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(54) **A clothes wrapper**

(57) A clothes wrapper comprises a double sheet of a film of a synthetic material, bound by two straight, longitudinal borders, by an upper transverse border (SS) and by a lower transverse border (ST), and joined together along one of the straight, longitudinal borders (LC) and along the upper transverse border (SS). The other longitudinal border is provided with two free longitudinal flaps (BL1, BL2). A longitudinal stripe (SL), adjacent to and integral with one of the free longitudinal flaps (BL2) extends substantially for the entire length of the sheet and is joined to it along the upper transverse border (SS).

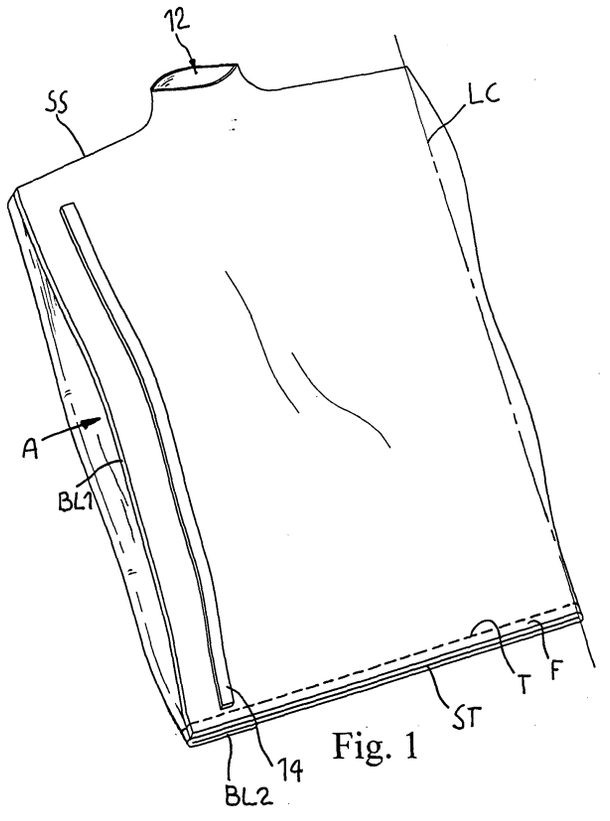

Fig. 1

EP 1 520 805 A1

Description

[0001] This invention is concerned with a clothes wrapper made of a film of a synthetic material such as polyethylene or polypropylene.

[0002] In homes, as well as in shops, laundries, etc., it is usual to cover clothes such as coats, jackets and the like, inside protective wrappers during periods of non-use, in order to protect them from dust, moths and other damaging environmental agents. More particularly, the invention is concerned with throwaway wrappers to be mass-produced on processing lines handling polyethylene or polypropylene. Such wrappers consist substantially of a thin-film tube that is closed at one end and is open at the opposite end for insertion of a garment, the latter usually being carried on a dress-hanger.

[0003] The above wrappers are inconvenient in use, because the user must hold the garment with one hand, and has only one free hand for fitting the wrapper around it. Moreover, the position of the opening at the bottom of the wrapper makes the operation awkward.

[0004] Another drawback of the above known wrappers, while they do protect clothes from dust, they allow moths and other damaging environmental agents to attack and damage the garment through their bottom openings.

[0005] It is therefore the main object of this invention to provide a clothes wrapper made of a film of a synthetic material, which is easier to be fitted onto a garment and which will provide a better protection for the item of clothing against moths and other possible harmful agents such as moisture, dust, and the like.

[0006] The above and other objects and advantages, such as will appear below, are achieved by the press-and-blow machine having the features recited in claim 1, while the subordinate claims identify other advantageous though unessential features of the machine.

[0007] The invention will now be described in more detail, as shown by way of indicative and not limiting example in the attached drawings, wherein:

Figure 1 is a perspective view of a clothes wrapper according to the invention;

Figure 2 is a in view in transverse cross-section of the clothes wrapper according to the invention;

Figure 3 is a front view of the wrapper in a first step of insertion of a garment;

Figure 4 is a front view of the wrapper in a second step of insertion of a garment;

Figure 5 is an enlarged view in cross-section of a detail of the wrapper, made along line V-V of Fig. 4;

Figures 6 to 8 show three successive steps in the manufacture of the wrapper.

[0008] It should be noted that the thickness of the film comprising the wrapper has been exaggerated in the drawings for the sake of clarity.

[0009] With initial reference to Figure 1 and 2, a clothes wrapper 10 according to the invention consists of a sheet of a synthetic material, preferably polyethylene, that has been folded about a longitudinal line LC and joined along a lower transverse border by a cross-weld ST and along an upper transverse border by a profiled weld SS extending along a line defining the shoulder profile of a generic garment. One of the two free flaps BL1, BL2 (flap BL2 in the Figures) extends to project laterally farther than the other longitudinal flap (flap BL1 in the Figures), is folded outwardly upon the adjoining wall to form a longitudinal stripe SL, and is joined to the sheet along welds ST and SS. A side opening A in the wrapper is thus provided on the longitudinal border opposite longitudinal line LC. Profiled weld SS is broken over an intermediate space to provide a passage 12, for purposes described below.

[0010] A longitudinal piece of double-face adhesive tape 14 is applied on the outward surface of the sheet opposite to the surface upon which the longitudinal stripe SL is folded, near the corresponding free flap (BL1 in the Figures).

[0011] Finally, near the lower transverse weld ST extends a transverse pre-cut T, defming a transverse portion of the bottom F which can be torn away by hand for purposes appearing below.

[0012] As shown on Figs. 3 and 4, a generic garment 16, hanging on a dress-hanger 18, is inserted sidewise into wrapper 10 through opening A, in the direction of arrows F, while a hook G of the dress-hanger is pushed through passage 12. The longitudinal stripe SL on the opposite wall of the wrapper (Figs. 4 and 5) is then folded so that it will act as a flap to close opening A, and the closure is then ensured by fastening the longitudinal stripe SL to the material of the wrapper by means of the double-face adhesive tape 14.

[0013] Should the garment to be covered be longer than the longitudinal length of the wrapper, the bottom transverse portion F is torn away so that the wrapper is opened at its base and allows the garment to project outwardly.

[0014] A preferred process for mass-manufacturing the wrapper of the invention is described below, with reference to a processing line for handling file of polyethylene or polypropylene.

[0015] As shown on Figs. 6 to 8, a ribbon of polyethylene N unwinds from a drum (not shown) to be progressively folded upon itself along a longitudinal line LC, which is offset from the midline LM of the ribbon, so that one of both side borders ML1, ML2 will project from the sheet laterally (ML2 in the figures). The projecting lateral strip ML2 is then folded externally to the wall with which it is integral, along the edge of the opposite border ML1. A sequence of transverse welds ST1, ST2, ..., and of profiled welds SS1, SS2, ..., the latter extending along

lines substantially defining the shoulder contour of a generic garment, are made at uniform intervals upon the unwinding sheet. The profiled welds SS1, SS2 are made by a pair of symmetrical welding bars (not shown), each intended to make a weld on one of the "shoulders" of the wrapper, while the cut at the neck, intended to provide the passage 12, is made by a blade integral with the bars (not shown). Welds ST and SS are made at a temperature and pressure such that they will also cause the material to be cut, thereby automatically separating the wrappers from the ribbon. Pre-cuts T1, T2, ... are also made parallelly and in proximity to the welds. Finally, the double-face adhesive tape may be applied manually onto every individual wrapper, or on the ribbon, upstream of the process, by techniques that are common in the art.

[0016] A preferred embodiment of the invention has been described above, but it is understood that a person skilled in the art may make, depending on circumstances, various changes and modifications to it within the inventive idea. In particular, where the wrapper of the invention should be manufactured manually, or by equipment differing from what has been shown above, certain constructive differences may be envisaged with respect to the preferred embodiment disclosed above, which is particularly suitable for mass manufacture at a low cost on conventional installations used for processing synthetic films: the scope of the invention should not limited thereby. For instance, rather than a single sheet folded about a longitudinal line LC, the wrapper might comprise two superposed sheets that are welded along one border. Moreover, the sheets might be glued rather than welded. Finally, any details which, though useful, are unessential for carrying out the invention can be dispensed with: for instance, although the double-face adhesive tape effectively helps to isolate the wrapper from the outside environment, such tape is not essential to achieve the stated objects.

Claims

1. A clothes wrapper comprising a double sheet of a film of a synthetic material, bound by two straight, longitudinal borders, by an upper transverse border (SS) and by a lower transverse border (ST), and joined together along a first of said straight, longitudinal borders (LC) and along said upper transverse border (SS), **characterized in that** the second of said longitudinal borders is provided with two free longitudinal flaps (BL1, BL2) and **in that** it comprises a longitudinal stripe (SL), adjacent to and integral with one of said free longitudinal flaps (BL2) extending substantially for the entire length of the sheet and joined to it along said upper transverse border (SS).

2. The clothes wrapper of claim 1, **characterized in that** said double sheet is also joined along said lower transverse border (ST).

3. The clothes wrapper of claim 2, **characterized in that** said longitudinal stripe (SL) is joined to said double sheet also along said lower transverse border (ST).

4. The clothes wrapper of any of claims 1 to 3, **characterized in that** said upper transverse border (SS) has a passage (12) in an intermediate space.

5. The clothes wrapper of any of claims 1 to 4, **characterized in that** it further comprises fastening means (14) on the stripe and on the sheet, arranged for cooperating to keep the longitudinal stripe (SL) adherent to the sheet material when the stripe is folded over the longitudinal flap opposite the flap with which it is integral.

6. The clothes wrapper of claim 5, **characterized in that** said fastening means (14) consist of a strip of double-face adhesive tape (14), glued externally to the sheet along said opposite flap.

7. The clothes wrapper of any of claims 1 to 6, **characterized in that** said upper transverse border is contoured along a line defining essentially the profile of the shoulder of a generic garment.

8. The clothes wrapper of any of claims 1 to 7, **characterized in that** said synthetic material is polyethylene.

9. The clothes wrapper of any of claims 2 to 8, **characterized in that** it has a transverse pre-cut (T) extending near said lower transverse border (ST) and defining a transverse portion of the bottom (F) which is tearable by hand.

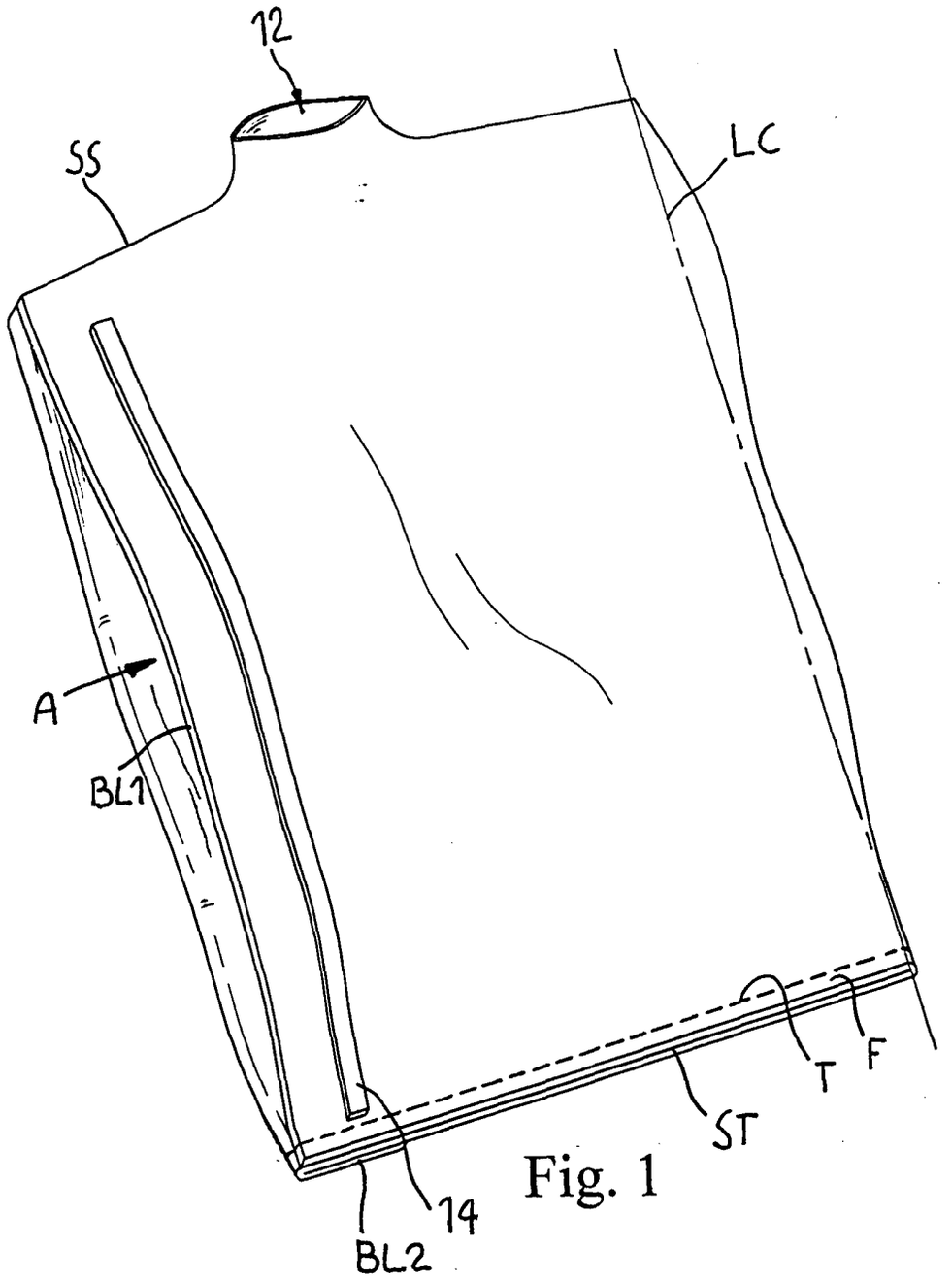

Fig. 1

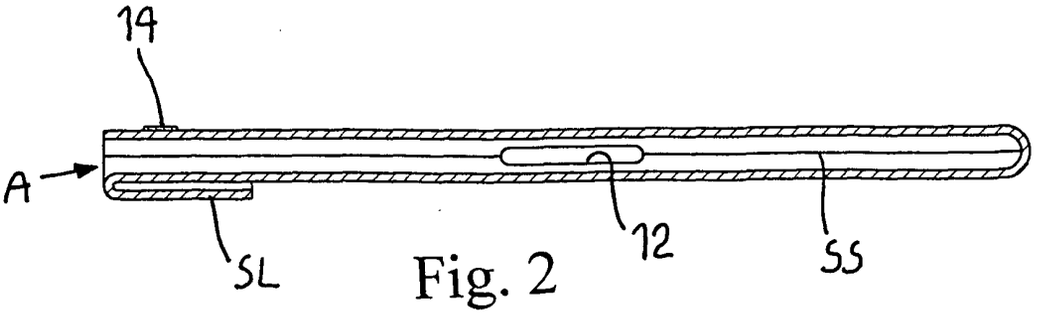

Fig. 2

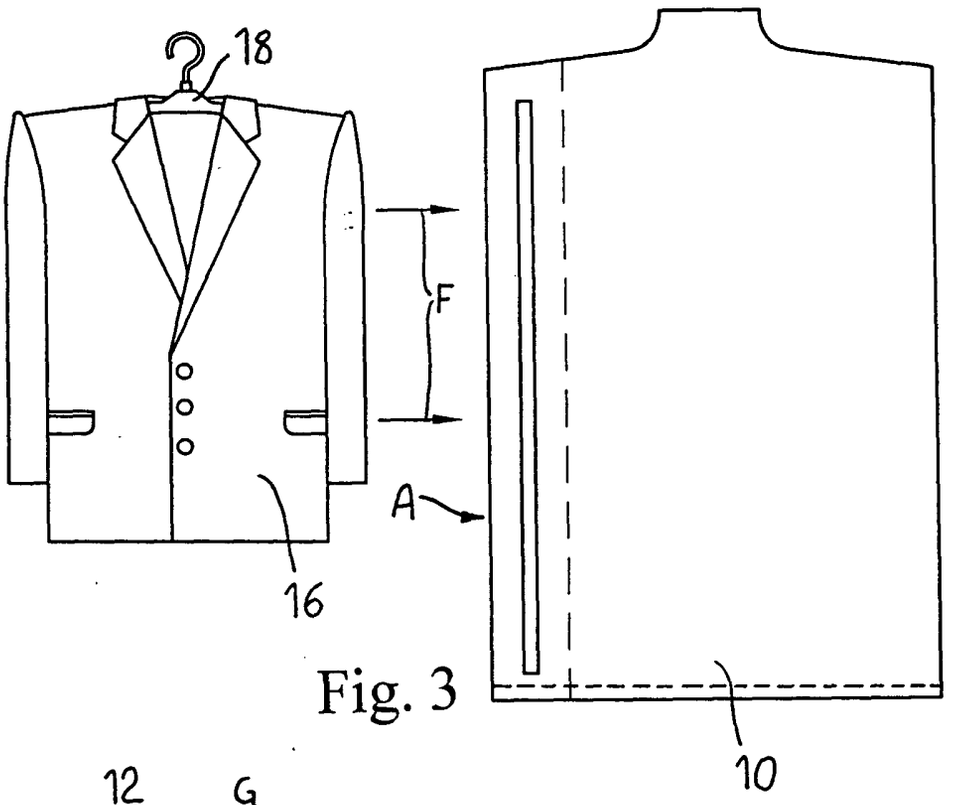

Fig. 3

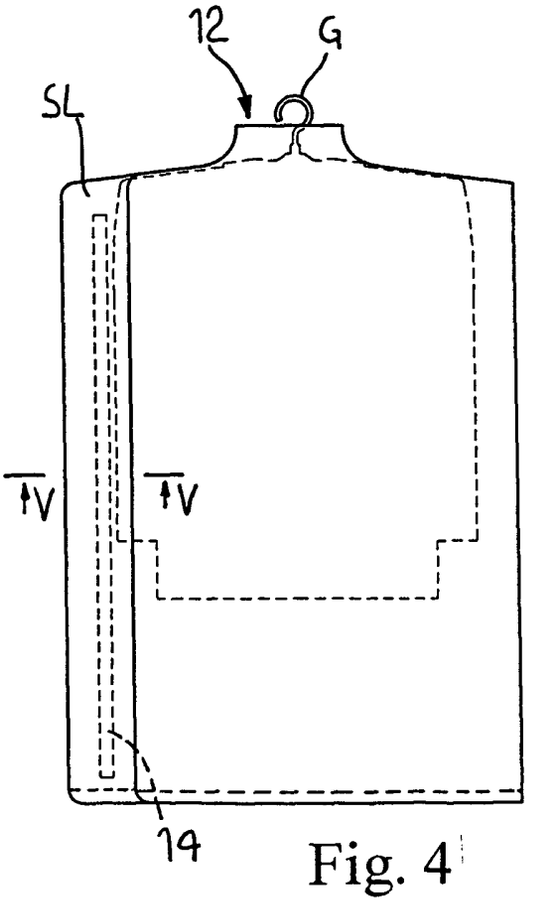

Fig. 4

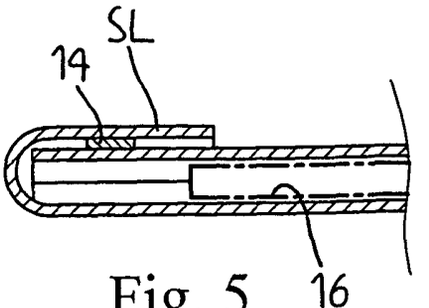

Fig. 5

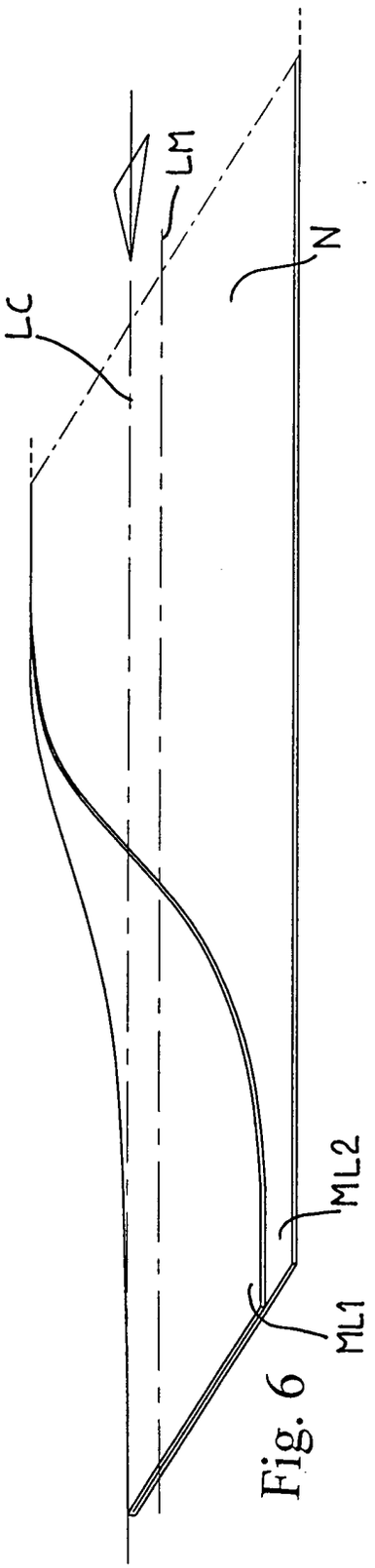

Fig. 6

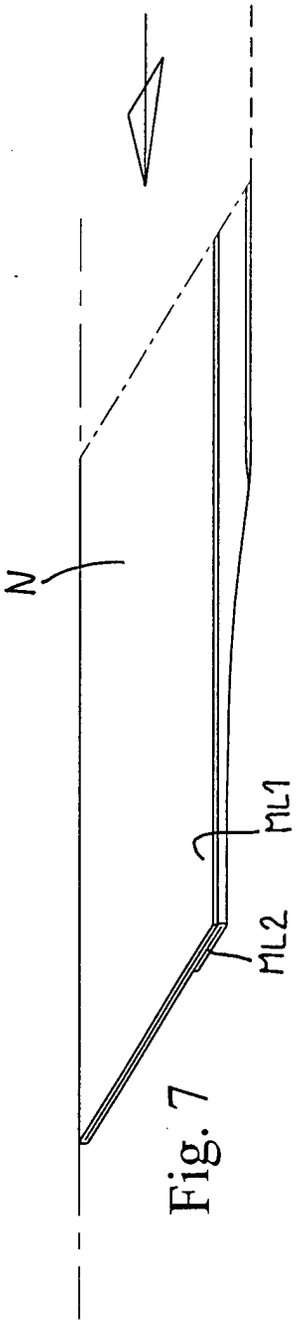

Fig. 7

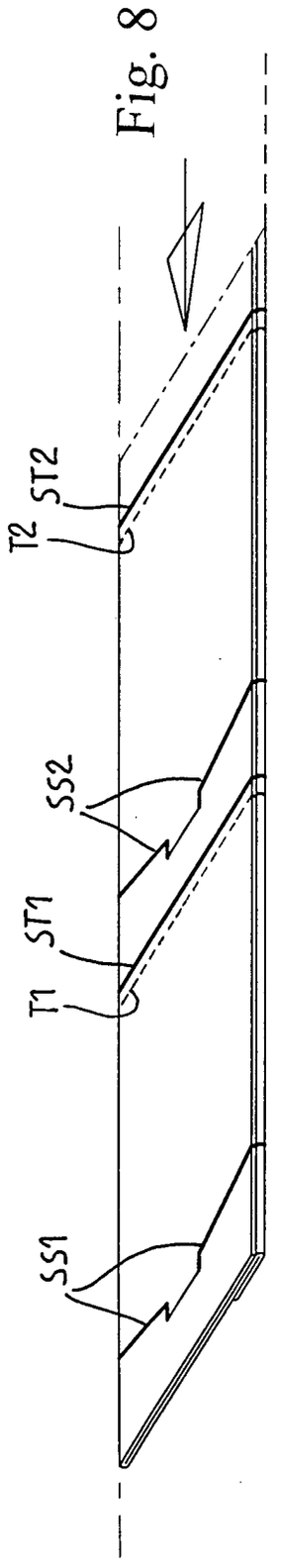

Fig. 8

European Patent Office

EUROPEAN SEARCH REPORT

Application Number
EP 04 02 2995

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The present search report has been drawn up for all claims

Place of search	Date of completion of the search	Examiner
Munich	11 January 2005	Balz, O

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