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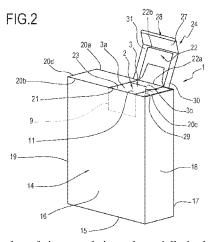
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(54) Title: PACKET FOR SMOKABLE ARTICLES, IN PARTICULAR CIGARETTES



(57) Abstract: This invention relates to a packet of cigarettes being substantially in the shape of a parallelepiped and comprising a first inner wrapper (2), containing a plurality of smokable articles (S) and having a top wall (3), a bottom wall (4), a front wall (5), a rear wall (6) and two side walls (7, 8) and a second outer wrapper (14) superposed on the first wrapper (2) and having a bottom wall (15), a front wall (16), a rear wall (17) and two side walls (18, 19), each superposed on a corresponding wall of the first wrapper (2). The second wrapper (14) also comprises a top wall (20), superposed on the top wall (3) of the first wrapper (2) and having a precut line or line of weakness (21) delimiting a lift-up tongue (22) designed to allow the smokable articles (S) to be extracted. Also provided is a label (24) having a first part (25) provided with a layer of permanent adhesive material connected stably to an upper portion of the rear wall (17) of the second wrapper (14), a second part (26) provided with a layer of permanent adhesive material connected stably to the lift-up tongue (22), a third part (27) provided with a layer of replaceable adhesive material and, when the packet is closed, superposed on a portion of the front wall (16) of the second wrapper (14), and a fourth part (28), adjacent to the third part (27) and distal from the second part (26), without adhesive material on it and defining a grip tab (28a) by which the user can grip the label (24), wherein the first wrapper (2) has a line of weakness (9) extending from the first flap (3a) towards the second flap (3b) around a portion (10) of the top wall (3) proximal to one of the side walls (7) to define an appendage (11) of the top wall (3) removable when pulled by a user; the lift-up tongue (22) of the second wrapper (14) being located at least partly on top of the removable appendage (11) of the first wrapper (2).



DESCRIPTION

PACKET FOR SMOKABLE ARTICLES, IN PARTICULAR CIGARETTES

Technical field

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This invention relates to a packet for smokable articles, in particular cigarettes, and a sheet of wrapping material.

This invention is applicable in particular in the packaging industry and, in particular, to the manufacture of packets for smokable articles, preferably cigarettes or the like.

In this specification, for simplicity, express reference is made to a packet of cigarettes without, however, thereby limiting the scope of the invention. It should be noted that this invention relates to a packet for smokable articles, of the type known as semi-rigid packet, that is, medium grammage, but is adaptable also to soft packets.

Background art

As is known, semi-rigid packets are made by superposing and wrapping an outer wrapper, of low or medium grammage, over an inner wrapper, typically made of aluminium, and fixing the outer wrapper to the inner wrapper by means of a label or stamp placed over the top of the top wall of the inner wrapper. In effect, it should be noted that the outer wrapper is usually cup shaped, that is, it does not have a top wall.

It is clear that the structure of these packets has considerable disadvantages due to the poor quality of the seal provided by the wrapping once opened.

Indeed, as is known, tobacco is very sensitive to the effects of the surrounding environment and when in contact with the atmosphere, tends to modify its organoleptic properties not only on account of variations in humidity (it tends to dry or to absorb too much moisture) but also on account of evaporation of the volatile substances it has been impregnated

with (particularly in the case of especially flavoured cigarettes).

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In light of this, there is a growing need to make packets with improved capability of retaining flavours, which has in recent times led to the development of both rigid and soft packets made of heat sealable materials and provided with open/close labels.

Disadvantageously, these solutions, although excellent in terms of sealing quality, have not been well received by the market, in particular by consumers of soft packets, because they are too far removed from traditional packets in terms of tactile perception and gestural habits.

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Disclosure of the invention

This invention therefore has for an aim to provide a packet for smokable articles, in particular cigarettes, and a sheet of wrapping material to overcome the above mentioned disadvantages of the prior art.

More precisely, it is an aim of this invention to provide a packet for smokable articles, in particular cigarettes, which allows keeping unaltered the tobacco's organoleptic properties and flavour even after being opened for the first time, but without affecting the user's tactile perception and gestural habits

Another aim of this invention is to provide a sheet of wrapping material which facilitates opening the packet without damaging the outer wrapper.

These aims are achieved by a packet for smokable articles, in particular cigarettes, having the features set out in the appended claims.

More precisely, the above mentioned aims are achieved by a packet for smokable articles, in particular cigarettes, which is substantially in the shape of a parallelepiped and which comprises: a first inner wrapper containing a plurality of smokable articles and having a top wall, a bottom wall, a front wall, a rear wall and two side walls, where the top wall is partly constituted by a first folded flap of material overlapping a second flap of material; and a second outer wrapper, superposed on the first

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wrapper and having a bottom wall, a front wall, a rear wall and two side walls, each superposed on a corresponding wall of the first wrapper.

According to the invention, the second wrapper is also provided with a top wall, superposed on the top wall of the first wrapper and having a pre-cut line or line of weakness delimiting a lift-up tongue designed to allow the smokable articles to be extracted, where the lift-up tongue has a pivoting side located at the rear wall and an opening side located at the front wall. According to another aspect of the invention, the packet comprises a label having a first part provided with a layer of permanent adhesive material connected stably to an upper portion of the rear wall of the second wrapper (or to an edge of the top wall adjacent to the rear wall), a second part provided with a layer of permanent adhesive material connected stably to the lift-up tongue, a third part provided with a layer of replaceable adhesive material and, when the packet is closed, superposed on a portion of the front wall of the second wrapper, and a fourth part adjacent to the third part and distal from the second part, without adhesive material on it and defining a grip tab by which the user can grip the label.

Advantageously, thanks to this structure, the packet is generally similar to a traditional soft packet, especially in terms of the gestures performed by the user when opening the packet.

Indeed, this solution allows the user to open the packet manually in the manner they are used to and at the same time guarantees that the organoleptic properties of the cigarettes are preserved.

Preferably, in order to guarantee opening the inner wrapper without damaging the outer one, the first wrapper has a line of weakness extending from the first flap around a portion of the top wall proximal to one of the side walls, so as to define on the top wall an appendage which is removable when pulled by a user.

It should be noted that the lift-up tongue of the second wrapper is located

at least partly on top of the removable appendage of the first wrapper.

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Brief description of the drawings

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Further features and advantages of the invention are more apparent from the following description of a preferred and non-exclusive, and therefore non-limiting, example embodiment of a packet for smokable articles, in particular cigarettes, and of a sheet of wrapping material, as illustrated in the accompanying drawings, in which:

- Figures 1 and 2 show perspective views of a first embodiment of a packet for smokable articles according to this invention, in two different configurations;
- Figures 3 and 4 are a front and a rear perspective view of the inner wrapper of the packet of Figures 1 and 2;
- Figures 5 and 6 show the steps of opening the inner wrapper of the packet of Figures 1 and 2;
- Figures 7 and 8 show sheets of wrapping material used for making the two wrappers of the packet of Figures 1 and 2;
- Figures 9 and 10 show perspective views of a second embodiment of a packet for smokable articles according to this invention, in two different configurations;
- Figures 11 and 12 show sheets of wrapping material used for making the two wrappers of the packet of Figures 9 and 10;
- Figures 13 and 14 show perspective views of a third embodiment of a packet for smokable articles according to this invention, in two different configurations;
- Figures 15 and 16 are a front and a rear perspective view of the inner wrapper of the packet of Figures 13 and 14;
- Figure 17 shows a step of opening the inner wrapper of the packet of Figures 13 and 14;
- Figures 18 and 19 show sheets of wrapping material used for making the

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two wrappers of the packet of Figures 13 and 14;

- Figures 20 and 21 show perspective views of a fourth embodiment of a packet for smokable articles according to this invention, in two different configurations;
- 5 - Figure 22 shows a step of opening the inner wrapper of the packet of Figures 20 and 21;
 - Figure 23 shows a sheet of wrapping material used for making the outer wrapper of the packet of Figures 20 and 21;
 - Figures 24 and 25 show perspective views of a fifth embodiment of a packet for smokable articles according to this invention, in two different configurations;
 - Figures 26 and 27 show sheets of wrapping material used for making the two wrappers of the packet of Figures 24 and 25; and
 - Figure 28 shows a further embodiment of a sheet of wrapping material used for making the outer wrapper of a packet according to the invention.

<u>Detailed description of preferred embodiments of the invention</u>

With reference to the accompanying drawings, the numeral 1 denotes a packet for smokable articles, in particular cigarettes, according to this invention, which is substantially in the shape of a right-angle parallelepiped extending longitudinally along a longitudinal axis "A".

Hereinafter, express reference is made to cigarettes, instead of generic smokable articles, without thereby limiting the generality or the scope of the invention in any way.

- Preferably, the packet 1 is of the type known as semi-rigid packet, that is, 25 having an outer wrapper of medium grammage. The invention is, however, also applicable to soft packets which are made by wrapping and forming operations which are very similar to those used to make semi-rigid packets.
- The packet 1 according to the invention comprises a first, inner wrapper 2 30

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and a second, outer wrapper 14, wrapped around the first wrapper 2 and, in use, bearing the manufacturer's logo and graphical representations.

Preferably, the first wrapper 2, that is, the inner wrapper is made by folding a sheet 100 of wrapping material 100 (also an object of this invention) provided with a first, outer layer of aluminium (or the like) and a second, inner layer of paper, superposed over each other.

Thus, the first and second layers are superposed and irremovably attached to each other.

It should be noted that the outer layer is preferably made of material which is commonly known as "foil paper".

As already mentioned, the first wrapper 2 is substantially in the shape of a parallelepiped and contains a plurality of cigarettes "S".

More precisely, the first wrapper 2 has a top wall 3, a bottom wall 4, a front wall 5, a rear wall 6 and two side walls 7, 8.

It should be noted that the top wall 3 of the first wrapper 2 is delimited by a first long side 12a and a second long side 12b, corresponding to the rear wall 6 and front wall 5, respectively, and by a first short side 12c and a second short side 12d, corresponding to the side walls 7, 8.

Preferably, the top wall 3 is partly constituted by a first folded flap 3a of material overlapping a second flap 3b of material.

In effect, the sheet 100 of wrapping material is preferably substantially quadrilateral in shape and is delimited by two longitudinal edges 100a and two transverse edges 100b which are parallel in twos and define four vertices 101.

Preferably, the sheet 100 is folded about its longitudinal axis and the transverse edges 100b are folded in such a way as to define the aforementioned first flap 3a and second flap 3b.

Preferably, the first wrapper 2 has a line of weakness 9 extending from the first flap 3a around a portion 10 of the top wall 3 proximal to one of the side walls 7, 8.

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The line of weakness 9 thus defines of the top wall 3 an appendage 11 which is removable when pulled by a user.

In other words, the line of weakness 9 extends from the first flap 3a, surrounding the portion 10 (at least partly) in such a way as to make it easier to grip and remove the appendage 11 (that is, the portion 10 itself). Thus, in use, the operator grips the first flap 3a in the proximity of the line of weakness 9 and pulls to tear at least part of it, leaving the cigarettes exposed (and accessible).

To make tearing the line of weakness 9 more certain, the removable appendage 11 also extends partly into the front wall 5 and into the rear wall 6 of the first wrapper 2.

Thus, the line of weakness 9 runs along a path which extends also into the rear wall 6 and front wall 5.

In other words, the line of weakness 9 preferably crosses both the first long side 12a and the second long side 12b of the top wall 3.

It should be noted that, depending on the embodiment, the portion of appendage 11 lying on the front wall 5 may be larger (Figures 1-23) or smaller (Figures 24-27).

Preferably, the portion 10 is substantially an edge (or corner) portion of the top wall 3, which makes the zone for extracting the cigarettes "S" much like the one traditionally used in soft packets.

The second outer wrapper 14 is then superposed on the first wrapper 2 and has a bottom wall 15, a front wall 16, a rear wall 17 and two side walls 18, 19, each superposed on a corresponding wall of the first wrapper 2.

Further, according to one aspect of the invention, the second wrapper 14 has a top wall 20, superposed on the top wall 3 of the first wrapper 2.

Thus, the second wrapper 14 comprises:

- a top wall 20 superposed on the top wall 3 of the first wrapper 2;
- a bottom wall 15 superposed on the bottom wall 4 of the first wrapper 2;
- a front wall 16 superposed on the front wall 5 of the first wrapper 2:

- a rear wall 17 superposed on the rear wall 6 of the first wrapper 2;

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- two side walls 18, 19, each superposed on a corresponding side wall 7, 8 of the first wrapper 2.

Preferably, the top wall 20 of the second wrapper 14 is delimited by a first long side 20a and a second long side 20b, corresponding to the rear wall 17 and front wall 16, respectively, and by a first short side 20c and a second short side 20d, corresponding to the side walls 18, 19.

The top wall 20 of the second wrapper 14 has a pre-cut line or line of weakness 21 delimiting a lift-up tongue 22 designed to allow access to the space inside the wrapper 14 itself.

It should be noted that in this text, the terms pre-cut line and line of weakness have substantially the same meaning.

In the preferred embodiment, however, the pre-cut line 21 has through cuts or slits in it.

The space inside the second wrapper contains the first wrapper 2 and thus, the lift-up tongue 22 defines an opening 23 for extracting the cigarettes "S"

In this regard, it should be noted that the lift-up tongue 22 is located at least partly on top of the removable appendage 11 of the first wrapper 2.

More precisely, the tongue 22 is pivot opening. In other words, the lift-up tongue 22 has a pivoting side 22a located at the rear wall 17 and an opening side 22b located at the front wall 16.

To preserve the organoleptic properties of the cigarettes "A" even after being opened for the first time, the packet 1 comprises an open/close label 24 associated with the lift-up tongue 22.

Preferably, the label 24 has at least a first part 25 provided with a layer of permanent adhesive material connected stably to an upper portion of the rear wall 17 of the second wrapper 14 (or to an edge of the top wall 20 adjacent to the rear wall 17). The first part 25 thus defines a pivot line or hinge line of the label 24.

The label 24 also comprises a second part 26 provided with a layer of permanent adhesive material connected stably to the lift-up tongue 22 in such a way as to tear the pre-cut line or line of weakness 21 to define the opening 23.

There is also a third part 27 provided with a layer of replaceable adhesive material and, when the packet is closed, superposed on a portion of the front wall 16 of the second wrapper 14.

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The expression "replaceable adhesive" is used to mean an adhesive substance which immediately sticks to the material of the front wall 16 but which is removable a multiplicity of times without losing its adhesive efficacy.

Lastly, to allow the packet 1 to be easily opened and closed, the label 24 comprises a fourth part 28, adjacent to the third part 27 and distal from the second part 26, without adhesive material on it and defining a grip tab 28a by which the user can grip the label 24.

In other words, in a first embodiment, the label 24 is positioned in U fashion across the top wall 20, from the first part 25 to the fourth part 28. In a further embodiment, the label 24 is positioned in L fashion over the top wall 20 and front wall 16.

Advantageously, that way, at the forming stage, it would be possible to use a pre-labelled blank provided directly by a paper processing company which manufactures the blank or prepared on the machine by applying the label 24 while the roll of paper used to make the second wrapper 14 is being unwound or while pre-cut blanks are being transported on a conveyor.

The packet 1 can be opened for the first time by gripping the adhesive-free, fourth part 28 of the label 24 between two fingers and pulling it in such a way as to detach the third part 27 from the front wall 16 of the second wrapper 14, overcoming the resistance offered by the layer of replaceable adhesive. Continuing to pull on the fourth part 28 of the label

24 causes the second part 26 of the label 24 with the permanent adhesive on it to be lifted, bringing the lift-up tongue 22 of the second wrapper 14 with it and thereby tearing the pre-cut line or line of weakness 21 and giving access to the first wrapper 2.

At this point, the user grips the first flap 3a of the top wall 3 of the first wrapper 2 and pulls it by the removable appendage 11 so as to tear the line of weakness 9 and allow the cigarettes "S" to be taken out.

Once opened in this way, the packet 1 has an access opening 23 at the top of it, allowing the cigarettes "S" to be picked up and taken out.

To reclose the packet 1, the label 24 is brought back to its previous position so that its third part 27 sticks to the front wall 16 of the second wrapper 14 again.

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In a first embodiment (Figures 1-12), the lift-up tongue 22 of the second wrapper 14 is located in proximity to the first short side 20c of the top wall 20, at a preset distance therefrom.

Thus, when the tongue 22 is lifted, this defines a shoulder 29 separating the first short side 20c and the opening 23 for extracting the cigarettes "S".

In this embodiment (Figures 1-12), the removable appendage 11 is located in proximity to the first short side 12c of the top wall 3, at a preset distance therefrom.

In this embodiment, therefore, the line of weakness 9 has an inside stretch 9a and an outside stretch 9b both located on the top wall 3, where the inside stretch 9a is distal from the first short side 12c relative to the outside stretch 9b.

The outside stretch 9b is thus proximal to the first short side 12c and spaced therefrom to define an end segment of the top wall 3.

Advantageously, that allows removing the appendage 11 without damaging the separating shoulder 29 of the second wrapper 14, that is to say, without spoiling the appearance of the packet 1.

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It should be noted that also in this embodiment (Figures 2, 6, 10), the label 24 has at least one lateral edge 30, laterally adjacent to the second part 26, superposed (or superposable) on the top wall 20 of the second wrapper 14 at the shoulder 29.

The lateral edge 30 is at least partly covered by a layer of replaceable 5 adhesive by which it is connected to the top wall 20 (in particular to the shoulder 29) to guarantee that the packet 1 remains sealed once closed. Preferably, the label 24 also has a further edge 31, opposite to the first edge 30, and also partly covered by a layer of replaceable adhesive to connect the label to the top wall 20. 10

It should be noted that a peripheral (lateral) portion of the lateral edge 30 (and of the further edge 31) is "inertized", that is to say, free of adhesive material, in order to facilitate machine handling of the label 24.

Preferably, therefore, the label 24 has at least one longitudinal band, extending from the first part 25 to the fourth part 28 and free of adhesive material, in order to facilitate its handling by the machine.

Also preferably, the removable appendage 11 is provided with a separating line 13 (Figures 3, 4, 8, 12) extending from the line of weakness 9 away therefrom and located in the proximity of a centre line of the top wall 3 parallel to the first and second long sides 12a, 12b.

More precisely, the separating line 13 extends from the outside stretch 9b towards the inside stretch 9a, that is, away from the first short side 12c.

Thus, the separating line 13, divides the appendage 11 into two half parts. where the first half part 11a extends from the first flap 3a to the separating line 13 itself, while the second half part 11b extends from the separating line 13 into the second flap 3b.

Advantageously, the separating line 13 divides the removal of the appendage 11 into two successive steps.

In effect, in a first step (Figure 5), the pulling action applied by the operator on the first flap 3a removes the first half part 11a of the

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appendage 11, while in the next step (Figure 6), the pulling action applied on the second flap 3b (starting from the separating line 13) causes the second half part 11b. to be removed.

In a further embodiment (Figures 13-27), the lift-up tongue 22 is partly delimited by the first short side 20c of the top wall 20 of the second wrapper 14 in such a way as to define an end portion of the top wall 20 itself.

Thus, the pre-cut line, or line of weakness 21 is adjacent to the first short side 20c of the top wall 20.

In this embodiment, the removable appendage 11 of the first wrapper 2 extends mainly on the top wall 3 and has peripheral edges on the front wall 5, on the rear wall 6 and on one side wall 7 to facilitate its removal.

In other words, in this embodiment, the line of weakness 9 has a single stretch 9a on the top wall 3, located at a predetermined distance from the first short side 12c of the top wall 3.

It should be noted that, preferably, the second wrapper 14 has a rotatable tab 32 (Figures 20-23) pivoted to one end of the side wall 18 located at the tongue 22 and defining, when the packet is open, a dustproof flap for protecting the cigarettes "S".

In the embodiment illustrated, the tab 32 has, on a top face of it, a graphic design similar in colour and shape to the removable appendage 9 of the first wrapper 2.

Advantageously, that way, besides protecting the cigarettes "S" from dust, the tab 32 gives the impression that the packet 1 is whole.

As mentioned previously, the packet 1 is made from two sheets of wrapping material.

More specifically, the first wrapper 2 is made by folding a first sheet 100 and the second wrapper 14 is made by folding and gluing a second sheet 104.

30 Where possible, the reference numbers used in the description of the

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sheets 100 and 104, are the same as those used for the corresponding parts of the packet 1, but with primes.

In some cases, there are two or more primes to mean that the wall of the wrapper 2, 14 is obtained by superposing two or more parts of the corresponding sheet 100, 104.

The sheet 100 of wrapping material used to make the first wrapper 2 is, as mentioned previously, substantially quadrilateral in shape and is delimited by two longitudinal edges 100a and two transverse edges 100b which are parallel in twos and define four vertices.

More precisely, the sheet 100 has two longitudinal pre-folding lines 101a and four transverse pre-folding lines 101b extending between the two longitudinal pre-folding lines 101a,

The lines 101a and 101b define a first panel 5', defining the front wall 5, two second panels 7', 8', defining the side walls 7, 8, in use, and two third panels 6', 6'' which, in use, are partly superposed to define the rear wall 6. On the outer side of the longitudinal pre-folding lines 101a, there are two border pieces 3', 4' interposed between the longitudinal edge 100a and the respective longitudinal pre-folding line 101a.

The border pieces 3', 4' are crossed by a plurality of fold lines which delimit a plurality of flaps and which allow the flaps to be superposed to form the top wall 3 and the bottom wall 4 of the first wrapper 2.

The sheet 100 also comprises a line of weakness 9' extending between a longitudinal edge 100a and a transverse edge 100b adjacent thereto to delimit a corner portion 11' of the sheet 100 which, in use, defines the removable appendage 11 of the wrapper.

More precisely, the corner portion 11' is delimited by the line of weakness 9', by an end portion of the aforementioned longitudinal edge 100a and by an end portion of the aforementioned transverse edge 100b.

Preferably, the line of weakness 9' has at least a first stretch 102 extending from a longitudinal edge 100a towards the inside of the first

panel 5' and at least a second stretch 103 extending away from the first stretch 102 towards the transverse edge 100b.

More precisely, with reference to the embodiment illustrated in Figures 18 and 26, the second stretch 103 of the line of weakness 9' lies entirely in the central panels without touching the border pieces 3', 4'.

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Alternatively, with reference to Figures 8 and 12, the second stretch 103 of the line of weakness 9' has at least one portion 103a lying in the border piece 3' at a predetermined distance from the corresponding longitudinal pre-folding line 101a.

More specifically, the corner portion 11' has at least one separating line 13' extending between the portion 103a of the second stretch 103 and the longitudinal edge 100a opposite thereto.

The second sheet 104, on the other hand, is made from medium- or low-grammage paperboard.

The second sheet 104 comprises at least a first panel 16', which in use defines the front wall 16, a second panel 17', which in use defines the rear wall 17, a third panel 18', interposed between the first panel 16' and the second panel 17' and which in use defines one side wall 18, and two end panels 19', 19'' which are superposable to define, in use, the other side wall 19 of the second wrapper 14.

Alternatively, with reference to Figure 28, the second sheet 104 might comprise at least a first panel 16', which in use defines the front wall 16, a second panel 17', a third panel 18', interposed between the first panel 16' and the second panel 17' and which in use defines one side wall 18, a fourth panel 19' which in use defines the other side wall 19, and an end panel 17", where the second panel 17' and the end panel 17" are superposable to define, in use, the rear wall 17 of the second wrapper 14. The panels 16', 17', 17", 18', 19', 19" are located one after the other along the main direction of extension of the sheet, each being connected to the next by a transverse fold line 105a (there are thus four transverse

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fold lines 105a) and are laterally delimited by a longitudinal fold line 105b (there are thus two longitudinal fold lines 105b).

The sheet 104 also comprises a plurality of first protrusions 20' projecting from the panels 16', 17', 18', 19', 19" away from a respective longitudinal fold line 105b and a plurality of second protrusions 15' projecting from the panels 16', 17', 18', 19' away from the other longitudinal fold line 105b, that is to say, located on the opposite side of the panel with respect to the first protrusions.

The first protrusions 20' are superposable on each other to define the top wall 20 of the second wrapper 14.

Similarly, the second protrusions 15' are superposable on each other to define the bottom wall 15 of the second wrapper 14.

According to the invention, the first protrusion 20' located at the first panel 16' has a pre-cut line or line of weakness 21' delimiting a portion 22' which, in use, partly defines the lift-up tongue 22.

In some embodiments (Figures 11, 19, 23), the pre-cut line or line of weakness 21' crosses the longitudinal fold line 105b and a U-shaped portion of it 21" extends also into the first panel 16'.

With reference to the embodiments of Figures 7 and 11, it should be noted that the first protrusions 20' of the second panel 17' consist of at least three elements, namely, a first element 29', adjacent to the third panel 18', a third element 106, adjacent to an end panel 19' and a second element 22" interposed between the other two.

Preferably, the first element 29' and the third element 106 protrude from the longitudinal fold line 105b for a longer stretch than the second element 22".

Further, an extension of a first protrusion 29" of the third panel 18 away from the longitudinal fold line 105b is substantially equal to a longitudinal extension (that is, a thickness) of the aforementioned first element 29.

In effect, the first element 29' and that first protrusion 29" are shaped in

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such a way that they can be superposed on each other to define the shoulder 29 of the packet 1 shown in Figures 1, 2, 5, 6, 9, 10.

PCT/IB2015/054578

In the embodiment of Figures 19, 23, 27, the first protrusions 20' of the second panel 17' are defined by only two elements, a first element 22" attachable to the portion 22' of the first protrusion 20' of the first panel 16', and a second element 107 attachable to the rest of the first protrusion 20' of the first panel 16'.

Preferably, in this embodiment, the third panel 18' does not have any first protrusion (Figures 19, 27).

Alternatively, with reference, for example, to Figure 23, the first protrusion 20' of the third panel 18' comprises a tab 32' which, in use, defines a dustproof flap protecting the cigarettes "S" in the packet of Figures 20-22. In the embodiment illustrated, the tab 32' has, on a top face of it, a graphic design similar in colour and shape to the removable appendage 11 of the first wrapper 2.

Again with reference, for example, to the embodiment of Figure 28, there is only one first protrusion 20', defined by the element 106 located at a predetermined distance from the third panel 18'.

The invention achieves the above mentioned aims and brings important advantages.

Indeed, the combination of a first, pull-open inner wrapper and a second outer wrapper with an open/close label allows obtaining a semi-rigid or soft packet having very good sealing properties and, at the same time, without affecting the user's gestural habits.

Moreover, making a cut (or line of weakness) at the appendage allows part of the first wrapper to be removed easily and without damaging the outer wrapper.

Furthermore, making a separating line at that line of weakness makes it possible to divide the removal of the appendage into two successive steps, thereby avoiding damage to the shoulder, or edge, of the packet.

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PCT/IB2015/054578

CLAIMS

- 1. A packet for smokable articles, in particular cigarettes, being substantially in the shape of a parallelepiped and comprising:
- a first inner wrapper (2), containing a plurality of smokable articles (S) and having a top wall (3), a bottom wall (4), a front wall (5), a rear wall (6) and two side walls (7, 8), where the top wall (3) is partly constituted by a first folded flap (3a) of material overlapping a second flap (3b) of material;
- a second outer wrapper (14), superposed on the first wrapper (2) and having a bottom wall (15), a front wall (16), a rear wall (17) and two side walls (18, 19), each superposed on a corresponding wall of the first wrapper (2);
- characterized in that the second wrapper (14) also comprises a top wall (20), superposed on the top wall (3) of the first wrapper (2) and having a pre-cut line or line of weakness (21) delimiting a lift-up tongue (22) designed to allow the smokable articles (S) to be extracted; the lift-up tongue (22) having a pivoting side (22a) located at the rear wall (17) and an opening side (22b) located at the front wall (16);

and in that it comprises a label (24) having:

- a first part (25) provided with a layer of permanent adhesive material connected stably to an upper portion of the rear wall (17) of the second wrapper (14) or to an edge of the top wall (20) adjacent to the rear wall (17),
- a second part (26) provided with a layer of permanent adhesive material connected stably to the lift-up tongue (22);
- a third part (27) provided with a layer of replaceable adhesive material and, when the packet is closed, superposed on a portion of the front wall (16) of the second wrapper (14);
 - a fourth part (28), adjacent to the third part (27) and distal from the second part (26), without adhesive material on it and defining a grip tab (28a) by which the user can grip the label (24),

wherein the first wrapper (2) has a line of weakness (9) extending from the first flap (3a) towards the second flap (3b) around a portion (10) of the top wall (3) proximal to one of the side walls (7) to define an appendage (11) of the top wall (3) removable when pulled by a user; the lift-up tongue (22) of the second wrapper (14) being located at least partly on top of the removable appendage (11) of the first wrapper (2).

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- 2. The packet according to claim 1, characterized in that the removable appendage (11) extends partly also on the front wall (5) and on the rear wall (6) of the first wrapper (2).
- 3. The packet according to either of the preceding claims, characterized in that the lift-up tongue (22) extends also on the front wall (16) of the second wrapper (14) to allow the smokable articles (S), in use, to be extracted by sliding.
 - 4. The packet according to any one of the preceding claims, characterized in that the first wrapper (2) is made by folding a sheet (100) of wrapping material comprising a first, outer layer of aluminium and a second, inner layer of paper, superposed over each other.
 - 5. The packet according to any one of the preceding claims, characterized in that the label (24) has at least one longitudinal strip without adhesive material and extending from the first part (25) to the fourth part (28) to facilitate its handling in the machine.
 - 6. The packet according to any one of the preceding claims, characterized in that the top wall (20) of the second wrapper (14) is delimited by a first long side (20a) and a second long side (20b), corresponding to the rear wall (17) and front wall (16), and by a first short side (20c) and a second short side (20d), corresponding to the side walls (18, 19); the lift-up tongue (22) being located in the proximity of the first short side (20c) at a predetermined distance therefrom to define, when the tongue (22) is lifted, a shoulder (29) separating the short side (20c) from an opening (23) for extracting the smokable articles (S).

7. The packet according to claim 6, characterized in that the top wall (3) of the first wrapper (2) is delimited by a first long side (12a) and a second long side (12b), corresponding to the rear wall (6) and front wall (5), respectively, and by a first short side (12c) and a second short side (12d), corresponding to the side walls (7, 8); the removable appendage (11) being located in the proximity of the first short side (12c) at a predetermined distance therefrom to allow removing the appendage (11) without damaging the separating shoulder (29) of the second wrapper (14).

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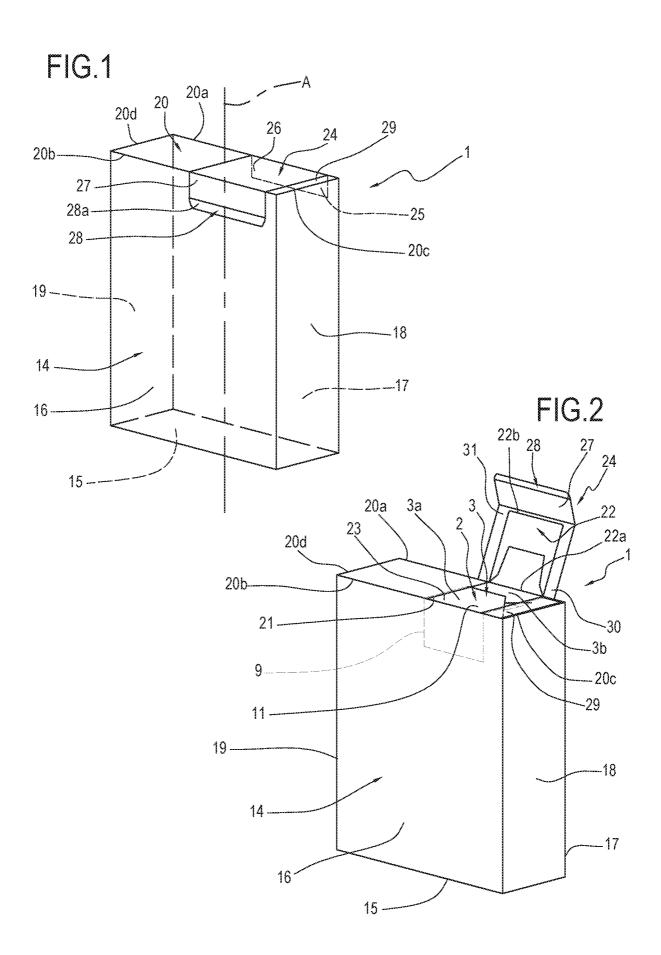
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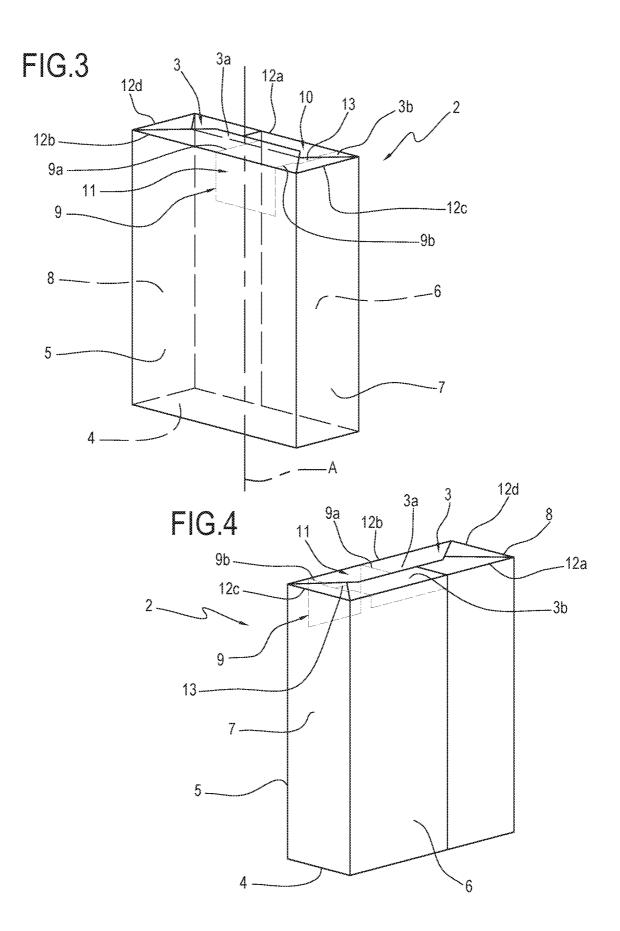
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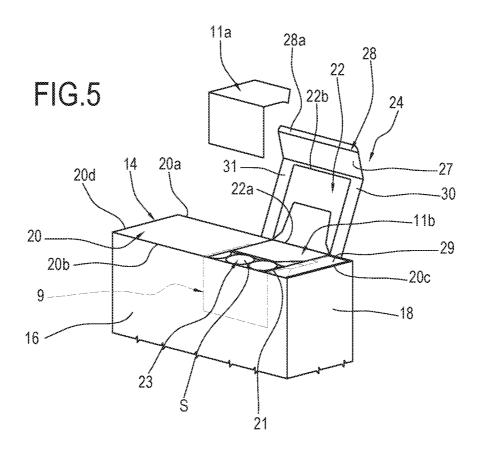
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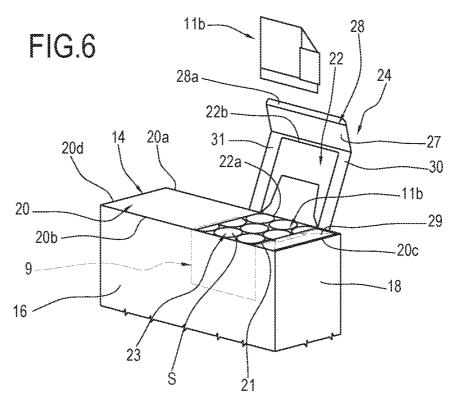
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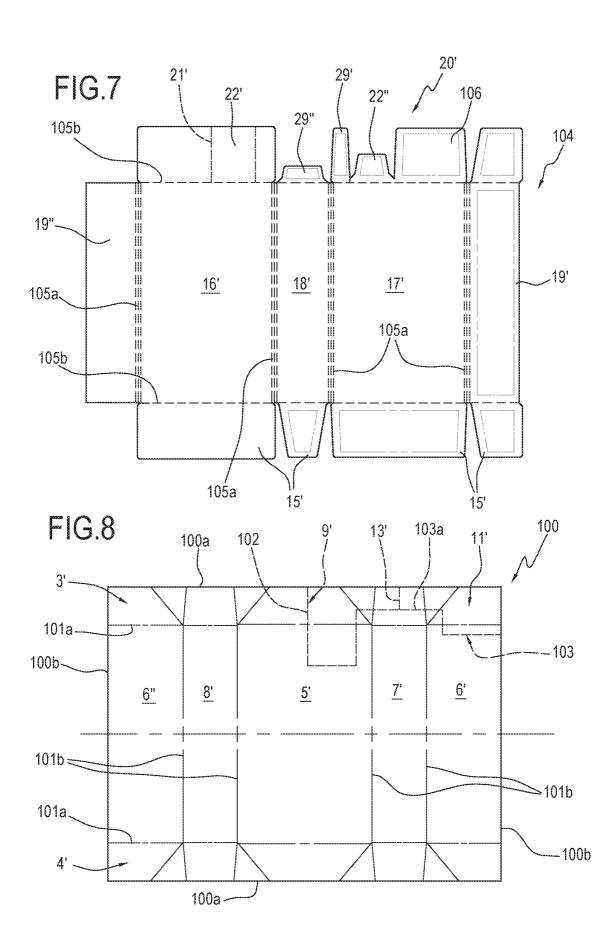
- 8. The packet according to claim 7, characterized in that the removable appendage (11) is provided with a separating line (13) extending from the line of weakness (9) away therefrom and located in the proximity of a centre line of the top wall (3) substantially parallel to the first and second long sides (12a, 12b).
- 9. The packet according to any one of claims 1 to 5, characterized in that the top wall (20) of the second wrapper (14) is delimited by a first long side (20a) and a second long side (20b), corresponding to the rear wall (17) and front wall (16), respectively, and by a first short side (20c) and a second short side (20d), corresponding to the side walls (18, 19); the lift-up tongue (22) being partly delimited by the first short side (20c) in such a way as to define an end portion of the top wall (20).
- 10. The packet according to claim 9, characterized in that in that the removable appendage (11) of the first wrapper (2) extends mainly on the top wall (3) and has peripheral edges on a side wall (7) and on the rear wall (6) to facilitate its removal.
- 11. The packet according to claim 9 or 10, characterized in that the second wrapper (14) has a rotatable tab (32) pivoted to one end of the side wall (7) located at the tongue (22) and defining, when the packet is open, a dustproof flap for protecting the smokable articles (S).

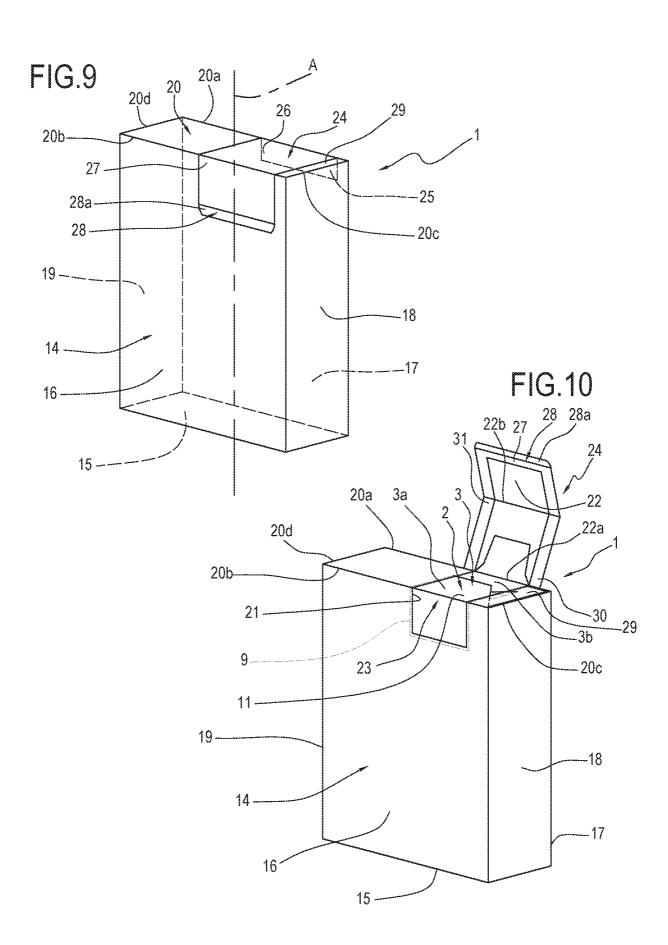


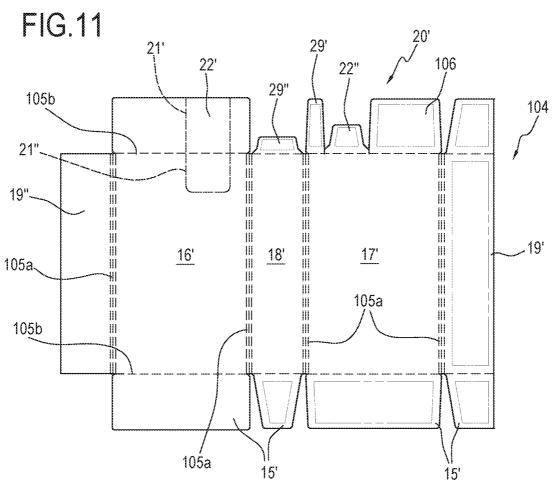


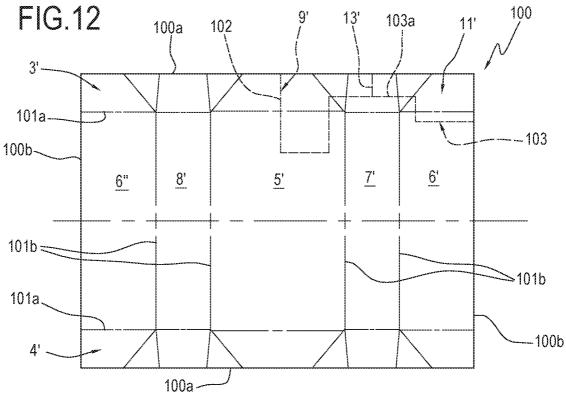


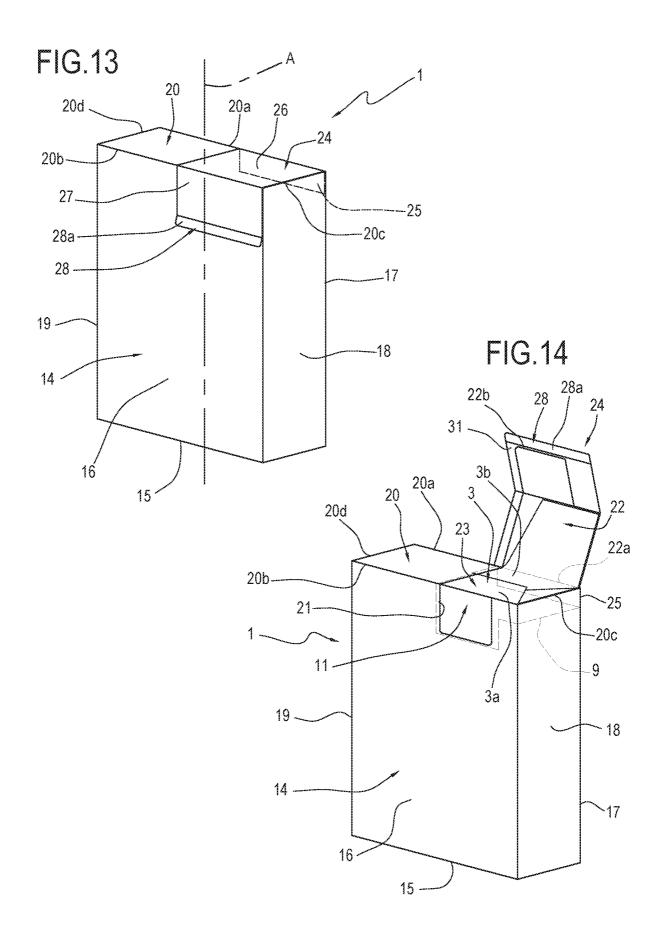


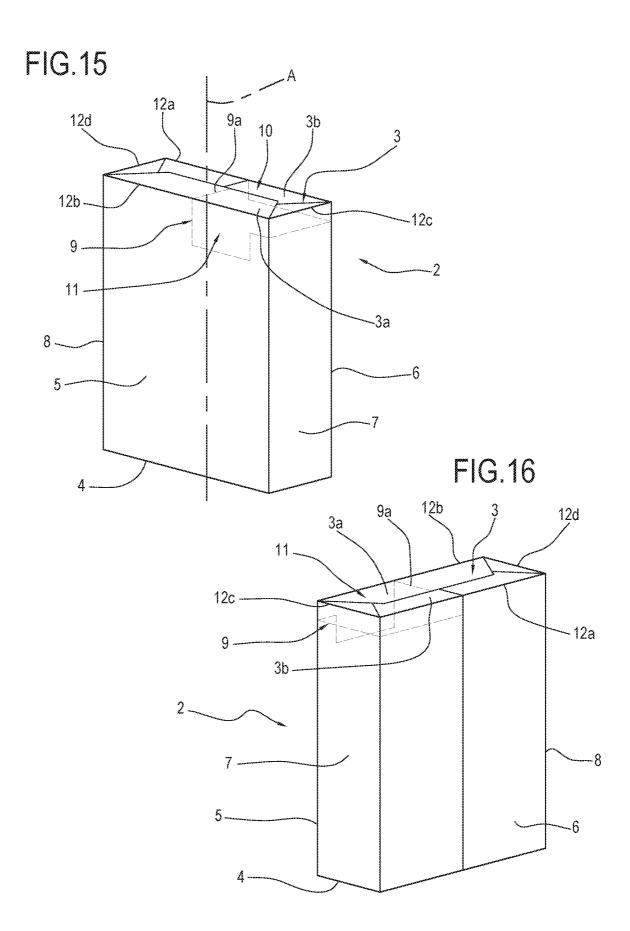


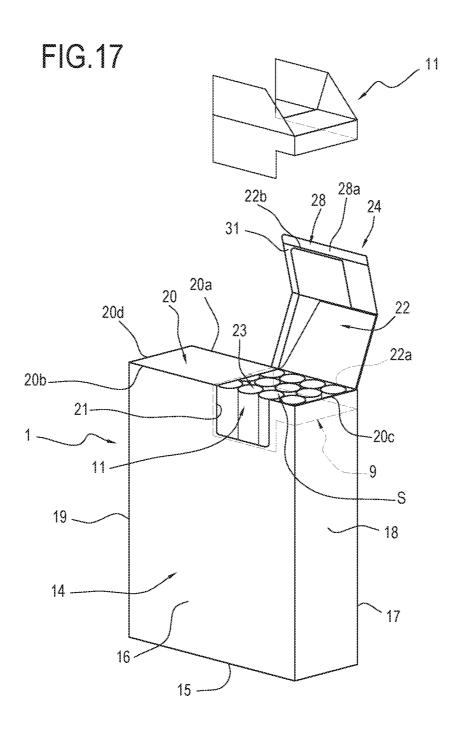


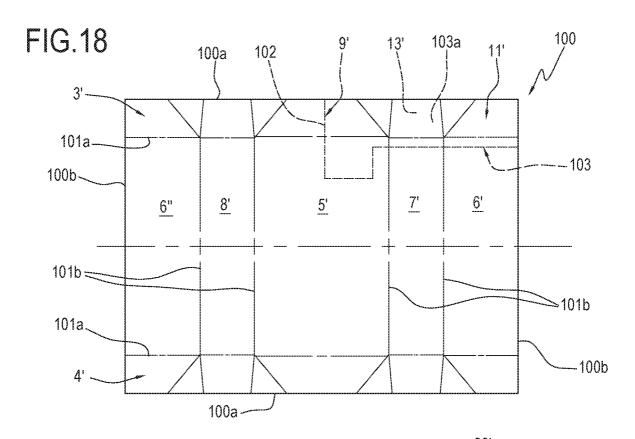


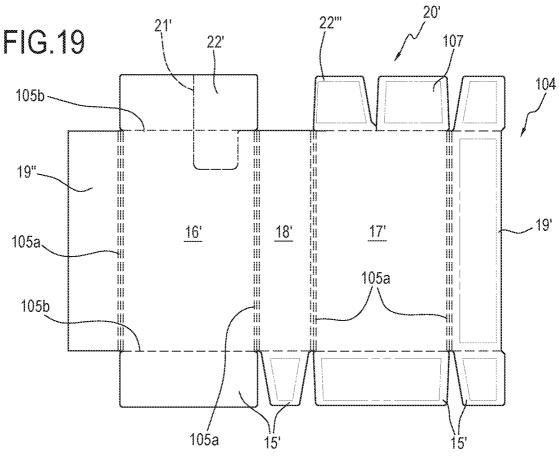


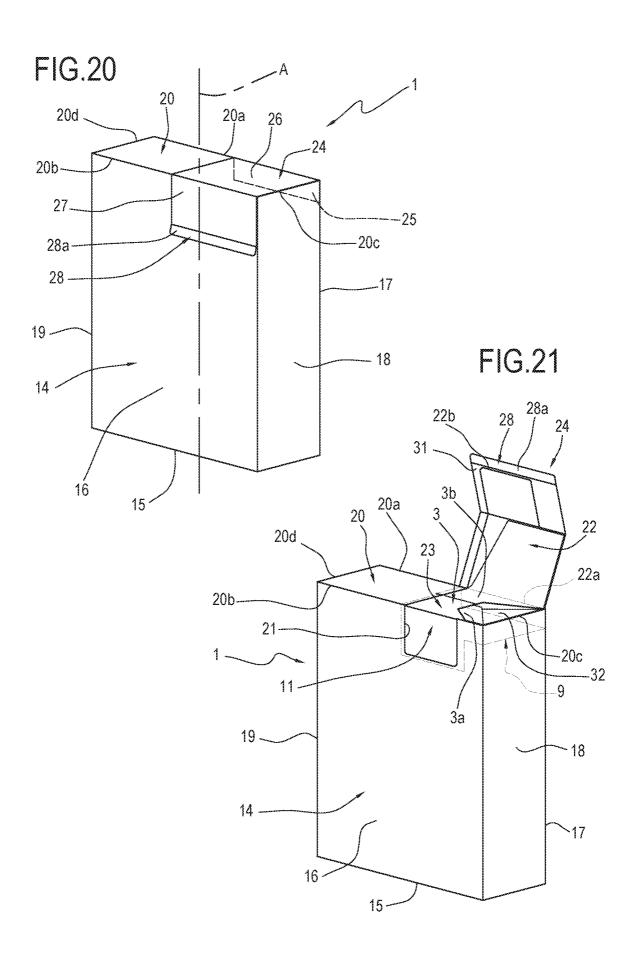


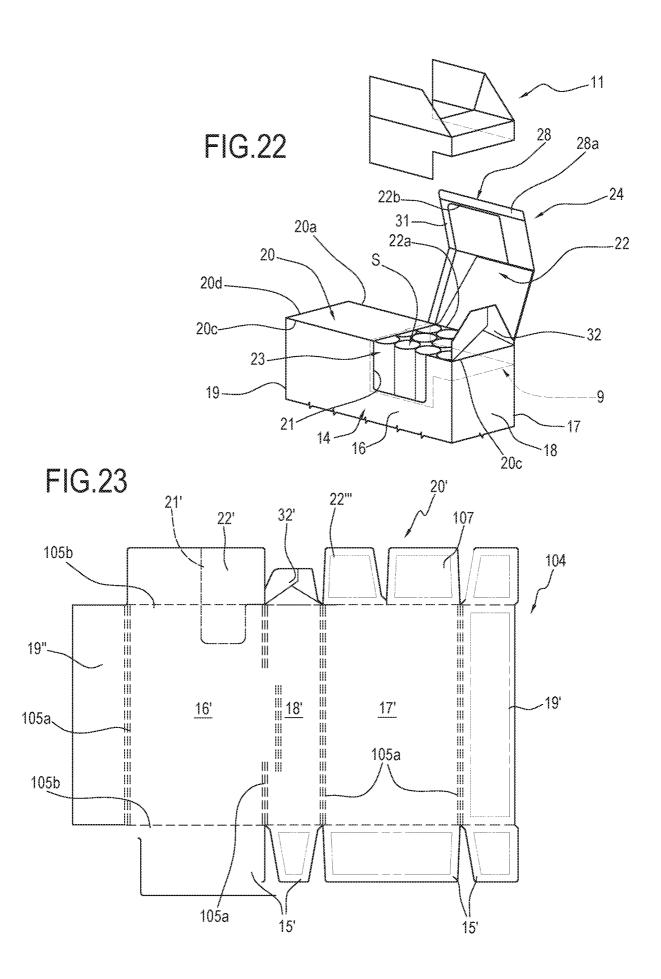


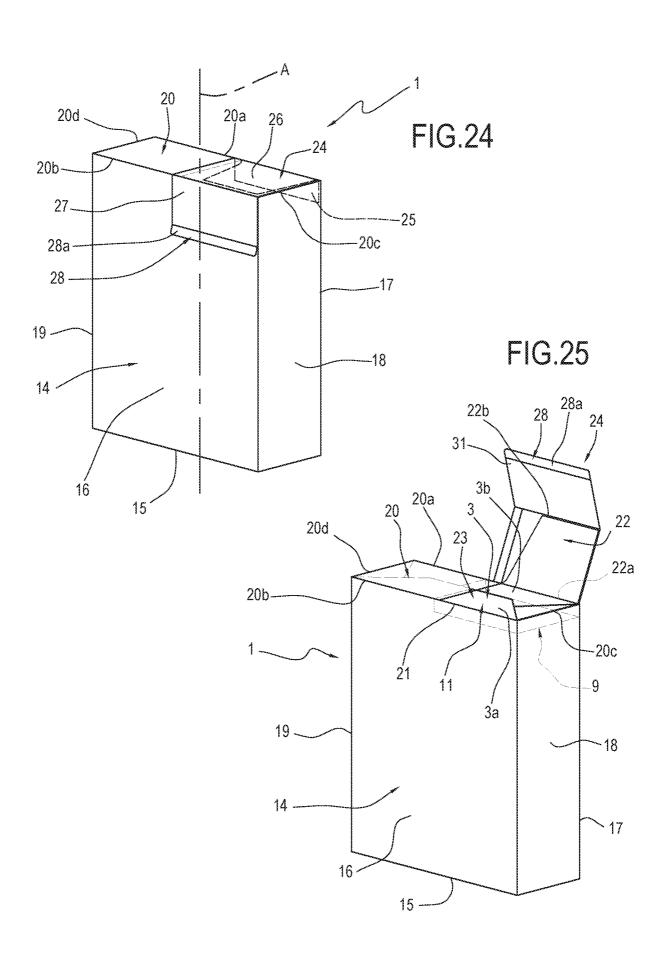


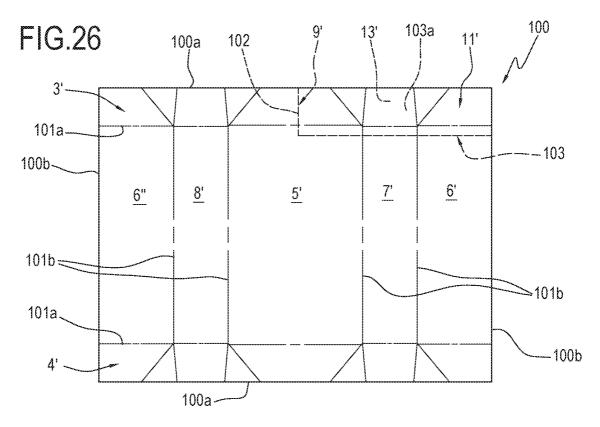












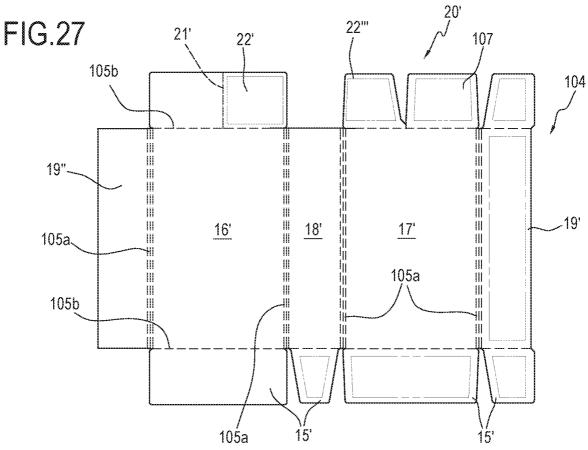
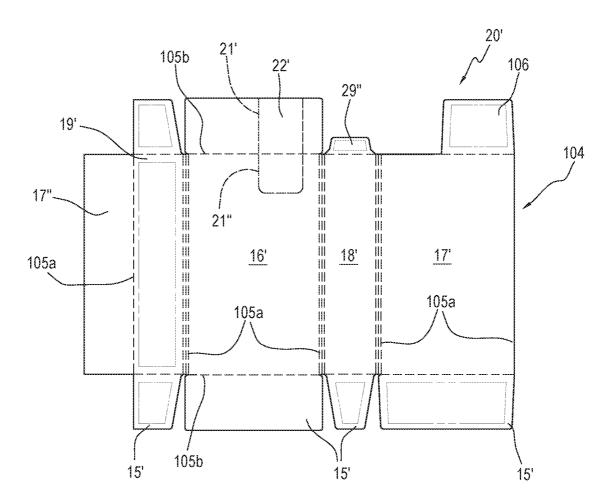


FIG.28



International application No
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A. CLASSIFICATION OF SUBJECT MATTER INV. B65D85/10

ADD.

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

 $\label{eq:bound} \begin{tabular}{ll} Minimum documentation searched (classification system followed by classification symbols) \\ B65D \end{tabular}$

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

EPO-Internal, WPI Data

X !	tation of document, with indication, where appropriate, of the relevant passages WO 2014/013468 A2 (GD SPA [IT]) 23 January 2014 (2014-01-23) page 3, lines 7-10 page 4, lines 10-16 page 8, line 16 - page 9, line 25	Relevant to claim No.
A 1	23 January 2014 (2014-01-23) page 3, lines 7-10 page 4, lines 10-16 page 8, line 16 - page 9, line 25	1,4,9,11
	page 11, line 3 - page 12, line 18; figures 1,3,8-10	
	WO 2013/131620 A1 (PHILIP MORRIS PROD [CH]) 12 September 2013 (2013-09-12) page 13, paragraph 2 - page 15, paragraph 2; figures 1-8	1-11
	DE 10 2010 027175 A1 (FOCKE & CO [DE]) 19 January 2012 (2012-01-19) the whole document	1-11

Y Further documents are listed in the continuation of Box C.	X See patent family annex.
* Special categories of cited documents: "A" document defining the general state of the art which is not considered to be of particular relevance "E" earlier application or patent but published on or after the international filing date "L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified) "O" document referring to an oral disclosure, use, exhibition or other means "P" document published prior to the international filing date but later than the priority date claimed	"T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention "X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone "Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art "&" document member of the same patent family
Date of the actual completion of the international search	Date of mailing of the international search report
18 August 2015	27/08/2015
Name and mailing address of the ISA/	Authorized officer
European Patent Office, P.B. 5818 Patentlaan 2 NL - 2280 HV Rijswijk Tel. (+31-70) 340-2040, Fax: (+31-70) 340-3016	Leijten, René

International application No
PCT/IB2015/054578

5/5		PCT/IB2015/054578
C(Continua	tion). DOCUMENTS CONSIDERED TO BE RELEVANT	
Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Α	EP 2 366 637 A1 (GD SPA [IT]) 21 September 2011 (2011-09-21) the whole document	1-11
Α	DE 10 2008 035467 A1 (FOCKE & CO [DE]) 4 February 2010 (2010-02-04) the whole document	1-11
Α	WO 99/37559 A1 (FOCKE & CO [DE]; FOCKE HEINZ [DE]; BUSE HENRY [DE]) 29 July 1999 (1999-07-29) the whole document	1
Α	US 5 333 729 A (WOLFE PATRICIA K [US]) 2 August 1994 (1994-08-02) the whole document	1
Α	US 2 338 041 A (KING CARL B) 28 December 1943 (1943-12-28) the whole document	1
А	WO 2011/018704 A2 (GD SPA [IT]; GHINI MARCO [IT]; POLLONI ROBERTO [IT]; BIONDI ANDREA [IT) 17 February 2011 (2011-02-17) page 11, lines 9-27; figure 7	1
Α	US 6 244 435 B1 (CHO MYONG HO [KR]) 12 June 2001 (2001-06-12) column 11, lines 32-54; figures 11-14	1
Α	US 5 080 227 A (FOCKE HEINZ [DE]) 14 January 1992 (1992-01-14) column 4, line 50 - column 5, line 24; figure 9	1
Α	US 2 096 102 A (GORDON EDWIN I) 19 October 1937 (1937-10-19) page 1, lines 28-118; figures 1-7	1

Information on patent family members

International application No
PCT/IB2015/054578

	dand dan		Dublic -ti- :-	Potent formily Dublication
	atent document I in search report		Publication date	Patent family Publication member(s) date
WO	2014013468	A2	23-01-2014	CN 104507823 A 08-04-2015 PH 12014502755 A1 09-02-2015 WO 2014013468 A2 23-01-2014
WO	2013131620	A1	12-09-2013	NONE
DE	102010027175	A1	19-01-2012	CN 103003172 A 27-03-2013 DE 102010027175 A1 19-01-2012 EP 2593382 A1 22-05-2013 JP 5706524 B2 22-04-2015 JP 2013536129 A 19-09-2013 WO 2012007081 A1 19-01-2012
EP	2366637	A1	21-09-2011	EP 2366637 A1 21-09-2011 JP 2011251766 A 15-12-2011 US 2012006823 A1 12-01-2012
DE	102008035467	A1	04-02-2010	CN 102112378 A 29-06-2011 DE 102008035467 A1 04-02-2010 EP 2310300 A1 20-04-2011 JP 5398832 B2 29-01-2014 JP 2011529421 A 08-12-2011 US 2011114518 A1 19-05-2011 WO 2010012370 A1 04-02-2010
WO	9937559	A1	29-07-1999	AU 2420299 A 09-08-1999 BR 9907266 A 14-11-2000 CN 1289300 A 28-03-2001 DE 19802800 A1 29-07-1999 DE 59903246 D1 05-12-2002 EP 1051340 A1 15-11-2000 ES 2187141 T3 16-05-2003 JP 4191381 B2 03-12-2008 JP 2002500993 A 15-01-2002 PL 341905 A1 07-05-2001 TR 200002188 T2 21-12-2000 US 6390290 B1 21-05-2002 WO 9937559 A1 29-07-1999
US	5333729	Α	02-08-1994	NONE
US	2338041	Α	28-12-1943	NONE
WO	2011018704	A2	17-02-2011	CA 2771033 A1 17-02-2011 EP 2464583 A2 20-06-2012 EP 2532607 A1 12-12-2012 JP 5643310 B2 17-12-2014 JP 2013527822 A 04-07-2013 KR 20120074274 A 05-07-2012 RU 2012109398 A 20-09-2013 US 2012211380 A1 23-08-2012 US 2014131232 A1 15-05-2014 US 2014131234 A1 15-05-2014 WO 2011018704 A2 17-02-2011
US	6244435	B1	12-06-2001	NONE
US	5080227	Α	14-01-1992	BR 9005008 A 10-09-1991

Information on patent family members

International application No
PCT / I B 2 0 1 5 / 0 5 4 5 7 8

1	CA DE	2027044 A1 3933455 A1	07-04-1991
	EP ES JP US	0421311 A1 2064581 T3 H03212386 A 5080227 A	18-04-1991 10-04-1991 01-02-1995 17-09-1991 14-01-1992
US 2096102 A 19-10-193	7 NONE		