



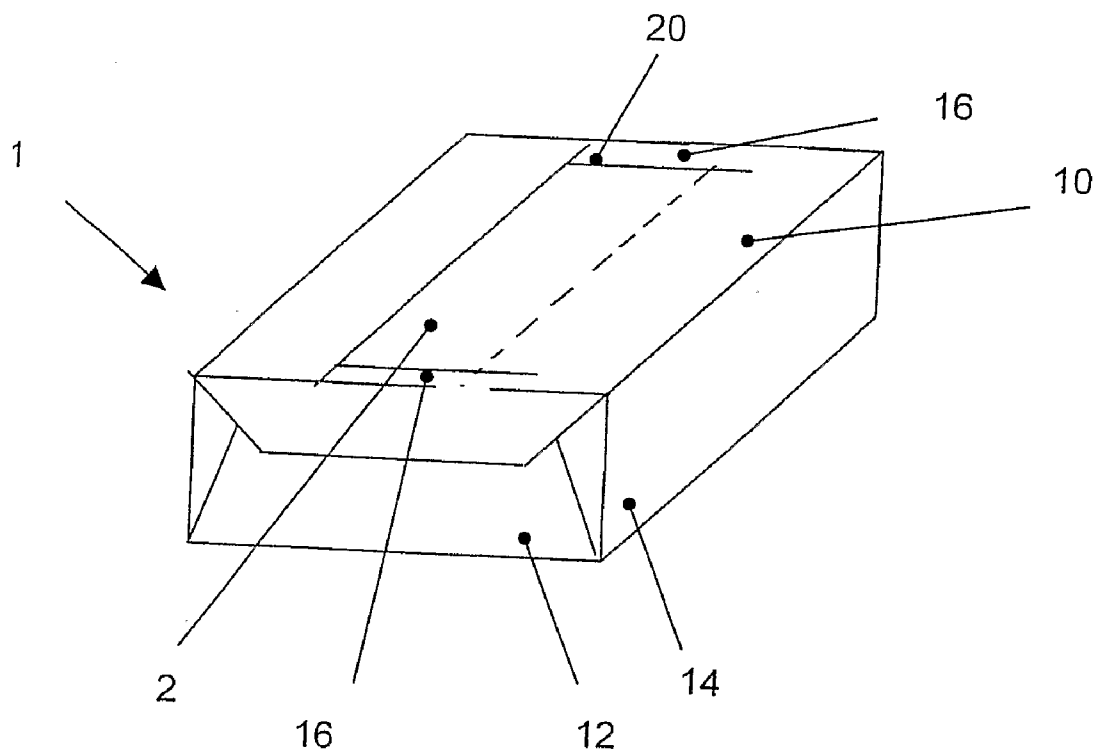
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Arndt-Jakob et al.(10) **Pub. No.: US 2009/0090717 A1**(43) **Pub. Date: Apr. 9, 2009**(54) **SOFTPACK****Publication Classification**(75) Inventors: **Kerstin Arndt-Jakob**, Mannheim
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ALEXANDRIA, VA 22314 (US)(57) **ABSTRACT**(73) Assignee: **SCA HYGIENE PRODUCTS**
GMBH, MANNHEIM (DE)(21) Appl. No.: **12/278,578**(22) PCT Filed: **Feb. 8, 2006**(86) PCT No.: **PCT/EP2006/001088**§ 371 (c)(1),
(2), (4) Date: **Aug. 7, 2008**

The invention relates to a softpack (1) formed by folding a blank provided with at least one opening and closing mechanism in a first overlapping zone; the opening and closing mechanism comprising a sealing flap (2) and an extension (3); the sealing flap (2) overlapping the extension (3) at least partially in the first overlapping zone; the sealing flap (2) and the extension (3) being formed by cuts (20) or perforations located on opposing edges of the blank which are contacting each other in the first overlapping zone; an overlapping material (16) in the first overlapping zone besides the sealing flap (2) and the extension (3) being bonded; and the opening and closing mechanism being positioned on a largest surface (10) of the softpack (1).



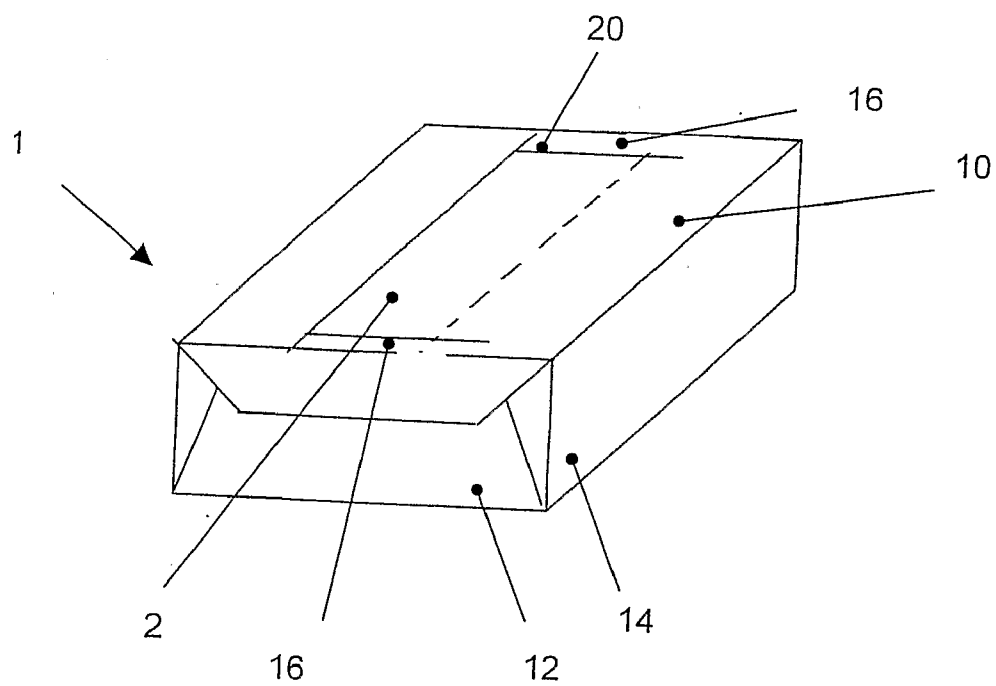


Fig. 1a

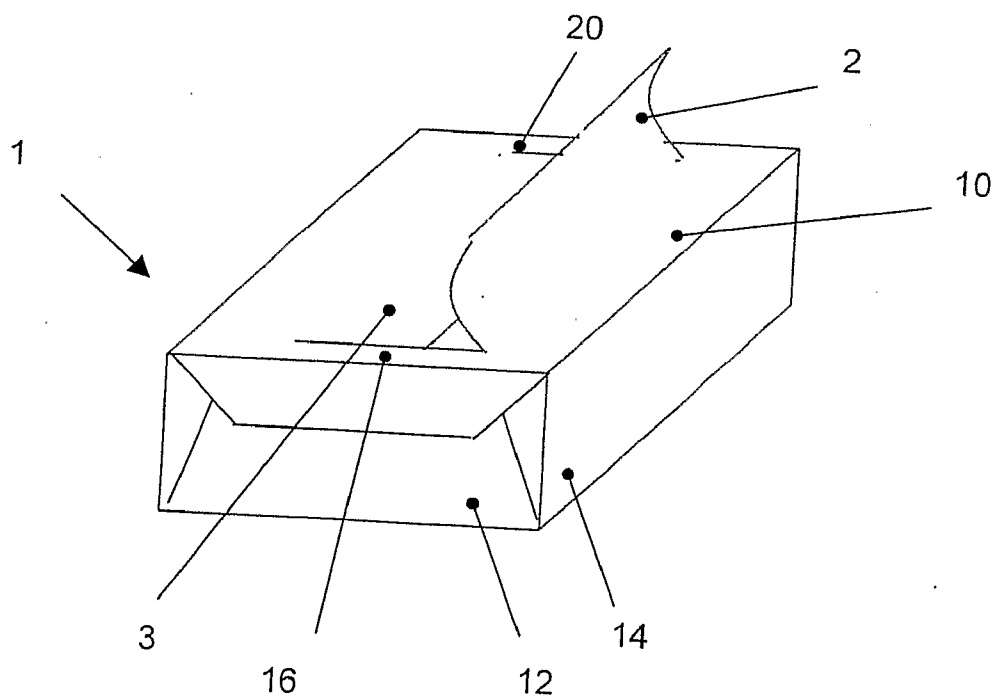


Fig. 1b

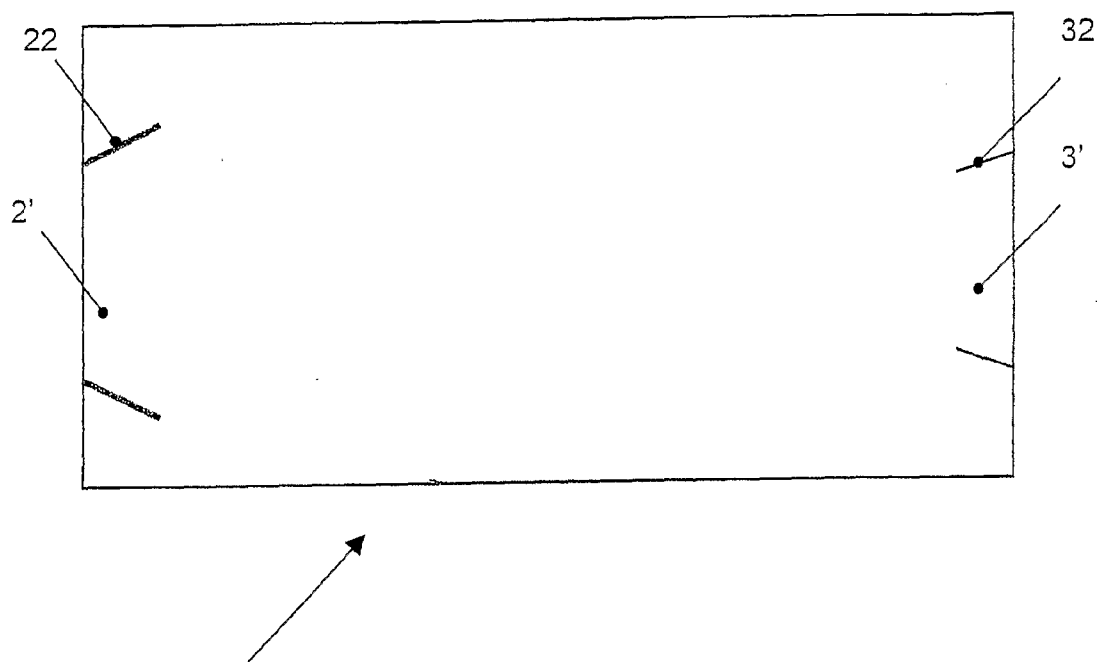


Fig. 2a

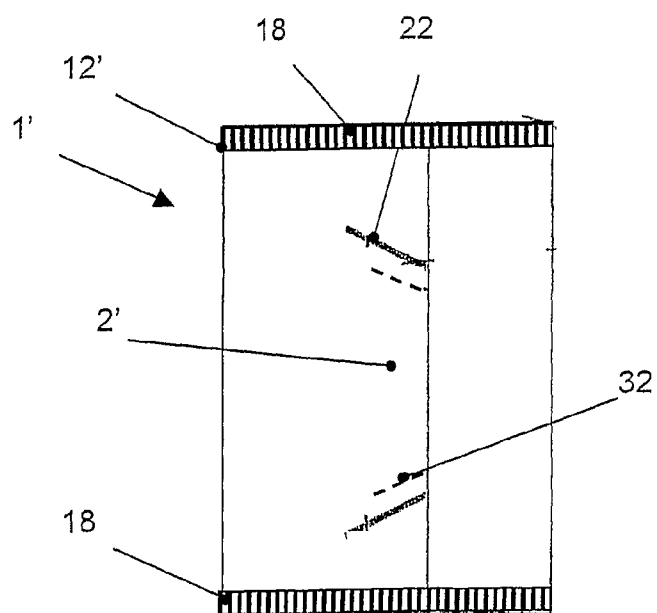


Fig. 2b

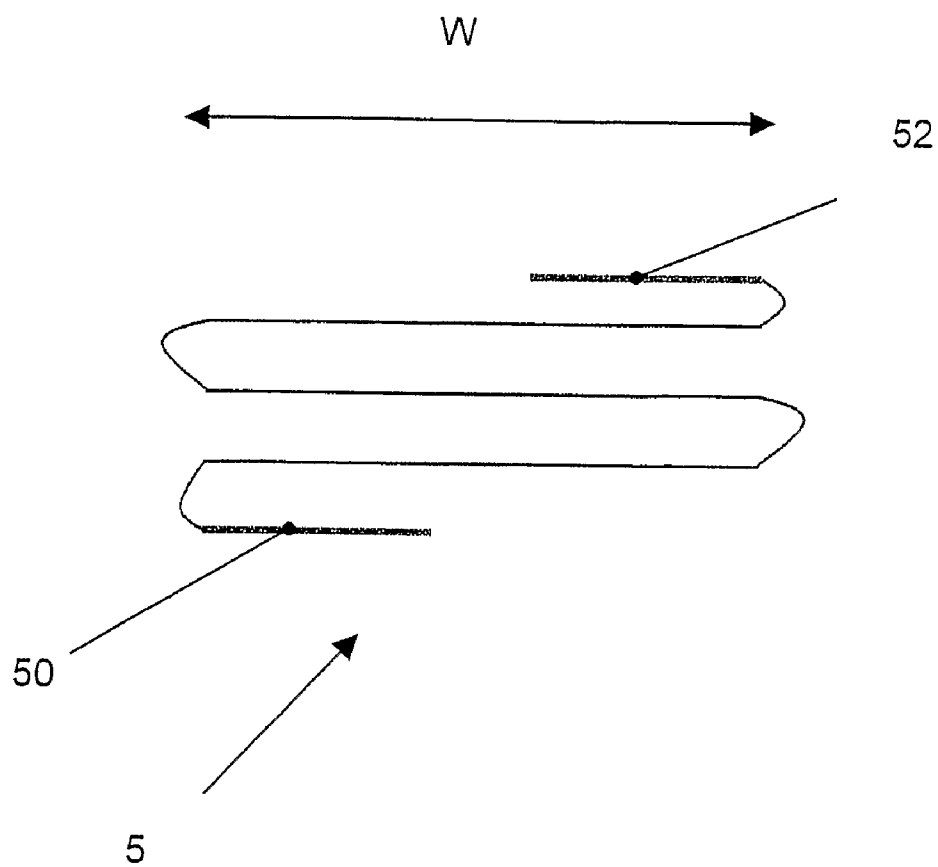


Fig. 3

SOFTPACK

TECHNICAL FIELD

[0001] The invention relates to a softpack formed by folding a blank and provided with at least one opening and closing mechanism in a first overlapping zone in accordance with the preamble of claim 1. The invention further relates to a method for folding tissues to be enwrapped in a softpack.

PRIOR ART

[0002] Softpacks for tissues such as handkerchiefs or facial tissues are very popular. Known softpacks are for example provided with a perforation on the front side for forming an opening aid or tear open flap. The softpack may further be provided with a tape on the tear open flap for closing the softpack after being torn open. The tape further facilitates opening of the pack.

[0003] Softpacks for wrapping handkerchiefs equipped with a reclosable opening aid consisting of a tear open flap are for example disclosed in U.S. Pat. No. 5,796,113. The softpack is further provided with an adhesive label covering the tear open flap for improving the stability and handiness of the softpack.

[0004] Manufacturing of a softpack provided with a perforation for forming the opening aid is very cost effective. However, when closing the pack after being torn open, a gap in the pack is only covered with a minimum of material and dirt may enter the pack.

[0005] In order to avoid dirt from entering into the pack, the size of the gap may be kept very small. However, this may reduce the convenience for a user removing a tissue from the softpack.

[0006] U.S. Pat. No. 6,318,625 B1 discusses a softpack for tissues provided with an opening and closing mechanism in a first overlapping zone, which is located on an upper side of the softpack. The opening and closing mechanism comprises a sealing flap and an extension which are formed by slots. Only the material overlapping in edge areas of the upper side is bonded together by heat effect. The sealing flap is fixed to the extension by a pressure sensitive adhesive. Further, a tape is provided for closing the softpack after first opening. Tissues remaining in the softpack after the first opening are well protected. However, the size of the gap is limited to the size of the side. Further, tissues are gripped on their small folded edges for a removal from the softpack.

SUMMARY OF THE INVENTION

[0007] It is the object of the invention to provide a softpack for tissues in which tissues are protected against dirt and which allows an easy removal of tissues from the softpack. It is a further object of the present application to provide a method of folding tissues for an easy removal from a softpack.

[0008] These objects are solved by a softpack with the features of claim 1 and a method with the features of claim 12.

[0009] It is the basic idea of the invention to provide an opening and closing mechanism comprising a sealing flap and an extension wherein the sealing flap is overlapping the extension at least partially in a first overlapping zone, the sealing flap and the extension being formed by slots located on opposing edges of a blank which are contacting each other in the first overlapping zone, and an overlapping material and the first overlapping zone besides the sealing flap and the

extension is bonded, and wherein the opening and closing mechanism is positioned on a largest surface of the softpack. Positioning the opening and closing mechanism on a largest surface of the softpack is making it possible to increase the gap. As the sealing flap and the extension are overlapping each other at least partially covering the gap, dirt is prevented from entering the softpack after the first opening. For a good protection, preferably the sealing flap is fully overlapping the extension. Preferably tissues are folded and placed lengthwise in the pack so that their surfaces coincide with the gap. This allows the tissue to be gripped very easily for a removal from the softpack.

[0010] According to a further feature of the invention, the sealing flap and/or the extension are formed by straight cuts or perforations. Fixed cuts or perforations may be produced very cost effectively. Endings of the cuts may be provided with additional cuts for preventing a rupture of the opening flap and/or the extension.

[0011] According to another feature of the invention, the sealing flap and/or the extension are formed by angled cuts or perforations. An angled cut or perforation further improves the protection of the tissues in softpack.

[0012] According to an advantageous development of the inventive softpack, the width of the sealing flap differs from the width of the extension. In particular, the position of the cuts or perforations does not coincide in the overlapping zone. This results in an enhanced protection of the tissues. Preferably the sealing flap is wider than the extension for a higher convenience when opening and closing the softpack.

[0013] According to another embodiment of the invention, the sealing flap and/or the extension are sealed or covered with an adhesive. The sealing or the adhesive enhance the protection of the tissues in a softpack before the first opening.

[0014] In another embodiment of the invention the overlapping material in the first overlapping zone beside the sealing flap and the extension is bonded by welding. Heat welding is a well-known process for bonding overlapping zones of a softpack, in particular, if the softpack is made of film. If the softpack is made of paper or the like, the overlapping material in the first overlapping zone may, for example, be bonded by adhesive.

[0015] According to another feature of the invention, the opening and closing mechanism comprises a tape. The tape enhances the closing of the softpack after the first opening. Additionally, the tape simplifies opening the softpack.

[0016] According to another embodiment of the invention, the softpack is having a form of a cuboid with a rectangular top surface. Typically, the cuboid has three different lengths. However, embodiments having two generally equal lengths are possible.

[0017] In another embodiment of the invention, tissues such as hankies, facial tissues, napkins or the like are wrapped in the softpack. The softpack is preferably formed by wrapping a blank of film, paper or another packing material about the tissues. Overlapping zones on the side of the softpack may project from the softpack. However, preferably the overlapping zones on the sides are folded and abut the sides of the enwrapped tissues. Preferably the tissues are wrapped, so that they are placed lengthwise in the softpack and their top surfaces are generally parallel to the top surface of the softpack.

[0018] In another embodiment of the invention, the tissues in the softpack are folded with at least one edge being shorter than the width of the folded tissues and align within the

opening and closing mechanism. When the pack is opened, the loose edge can be gripped very easily and the access to the tissues is further improved.

[0019] In another embodiment, the tissues are interfolded so that the tissues may be C-, V- or Z-folded. In this embodiment, the access to the tissues is further improved. Folding according to the invention can be carried out by using conventional folding process technology, preferably by using crossfolding of longfolding technology.

[0020] It is another basic idea of the invention to provide tissues folded with at least one edge being shorter than the width of the folded tissue. Such tissues may be wrapped by any softpack. Preferably the tissues are wrapped in a softpack having an access gap on the side wherein the tissue can be gripped on the loose edge coinciding with the access gap.

BRIEF DESCRIPTION OF THE DRAWINGS

[0021] In the following, two embodiments of the invention will be described in detail based on several schematic drawings in which

[0022] FIG. 1a is a schematic view of a softpack having a sealing flap and an extension flap formed by straight cuts;

[0023] FIG. 1b is a schematic view of the softpack in accordance with FIG. 1a, wherein the sealing flap is opened;

[0024] FIG. 2a is a schematic view of a blank for forming a softpack with angled cuts;

[0025] FIG. 2b is a schematic top view of a softpack formed by folding the blank of FIG. 2a; and

[0026] FIG. 3 is a schematic view of a folded tissue.

DETAILED DESCRIPTION OF PREFERRED EMBODIMENTS

[0027] In the following, preferred embodiments of the invention will be described in detail with reference to the drawings. Throughout the drawings, the same elements will be denoted by the same reference numerals.

[0028] In FIG. 1a a schematic view of a softpack 1 is shown. The softpack is formed in form of a cuboid having a top surface 10 and sides 12, 14. On the top surface 10, an opening and closing mechanism is provided comprising a sealing flap 2 and an extension, which is not visible in FIG. 1a as the sealing flap 2 overlaps the extension completely. The sealing flap 2 is formed by straight cuts 20.

[0029] FIG. 1b shows the softpack of FIG. 1a, wherein the sealing flap 2 is opened. The extension 3 is still closed, covering none-visible tissues wrapped in the softpack 1.

[0030] The size of an access gap to the tissues is depending on the length of the cuts 20. As the access gap is positioned on the top surface 10 of the softpack 1, the size of the access gap may be increased compared to an access gap provided on the side surfaces 12, 14. As the sealing flap 2 is overlapping the extension 3, a good protection of tissues wrapped in the softpack is achieved.

[0031] Overlapping material 16 in the overlapping zone besides the sealing flap 2 is preferably bonded by welding. The sealing flap and the extension are not welded but may be sealed or covered with an adhesive.

[0032] On the side 12 of the softpack 1, the ends of a blank folded for forming the softpack are overlapping and abutting tissues wrapped in the softpack 1. Instead of folding the ends of the blank on the sides, the overlapping ends may be bonded, e.g. by heat welding, and project from the sides 12.

[0033] FIG. 2a shows schematically a blank 4 for forming a second embodiment of an inventive softpack 1'. The blank 4 is provided with angled cuts 22 for forming a sealing flap 2'. The blank 4 is further provided with angled cuts 32 for forming an extension 3'.

[0034] FIG. 2b shows schematically a top view of the softpack 1' formed by folding a blank 4 of FIG. 2a. As can be best seen in FIG. 2b, the cuts 22 of the sealing flap 2' do not coincide with the cuts 32 for forming the extension 3'. As a result, the sealing flap 2' overlaps the sides of the extension 3' and the protection of tissues wrapped in the softpack 1' is improved.

[0035] The overlapping zones 18 on sides 12' are not folded. In the depicted embodiment, the overlapping zones 18 are bonded by heat welding and project from the sides 12'.

[0036] FIG. 3 shows schematically a tissue 5 to be wrapped by an inventive softpack. The tissue is folded so that edges 50, 52 are shorter than the width W of the folded tissue 5. Preferably both edges 50, 52 are shorter and adjacent tissues 5 are interfolded.

[0037] When wrapped by an inventive softpack, the loose edge 52 coincides with an access gap of the softpack. Therefore, the tissue 5 can be easily gripped on the loose edge 52.

1-13. (canceled)

14. Softpack formed by folding a blank and provided with at least one opening and closing mechanism in a first overlapping zone;

the opening and closing mechanism comprising a sealing flap and an extension;

the sealing flap overlapping the extension at least partially in the first overlapping zone;

the sealing flap and the extension being formed by cuts and/or perforations located on opposing edges of the blank which are contacting each other in the first overlapping zone; and

an overlapping material in the first overlapping zone besides the sealing flap and the extension being bonded; wherein the opening and closing mechanism is positioned on a largest surface of the softpack.

15. Softpack in accordance with claim 14, wherein the sealing flap and/or extension are formed by straight cuts or perforations in machine direction.

16. Softpack in accordance with claim 14, wherein the sealing flap and/or the extension are formed by angled cuts or perforations.

17. Softpack in accordance with claim 14, wherein the width of the sealing flap differs from the width of the extension.

18. Softpack in accordance with claim 14, wherein the sealing flap and/or the extension are sealed or covered with adhesive.

19. Softpack in accordance with claim 14, wherein the overlapping material in the first overlapping zone besides the sealing flap and the extension is bonded by welding.

20. Softpack in accordance with claim 14, wherein the opening and closing mechanism comprises a tape.

21. Softpack in accordance with claim 14, being in the form of a cuboid, wherein the top surface is rectangular.

22. Softpack in accordance with claim 14, wherein tissues selected from the group consisting of hankies, facial tissues, and napkins are wrapped.

23. Softpack in accordance with claim **22**, wherein tissues folded with at least one edge being shorter than the width of the folded tissue and the edge lying within the opening and closing mechanism.

24. Softpack in accordance with claim **22**, wherein adjacent tissues are interfolded.

25. Method of folding a tissue with at least one edge being shorter than the width of the folded tissue wherein the folding process is carried out by using crossfolding or longfolding technology.

26. Method of folding a tissue with at least one edge being shorter than the width of the folded tissue which comprises; carrying out the folding process by using crossfolding or longfolding technology, and wrapping the tissue in a softpack in accordance with claim **14**.

27. Softpack in accordance with claim **15**, wherein the sealing flap and/or the extension are formed by angled cuts or perforations.

28. Softpack in accordance with claim **15**, wherein the width of the sealing flap differs from the width of the extension.

29. Softpack in accordance with claim **15**, wherein the sealing flap and/or the extension are sealed or covered with adhesive.

30. Softpack in accordance with claim **15**, wherein the overlapping material in the first overlapping zone besides the sealing flap and the extension is bonded by welding.

31. Softpack in accordance with claim **15**, wherein the opening and closing mechanism comprises a tape.

32. Softpack in accordance with claim **15**, being in the form of a cuboid, wherein the top surface is rectangular.

33. Softpack in accordance with claim **16**, wherein the width of the sealing flap differs from the width of the extension.

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