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(54) Band-like package

(57) The present invention concerns a band-like package, in cardboard, planiform, the mounting of which is performed by means of predefined folding lines. It is

characterised in that it may be formed by only two side walls 8, one bottom 7 and one upper part or lid formed by two parts 18 and 19 and a central strip 20 which may be torn off through punched lines 22 and 23.

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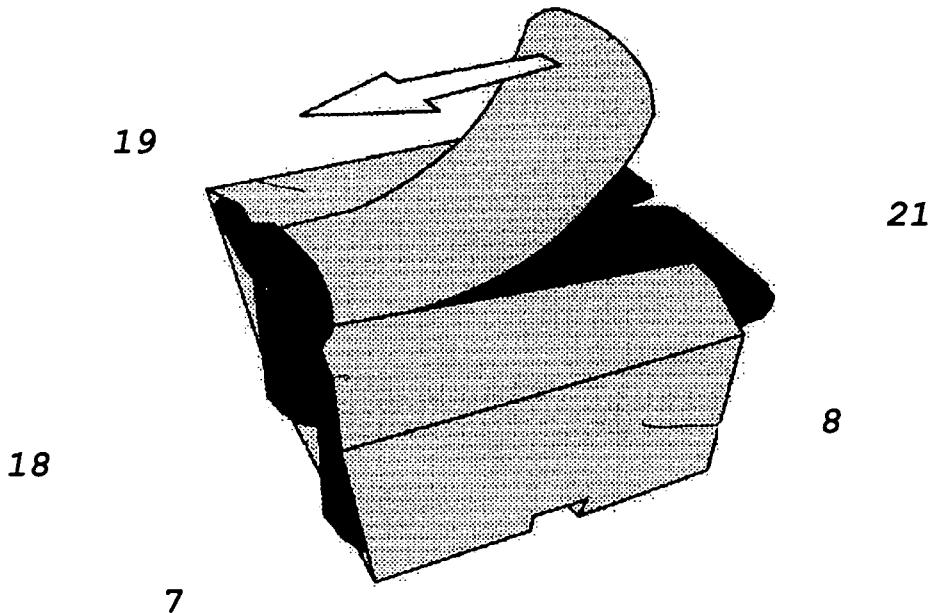


Fig. 2

Description**Scope of the invention**

[0001] The present invention concerns a band-like package, in cardboard, essentially designed for the food industry, more particularly for refrigerated milk products as, for instance, yogurts, and which is appropriate for use in sales points, such as those normally present in supermarket shelves. It is essentially characterised in that it does not fully wrap the products to be packed and in that it is provided with opening means by tearing off a strip provided in the centre of the package's upper portion.

Prior art

[0002] A number of packages for food products or else, among which should be mentioned those that are the object of patents EP 0997380 and EP 0780311, are well known.

[0003] Patent EP 0997380 concerns one box with four side walls. Two of these respective walls are provided with first closing flaps and the other two respective walls are provided with second closing flaps. The second flaps, which edges are to be joined, cover the first flaps and, over the joints, are to be applied some adhesive bands, which may be stripped off, in order to secure the package closure. The side walls including the first flaps are provided with some punched lines. These flaps do also display opening means formed by a cutting line.

[0004] Patent EP 0780311 concerns a container, particularly a box in corrugated cardboard proper to house packs of commercial items, having rigid walls provided with an enclosing portion that are kept closed by means of sticking tape applied to the container. At least one wall of the container is provided with a cutting bore or a tab that may be removed and which is defined by cutting lines and/or weakened lines on the wall, the said bore or the said tab being provided under a portion of the sticking tape edge.

[0005] None of the previously mentioned documents display the characteristics of the package defined in claim 1.

[0006] The band-like package that is the object of the invention presents at least two advantages when compared with the currently known packages in the field of the industry in question. Such advantages are the following:

- It has an innovative lid, easy to open by tearing it off.
- Its design employs a lower amount of cardboard, which allows for the interconnection of the card packages on the printing/production sheet. This characteristic affords less card waste and a greater number of card packages per card sheet during production. Therefore, the manufacture of this card package is cheaper than the packages produced according to the standards of the package production industry.

Brief description of the drawings

[0007] In the attached drawings, which should not be construed as having a limiting character, the following is depicted:

- Figure 1 displays a planiform package of one embodiment of the invention;
- Figure 2 displays the package of Figure 1 duly mounted and showing the strip being torn off;
- Figure 3 displays one package of a second embodiment, duly mounted and showing the strip being torn off; and
- Figure 4 displays a series of planiform packages.

Detailed description of the invention

[0008] As it may be observed in the figures, the package that is the object of the invention 1, 2, is planiform displayed with parts 3, 4 and 5, 6 forming, respectively, the bottom 7 of the package 1 and the side walls 8. Each

25 of these parts is separated from the remaining ones by means of folding lines, respectively 9, 10, 11 and 12, formerly grooved during the manufacturing process of the said packages. Part 5 is further provided with a small flap 13, which is fixed to the flap on the opposite side 3

30 by means of glue or any other suitable process to form the bottom 7 of package 1. Between parts 3 and 4 and 5 and 6, substantially trapezoidal small tabs 14 and 15 are made during manufacture, with previously grooved folding lines 16 and 17, which, when pressed inwards, 35 shall allow them to assume an extending position towards the inside of the package, as it may be observed in figures 3 and 4.

[0009] Package 1, which is the object of this invention, is further formed by parts 18, 19 and 20 which compose 40 the package upper part and may be called lid because access to the packed products 21 is provided thereby. Part 20, which forms a strip along the length of package 1, is attached to parts 18 and 19 by means of punched lines 22 and 23, which punches facilitate the tearing off 45 of part, or strip, 20.

[0010] As it is obvious, the mounting of the package is made by means of folding lines 9, 10, 11 and 12 and by gluing flap 13 to the opposite part 3. It is preferred that the products to be packed, more particularly yogurts, are 50 previously positioned before the package is duly mounted. As soon as the package is mounted, folding lines 16 and 17 are pressed so that the trapezoidal tabs assume an extending position towards the inside of the package in order to serve as a brake to prevent the yogurts from 55 sliding.

[0011] This kind of package is supplied planiform, the mounting of which being performed later on by the food products distributor after such products are placed in suit-

able position.

[0012] In order to provide full access to the package insides and enable the withdrawal of the yogurts, removal of strip 20 is performed, as already mentioned, by tearing it off. Therefor, it shall be enough to engage the end portion of strip 20 and raise it. Punched lines 22 and 23 shall give in and, as if they were a zip, they shall successively separate from parts 18 and 19 which compose the package lid.

[0013] The geometrical characteristics of this package, namely the curved edges of strip 20, shall make it easy for the user, when tearing off the said strip, to easily engage the strip's edge and, thereafter, proceed to the removal thereof. The remaining geometrical characteristics condition a parallelepiped form of the package after it is mounted.

[0014] As the experts in the art will find obvious, there is no limit regarding the package's dimensions. It may be redesigned to contain a set of 4 yogurt cups, a set of 8 yogurt cups or a set of 16 yogurt cups. These are the standard amounts for the sets of yogurt cups in the field of the yogurt production industry when these are displayed for sale conditioned in cardboard packages.

[0015] As it may be seen in Figure 4, the packages may be arranged in a single sheet and, then, be cut to provide individual items. Such a procedure yields less cardboard waste and more cardboard packages per cardboard sheet during common printing and production.

5 5. Band-like package, according to the preceding claims, **characterised in that** it is provided planiform and the mounting of which is to be made after the products to be packed are suitably positioned. Then, the trapezoidal tabs 16 and 17 are pressed in so that they assume an inward extending position to serve as a brake to prevent the packed products from sliding.

10 6. Band-like package, according to the preceding claims, **characterised in that** it may be manufactured together with other packages in a single cardboard sheet.

Claims

1. Band-like package, in cardboard, planiform, the mounting of which is performed through predefined folding lines, **characterised in that** it is formed by only two side walls 8, one bottom 7 and one upper part or lid formed by two parts 18 and 19 and a central strip 20, which is removable.
2. Band-like package, according to the preceding claim, **characterised in that** the said central strip 20 is attached to the said parts 18 and 19 by means of punched lines 22 and 23, which facilitate the tearing off of the part or strip 20, thereby providing full access to the packed products.
3. Band-like package, according to the preceding claims, **characterised in that** strip 20 is extended along the full length of package 1.
4. Band-like package, according to the preceding claims, **characterised in that** substantially trapezoidal small tabs 14 and 15 are provided, with folding lines 16 and 17 previously grooved in the area of folding lines 9 and 11 of the parts that shall form the bottom 7 and the side walls 8, which, when pressed inwards, shall allow them to assume an extending position towards the inside of the package.

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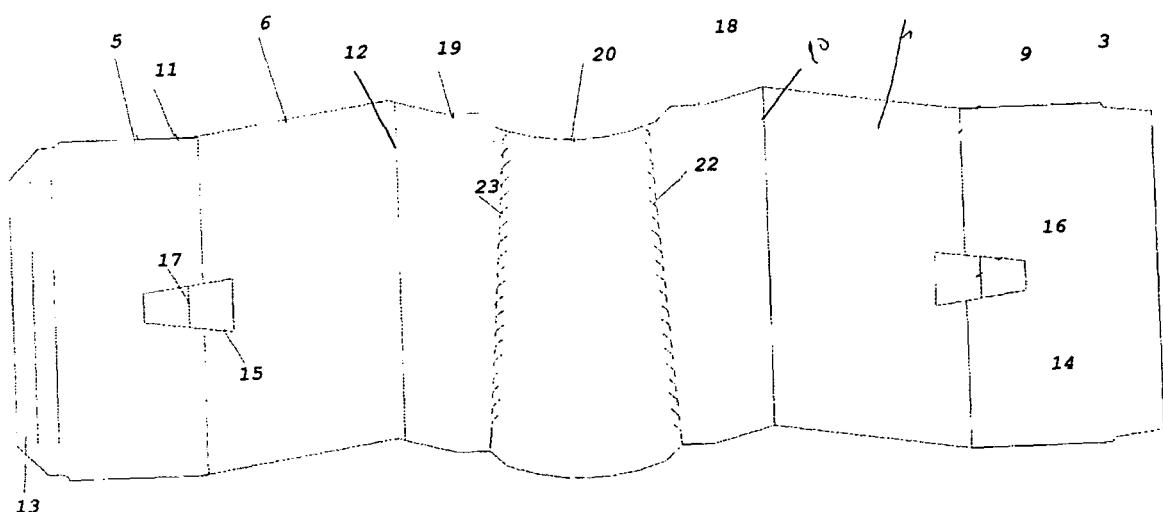


Fig. 1

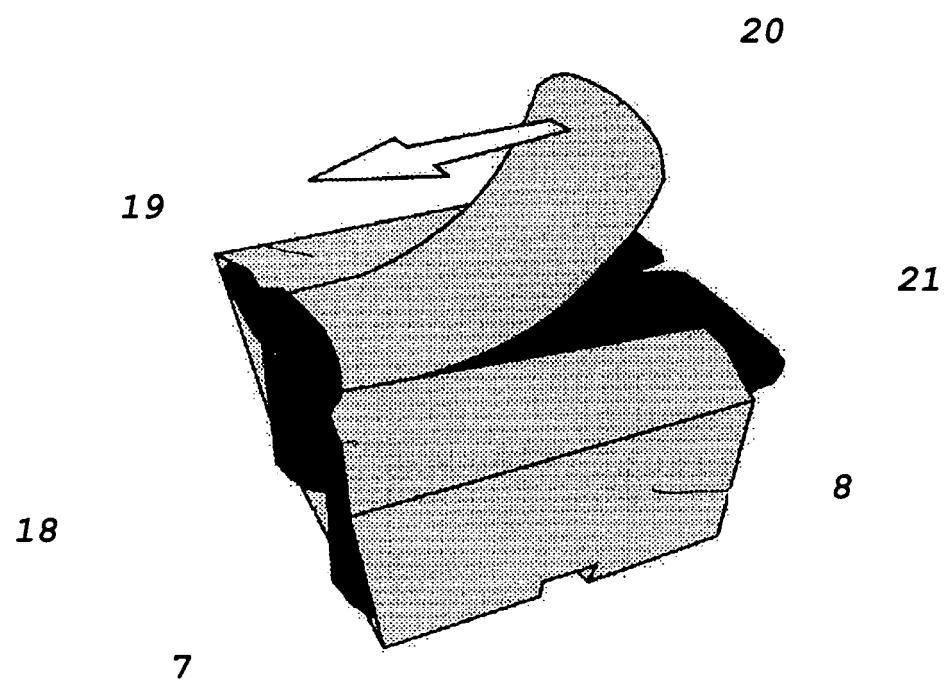


Fig. 2

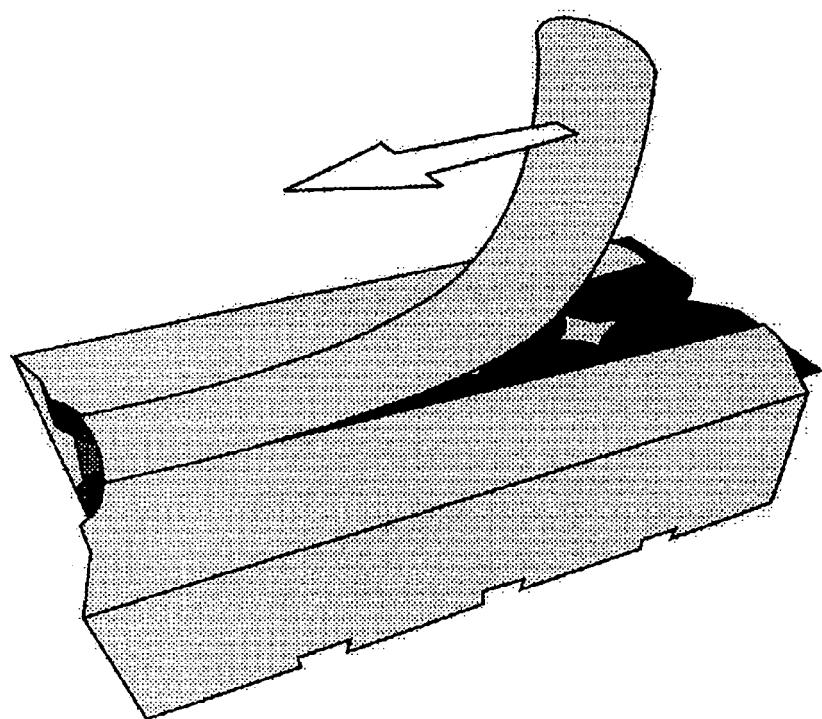


Fig. 3

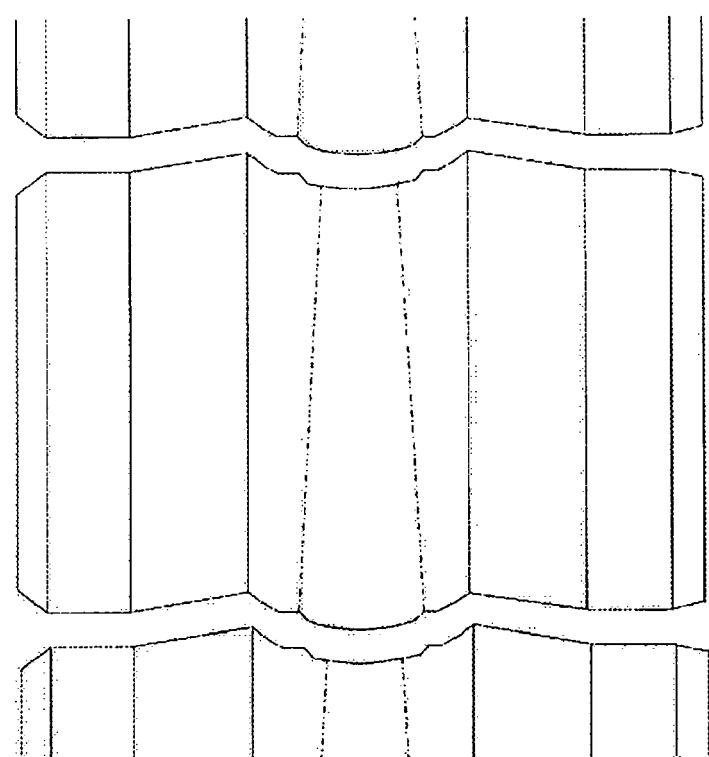


Fig. 4



DOCUMENTS CONSIDERED TO BE RELEVANT			CLASSIFICATION OF THE APPLICATION (IPC)
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	
X	FR 2 149 666 A (EMBALLAGES PUBLIC FSE) 30 March 1973 (1973-03-30)	1-3, 6	INV. B65D5/54 B65D71/00
Y	* figures *	4, 5	
Y	----- DE 89 13 992 U1 (BREITSAMER & ULRICH GMBH & CO. KG, 8000 MUENCHEN, DE) 11 January 1990 (1990-01-11) * figures *	4, 5	
A	----- GB 753 344 A (BRITISH THOMSON HOUSTON CO LTD) 25 July 1956 (1956-07-25)	4, 5	
A	----- EP 0 997 380 A (SCA EMBALLAGE FRANCE [FR]) 3 May 2000 (2000-05-03)		
A	----- US 2004/226988 A1 (FOGLE JAMES C [US] ET AL FOGLE JAMES C [US] ET AL) 18 November 2004 (2004-11-18)		
A	----- FR 1 348 109 A (MEAD CORP) 4 January 1964 (1964-01-04)		TECHNICAL FIELDS SEARCHED (IPC)
A	----- US 3 750 363 A (WOOD P) 7 August 1973 (1973-08-07)		B65D
The present search report has been drawn up for all claims			
2	Place of search	Date of completion of the search	Examiner
	The Hague	22 January 2007	SERRANO GALARRAGA, J
CATEGORY OF CITED DOCUMENTS			
X : particularly relevant if taken alone Y : particularly relevant if combined with another document of the same category A : technological background O : non-written disclosure P : intermediate document			
T : theory or principle underlying the invention E : earlier patent document, but published on, or after the filing date D : document cited in the application L : document cited for other reasons & : member of the same patent family, corresponding document			

**ANNEX TO THE EUROPEAN SEARCH REPORT
ON EUROPEAN PATENT APPLICATION NO.**

EP 06 39 8007

This annex lists the patent family members relating to the patent documents cited in the above-mentioned European search report. The members are as contained in the European Patent Office EDP file on The European Patent Office is in no way liable for these particulars which are merely given for the purpose of information.

22-01-2007

Patent document cited in search report		Publication date		Patent family member(s)		Publication date
FR 2149666	A	30-03-1973	DE	2240395 A1		01-03-1973
DE 8913992	U1	11-01-1990		NONE		
GB 753344	A	25-07-1956		NONE		
EP 0997380	A	03-05-2000	FR	2784964 A1		28-04-2000
US 2004226988	A1	18-11-2004	AU	2004240932 A1		02-12-2004
			CA	2520825 A1		02-12-2004
			EP	1622811 A2		08-02-2006
			JP	2006525922 T		16-11-2006
			MX	PA05012131 A		19-05-2006
			US	2005279815 A1		22-12-2005
			WO	2004103826 A2		02-12-2004
FR 1348109	A	04-01-1964		NONE		
US 3750363	A	07-08-1973		NONE		

REFERENCES CITED IN THE DESCRIPTION

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Patent documents cited in the description

- EP 0997380 A [0002] [0003]
- EP 0780311 A [0002] [0004]