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(21) International Application Number: PCT/FI95/00021 (22) International Filing Date: 19 January 1995 (19.01.95) (30) Priority Data: 940254 19 January 1994 (19.01.94) FI (71)(72) Applicant and Inventor: RAHKONEN, Reijo, Toivo, Tapio [FI/FI]; Laaksokuja 5 C 26, FIN-02400 Kirkkonummi (FI). (74) Agent: PAULI, S., Laitinen; Patentti-Laitinen Oy, P.O. Box 24, FIN-02341 Espoo (FI).	(81) Designated States: AM, AT, AU, BB, BG, BR, BY, CA, CH, CN, CZ, DE, DK, EE, ES, FI, GB, GE, HU, JP, KE, KG, KP, KR, KZ, LK, LR, LT, LU, LV, MD, MG, MN, MW, MX, NL, NO, NZ, PL, PT, RO, RU, SD, SE, SI, SK, TJ, TT, UA, US, UZ, VN, European patent (AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG), ARIPO patent (KE, MW, SD, SZ). Published <i>With international search report.</i> <i>In English translation (filed in Finnish).</i>	
(54) Title: FLAVORING MATERIAL AND METHOD (57) Abstract <p>The invention concerns a flavoring material and method. A flavoring extract is absorbed into carrier material and the latter is then put in close contact with the product which is intended to be flavored.</p>		

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Flavoring material and method

This invention concerns flavoring material and a flavoring method. More precisely said, the object of the invention is such a flavoring material that is very multi-faceted in use and which provides a convenient and economical opportunity to flavor food.

Including preservative substances in packaging materials is a familiar concept. Indeed, such known solutions are presented in the European Patent Publication 180468, for example, in which the preservative substance known as hinokitiol is enclosed in packaging material in a solid form.

A similar particular case is known from the publication Chemical Abstracts vol. 107 (1987) 6045t, in which cyklodextrin complexes are used to flavor either tea bags or the filter paper used in the construction of the bags. The substance mentioned then flavors tea or other foods.

The German Publication 3109336 can also be mentioned as a known solution, in which a pipe-like, cellulose-based packaging material, with certain added chloride salts, is presented. The material is used in the packaging of sausages.

Even more flavoring methods, suitable for the preparation of certain drinks, are known: like those found in the EP-Publication 1 460 and US patent 4 975 292, in which coffee is flavored; and that of US Patent 2 983 616, in which the flavoring agent is absorbed into the inner layer of a drinking straw, from where it dilutes into the drink to be drunk.

The purpose of this invention is to widen the scope of application to which the items mentioned above refer, and make the flavoring of expressly meat, fish and other similar solid food substances truly easy and multi-faceted.

The invention's above mentioned, as well as other advantages and

benefits can be achieved by means presented characteristically in the attached patent claims.

The invention is explained in more detail in the following.

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The invention is based on the perception that certain materials have the capacity to absorb flavoring agents as extracts in such a way that the flavoring agents are later released from the material for the desired use. In practice, this is arranged so that a suitably porous material is
10 impregnated with an appropriate flavor extract, after which the desired piece or part of the material impregnated in this fashion is placed as desired in an aroma-proof package for later use. The actual flavoring of the meat, fish or the like shall be carried out by ensuring the close contact of the carrying material with the food substance, at which time
15 the extract flavors the food substance.

There are a variety of materials which can be used as carriers for flavoring. Different kinds of cellulose-based, porous materials are particularly suitable as carriers. They have another advantage in that
20 they have been tested over a long period in food product use, for which reason there is no fear that any adverse effects would result from their use.

On the other hand, there are a variety of plastic materials today which
25 would be also quite suitable for the purpose presented here. Plastics, which have been approved for use with food products after strict testing, can be foamed with methods already known in themselves, be made porous in a suitable way, or otherwise treated in such a way that they are capable of absorbing the appropriate amount of flavoring agent
30 as extract, and from which the liquid part can be eliminated afterwards with a simple operation.

Naturally, it is also possible (in some circumstances, it would indeed be recommended) to use a combination of two materials. One would
35 absorb the flavoring agent and the other would function to lock in

moisture and aroma, preventing the moisture or liquid from escaping from the food substance to be flavored, for example. Something like this can be represented in a double-layered construction, in which tight plastic wrap and porous cellulose-based material are combined as a
5 double-layered construction, in which the flavoring agents are in the porous part. Meat, for example, could be packaged for flavoring purposes in this kind of sheet-like material.

Yet another carrier utilized as a specific, quite extensive group can be
10 mentioned: the so-called fiber fabrics, which have been widely described in many publications, like the TEKES publication number 36/93, for example. Fiber fabrics are manufactured from virtually any kind of material which can be made into a fiber, making both cellulose-based and plastic-based materials suitable for the purpose. The fibers of
15 the fiber fabric are connected by mechanical or chemical means.

In relation to fiber fabric, it must still be mentioned that a great deal of tests concerning them have also been performed determining suitable materials for food product use, and also that it is standard technique to
20 make their composition water-tight.

All in all, is clear, however, that materials are not limited in any way whatsoever to those presented above.

25 Impregnating the carrying materials with the flavor can take place, for example, in such a way that the flavor is made into a suitable extract, with a method known in itself. The extract, particularly when in its liquid form, is diluted in water, alcohol or other suitable liquids. The liquid is added to the absorbent carrying material mentioned above to
30 such an extent that the appropriate proportion is reached, after which the carrier is possibly dried. The drying is not necessarily needed if the product shall be used for certain purposes, as was mentioned above.

One could, of course, also mention those numerous flavoring and aroma
35 agents which are already ready in liquid form of themselves, or are in

such a form that they can be used directly in the impregnation of the carrier without additional measures beyond, perhaps, dilution.

Dependent on the flavoring, the carrier in which the flavors are
5 impregnated can be possibly preserved in either rolls, in a board-type form, for example; or packed in plastic bags, for example, in suitable pieces; or even closed in an aroma-proof package from which the flavor aromas cannot evaporate. Particularly in those cases in which the
10 flavoring material is intended to be preserved wet or damp (in any case, not dry), the latter packaging method is very suitable. The package shall be made in such a way that it is easy to open. Numerous methods of these kind are known in the packaging industry.

According to the invention then, the food product or other product to be
15 flavored is wrapped in sheet-like or board-like material that has been impregnated with the flavor extract. The moisture of the product to be wrapped releases the flavoring agents from the carrier, at which time the product is flavored. By appropriately choosing the flavoring time, it is consistently possible to achieve the desired final result. If the carrier
20 material impregnated with the flavoring extract is itself moist, the product to be flavored need not be moist as such, for flavoring to take place. Different meat and fish products, for example, are suitable for flavoring.

25 On the other hand, it is also possible to use the material of this invention, for example, material impregnated with garlic extract, in such a way that the sides of a salad bowl, for example, are rubbed with the material before making a salad. This would give the salad an appropriate aroma.

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The amount of flavors which are suitable for use are as many as the amount of flavors in general. Take as examples the various herb flavors used to flavor meat and fish.

Claims

1. Flavoring material to be used for food substance flavoring with a
absorbent carrying material in which a suitable flavor or flavor
5 combination has been absorbed, **characterized** in that the flavor is
absorbed into the carrier as an extract and that, as such, the purpose is
to flavor meat, fish or a similar solid food substance.
2. Material according to claim 1, **characterized** in that the carrier
10 material which has absorbed the extract is dried after the absorption.
3. Material according to claim 1, **characterized** in that the carrier
material is composed of either cellulose-based or plastic-based material.
- 15 4. Material according to claim 1, **characterized** in that the carrier
material is composed of fiber fabric type material.
5. Material according to claim 1, **characterized** in that it is composed
of a combination of carrier material and moisture tight layers.
20
6. Material according to any of the foregoing claims, **characterized** in
that the carrier material into which the substance has been absorbed is
closed in an aroma-proof package.
- 25 7. Flavoring method for the flavoring of meat, fish and the like,
characterized in that an extract is produced from the flavor or flavor
combination, the extract is absorbed into the carrier material, and,
when necessary, the material is dried, and ensure that the material
containing the flavoring extract is in close contact with the product to
30 be flavored for such a period of time that the desired amount of
flavoring is then transferred to the product to be flavored.
8. Method according to claim 7, **characterized** in that the material is
used for the wiping of salad bowls or the like, in order to give flavor to
35 the salad.

INTERNATIONAL SEARCH REPORT

International application No.
PCT/FI 95/00021

A. CLASSIFICATION OF SUBJECT MATTER		
IPC6: A23L 1/22 According to International Patent Classification (IPC) or to both national classification and IPC		
B. FIELDS SEARCHED		
Minimum documentation searched (classification system followed by classification symbols)		
IPC6: A23L, A23F		
Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched		
SE,DK,FI,NO classes as above		
Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)		
WPAT, USPM		
C. DOCUMENTS CONSIDERED TO BE RELEVANT		
Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	EP, A1, 0001460 (THE PROCTER & GAMBLE COMPANY), 18 April 1979 (18.04.79), claims 1-10 --	1-8
X	US, A, 4104408 (H. S-G. CHIU), 1 August 1978 (01.08.78), claims 11-12 --	1-8
A	US, A, 4299851 (H. E. LOWE), 10 November 1981 (10.11.81), abstract --	1-8
A	US, A, 3689291 (A. DRAPER), 5 Sept 1972 (05.09.72), column 2, line 37 - line 42, claims 1-3 --	1-8
<input checked="" type="checkbox"/> Further documents are listed in the continuation of Box C. <input checked="" type="checkbox"/> See patent family annex.		
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Date of the actual completion of the international search		Date of mailing of the international search report
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C (Continuation). DOCUMENTS CONSIDERED TO BE RELEVANT		
Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	DE, A1, 2160550 (W. EFFENBERGER), 14 June 1973 (14.06.73), claims 1-3 ----- -----	1-8

INTERNATIONAL SEARCH REPORT

Information on patent family members

25/02/95

International application No.

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