaser.
- 46. The delegation of Switzerland stated that if this were the case it could not agree to the proposed wording in the scope section because it would restrict unduly the freedom of manufacturers to prepare reconstituted juice for distribution by blending concentrates from different geographic areas or concentrates having various compositions.
- 47. Other delegations agreed with the wording of the scope section because they thought it important that the possibilities for bottlers to use this concentrate to prepare reconstituted juice should also be indicated in the scope.
- 48. After various attempts to find a new wording, the Group agreed not to include anything about intended uses of the concentrated juice and to restrict the scope section to the following statement: "This standard applies only to concentrates which are made from Vinifera type grape juices which are free from the essential flavour characteristics of Concord and Concord type grapes".

#### **Description**

- 49. The Group agreed to amend the title of paragraph 2.1 to read "Process definitions" and to adjust the figure of 32 to 30 percent by weight. The words "exclusive of added sugar" were deleted and the words "of maintaining the essential composition and quality factors of the concentrate" were added after the words "for the purpose". The square brackets were also removed.
- 50. The wording of paragraph 2.2 was slightly altered and the amended version appears in Appendix IV to this Report. Some delegations considered that only juices conforming to the standards for single-strength juices could be used in the making of concentrates. Amongst these delegations the delegation of France felt that the standards under discussion would make it possible to produce reconstituted juices under conditions which might not be in accordance with the provisions of the fruit juice standards; consequently other delegations made a formal reservation concerning these drafts. Other delegations thought that it was not necessary provided that the reconstituted juice would meet the requirements of the standard for single-strength grape juice. They pointed out that the Group was standardizing a product and not its raw material and that anyway under the fruit juice standards blending of juices and/or addition of concentrate to obtain a juice meeting the requirements of the standard was allowed.

#### Food Additives

- 51. The Group agreed to permit the addition of malic acid and citric acid as acidifying agents. The delegation of the Federal Republic of Germany reserved its position concerning the addition of these acids as in its opinion, they were not technologically necessary,
- 52. The delegations of Italy and France proposed that the use of potassium nitrate be permitted as a de-acidifying agent as it was widely used in their countries. The delegation of Switzerland considered that the problem with this de-acidifying agent was that, unlike with

calcium carbonate, potassium remained as a residue in the product. The Group agreed, however, to allow potassium tartrate as a de-acidifying agent in grape juice and concentrated grape juice with proper label declaration.

#### Presence of SO<sub>2</sub>

- 53. Several delegations felt that the question of the amount of  $SO_2$  to be tolerated in Vinifera type concentrated grape juice could be dealt with by the contaminants section of the standard. This would mean a level of  $SO_2$  such that the reconstituted juice could still have a maximum of 50 ppm. It was felt by some delegations that this provision might result in such high concentrations of  $SO_2$  in the concentrate that the qualification "preserved exclusively by physical means" would no longer be valid. The delegation of the U.K., therefore, proposed a limiting clause that the level of  $SO_2$  should be such that it would not be sufficient to exert a preservative effect on the product. The delegation of Italy explained that a considerable amount of  $SO_2$  was lost on concentration and again on reconstitution and, therefore, proposed a tolerance of  $SO_2$  like the one adopted for single-strength juice, namely 50 mg/kg in the concentrate to be reduced to 10 mg/kg by 1st July 1976.
- 54. The delegation of Spain stated that in their experience, levels of up to 150 mg/kg  $SO_2$  were found after concentration of the juice to  $30^\circ$  Brix. They explained that the harvest period lasted for a comparatively short time and higher levels of  $SO_2$  were found only up to  $45^\circ$  or  $50^\circ$  Brix, but not at the higher levels of concentration which normally varied from  $65^\circ$  to  $71^\circ$  Brix. Some delegations expressed their view that this meant that chemically preserved juices were being used for concentration which should never be allowed to become concentrates with the qualification "preserved exclusively by physical means only".
- 55. After a lengthy discussion, it was decided to accept the proposal of the delegation of Italy as this was the best way to keep low levels, and further reduce the concentration of  $SO_2$  in this product. It was, therefore, decided to include a provision for a maximum amount of 50 mg/kg total  $SO_2$  in the Vinifera type concentrated grape juice which might be present in the final product and that this figure would be reduced to 10 mg/kg on 1st July 1976. The appropriate provisions were added to the labelling section.

#### Weights and Measures

56. The delegation of the Federal Republic of Germany made a similar reservation as regards the fill of container as it had done for the single-strength juice.

#### The Name of the Food

57. The words in square brackets were deleted and the last sentence was amended so as to permit that the instructions for dilution should appear in close proximity to the name. The reference to the addition of sugar was also deleted.

#### **List of Ingredients**

58. The square brackets in the second sentence of sub-section 9.2.1 were removed and the sentence amended to read as follows: "Except that the components mentioned in section 2.1 need not be declared".

#### Additional Requirements

59. The Group decided to retain the figure of 2 g/kg of carbon dioxide and, therefore, removed the square brackets.

#### Degree of Concentration

60. The Group agreed to remove the reference "exclusively of added sugars" is it did not apply to the vinifera type concentrated grape juice.

#### Status of the standard

61. The Group decided to advance the Draft Standard for Vinifera type concentrated grape juice to step 8 of the Procedure. The delegation of Spain reserved its position on this decision.

#### <u>Draft Standards for Concord and Concord Type Concentrated Grape Juice</u>

- 62. The Group agreed that this standard should be drafted in accordance with its decisions on the single-strength juice and the draft standard for Vinifera type concentrated grape juice. The amended version appears as Appendix V to this Report.
- 63. The delegation of Italy considered that concentrated grape juice made from Concord and Concord type grapes should be labelled in such a way that consumers in Europe would be able to clearly identify this type of grape juice. The delegations of France and Italy were of the opinion that as Concord grape juice was not widely known in Europe, the consumer might be misled by the present name of the product. They suggested the name "Concord Grape Juice" might be replaced by a description such as Labrusca Grape Juice. The delegations of Canada and U.S.A. pointed out that the Vinifera type grape juice was not widely known in North America and the consumer in that part of the world could be misled by the words grape juice appearing on this particular product.
- 64. The Group agreed that countries should consider possible alternative qualifying descriptions to Concord for the French and Spanish texts of the standard.

#### Sugar

- 65. Considering the standard for Concentrated Concord and Concord Type Grape Juice, the delegation of the U.K. requested the Group to have a provision covering a sweetened concentrated Concord type grape juice.
- 66. The delegation of Spain considered that grape juices to which sugar had been added would not be suitable for concentration, because on concentration the product could contain up to 50% .sugar.
- 67. The delegation of the U.S.A. mentioned that there was a large market for sweetened concentrated grape juice in the U.S.A. They explained that in these grape juices the added sugar content is not half of the total solids but rather in the ratio of 7-5% added sugars to 16-18° soluble grape solids. The concentrated product was sold to the consumer under the description of a sweetened product. The Group noted that there was already a provision in case of single-strength juices containing sugar in excess of 25 g/kg, and that such juices must be labelled as "sweetened" juice.
- 68. The Group agreed to provide for the addition of sugar to the concentrated Concord and Concord type grape juice and noted that this product should be labelled "sweetened" juice when it exceeds 25 g/kg in the reconstituted final product.

#### Status of the Standard

69. The Group agreed that the Executive Committee should be asked whether the standard could be given the status of a Step 6 standard in view of the fact that it had already been

examined by delegates and governments as part of the standard for concentrated grape juice which was to be submitted to the Commission at Step 8 and that the amendments made by the Group to the standard for concentrated Concord and Concord type grape juice had been largely of an editorial nature. The delegation of the Netherlands queried what would happen to grape juice which contained more than 10 ppm of S02 after the deadline for reduction of the S0 $_2$  from 50 ppm to 10 ppm. They were of the opinion that government comments should be sought on this matter.

#### <u>Draft Standard for Concentrated Apple Juice</u>

- 70. The Group had before it for consideration at Step 7 of the Procedure the Draft Standard for Concentrated Apple Juice Preserved Exclusively by Physical Means, as contained in document CX/FJ 72/3 and government comments thereon as contained in document CX/FJ 72/6 and its addenda.
- 71 The Group agreed to amend this standard in the light of the general decisions it had taken on the standards for concentrated grape juice. The amended version appears as Appendix VI of this Report.

#### **Process Definitions**

- 72. The delegation of the Federal Republic of Germany considered that the degree of concentration was too low. It was pointed out that many fruit juices would not be concentrated too high as they became too viscuous because of their pulp content. On the other hand, it was recognized that nobody was prevented from making a higher concentration as long as they complied with the provisions of the standard.
- 73. The delegations of Finland and the Federal Republic of Germany reserved their position on what they considered to be a too low degree of concentration and stated that they would prefer a higher 3 for apple juice concentrates.
- 74. The delegation of the Federal Republic of Germany also declared that the standard should make provisions for a mandatory clause requiring that the volatile flavour, which is removed during concentration, must be put back prior to reconstitution and reserved its position on this point.

#### Status of the Standard

75. The delegations of France and Italy stated that they were not in favour of advancing this standard to Step 8 and this applied to all concentrates. The Group decided, with the exception of the delegations of France and Italy to advance the standard to Step 8 of the Procedure. The delegation of Spain joined the delegations of France and Italy with regard to the draft standard for grape juice concentrate and apple juice concentrate because, with the deletion of the scope section as proposed in these standards and contained in document CX/FJ 72/3, the scope of these concentrates would no longer be defined.

## <u>Draft Standard for Concentrated Sweetened and Unsweetened Orange Juice Preserved Exclusively by physical Means</u>

76. The Group had before it document CX/FJ 72/3 which contained the Draft Standard for Concentrated Orange Juice (Unsweetened) Preserved Exclusively by Physical Means and the Proposed Draft Standard for (Sweetened) Concentrated Orange Juice Preserved Exclusively by Physical Means. These standards were examined in the light of government comments contained in document CX/FJ 72/6 and its addenda.

- 77. The Chairman suggested that the Group could simplify drafting problems by revising the standards for concentrated orange juice to include provisions for adding sugars for the purpose of adjustment, and for adding larger quantities of sugars in order to produce a sweetened concentrated orange juice. This would permit combining the two standards into a single standard.
- 78. A number of delegations were in favour of this approach but the Federal Republic of Germany preferred a standard for unsweetened concentrated orange juice and a separate standard for sweetened concentrated orange juice. The delegation of Poland was opposed to the use of sugars for adjustment purposes but did not object to providing for a sweetened concentrated orange juice.
- 79. The Group agreed that a single standard combining the draft standard for sweetened and unsweetened concentrated orange juice should be drafted.
- 80. The delegation of the U.S.A. proposed that there should be two standards for concentrated orange juice, one for a concentrate preserved by heat and subsequently distributed without refrigeration, and a second standard for frozen concentrate distributed in the frozen state to the ultimate consumer or to manufacturers of reconstituted orange juice. The delegation of the U.S.A. went on to explain that the differences in methods of preservation and handling resulted in such great differences in the quality of the final product as to justify considering them as having different identities. It further added that, if the frozen concentrate had a separate standard, much higher requirements for soluble solids and for Brix acid ratio could be incorporated resulting in a better and more valuable product for the consumer.
- 81. A number of delegations were opposed to this suggestion and after considerable discussion the Group decided to elaborate one Standard for Concentrated Orange Juice Preserved Exclusively by Physical Means.
- 82. The Chairman then summarized the changes that were necessary in the draft standard, for concentrated orange juice to bring it in line with other concentrated juices while maintaining certain differences where necessary. These changes are reflected in the Draft Standard for Concentrated Orange Juice (see Appendix VII to this Report).
- 83. The delegation of Israel stated its opposition to lowering the Brix in the recommended standard for single-strength orange juice from 10.5° Brix to 10.0 Brix. The Chairman stated that since this had already been approved by the Commission, it could only be changed by proposing a formal amendment to that standard, but he felt that the Group could adopt a higher figure for reconstituted concentrated orange juice if they wished to do so, since the minimum Brix for single-strength fruit juice standards should not necessarily be the basis for the juice from concentrates. The delegation of the U.S.A. proposed that the minimum Brix for reconstituted juices should be 11.8° Brix.
- 84. There was some support for this figure. The delegation of Spain pointed out that there was no inconsistency between a minimum Brix of 10.0° as required by the standard for single-strength juice and a higher figure for juice from concentrate, since the lower figure was related to the minimum soluble solids found in fruit coming to packing plants whereas the higher figure reflected more closely the average of fruit received.

After further discussion, the delegation of Israel proposed 11.0° Brix, which was then adopted by the Group. Section 2.1 was then rephrased by adding at the end of the section the following

words: "except that the soluble orange solids shall be not less than 11.0 percent m/m exclusive of added sugars, as determined in section 1.1".

85. The delegations of Switzerland and the Federal Republic of Germany requested that corresponding changes be made in the standards for concentrated apple juice and concentrated grape juice in order to allow higher soluble solids in the reconstituted juices. The Group did not discuss this request due to lack of time.

#### Status of the Standard

86. The Group agreed to advance the Standard for Concentrated Orange Juice to Step 8 of the Procedure. The delegation of France reserved its position on this decision.

#### <u>Proposed Draft Standard for Pineapple Juice Preserved Exclusively by Physical Means</u>

87. The Group had before it for consideration at Step 4 the Proposed Draft Standard for Pineapple Juice Preserved Exclusively by Physical Means as contained in document CX/FJ 72/4 and government comments thereon as contained in document CX/FJ 72/13.

#### **Description**

88. The delegation of the U.S.A. proposed that the words "flesh or parts thereof with or without the core material" should be substituted in place of the word "endocarp" as this was a product which was produced from all the edible parts of the fruit. The Group agreed to this amendment.

#### Insoluble Solids

89. The delegation of Poland stated that in their opinion the range mentioned, namely, between 5% and 30% was much too high. The delegation of the U.S.A. pointed out that these figures were measured by volume and not by weight. Some delegations were in favour of removing this section altogether as there seemed to be no explanations forthcoming as regards its necessity. Other delegations felt that the section could be maintained in square brackets and that governments should be requested to comment on the range. It was noted that Australia, in its written comments, had explained that it produced a cloudy or opalescent pineapple juice which is substantially clarified by centrifuging it to a suspended solids level of 0.3% to 0.5% and that it had proposed that the minimum limit for insoluble solids should, therefore, be deleted and the draft standard contain only the maximum level. The delegation of the U.S.A. stated that they had a method for the determination of pulp by volume and that they were prepared to make it available.

#### **Acidity**

90. The delegation of Thailand, supported by the delegations of the Philippines and the U.S.A., suggested that the minimum figure of 6 g/kg be deleted and only the maximum figure of 13.5 g/kg be maintained. In reply to a query by the delegation of Switzerland as regards what would be a suitable sugar/acid ratio, the delegation of the U.S.A proposed 12/1 as a minimum.

#### <u>Sugars</u>

91. The Group took note of the suggestion by Australia in its written comments that the standard should provide for the addition of sugars up to 50 g/kg as had been done in the standards for grapefruit juice and orange juice. The reason for this request was that at some periods of the year the addition of sugars up to this level was desirable in order to balance

naturally occurring high levels of acidity. The U.S.A. had also requested that addition of sugar should be allowed. Governments were requested to comment specifically on this proposal.

#### Food Additives

92. The delegation of Thailand requested that a provision should be made to permit the addition of citric and malic acids as acidifying agents. This proposal was supported by the delegation of the U.S.A., who also proposed that the use of dimethyl polysiloxane be permitted as an anti-foaming agent. The Group agreed that governments should be requested to comment specifically on these proposals. The Group noted that dimethyl polysiloxane had been temporarily endorsed to a maximum level of 10 mg/kg by the Codex Committee on Food Additives for canned pineapple and it was agreed to insert it in the food additives section of this draft standard in square brackets. It was decided that L-ascorbic acid should be removed from the list of food additives as an antioxidant. Several delegations declared that in their opinion Vitamin C should not be added to a product having a natural Vitamin C content. The delegation of the U.K. proposed that

the Group draw the attention of the Codex Committee on Food Labelling to the question of vitaminized juices and request it to take into account the work being done on this subject by this Group and the Codex Committee on Foods for Special Dietary Uses, and that the Codex Committee on Food Labelling should consider how proper claims as regards vitamin c might be declared on the label. In this connection, it was pointed out that the subject of claims would be discussed at the next session of the Codex Committee on Food Labelling.

#### **Contaminants**

93. The Group took note that the delegation of New Zealand had requested in its written comments that the maximum level for copper should be reduced from 5 mg/kg to 2 mg/kg. The Group also took note of the statement of the delegation of Finland that due regard should be given to the possibility of providing a maximum level for cadmium as this contaminant had been found in increasing levels during recent years.

#### Hygiene

94. The Group decided to amend this section in accordance with the decision taken by the Committee on Food Hygiene and to delete the section referring to mould count.

#### Fill of Containers

95. The Group noted that the Federal Republic of Germany made a reservation regarding the minimum fill with reference to the water capacity of the container as it had done for other juices.

#### Labelling

96. The Group agreed in the light of its earlier decisions regarding Vitamin C to delete subsections 7.2.2 and 7.6.2.

#### Status of the Standard

97. The Group agreed that the standard was not yet ready to be advanced to Step 5 of the Procedure and therefore decided to retain it at Step 4 and to seek further government comments. The delegation of the U.S.A. was requested to prepare a paper which would explain the figures for the insoluble solids content and would furnish information on the proposed sugar acid ratio. The delegation of the U.S.A. agreed to prepare such a paper.

#### **Ingredient Juices**

98. The Group had before it a working paper prepared by the U.K. on Ingredient Juices (CX/FJ 72/8). This was the basis for an extended discussion on whether or not and to what degree the Group should consider standards for fruit juices which were not intended for direct consumption but for use as ingredients in other standardized products No decision was reached by the Group and further consideration was deferred' until the next meeting of the Group

#### Agenda for the 10th Session

99. The Group agreed that the agenda for its next session would include consideration of the Draft Standards for Single Strength and Concentrated Concord and Concord Type Grape Juices, the Draft Standard for Pineapple Juice Preserved Exclusively by Physical Means, the paper prepared by the Federal Republic of Germany on demineralized water, acceptance sampling plan for fruit juice consignments and those proposed draft standards at Step 2 which it had not had sufficient time to discuss, namely small fruit nectars, citrus based drinks with high natural juice content and clear blackcurrant nectar.

#### Election of Chairman and Vice-chairman for the Next Session

100. The Group unanimously re-elected Professor Dr. W. Pilnik (Netherlands) to serve as Chairman and Mr. w. Orlowski (Poland) to serve as vice-chairman until the end of the Tenth Session.

#### Date and Place of Next Session

101. The Group took note that its next session would probably be held in Geneva in June 1973.

#### Other Business

102. The delegation of the Netherlands expressed its willingness to prepare a draft standard for blackcurrant juice. The Group agreed to accept this proposal as it considered that this would considerably aid the discussion on clear nectar and ingredient juices. The delegation of Finland drew the attention of the Group to the decision of the EEC Working Party on Standardization of Perishable Foodstuffs to designate 1974 as a European Fruit and Vegetable Year.

#### STATUS OF STANDARDS BEING ELABORATED BY THE GROUP

(prepared by the Secretariat)

- 1. <u>Standards considered at Step 7 and advanced to Step 8 for consideration by the Commission at its Ninth Session</u>
- (a) Draft Standard for Vinifera Type Grape Juice Preserved Exclusively by Physical Means.
- (b) Draft Standard for Vinifera Type Concentrated Grape Juice Preserved Exclusively by Physical Means.
- (c) Draft Standard for Concentrated Apple Juice Preserved Exclusively by Physical Means.
- (d) Draft Standard for Concentrated Orange Juice Preserved Exclusively by Physical Means.
- 2. <u>Standards considered at Step 7 and returned to Step 6 for reconsideration by the Group</u> at its Tenth Session at Step 7

- (a) Draft Standard for Concord and Concord Type Grape Juice Preserved Exclusively by Physical Means.
- (b) Draft Standard for Concord and Concord Type Concentrated Grape Juice Preserved Exclusively by Physical Means.
- 3. <u>Standard to be reconsidered at Step 4 by the Group at its Tenth Session in the light of further comments</u>
  - Proposed Draft standard for Pineapple Juice Preserved Exclusively by Physical Means.
- 4. Standards to be considered at Step 2 of the Procedure
- (a) Proposed Draft Standard for Citrus Based Drinks with High Natural Juice Content Preserved Exclusively by Physical Means.
- (b) Proposed Draft Standard for Small Fruit Nectars Preserved Exclusively by Physical Means.
- © Proposed Draft Standard for Clear Blackcurrant Nectar Preserved Exclusively by Physical Means.
- 5. <u>Standards to be drafted for consideration at Step 2 of the Procedure for the following juices'</u>
- (a) Tomato Juice Cocktail.
- (b) Nectars of Passion Fruit, Paw-Paw (Papaya) and Guava.
- (c) Citrus Juice of the Species "Citrus reticulata".
- (d) Blackcurrant Juice.
- (e) Lime Juice.
- (f) Cranberry Juice.
- (g) Bilberry Juice.

#### ALINORM 72/14 Appendix I

LIST OF PARTICIPANTS LISTE DES PARTICIPANTS LISTA DE PARTICIPANTES ALGERIA ALGERIE ARGELIA

M. Abdellaoui

Inspecteur divisionnaire

Sous-Direction de la Repression

des Fraudes Ministère de l'Agriculture et de

la Réforme agraire 12, Bd. Colonel

Amirouche

Alger

M.O. Benmahdjoub

President Directeur général

Société nationale des Conserveries

d'Algérie

87, rue Didouche Mourad

Alger

A. Vignote

Chef du Service laboratoire

Société nationale des Conserveries

algériennes

87, rue Didouche Mourad

Alger

ARGENTINA ARGENTINE

i. vallega

Consejero Agricola

Embajada de la Argentina

Piazza dell'Esquilino 00185 Rome (Italy)

Dr. J.C. Vignaud

Segundo Secretario (Asuntos Econ6micos)

Embajada de la Argentina

00185 Rome (Italy)

AUSTRIA AUTRICHE

Dr. H. Woidich

Lebensmittelversuchsanstalt

Blaasstr. 29 A1190 Vienna

Dr. J. Weiss

Hoehere Bundeslehf-U. Versuchsanstalt

fúr Wein-U. Obstbau Wienerstr. 74

A-3400 Klosterneuburg

BELGIUM BELGIQUE BELGICA

R.L.J.C. de Groot

Ministère des Affaires économiques

23, Square de Meeûs

1040 Brussels

C. Martens

Ingénieur agronome de l'Etat Ministère de 1'Agriculture 10, rue du Méridien

1030 Brussels

P. Fabry

Inspecteur - Chef de Service Ministère de la Santé publique

Cite administrative

Brussels

BRAZIL BRESIL BRASIL

J, Rodriguez da Costa Engenheiro Agrônomo Ministério da Agricultura

Rio de Janeiro

S.F.G. Bath

Permanent Representative of Brazil

Piazza Navona, 14

Rome (Italy)

CAMEROON CAMEROUN CAMERUN

S. Bakoto

Conseiller

Ambassade du Caméroun 147bis, rue de Longchamp

Paris 16ème (France)

CANADA

K.H. Dean

Chief, Processed Fruit and vegetable

Section

Canada Department of Agriculture Sir John

Carling Bldg. Ottawa, Ontario

\* Heads of delegations listed first. Les chefs des délégations figurent en tête. Figuran en primer lugar los Jefes de las Delegaciones.

DENMARK DANEMARK DINAMARCA

H. Herget

**Production Manager** 

**Danish Canners Association** 

Copenhagen

EGYPT, ARAB REP, EGYPTE, REP. ARABE EGIPTO, REP. ARABE

Dr. M.A.H. Asem

Director Food Control Dept. Ministry of Public Health

Cairo

FINLAND FINLANDE FINLANDIA

Prof. Dr. T. Rautavaara Section d'horticulture Agriculture administration Maatilahallitus

Helsinki 17 FRANCE FRANCIA

M. Traincard

Inspecteur divisionnaire

Service de la repression des frauds

et du contrôle de la qualité

42bisf rue de Bourgogne Paris 7ème

P. Dupaigne

IFAC (Technologie) 40, rue des Ecoles

**Paris** 

Malvoisin Expert (CEE)

Vice-Président, Union nationale

producteurs jus de fruits

GERMANY, FED. REP, ALLEMAGNE, REP. FED. ALEMANIA, REP. FED. H.P. Mollenhauer Ministerialrat

Federal Ministry of Youth, Family

and Health

Deutschherrenstr. 87 53 Bonn-Bad Godesberg

C.H. Kriege Ministerialrat

Ministry of Food, Agriculture and

Forestry
Postfach BML
53 Bonn

Prof. Dr. H.J. Bielig

Director, Institute of Fruit and

Vegetable Technology Technische Universität

Berlin

A. Korth

Geschäfüfuhrer

Verband der deutschen Fruchtsafr-

Industrie

Nik. Beckerstrasse 3

530 Bonn-Bad Godesberg

ISRAEL

U.R. Pollak

Representative of Citrus Products

Board

c/o "GAT" Givat Hayim

ITALY

**ITALIE** 

**ITALIA** 

Dr. C. Zambrano

Secretaire général du Comité italien du

Codex

Inspecteur général, au Ministère de

l'Agriculture

Via Sallustiana 10

Rome

Dr. A. Fogli

The Coca-Cola Exp. Corporation

Via Palmieri 58

Milan

Dr. S. Gherardi

Stazione Sperimentale Industria Conserve

Viale Tanara 33

Parma

G. Gianni

Directeur adjoint AIIPA

Via P. Verri 8

Milan

Dr. R. Maroncelli

Confindustria

Piazza Venezia, 11

Rome

Dr. G. Ortalli

Dir. Tecnico Levissima

Piazza Bossi 3

Milan

Dr. A. Pajella

Minister© Agricoltura e Foreste

Via Sallustiana 10

Rome

H. Reintjes

Techn.Director

STAR Spa. AGRATE

Brianza (Milano)

Prof. A\*Stacchini

Istituto Superiore di Sanitá

Viale Regina Elena 299

Rome

ALINORM 72/14 A

ppendix I

A. Svaldi

Ufficio C.E.E.

Ministero Agricoltura

Via XX Settembre, 20

Rome

Prof. F. Cotta-Ramusino

Istituto Superiore di Sanità

Viale Regina Elena 299

Rome

**MADAGASCAR** 

R. Ratsifandrihamanana

Directeur du Laboratoire central du

Conditionnement du Madagascar

Tananarive

MOROCCO

MAROC

**MARRUECOS** 

P. Couvé

Office de Commercialisation et

d'Exportation (OCE)

45, Avenue des Forces Armées Royales

Casablanca

M. Serrada

Directeur du Laboratoire Officiel

23, Rue de Tours

Casablanca

**NETHERLANDS** 

PAYS-BAS

PAISES BAJOS

J.P.L.L.A. Burg

Ministry of Agriculture and Fisheries

le v.d. Boschstraat 4

The Hague

W.G. Aldershoff

Public Health Officer

Ministry of Social Affairs and

Public Health

Dokter Rejersstraat 10

Leidschendam

M.J.M. Osse

Ministry of Agriculture and Fisheries

**Direction of Agricultural Industries** 

and International Trade

le v.d. Boschstraat 4

The Hague

Prof. Dr. W. Pilnik \*

Agricultural University

Department of Food Science

Wageningen

\* Chairman Président Presidente

T. van Hiele

Director, Sprenger Institute

Haagsteeg 6 Wageningen

J. van Waardenberg

Produktschap voor Groenten en Fruit

Zezuidenhoutse Weg 153

The Hague

NORWAY NORVEGE NORUEGA0.

**Tvete** 

Director, Food Inspection Ministry of Agriculture

Gladengvn 3B

Oslo 6

**PANAMA** 

M. Arosemena I ncaricato di Affari Embajada de Panamá Via Po 10 Rome (Italy)

M.I. de Arosemena

Addetto Ambasciata Panamá

Via Po 10, Rome (Italy)

PHILIPPINES FILIPINAS

H.B. Garcia First Secretary Philippine Embassy via San Valentino 12

Rome

POLAND POLOGNE POLONIA

W. Orlowski

Central Board of Standardization

Ministry of Foreign Trade

Stepinska 9 Warsaw R. Samplawski

Foreign Trade Enterprise Agros

Zurawia 32/34

Warsaw

ROMANIA ROUMANIE RUMANIA

Prof. F.I. Radu

Institul de Cercetari si Proiectäri Pentru Valorificarea Legumelor si Fructelor

Calea Victoriei No. 11

**Bucharest** 

1

SPAIN ESPAGNE ESPANA

J.A. Canals Navarrete

Subdirector

Ministerio de Agricultura Paseo Infanta Isabel 1

Madrid

J. Carballo

Investigaciones Agron ómicas (I.N.I.A.)

Avenida Puerta de Hierro

Madrid-3

L. Esteban

Agregado Comercial Embajada dè España 29, Bd. du Regent Bruxelles (Belgium)

J.J. Garcia del Castillo Martin Jefe Sección Normalización Ministerio de Agricultura Paseo Infanta Isabel 1

Madrid

J. Royo-Iranzo

Scientific Adviser of "Sindicato de

Frutos"

Consejo Superior de Investigaciones

Cientificas

c/ Alvaro de Bazán, 3 Valencia-10

I. Unceta onaindia

Subdirecci6n General Industrias Agrarias

Ministerio de Agricultura Paseo de Maria Cristina 1

Madrid

SWEDEN SUEDB SUECIA

0. Ågren

Deputy Head of Division

National Swedish Food Administration

S-10401 Stockholm 60

B.N. Ågren Head of Section

National Swedish Food Administration

S-10401 Stockholm 60

J. Teär

Alfa Laval AB Facic S-14700 Tumba

**SWITZERLAND** 

SUISSE SUIZA

H. Ulrich Pfister

Chef de Section, Régie fédérale des Alcoalf

Länggasstrasse 31

3012 Berne

H.A. Rentschler

Adjoint à la Station fédérale de Recherche

Station fédérale de Recherche

8820 wädenswil

J.F. Schopfer Chef de Section

Station fédérale de recherches

agronomiques 1005 Lausanne

THAILAND THAILANDE TAILANDIA

A. Bhumiratana

Director, Institute of Food Research

and Product Development

Kasetsart University PO Box 4-170

Bangkok

TUNISIA TUNISIE TUNEZ

A. Amradui

Ingénieiar des industries alimentaires

Institut de nutrition

120 Avenue de la Liberté

Tunis

UNITED KINGDOM ROYAUME-UNI REINO UNIDO

L.G. Hanson Principal Officer

Ministry of Agriculture, Fisheries and Food

Great Westminster HouseÅ

Horseferry Road London S.W.I

J.B. Hirons

Principal Scientific officer Food Chemistry Branch

Ministry of Agriculture, Fisheries and Food

Horseferry Road London S.W.I

A.W. Hubbard

Superintendent, Food and Nutrition Division Laboratory of the Government chemist

Cornwall House Stamford Street London S.E.I

G.M. Keir

Higher Executive officer

Ministry of Agriculture, Fisheries and Food

**Great Westminster House** 

London S.W.I

W.T. Watkins

Chemist, Schweppes Research Laboratory

Garrick Road Hendon

London, N.W.9

URUGUAY

D. Zorrilla de San Martin

Primer Secretario

Misión Permanente del Uruguay ante la

FAD

Via Ticino, 7 Rome (Italy)

UNITED STATES OF AMERICA ETATS-UNIS D'AMERIQUE ESTADOS UNIDOS DE AMERICA

L.M. Beacham

Assistant Director for International Standards US Food and Drug

Administration - BF 40

200 "C" at. s.w.

Washington D.C. 20204

Y.G. Brault

Managing Director

Calpak Spa.

Via del Porto, 1

40122 Bologna (Italy)

R.I. Mori

Director of Quality Assurance Dole Co.

Dole Co.

P.O. Box 3380

Honolulu HI 96822

W.R. Roy

Coca-Cola Company

310 North A.

Atlanta Ga.

W.E. Savant

**Executive Vice-President** 

Florida Canners Association

P.O. Box 780

Winter Haven

Florida 33880

R.K. Shaw

Florida Canners Association

P.O. Box 2111

Tampa

Florida 33601

D.R. Thompson

European Representative

California-Arizona Citrus Industry

Rue du Progrès, 52 1000 Brussels (Belgium)

R.J. Tolley

**National Canners Association** 

1133-20th St. N.W.

Washington D.C.

INTERNATIONAL ORGANIZATIONS
ORGANISATIONS INTERNATIONALES
ORGANIZACIONES INTERNACIONALES

European Economic Community (EEC)

Mr. E. Gaerner

Administrateur principal auprès de la

Commission des Communautès

Europèennes

200, rue de la Loi

1040 Bruxelles Belgium

Mr. M. Graf

Administrates auprès du Secrétariat

géneral du Conseil

170, rue de la Loi

1040 Bruxelles

Belgium

Office International du Vin (OIV)

Mr. C. Olivieri

Maître-Assistant (Enseignement)

Ecole Nationale Supérieure Agronomique

Montpellier 34

France

UNIDO

Mrs. F.I. Selim

(Fellow. UNIDO)

Egyptian Organization of Standardization

Ministry of Industry

Cairo

Egypt, Arab Republic of

**JOINT SECRETARIES** 

**CO-SECRETAIRES** 

COSECRETARIOS

F. Lesock

FAO/ECE Agriculture Division

Palais des Nations

Geneva, Switzerland

H. Barrera-Benitez Food Standards Officer Joint FAO/WHO Food standards Programme FAO, Rome, Italy FAO Personnel - Joint FAO/WHO Food Standards Programme

L.W. Jacobson G.O. Kermode

# DRAFT STANDARD FOR VINIFERA TYPE GRAPE JUICE PRESERVED EXCLUSIVELY BY PHYSICAL MEANS I/

(Advanced to Step 8 of the Procedure)

1. <u>SCOPE</u> This standard applies only to <u>Vinifera</u> type grape juices which are free from the essential flavour characteristics of the Concord type grapes.

#### 2. <u>DESCRIPTION</u>

Unfermented but fermentable juice, intended for direct consumption, obtained by a mechanical process from sound, ripe grapes preserved exclusively by physical means. The juice may be turbid or clear. The juice may be clarified and may' be partly de-acidified with the aid of the agents listed in section 5 (Processing Aids). The juice may have been concentrated and later reconstituted with water suitable for the purpose of maintaining the essential composition and quality factors of the juice.

#### 3. ESSENTIAL-COMPOSITION AND QUALITY FACTORS

#### 3.1 Soluble Solids

The soluble solids content of grape juice shall be not less than 15 percent as determined by refractometer at 20°C, uncorrected for acidity and read as °Brix on the International Sucrose Scales.

#### 3.2 <u>Ethanol Content</u>

The ethanol content shall not exceed 5 g/kg

#### 3.3 Volatile Acids

The volatile acids content shall not exceed 0.4 g/kg expressed as acetic acid.

#### 3.4 <u>Organoleptic Properties</u>

The product shall have the characteristic colour, aroma and flavour of the <u>Vinifera</u> type grape and be free from the essential flavour characteristics of the Concord type grape. Natural volatile grape juice components may only be restored to the same type of grape juice from which natural grape juice components have been removed.

#### 3.5 Use of Concentrates

The addition of concentrate to juice is permitted.

#### 4. <u>FOOD ADDI</u>TIVES

The following provisions in respect of food additives have been endorsed by the Codex Committee on Food Additives:

4.1 Acidifying Agents citric acid - malic acid Maximum level of use

4.2 Antioxidants

L-ascorbie acid limited by GMP limited by GMP

limited by GMP

4.3 Others

Pure carbon dioxide limited by GMP

- 5. PROCESSING AIDS
- 5.1 Clarifying and filtering agents as approved by the Codex Alimentarius Commission and used in accordance with good manufacturing practice.
- 5.2 <u>De-acidifying Agents</u>
- 5.2.1 Pure precipitated calcium carbonate
- 5.2.2 Potassium tartrate
- 1/ For the purpose of this standard and at this time preservation by physical means does not include ionising radiation.
- 5.3 Others
- 5.3.1 Pure vegetable carbon
- 5.3.2 Pure nitrogen
- 5.3.3 Pure carbon dioxide
- 6. <u>CONTAMINANTS</u>

The following provisions in respect of contaminants have been endorsed by the Codex Committee on Food Additives, except as otherwise indicated.

	<u>Contaminant</u>	Maximum level
6.1	Arsenic (As)	0.2 mg/kg
6.2	Lead (Pb)	0.3 mg/kg
6.3	Copper (Cu)	5 mg/kg
6.4	Zinc (Zn)	5 mg/kg
6.5	Lron (Fe)	15 mg/kg
6.6	Tin (Sn)	150 mg/kg (temporarily endorsed) 1/
6.7	Total metal content precipitable	
	by potassium hexacyanoferrate (II)	17 mg/kg expressed as Fe

- 6.8 The amount of total sulphur dioxide which may be present in the final product shall not exceed 50 mg/kg- The maximum amount will be reduced to 10 mg/kg On *X* July 1976.
- 6.9 Mineral impurities insoluble in 10% hydrochloric acid shall not exceed 20 mg/kg.

#### 7. HYGIENE

The following provisions in respect of the food hygiene of this product have been endorsed by the Codex Committee on Food Hygiene:

7.1 It is recommended that the products covered by the provisions of this standard be prepared in accordance with the Recommended International Code of Hygienic Practice for Canned Fruit and Vegetable Products (Ref. No. CAC/RCP 2-1969) and the Recommended

International Code of Hygienic Practice for Quick Frozen Fruits, Vegetables and their Juices (Ref. No. CAC/RCP ...).

- 7.2 When tested by appropriate methods of sampling and examination, the product:
- (a) shall be free from micro-organisms capable of development under normal conditions of storage; and
- (b) shall not contain any substances originating from micro-organisms in amounts which may be toxic.
- 8. WEIGHTS AND MEASURES
- 8.1 Fill of Container

#### 8.1.1 Minimum Fill

The grape juice shall occupy not less than 90% v/v of the water capacity of the container. The water capacity is the volume of distilled water at 20°C which the sealed container will hold when completely filled.

9. <u>LABELLING</u> (Subject to endorsement by the Codex Committee on Food Labelling) In addition to sections 1, 2, 4 and 6 of the Recommended International General Standard for the Labelling of Prepackaged Foods (Ref. No. CAC/RS 1-1969) the following specific provisions apply:

#### 9.1 The Name of the Food

The name of the product shall be "grape juice".

1/ The provisional limit of 150 mg/kg for tin is currently under review and will be re-examined in 1973.

#### 9.2 <u>List of Ingredients</u>

- 9.2.1 A complete list of ingredients shall be declared on the label in descending order of proportion, except that added water need not be declared.
- 9.2.2 In the case of grape juice made from concentrate, the fact of reconstitution shall be declared in the list of ingredients as the first ingredient as follows: "grape juice made from concentrate" or "reconstituted grape juice" or "grape juice made from concentrated grape juice".
- 9.2.3 The addition of L-ascorbic acid shall be declared in the list of ingredients as:
- (a) "L-ascorbic acid as antioxidant" or
- (b) "antioxidant"

#### 9.3 Net Contents

The net contents shall be declared by volume in one or more of the following systems of measurement: Metric ("Système International"), US or British units, as required by the country in which the product is sold.

#### 9.4 Name and Address

The name and address of the manufacturer, packer, distributor, importer, exporter or vendor of the product shall be declared.

#### 9.5 Country of Origin

- 9.5.1 The country of origin of the product shall be declared.
- 9.5.2 When the product undergoes processing in a second country which changes its nature, the country in which the processing is performed shall be considered to be the country of origin for the purposes of labelling.

#### 9.6 Additional Requirements

The following additional specific provisions shall apply:

- 9.6.1 No fruit or fruit juice may be represented pictorially on the label except grape or grape juice.
- 9.6.2 The term "carbonated" or an equivalent term in other languages shall be declared on the label if the grape juice contains more than 2 g/kg of carbon dioxide.
- 9.6.3 No claims shall be made in respect of "Vitamin C" nor shall the term "Vitamin C" appear on the label unless the product contains such quantity of "Vitamin C" as would be accepted by national authorities as warranting such claim or the use of such term.
- 9.6.4 Where grape juice requires to be kept under conditions of refrigeration, there shall be information for keeping and, if necessary, thawing of the product.
- 9.6.5 The presence of sulphur dioxide shall be declared on the label if it exceeds 10 mg/kg.

#### 9.7 Bulk Packs

In the case of grape juice in bulk, the information required in 9.1 to 9.6.5 shall either be placed on the container or be given in accompanying documents.

#### 10. METHODS OF ANALYSIS AND SAMPLING (To be finalized later.)

ALINORM 72/14

Appendix III

# DRAFT STANDARD FOR CONCORD AND CONCORD TYPE GRAPE JUICE PRESERVED EXCLUSIVELY BY PHYSICAL MEANS

1/ (To be held at Step 6 of the Procedure)

#### 1. SCOPE

This standard applies only to grape juice which is made from Concord and Concord type grapes and which has the essential flavour characteristics of these grapes.

#### 2. <u>DESCRIPTION</u>

Unfermented but fermentable juice, intended for direct consumption, obtained by a mechanical process from sound, ripe grapes preserved exclusively by physical means. The juice may be turbid or clear. The juice may be clarified and may be partly de-acidified with the aid of the agents listed in section 5 (Processing Aids). The juice may have been concentrated and later reconstituted with water suitable for the purpose of maintaining the essential composition and quality factors of the juice.

#### 3. ESSENTIAL COMPOSITION AND QUALITY FACTORS

#### 3.1 Soluble Solids

The soluble solids content of grape juice (exclusive of added sugar) shall be not less than 15 percent as determined by refractometer at 20°C, uncorrected for acidity and read as Brix on the International Sucrose Scales.

#### 3.2 Sugars

The following sugars may be added: sucrose (white sugar), dextrose and dried glucose syrup, as defined by the Codex Alimentarius Commission. The addition of fructose is also permitted. The total quantity of sugars added shall not exceed 75 g/kg. When the juice has been acidified the addition of sugars is not permitted.

#### 3.3 Ethanol Content

The ethanol content shall not exceed 5 g/kg.

#### 3.4 Volatile Acids

The volatile acids content shall not exceed 0.4 g/kg expressed as acetic acid.

#### 3.5 Organoleptic Properties

The product shall have the characteristic colour, aroma and flavour of Concord and Concord type grapes. Natural volatile grape juice components may only be restored to the same type of grape juice from which natural grape juice components have been removed.

#### 3.6 Use of Concentrates

The addition to juice of concentrate made from Concord and Concord type grape juices is permitted.

#### 4. FOOD ADDITIVES

The following provisions in respect of food additives have been endorsed by the Codex Committee on Food Additives:

4.1 Antioxidants
L-ascorbic acid

Maximum level of use limited by GMP

4.2 Acidifying Agents

Malic acid limited by GMP
Citric acid limited by GMP

The use of these acids may only be permitted when the juice contains no added sugars.

1/ For the purpose of this standard and at this time preservation by physical means does not include ionizing radiation.

4.3 Others Maximum level of use

Pure carbon dioxide without limit

#### 5. PROCESSING AIDS

- 5.1 Clarifying and filtering agents as approved by the Codex Alimentarius Commission and used in accordance with good manufacturing practice.
- 5.2 Others
- 5.2.1 Pure vegetable carbon
- 5.2.2 Pure nitrogen

#### 5.2.3 Pure carbon dioxide

#### 6. CONTAMINANTS

The following provisions in respect of contaminants have been endorsed by the Codex Committee on Food Additives, except as otherwise indicated.

<u>Contaminant</u>	Maximum level
Arsenic (As)	0.2 mg/kg
Lead (Pb)	0.3 mg/kg
Copper (Cu)	5 mg/kg
Zinc (Zn)	5 mg/kg
Iron (Fe	15 mg/kg
Tin (Sn)	250 mg/kg (not endorsed) <u>1</u> /
Total metal content precipitable by	
potassium hexacyanoferrate (II)	17 mg/kg expressed as Fe
	Arsenic (As) Lead (Pb) Copper (Cu) Zinc (Zn) Iron (Fe Tin (Sn) Total metal content precipitable by

6.8 Mineral impurities insoluble in 10% hydrochloric acid shall not exceed 20 mg/kg.

#### 7. HYGIENE

The following provisions in respect of the food hygiene of this product have been endorsed by the Codex Committee on Food Hygiene.

- 7.1 It is recommended that the products covered by the provisions of this standard be prepared in accordance with the Recommended International Code of Hygienic Practice for Canned Fruit and Vegetable Products (Ref. No. CAC/RCP 2-1969) and the Recommended International Code of Hygienic Practice for Quick Frozen Fruits, Vegetables and their Juices (Ref. No. CAC/RCP ...).
- 7.2 When tested by appropriate methods of sampling and examination, the product:
- (a) shall be free from micro-organisms capable of development under normal conditions of storage; and
- (b) shall not contain any substances originating from micro-organisms in amounts which may be toxic.
- 8. <u>WEIGHTS AND MEASURES</u>
- 8.1 Fill of Container

#### 8.1.1 Minimum Fill

The grape juice shall occupy not less than 90% v/v of the water capacity of the container. The water capacity is the volume of distilled water at 20°C which the sealed container will hold when completely filled.

LABELLING (Subject to endorsement by the Codex Committee on Food Labelling)

In addition to sections 1, 2, 4 and 6 of the Recommended International General Standard for the Labelling of Prepackaged Foods (Ref. No. CAC/RS 1-1969) the following specific provisions apply:

1/ The provisional limit of 250 mg/kg for tin is currently under review and will be re-examined in 1973•

#### 9.1 The Name of the Food

The name of the product shall be "Concord or Concord type grape juice". If a sugar is added in a quantity not exceeding 25 g/kg to grape juice obtained from Concord or Concord type grapes, the words "X added" shall plainly and conspicuously accompany the name "Concord or Concord type grape juice", where "X" is the name of the sugar added. Where sugar is added in quantities over 25 g/kg to grape juice obtained from Concord or Concord type grapes, then the name of the product shall be "sweetened Concord or Concord type grape juice".

#### 9.2 List of Ingredients

- 9.2.1 A complete list of ingredients shall be declared on the label in descending order of proportion, except that added water need not be declared,
- 9.2.2 In the case of grape juice made from concentrate, the fact of reconstitution shall be declared in the list of ingredients as the first ingredient as follows: "grape juice made from concentrate" or "reconstituted grape juice" or "grape juice made from concentrated grape juice".
- 9.2.3 The addition of L-ascorbic acid shall be declared in the list of ingredients as:
- (a) "L-ascorbic acid as antioxidant" or
- (b) "antioxidant"

#### 9.3 Net Contents

The net contents shall be declared by volume in one or more of the following systems of measurement: Metric ("Système International"), US or British units, as required by the country in which the product is sold,

#### 9.4 Name and Address

The name and address of the manufacturer, packer, distributor, importer, exporter or vendor of the product shall be declared.

#### 9.5 Country of Origin

- 9.5.1 The country of origin of the product shall be declared.
- 9.5.2 When the product undergoes processing in a second country which changes its nature, the country in which the processing is performed shall be considered to be the country of origin for the purposes of labelling.

#### 9.6 Additional Requirements

The following additional specific provisions shall apply:

- 9.6.1 No fruit or fruit juice may be represented pictorially on the label except grape or grape juice.
- 9.6.2 The term "carbonated" or an equivalent term in other languages shall be declared on the label if the grape juice contains more than 2 g/kg of carbon dioxide.
- 9.6.3 No claims shall be made in respect of "Vitamin C" nor shall the term "Vitamin C" appear on the label unless the product contains such quantity of "Vitamin C" as would be accepted by national authorities as warranting such claim or the use of such term.

9.6.4 Where grape juice requires to be kept under conditions of refrigeration, there shall be information for keeping and, if necessary, thawing of the product.

#### 9.7 Bulk Packs

In the case of grape juice in bulk, the information required in 9.1 to 9.6.4 shall either be placed on the container or be given in accompanying documents.

## 10. <u>METHODS OF ANALYSIS AND SAMPLING</u> (To be finalized later.)

# DRAFT STANDARD FOR VINIFERA TYPE CONCENTRATED GRAPE JUICE PRESERVED EXCLUSIVELY BY PHYSICAL MEANS 1/

(Advanced to Step 8 of the Procedure;

#### 1. SCOPE

This standard applies only to concentrates which are made from Vinifera type grape juices which are free from the essential flavour characteristics of Concord and Concord type grapes.

#### 2. DESCRIPTION

Concentrated grape juice is the unfermented but fermentable juice, preserved exclusively by physical means, obtained by the process of concentration (as defined in section 2.1) from the raw materials as described in section 2.2. The product may be turbid or clear. The concentrated grape juice may be clarified with the aid of clarifying agents and filtration aids in accordance with section 5.

#### 2.1 Process Definition

The process of concentration consists of the physical removal of water until the product has a soluble grape solids content of not less than 30 percent by weight as determined by refractometer at 20°C uncorrected for acidity and read as °Brix on the International Sucrose Scales and includes the addition of (1) juice, or concentrate or water suitable for the purpose of maintaining the essential composition and quality factors of the concentrate, and (2) the addition of natural volatile grape juice components where these have been previously removed.

2.2 The raw material from which this product is obtained is unfermented but fermentable grape juice obtained by a mechanical process from sound, ripe <u>Vinifera</u> type grapes which are free from the essential flavour characteristics of Concord or Concord type grapes.

#### 3. ESSENTIAL COMPOSITION AND QUALITY FACTORS

#### 3.1 Requirements for the juice after reconstitution

The product obtained by reconstituting the concentrated grape juice in accordance with section 9.7 of this standard shall comply with the provisions of the Standard for Vinifera Type Grape Juice Preserved Exclusively by Physical Means (see Appendix II to this Report).

#### 4. FOOD ADDITIVES

The following provisions in respect of food additives have been endorsed by the Codex Committee on Food Additives:

#### 4.1 Acidifying Agents Maximum level of use

Malic acid Citric limited by GMP limited by GMP acid

4.2 Antioxidants

L-ascorbic acid limited by GMP

4.3 Others limited by GMP

Pure carbon dioxide

#### PROCESSING AIDS

- 5.1 Clarifying and filtering agents as approved by the Codex Alimentarius Commission and used in accordance with good manufacturing practice.
- 5.2 <u>De-acidifying Agents</u>
- 5.2.1 Pure precipitated calcium carbonate.
- 5.2.2 Potassium tartrate.
- 5.3 Others
- 5.3.1 Pure vegetable carbon.
- 1/ For the purpose of this standard and at this time preservation by physical means does not include ionizing radiation.

#### **ALINORM 72/14**

Appendix IV

- 5.3.2 Pure nitrogen,
- 5.3.3 Pure carbon dioxide.

#### 6. CONTAMINANTS

- 6.1 When Vinifera type grape juice concentrate is reconstituted in accordance with section 9.7 of this standard, the limits of contaminants shall not exceed the laid down in section 6 of the Draft Standard for Vinifera Type Grape Juice Preserved exclusively by Physical Means (see Appendix II of this Report).
- The amount of total sulphur dioxide which may be present in the concentrate shall not exceed 50 mg/kg. The maximum amount will be reduced to 10 mg/kg on 1 ju 1976.

#### 7. <u>HYGIENE</u>

The following provisions in respect of the food hygiene of this product have been dorsed by the Codex Committee on Food Hygiene:

- 7.1 It is recommended that the products covered by the provisions of this standard be prepared in accordance with the Recommended International Code of Hygienic Practice for Canned Fruit and Vegetable Products (Ref. No. CAC/RCP 2-1969) and the Recommend International Code of Hygienic Practice for Quick Frozen Fruits, Vegetables and the Juices (Ref. No. CAC/RCP ....).
- 7.2 When tested by appropriate methods of sampling and examination, the products

- (a) shall be free from micro-organisms capable of development under normal conditions of storage; and
- (b) shall not contain any substances originating from micro-organisms in amount which may be toxic.

#### 8. <u>WEIGHTS AND MEASURES</u>

#### 8.1 Fill of Container

#### 8.1.1 Minimum Fill (exclusive of bulk packs)

The concentrated grape juice shall occupy not less than 90% v/v of the water capacity of the container. The water capacity of the container is the volume of distilled water at 20 C which the sealed container will hold when completely filled.

9. <u>LABELLING</u> (Subject to endorsement by the Codex Committee on Food Labellining In addition to sections 1, 2, 4 and 6 of the Recommended International General Standard for the Labelling of Prepackaged Foods (Ref, No. CAC/RS 1-1969) the following spec provisions apply:

#### 9.1 The Name of the Food

The name of the product shall be "concentrated grape juice". For prepackaged products an indication of the degree of concentration, e.g. the number of parts by volume o water which have to be added to one part by volume of the concentrate to obtain this strength juice which complies with section 9.7 of this standard, shall plainly and speciously appear in close proximity to the name of the product.

#### 9.2 List of Ingredients

- 9.2.1 A complete list of ingredients shall be declared on the label in descending order of proportion, except that the components mentioned in section 2.1 need not declared.
- 9.2.2 The addition of L-ascorbic acid shall be declared in the list of ingredients as:
- (a) "L-ascorbic acid as antioxidant" or
- (b) "antioxidant"

#### 9.3 Net Contents

The net contents shall be declared by volume in either the metric ("Système International"), U.S. or British units as required by the country in which the prod is sold.

#### 9.4 Name and Address

The name and address of the manufacturer, packer, distributor, importer, exporter or vendor of the product shall be declared.

#### 9.5 Country of Origin

The country of origin of the product shall be declared.

9.5.1 When the product undergoes processing in a second country which changes its nature, the country in which the processing is performed shall be considered to be the country of origin for the purpose of labelling.

#### 9.6 Additional Requirements

The following additional specific provisions shall apply:

- 9.6.1 No claims shall be made in respect of "Vitamin C" nor shall the term "Vitamin C" appear on the label unless the product contains such quantity of "Vitamin C" as would be accepted by national authorities as warranting such claim or the use of such term.
- 9.6.2 The term "carbonated" or an equivalent term in other languages shall be declared on the label if the grape juice contains more than 2 g/kg of carbon dioxide.
- 9.6.3 No fruit or fruit juice may be represented pictorially on the label except grapes or grape juice.
- 9.6.4 Where concentrated grape juice requires to be kept under conditions of refrigeration, there shall be information for keeping and, if necessary, thawing of the product.
- 9.6.5 The presence of sulphur dioxide shall be declared on the label if it exceeds 10 mg/kg.

#### 9.7 Degree of Concentration

Instructions for dilution shall be given on the container by stating the percentage of soluble grape solids, by weight, as determined by refractometer at 20°C, uncorrected for acidity, and read as °Brix on the International Sucrose Scales or in the case of prepackaged products, by stating the number of parts by volume of water which are required to be added to one part by volume of the concentrated juice to obtain juice which complies at least with the minimum requirements of the Standard for Vinifera Type Grape Juice Preserved Exclusively by Physical Means (see Appendix II to this Report).

#### 9.8 Bulk Packs

In the case of concentrated grape juice in bulk the information required in 9.1 to 9.7 shall either be placed on the container or be given in accompanying documents.

#### 10. METHODS OF ANALYSIS AND SAMPLING

(To be finalized later.)

Appendix V

# DRAFT STANDARD FOR CONCORD AND CONCORD TYPE CONCENTRATED GRAPE JUICE PRESERVED EXCLUSIVELY BY PHYSICAL MEANS 1/

(To be held at Step 6 of the Procedure;

#### 1. SCOPE

This standard applies only to the concentrate which is made from the Concord and Concord type grape juices and which has the essential flavour characteristics of Concord and Concord type grapes.

#### 2. <u>DESCRIPTION</u>

Concentrated grape juice is the unfermented but fermentable juice, preserved exclusively by physical means, obtained by the process of concentration (as defined in section 2.1)

1/ For the purpose of this standard and at this time preservation by physical means does not include ionizing radiation.

ALINORM 72/14 Appendix V from the raw materials as described in section 2.2. The product may be turbid or clear. The concentrated grape juice may be clarified with the aid of clarifying agents and filtration aids in accordance with section 5.

#### 2.1 Process Definition

The process of concentration consists of the physical removal of water until the product has a soluble grape solids content of not less than 30 percent by weight as determined by refractometer at 20°C uncorrected for acidity and read as °Brix on the International Sucrose Scales (exclusive of added sugar) and includes the addition of (I) juice or concentrate or water suitable for the purpose of maintaining the essential composition and quality factors of the concentrate and (2) the addition of natural volatile grape juice components where these have been previously removed.

2.2 The raw material from which this product is obtained is unfermented but fermentable grape juice obtained by a mechanical process from sound, ripe Concord or Concord type grapes.

#### 3. ESSENTIAL COMPOSITION AND QUALITY FACTORS

#### 3.1 Requirements for the juice after reconstitution

The product obtained by reconstituting the concentrated grape juice in accordance with section 9.7 of this standard shall comply with the provisions of the Standard for Concord and Concord Type Grape Juice Preserved Exclusively by Physical Means (see Appendix III to this Report).

#### 3.1.1 Sugars

The following sugars may be added: sucrose (white sugar), dextrose and dried glucose syrup as defined by the Codex Alimentarius Commission. The addition of fructose is also permitted. The total quantity of sugars added shall not exceed 75 g/kg. When the juice has been acidified the addition of sugars is not permitted.

#### 4. <u>FOOD ADDITIVES</u>

The following provisions in respect of food additives have been endorsed by the Codex Committee on Food Additives:

4.1 Acidifying Agents

Maximum level of use

Malic acid

limited by GMP limited by GMP

The use of these acids may only be permitted when the juice contains no added sugar.

#### 4.2 Antioxidants

L-ascorbic acid

limited by GMP

#### 5. PROCESSING AIDS

- 5.1 Clarifying and filtering agents as approved by the Codex Alimentarius Commission and used in accordance with good manufacturing practice.
- 5.2 Others
- 5.2.1 Pure vegetable carbon. 5.2.2 Pure nitrogen. 5.2.3 Pure carbon dioxide.

#### 6. CONTAMINANTS

When Concord or Concord type grape juice concentrate is reconstituted in accordance with section 9.7 of this standard, the limits of contaminants shall not exceed those laid down in section 6 of the Standard for Concord and Concord Type Grape Juice Preserved Exclusively by Physical Means (see Appendix III to this Report).

#### 7. HYGIENE

The following provisions in respect of the food hygiene of this product have been endorsed by the Codex Committee on Food Hygiene.

7.1 It is recommended that the products covered by the provisions of this standard be prepared in accordance with the Recommended International Code of Hygienic

Practice for Canned Fruit and Vegetable Products (Ref. No. CAC/ECP 2-1969) and the Recommended International Code of Hygienic Practice for Quick Frozen Fruits, Vegetables and their Juices (Ref. No. CAC/ECP ...).

- 7.2 When tested by appropriate methods of sampling and examination, the product
- (a) shall be free from micro-organisms capable of development under normal conditions of storage; and
- (b) shall not contain any substances originating from micro-organisms in amounts which may be toxic.
- 8. <u>WEIGHTS AND MEASURES</u>
- 8.1 Fill of Container
- 8.1.1 Minimum Fill (exclusive of bulk packs)

The concentrated grape juice shall occupy not less than 90% v/v of the water capacity of the container. The water capacity of the container is the volume of distilled water at 20°C which the sealed container will hold when completely filled.

9. <u>LABELLING</u> (Subject to endorsement by the Codex Committee on Food Labelling)

In addition to sections 1, 2, 4 and 6 of the Recommended International General Standard for the Labelling of Prepackaged Foods (Ref. No. CAC/RS 1-1969) the following specific provisions apply:

#### 9.1 The Name of the Food

The name of the product shall be "concentrated Concord grape juice" or "concentrated Concord type grape juice". For prepackaged products an indication of the degree of concentration, e.g. the number of parts by volume of water which have to be added to one part by volume of the concentrate to obtain single strength juice which complies with section 9.7 of this standard, shall plainly and conspicuously appear in close proximity to the name of the product.

9.1.1 If an added sugar is present in a quantity not exceeding 25 g/kg in the juice obtained by reconstituting the concentrate in accordance with section 9.7 of this standard, the words "X added" shall plainly and conspicuously accompany the name "concentrated Concord grape juice" or "concentrated Concord type grape juice", where "X" is the name of the sugar added. Where added sugar is present in quantities over 25 g/kg in juice obtained by reconstituting the concentrate in accordance with section 9.7 of this standard, the name of the product shall be

"sweetened concentrated Concord grape juice" or "sweetened concentrated Concord type grape juice".

#### 9.2 List of Ingredients

- 9.2.1 A complete list of ingredients shall be declared on the label in descending order of proportion, except that the components mentioned in 2.1 need not be declared.
- 9.2.2 The addition of L-ascorbic acid shall be declared in the list of ingredients as:
- (a) "L-ascorbic acid as antioxidant" or
- (b) "antioxidant"

#### 9.3 Net Contents

The net contents shall be declared by volume in either the metric ("Système International") U.S. or British units as required by the country in which the product is sold.

#### 9.4 Name and Address

The name and address of the manufacturer, packer, distributor, importer, exporter or vendor of the product shall be declared.

#### 9.5 country of Origin

The country of origin of the product shall be declared.

9.5.1 When the product undergoes processing in a second country which changes its nature, the country in which the processing is performed shall be considered to be the country of origin for the purpose of labelling.

#### 9.6 Additional Requirements

The following additional specific provisions shall apply:

- 9.6.1 No claims shall be made in respect of "Vitamin C" nor shall the term "Vitamin C" appear on the label unless the product contains such quantity of "Vitamin C" as would be accepted by national authorities as warranting such claim or the use of such term.
- 9.6.2 The term "carbonated" or an equivalent term in other languages shall be declared on the label if the grape juice contains more than 2 g/kg of carbon dioxide.
- 9.6.3 No fruit or fruit juice may be represented pictorially on the label except Concord grapes or Concord grape juice.
- 9.6.4 where concentrated grape juice requires to be kept under conditions of refrigeration, there shall be information for keeping and, if necessary, thawing of the product.

#### 9.7 <u>Degree of Concentration</u>

Instructions for dilution shall be given on the container by stating the percentage of soluble grape solids (exclusive of added sugar), by weight as determined by refractometer at 20°C uncorrected for acidity and read as Brix on the International Sucrose Scales or in the case of prepackaged products, by stating the number of parts by volume of water which are required to be added to one part by volume of the concentrated juice in order to obtain juice which complies

at least with the minimum requirements of the Standard for Concord and Concord Type Grape Juice Preserved Exclusively by Physical Means (see Appendix III to this Report).

#### 9.8 Bulk Packs

In the case of concentrated grape juice in bulk the information required in 9.1 to 9.7 shall either be placed on the container or be given in accompanying documents.

10. METHODS OF ANALYSIS AND SAMPLING (To be finalized later.)

Appendix VI

# DRAFT STANDARD FOR CONCENTRATED APPLE JUICE PRESERVED EXCLUSIVELY BY PHYSICAL MEANS 1/ (Advanced to Step 8 of the Procedure)

#### 1. DESCRIPTION

Concentrated apple juice is the unfermented but fermentable juice preserved exclusively by physical means, obtained by the process of concentration (as defined in section 1.1) from the raw materials as described in section 1.2. It may be turbid or clear. The concentrated apple juice may be clarified with the aid of clarifying agents and filtration aids in accordance with section 5.

#### 1.1 Process Definitions

The process of concentration consists of the physical removal of water until the product has a soluble apple solids content of not less than 20% by weight as determined by refractometer at 20 C uncorrected for acidity and read as "Brix on the International Sucrose Scales and includes (I) the addition of juice or concentrate or of water suitable for the purpose of maintaining the essential composition and quality factors of the concentrate and (2) the addition of natural volatile apple juice components where these have been previously removed.

- 1/ For the purpose of this standard and at this time preservation by physical means does not include ionizing radiation.
- 1.2 The raw material from which this product is obtained is unfermented but fermentable apple juice obtained by a mechanical process from sound, ripe apples (<u>Pyrus malus</u> L.).

#### 2. ESSENTIAL COMPOSITION AND QUALITY FACTORS

#### 2.1 Requirements for the juice after reconstitution

The product obtained by reconstituting the concentrated apple juice in accordance with section 8.7 of this standard shall comply with all the provisions of the Recommended International Standard for Apple Juice Preserved Exclusively by Physical Means (Ref. No. CAC/RS 48-1971).

#### 2.2 Use of Carbon Dioxide

The concentrated apple juice may be "carbonated".

#### 3. FOOD ADDITIVES

The following provisions in respect of food additives have been endorsed by the Codex Committee on Food Additives except as otherwise indicated:

3.1 Antioxidants L-ascorbic acid

Maximum level of use limited by GMP

#### 4. PROCESSING AIDS

- 4.1 Clarifying and filtering agents as approved by the Codex Alimentarius Commission and used in accordance with good manufacturing practices.
- 4.2 Others
- 4.2.1 Pure vegetable carbon.
- 4.2.2 Pure nitrogen.
- 4.2.3 Pure carbon dioxide.

#### 5. CONTAMINANTS

When apple juice concentrate is reconstituted in accordance with section 8.7 of this standard, the limits of contaminants shall not exceed those laid down in section 4 of the Standard for Apple Juice Preserved Exclusively by Physical Means (Ref. No. CAC/RS 48-1971).

#### 6. HYGIENE

The following provisions in respect of the food hygiene of this product have been endorsed by the Codex Committee on Food Hygiene:

- 6.1 It is recommended that the products covered by the provisions of this standard be prepared in accordance with the Recommended International Code of Hygienic Practice for Canned Fruit and Vegetable Products (Ref. No. CAC/RCP 2-1969) and the Recommended International Code of Hygienic Practice for Quick Frozen Fruits, Vegetables and their Juices (Ref. No. CAC/RCP ...).
- 6.2 When tested by appropriate methods of sampling and examination, the product:
- (a) shall be free from micro-organisms capable of development under normal conditions of storage; and '
- (b) shall not contain any substance originating from micro-organisms in amounts which may be toxic.
- 7. WEIGHTS AND MEASURES
- 7.1 Fill of Container
- 7.1.1 Minimum Fill (exclusive of bulk packs)

The concentrated apple juice shall occupy not less than 90% v/v of the water capacity of the container. The water capacity of the container is the volume of distilled

water at 20°C which the sealed container will hold when completely filled.

8. <u>LABELLING</u> (Subject to endorsement by the Codex Committee on Food Labelling)

In addition to sections 1, 2, 4 and 6 of the Recommended International General Standard for the Labelling of Prepackaged Foods (Ref. No. CAC/RS 1-1969) the following specific provisions apply:

#### 8.1 The Name of the Food

The name of the product shall be "concentrated apple juice". For prepackaged products an indication of the degree of concentration, e.g. the number of parts by volume of water which have to be added to one part by volume of the concentrate to obtain at least the minimum

requirements of single strength juice as defined in section 8.7 of this standard, shall plainly and conspicuously appear in close proximity to the name of the product.

#### 8.2 List of Ingredients

- 8.2.1 A complete list of ingredients shall be declared on the label in descending order of proportion except that the components mentioned in 1.1 need not be declared.
- 8.2.2 The addition of L-ascorbic acid shall be declared in the list of ingredients as:
- (a) "L-ascorbic acid as antioxidant" or
- (b) "antioxidant"

#### 8.3 Net Contents

The net contents shall be declared by volume in either the metric ("Système International") U.S. or British units as required by the country in which the product is sold.

#### 8.4 Name and Address

The name and address of the manufacturer, packer, distributor, importer, exporter or vendor of the product shall be declared.

#### 8.5 Country of Origin

- 8.5.1 The country of origin of the product shall be declared.
- 8.5.2 When the product undergoes processing in a second country which changes its nature, the country in which the processing is performed shall be considered to be the country of origin for the purpose of labelling.

#### 8.6 <u>Additional Requirements</u>

The following additional specific provisions shall apply:

- 8.6.1 No claims shall be made in respect of "Vitamin C" nor shall the term "Vitamin C" appear on the label unless the product contains such quantity of "Vitamin C" as would be accepted by national authorities as warranting such claim or the use of such term.
- 8.6.2 The term "carbonated" or an equivalent term in other languages shall be declared on the label if the apple juice contains more than 2 g/kg of carbon dioxide.
- 8.6.3 No fruit or fruit juice may be represented pictorially on the label except apples or apple juice.
- 8.6.4 Where concentrated apple juice requires to be kept under conditions of refrigeration, there shall be information for keeping and, if necessary, thawing of the product.

#### 8.7 <u>Degree of Concentration</u>

Instructions for dilution shall be given on the container by stating the percentage of soluble apple solids, by weight as determined by refractometer at 20 C, uncorrected for acidity, and read as <sup>0</sup> Brix on the International Sucrose Scales or in the case of pre-packaged products, by stating the number of parts by volume of water which are required to be added to one part by volume of the concentrated juice in order to obtain juice which complies at least with the minimum requirements of the Recommended International Standard for Apple Juice (Ref. No. CAC/RS 48-1971).

#### 8.8 Bulk Packs

In the case of concentrated apple juice in bulk the information required in 8.1 to 8.7 shall either be placed on the container or be given in accompanying documents.

9. <u>METHODS OF ANALYSIS AMD SAMPLING</u> (To be finalized later.)

Appendix VII

# DRAFT STANDARD FOR CONCENTRATED ORANGE JUICE PRESERVED EXCLUSIVELY BY PHYSICAL MEANS 1/ Advanced to Step 8 of the Procedure)

#### DESCRIPTION

Concentrated orange juice is the unfermented but fermentable juice, preserved exclusively by physical means, obtained by the process of concentration (as defined in section 1.1) from the raw materials as described in section 1.2.

#### 1.1 Process Definitions

The process of concentration consists of the physical removal of water until the product has a soluble orange solids content of not less than 20% by weight as determined by refractometer at 20°C uncorrected for acidity and read as °Brix on the International Sucrose Scales (exclusive of added sugars) and includes (1) the addition of juice or concentrate or of water suitable for the purpose of maintaining the essential composition and quality factors of the concentrate and (2) the addition of natural volatile orange juice components where these have been previously removed.

1.2 The raw material from which this product is obtained is unfermented but fermentable orange juice obtained by a mechanical process from sound, ripe oranges (<u>Citrus sinensis</u> (L.) Osbeck).

#### 2. <u>ESSENTIAL COMPOSITION AND QUALITY FACTORS</u>

- 2.1 The product obtained by reconstituting the concentrated orange juice in accordance with section 6.7 of this standard shall comply with all the provisions of the Recommended International Standard for Orange Juice Preserved Exclusively by Physical Means (Ref. No. CAC/RS 45-1971), except that the soluble orange solids shall be not less than 11 percent m/m (exclusive of added sugars) as determined in section 1.1
- 2.2 The following sugars may be added for adjustment or for sweetening purpose only: sucrose (white sugar), dextrose and dried glucose syrup as defined by the Codex Alimentarius Commission. The addition of fructose is also permitted. The total quantity of added sugars shall not exceed 50 g/kg in the product obtained by reconstituting the concentrated orange juice to 11 Brix (exclusive of added sugars) as determined in section 1.1 and in accordance with section 6.7 of this standard.
- 2.3 The juice or concentrate of citrus reticulata may be added in such quantity that the weight of soluble solids of citrus reticulata contributed by such addition does not exceed 10% of the weight of total soluble solids in the finished concentrate.

#### 3. CONTAMINANTS

When orange juice concentrate is reconstituted in accordance with section 6.7 of this standard, the limits of contaminants shall not exceed those laid down in section 3 of the Recommended

International Standard for Orange Juice Preserved Exclusively by Physical Means (Ref. No. CAC/RS 45-1971).

#### 4. HYGIENE

The following provisions in respect of the food hygiene of this product have been endorsed by the Codex Committee on Food Hygiene.

- 4.1 It is recommended that the products covered by the provisions of this standard be prepared in accordance with the Recommended International Code of Hygienic Practice for Canned Fruit and Vegetable Products (Ref. No. CAC/RCP 2-1969) and the Recommended International Code of Hygienic Practice for Quick Frozen Fruits, Vegetables and their Juices (Ref. No. CAC/RCP ...)
- 4.2 When tested by appropriate methods of sampling and examination, the product:
- (a) shall be free from micro-organisms capable of development under normal conditions of storage; and
- (b) shall not maintain any substances originating from micro-organisms in amounts which may be toxic.
- 1/ For the purpose of this standard and at this time preservation by physical means does not include ionizing radiation.
- 5. WEIGHTS AND MEASURES
- 5.1 Fill of Container
- 5.1.1 Minimum Fill (exclusive of bulk packs)

The concentrated orange juice shall occupy not less than 90% v/v of the water capacity of the container. The water capacity of the container is the volume of distilled water at 20°C which the sealed container will hold when completely filled.

LABELLING (Subject to endorsement by the Codex Committee on Food Labelling)

In addition to sections 1, 2, 4 and 6 of the Recommended International General Standard for the Labelling of Prepackaged Foods (Ref. No. CAC/RS 1-1969) the following specific provisions apply:

#### 6.1 The Name of the Food

6.1.1 The name of the product shall be "concentrated orange juice". If a sugar is added in a quantity greater than 15 g/kg in the product obtained by reconstituting the concentrated orange juice in accordance with section 6.7 of this standard, the words "X added" shall plainly and conspicuously accompany the name "concentrated orange juice" where X is the name of the sugar added. If the ratio of the total soluble solids, as determined in section 1.1, to the total titratable acid expressed as anhydrous citric acid is more than 15 to 1, the word "sweetened" may be used in lieu of the statement "X added".

#### 6.2 List of Ingredients

A complete list of ingredients shall be declared on the label in descending order of proportion except that the components mentioned in 1.1 need not be declared.

#### 6.3 Net Contents

The net contents shall be declared by volume in either the metric ("Système International"), U.S. or British units as required by the country in which the product is sold.

#### 6.4 Name and Address

The name and address of the manufacturer, packer, distributor, importer, exporter or vendor of the product shall be declared.

#### 6.5 Country of Origin

- 6.5.1 The country of origin of the product shall be declared.
- 6.5.2 When the product undergoes processing in a second country which changes its nature, the country in which the processing is performed shall be considered to be the country of origin for the purposes of labelling.

#### 6.6 Additional Requirements

The following additional specific provisions shall apply:

- 6.6.1 No fruit or fruit juice may be represented pictorially on the label except oranges or orange juice.
- 6.6.2 where concentrated orange juice requires to be kept under conditions of refrigeration, there shall be information for keeping and, if necessary thawing of the product.

#### 6.7 <u>Degree of Concentration</u>

Instructions for dilution shall be given on the container by stating the percentage of soluble orange solids (exclusive of added sugar), by weight as determined by refractometer at 20°C, uncorrected for acidity, and read as °Brix on the International Sucrose Scales or in the case of prepackaged products by stating the number of parts by volume of water which are required to be added to one part by volume of the concentrated juice in order to obtain juice which complies which all the provisions of the Recommended International Standard for Orange Juice Preserved Exclusively by Physical Means (Ref.No. CAC/RS 45-1971), except that the soluble solids shall be not less than 11 percent m/m (exclusive of added sugars) as determined in section 1.1.

#### 6.8 Bulk Packs

In the case of concentrated orange juice in bulk the information required in sections 6.1 to 6.7 shall be either placed on the container or given in accompanying documents.

7. METHODS OF ANALYSIS AND SAMPLING (To be finalized later.)

PROPOSED DRAFT STANDARD FOR PINEAPPLE JUICE PRESERVED EXCLUSIVELY BY PHYSICAL MEANS 1/ (Held at Step A)

#### 1. <u>DESCRIPTION</u>

Unfermented but fermentable juice, intended for direct consumption, obtained by a mechanical process from the flesh or parts thereof, with or without core material of sound, ripe pineapple (<u>Ananas comosus</u>) preserved exclusively by physical means. The juice may have been concentrated and later reconstituted with water suitable for the purpose of maintaining the essential composition and quality factors of the juice.

#### 2. ESSENTIAL COMPOSITION AND QUALITY FACTORS

#### 2.1 Soluble Solids

The soluble pineapple solids content of pineapple juice shall be not less than 10.5% by weight as determined by refractometer at 20°C, uncorrected for acidity and read as °Brix on the International Sucrose Scales.

#### [2.2 Insoluble Solids

The insoluble solids content shall be between 5% and 30% by volume as determined in section 8 (see attachment).]

#### [2.3 Acidity

The acidity shall be not more than 13.5 g/kg juice (expressed as anhydrous citric acid).

#### 2.4 Ethanol Content

The ethanol content shall not exceed 3 g/kg.

#### 2.5 Organoleptic Properties

The product shall have the characteristic colour, aroma and flavour of pineapple juice. Natural volatile pineapple juice components may be restored to any pineapple juice from which natural pineapple juice components have been removed.

#### 2.6 <u>Use of Concentrates</u>

The addition of concentrate to juice is permitted. Only concentrate from <u>Ananas comosus</u> may be used.

#### 3. FOOD ADDITIVE $\frac{2}{3}$

The following provision in respect of food additives is subject to endorsement by the Codex Committee on Food Additives:

# [3.1 Antifoaming Agent Maximum level of use dimethyl polysiloxane 10 mg/kg\_/

#### 4. CONTAMINANTS

The following provisions in respect of contaminants are subject to endorsement by the Codex Committee on Food Additives:

[4.1 <u>Co</u>	<u>ntaminant</u>	Maximum level
Arsenic (	(As)	0.2 mg/kg
Lead	(Pb)	0.3 mg/kg
Copper	(Cu)	5 mg/kg
Zinc	(Zn)	5 mg/kg
Iron	(Fe)	15 mg/kg
Tin	(Sn)	250 mg/kg (provisional limit) 3/

For the purpose of this standard and at this time preservation by physical means does not include ionizing radiation. [] = tentative proposals only.

- Governments are particularly requested to comment on whether a provision for the addition of citric and malic acids, to be used as acidifying agents, should be included in this section.
- The provisional limit of 250 mg/kg for tin is currently under review and will be re-examined in two years time.

### 4.2 Total metal content precipitable by potassium hexacyanoferrate (II)

Maximum level

[20]mg/kg expressed as Fe

#### 5 HYGIENE

The following provisions in respect of the food hygiene of this product have been endorsed by the Codex Committee on Food Hygiene:

- 5.1 It is recommended that the products covered by the provisions of this standard be prepared in accordance with the Recommended International Code of Hygienic Practice for Canned Fruit and Vegetable Products (Ref. No. CAC/RCP 2-1969) and the Recommended International Code of Hygienic Practice for Quick Frozen Fruits, Vegetables and their Juices (Ref. No. CAC/RCP ...).
- 5.2 When tested by appropriate methods of sampling and examination, the product:
- (a) shall be free from micro-organisms capable of development under normal conditions of storage; and
- (b) shall not contain any substance originating from micro-organisms in amounts which may be toxic.
- 6. <u>WEIGHTS AND MEASURES</u> 6.1 <u>Fill of Container</u>

#### 6.1.1 Minimum Fill

The pineapple juice shall occupy not less than 90% v/v of the water capacity of the container. The water capacity of the container is the volume of distilled water at 20°c which the sealed container will hold when completely filled.

7. LABELLING (Subject to endorsement by the Codex Committee on Food Labelling)

In addition to sections 1, 2, 4 and 6 of the Recommended International General Standard for the Labelling of Prepackaged Foods (Ref. No. CAC/RS 1-1969) the following specific provisions apply:

#### 7.1 The Name of the Food

The name of the product shall be "pineapple juice".

#### 7.2 <u>List of Ingredients</u>

- 7.2.1 A complete list of ingredients shall be declared on the label in descending order of proportion, except that added water need not be declared.
- 7.2.2 In the case of pineapple juice made from concentrate, the fact of reconstitution shall be declared in the list of ingredients as follows: "pineapple juice made from concentrate" or "reconstituted pineapple juice" or "pineapple juice made from concentrated pineapple juice".

#### 7.3 Net Contents

The net contents shall be declared by volume in one or more of the following systems of measurement: Metric ("Système International"), U.S. or British units, as required by the country in which the product is sold.

#### 7.4 Name and Address

The name and address of the manufacturer, packer, distributor, importer, exporter or vendor of the product shall be declared.

#### 7.5 Country of Origin

- 7.5.1 The country of origin of the product shall be declared.
- 7.5.2 When the product undergoes processing in a second country which changes its nature, the country in which the processing is performed shall be considered to be the country of origin for the purposes of labelling.

#### 7.6 <u>Additional Requirements</u>

The following additional specific provisions shall apply:

- 7.6.1 No fruit or fruit juice may be represented pictorially on the label except pineapple or pineapple juice.
- 7.6.2 Where pineapple juice requires to be kept under conditions of refrigeration, there shall be information for keeping and, if necessary, thawing of the product.

#### 7.7 Bulk Packs

In the case of pineapple juice in bulk, the information required in sections 7 to 7.6.2 shall either be placed on the container or be given in accompanying documents.

#### 8. METHODS OF ANALYSIS AND SAMPLING

(To be finalized later.)

# METHOD TO DETERMINE THE QUANTITY OF "INSOLUBLE SOLIDS" IN CANNED PINEAPPLE JUICE

(Proposed by the U.S.A.)

Measure 50 milliliters of thoroughly stirred pineapple juice into a cone-shaped graduated tube of the long-cone type, measured approximately 4-3/16 inches from tip to top calibration and having a capacity of 50 milliliters. Place the tube in a suitable centrifuge the approximate speed of which is related to diameter of swing in accordance with the table immediately below. The word "diameter" means the over-all distance between the tips of opposing centrifuge tubes in operating position.

Diameter (inches)	Approximate revolutions	
	per minute	
10	1,609	
10½	1,570	
11	1.534	
11½	1,500	
12	1,468	
12½	1,438	

13	1,410
13½	1,384
14	1,359
14½	1,336
15	1,313
15½	1,292
16	1,271
16½	1,252
17	1,234
17½	1,216
18	1,199
18½	1,182
19	1,167
19½	1,152
20	1,137

The millilitre reading at the top of the layer of "insoluble solids", after centrifuging 3 minutes, is multiplied by two to obtain the percentage of "insoluble solids".