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# **EUROPEAN PATENT APPLICATION**

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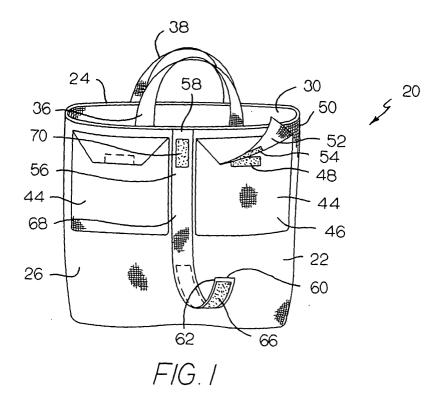
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## (54) Tote bag with a single strap and pockets

(57) A tote bag assembly (74) that comprises a primary tote bag (20) that has at least one handle (36,38) affixed thereto and a secondary tote bag (78) that has at least one handle affixed thereto. The secondary tote bag (78) is in a rolled up condition, and the primary tote bag (20) is in a rolled up condition so as to encompass the rolled up secondary tote bag (78). The primary tote bag has a single strap (56) affixed thereto so as to be

mediate of the handle (36,38). The single strap (56) is attachable to itself, the single strap (56) being in either: a secure condition wherein the single strap (56) encircles the rolled up primary tote bag (20) and the rolled up secondary tote bag (78) and the single strap (56) being attached to itself so as to maintain the primary tote bag (20) and secondary tote bag (78) in the rolled up condition; or an unsecure condition wherein the strap (56) is not attached to itself.



#### Description

#### BACKGROUND OF THE INVENTION

**[0001]** This invention relates generally to a single primary tote bag, as well as a tote bag system that comprises a plurality of tote bags wherein there is the primary tote bag and one or more secondary tote bags. More specifically, the invention pertains to a single primary tote bag, as well as to the above-mentioned tote bag system, wherein the primary tote bag has at least one pocket and a single strap so as to secure the primary tote bag (or the tote bag system) in a compact, self-contained condition so that the primary tote bag (or tote bag system) is easy to transport and store.

[0002] In the past, tote bags have been used for a variety of purposes, and particularly, by individuals desiring to transport small items from one place to another. For example, tote bags have been used by individuals to transport and store knitting materials and to transport items such as suntan lotion, towels and radios to and from a beach or lake. In light of heightened environmental concerns due to the use of the throwaway paper and/ or plastic shopping bags, the use of tote bags by shoppers, in lieu of the conventional paper and plastic shopping bags provided by the store, has been advocated and encouraged as environmentally friendly. The basic premise is that by providing their own reusable shopping bags, shoppers/consumers will lessen the demand for paper and plastic shopping bags. As a result, fewer trees will need to be cut down to make paper shopping bags and less garbage will be created as a result of the disposal of paper and/or plastic shopping bags after their use.

[0003] One principal inconvenience that was associated with reusable tote bags has been that these tote bags tended to be awkward and cumbersome to transport and store. One solution was set forth in U.S. Patent No. 5,044,699 to Duty for a TOTE BAG WITH STRAPS. The Duty patent disclosed a tote bag and tote bag system wherein there was a primary tote bag with a pair of straps and one or more plain strapless secondary tote bags. The primary tote bag encircled or encompassed one or more of the secondary tote bags so as to contain a plurality of tote bags in one bundle or roll. The straps were then secured to secure the bundle of tote bags.

[0004] While the tote bag and tote bag system disclosed in the Duty patent are useful, there remains a desire to improve upon the tote bag and tote bag system such as shown and disclosed in the Duty patent. In this regard, it would be desirable to provide an improved tote bag and tote bag system that is easier to secure and does not use two straps. It also would be desirable to provide an improved tote bag and tote bag system that provides the shopper with the ability to carry a wallet or other items in the tote bag without getting these items mixed up with the purchased items. Furthermore, it would be desirable to provide an improved tote bag and

tote bag system that is a more complete shopping system or kit wherein it relieves the shopper from carrying a separate purse or receptacle by providing pockets for storage. In this regard, the pocket or pockets are always accessible and conveniently provide a place for storage of a wallet, checkbook, pen, keys, shopping list, or the like

#### SUMMARY OF THE INVENTION

[0005] In one form thereof the invention is a tote bag assembly that comprises a primary tote bag that has at least one handle affixed thereto and a secondary tote bag that has at least one handle affixed thereto. The secondary tote bag is in a rolled up condition, and the primary tote bag is in a rolled up condition so as to encompass the rolled up secondary tote bag. The primary tote bag has a single strap affixed thereto so as to be mediate of the handle. The single strap is attachable to itself, the single strap being in either: a secure condition wherein the single strap encircles the rolled up primary tote bag and the rolled up secondary tote bag and the single strap being attached to itself so as to maintain the primary tote bag and secondary tote bag in the rolled up condition; or an unsecure condition wherein the strap is not attached to itself.

[0006] In yet another form thereof, the invention is a tote bag assembly of a primary tote bag and at least one secondary tote bag. The assembly comprises a primary tote bag that defines a top opening. The primary tote bag is capable of being in an expanded condition wherein the primary tote bag defines an interior volume that is accessible through the top opening. The primary tote bag is capable of being in a collapsed condition wherein the primary tote bag does not define an interior volume. The primary tote bag further includes a single strap that is attachable to itself. The assembly further includes a secondary tote bag that defines a top opening. The secondary tote bag is capable of being in an expanded condition wherein the secondary tote bag defines an interior volume that is accessible through the top opening and the secondary tote bag is capable of being in a collapsed condition wherein the secondary tote bag does not define an interior volume. The tote bag assembly is capable of being placed in a portable condition wherein the primary tote bag is collapsed and encircles the collapsed secondary tote bag in a collapsed condition wherein the strap encircles the assembly of the primary tote bag and the secondary tote bag and is secured to itself so as to maintain the primary tote bag about the secondary tote bag.

**[0007]** In still another form thereof the invention is a tote bag assembly that comprises a primary tote bag that has at least one handle affixed thereto and a secondary tote bag that has at least one handle affixed thereto. The secondary tote bag is in a rolled up condition and the primary tote bag is in a rolled up condition so as to encompass the rolled up secondary tote bag.

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The primary tote bag has a single strap affixed thereto so as to be mediate of the handle wherein the single strap is attachable to itself. The single strap is in either: a secure condition wherein the single strap encircles the rolled up primary tote bag and the rolled up secondary tote bag and the single strap being attached to itself so as to maintain the primary tote bag and secondary tote bag in the rolled up condition; or an unsecure condition wherein the strap is not attached to itself. The primary tote bag presents an exterior surface that has at least one pocket. The pocket is accessible when the primary tote bag and the secondary tote bag are in a rolled up condition.

[0008] In still another form thereof, the invention is a tote bag assembly that comprises a primary tote bag that has at least one handle affixed thereto and a secondary tote bag that has at least one handle affixed thereto. The secondary tote bag is in a rolled up condition. The primary tote bag is capable of being in an unrolled condition or a rolled up condition wherein in the rolled up condition the primary tote bag encompasses the rolled up secondary tote bag. The primary tote bag has a single strap affixed thereto so as to be mediate of the handle, and the single strap is attachable to itself. The single strap is in either: a secure condition wherein the single strap encircles the rolled up primary tote bag and the rolled up secondary tote bag and the single strap being attached to itself so as to maintain the primary tote bag and secondary tote bag in the rolled up condition; or an unsecure condition wherein the strap is not attached to the strap is not attached to itself. The primary tote bag presents an exterior surface that has at least one pocket, and the pocket is accessible when the primary tote bag and the secondary tote bag are in a rolled up condition.

### BRIEF DESCRIPTION OF THE DRAWINGS

**[0009]** The following is a brief description of the drawings that form a part of this patent application:

FIG. 1 is a perspective view of one embodiment of the tote bag of the present invention in an unfolded condition wherein the single strap extends downward and is twisted to show the "loops" portion of the "VELCRO" type material and a flap on one of the pockets is flipped up so as to expose the VELCRO® loops on the flap and the VELCRO® hooks on the tote bag;

FIG. 2 is a perspective view of the tote bag of FIG. 1 in a folded condition wherein the single strap is secured around the tote bag and ready to be attached to itself and each one of the pair of pockets is in a closed condition;

FIG. 3 is a perspective view of a tote bag system or assembly wherein a single strapless tote bag (i.e.,

a secondary tote bag) is rolled up and is encompassed by a primary tote bag (that has a single strap and pockets) in a rolled condition with the single strap secured about both the primary tote bag and the secondary tote bag;

FIG. 4 is a perspective view of a strapless secondary tote bag that has a pair of handles; and

FIG. 5 is a perspective view of a tote bag system or assembly wherein a pair of strapless secondary tote bags are rolled up and are encompassed by a primary tote bag (that has a single strap and pockets) in a rolled condition with the single strap secured about both the primary tote bag and the pair of secondary tote bags; and

FIG. 6 is a pattern for the pliable material to make the primary tote bag.

#### DETAILED DESCRIPTION OF THE INVENTION

[0010] Referring to the drawings, there is shown a specific embodiment of a primary tote bag (generally designated as 20) of the present invention. Primary tote bag 20 is made from a man-made material or natural fiber material or a combination of a man-made material and natural fiber material that can present any one or more of a number of different colors and designs. The material is pliable. As is shown in FIG. 6 hereof, the basic body of the primary tote bag is made from one piece of pliable material. However, applicant contemplates that the tote bags may be made from multiple pieces and multiple types of material. For example, one or more of the handles, the strap, the pockets and the basic body of the tote bag may be made from different materials. Hence, the fact that the preferred way to make the basic body of the tote bag is from one piece of material is not intended to be restrictive on the scope of the invention. Although it may vary depending upon the specific material, there is an advantage in the pliable material allowing air to easily enter into the volume defined within the primary tote bag 20. Primary tote bag 20 is strong and attractive.

[0011] Referring to the basic structure of the primary tote bag 20, primary tote bag 20 comprises a first panel 22 that has a generally rectangular or square shape. First panel 22 presents an interior surface and an exterior surface 26. Primary tote bag 20 also has a corresponding opposite second panel 24 that has a generally rectangular or square shape. Second panel 24 presents an interior surface 30 and an exterior surface (not illustrated). The primary tote bag 20 also has a bottom portion 32. The first panel 22 and the second panel 24 and the bottom portion 32 comprise what may be considered the basic body of the primary tote bag 20.

**[0012]** One handle 36 is attached to the interior surface 24 of the first panel 22 near the top edge thereof.

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Another handle 38 is attached to the interior surface 30 of the second panel 28 near the top edge thereof. The first panel 22, second panel 24 and the bottom panel define the interior volume of the tote bag 20.

**[0013]** The primary tote bag 20 also has a pair of pockets 44. Pockets 44 are the same so that a description of one of the pocket 44 will suffice for the description of the other both pocket 44. However, applicant contemplates that the pockets may be different depending upon the intended use of the pockets. Applicant also contemplates that there may be more than a pair of pockets.

[0014] Pocket 44 is on the exterior surface 26 of the first panel 22. Pocket 44 is located near the top edge of the first panel 22 of the primary tote bag 20. Pocket 44 has an exterior surface 46 that presents a section of VELCRO® loop material 48. Pocket 44 has a flap 50 that has an interior surface 52 wherein the interior surface 52 has a section of VELCRO® hook material 54. When in a closed condition, the flap 50 is folded down so that the VELCRO® hooks 54 engage the VELCRO® loops 48 so that the flap 50 (and hence the pocket 44) is secured in the closed condition. It should be appreciated that the pockets 44 are located near the top edge of the first panel 22 so that the pockets 44 remain accessible even when the primary tote bag 20 is rolled up as described hereinafter. Thus, the pockets 44 are always accessible when the primary tote bag 20.

[0015] Primary tote bag 10 is also provided with a single strap 56 attached to the exterior surface 26 of the first panel 22 at a location generally midway between the handles 36 and 38 and toward the upper edge of the first panel. The single strap 56 has a first end 58 and a second distal end 60. Single strap 56 also has one surface 62 that presents VELCRO@ hooks 66 wherein the hooks 66 are near the distal end 60 of the single strap 56. Single strap 56 has another surface 68 that presents VELCRO® loops 70 wherein the loops 70 are near the first end 58 of the single strap 56.

[0016] When the primary tote bag 20 is in use the single strap 56 typically loosely hangs downward against the primary tote bag 20. To place the primary tote bag 20 in a condition for storage and transportation while not in use, the primary tote bag 20 is laid flat with the second panel 28 facing downward and the first panel 22 facing upward. Primary tote bag 20 is rolled, beginning from the bottom end thereof, toward the top edge thereof so as to form a generally elongate cylindrical shape. Primary tote bag 20 is rolled up to the point where the single strap 56 is loose and outside of the interior of the rolled primary tote bag 20. The top edge of the first panel 22 which is not included in the rolled up primary tote bag 20 is folded in the direction of the second panel 28 so that the VELCRO® material on the single strap 56 is exposed and facing outwardly of the rolled up primary tote bag 20. Single strap 56 is then placed around the circumference of the rolled primary tote bag 20 and the VELCRO® hooks 66 engage the VELCRO® loops 70 so as to form a secure belt around the rolled up primary

tote bag 20 and the secondary tote bag or bags.

[0017] Once in this storage and transportation condition the primary tote bag 20 (and the secondary tote bag or bags) can be easily and efficiently stored and transported while not in use and thereby making the use of such tote bags much easier and more manageable. In addition, as mentioned hereinabove, the pockets 44 are accessible when the primary tote bag 20 is in the rolled up condition. The pockets 44 are also accessible when the primary tote bag 20 is not in a rolled up condition.

[0018] It should be appreciated that in some instances, the pocket (or pockets) 44 can be made from one kind of material and the strap 56 made from another kind of material and the basic body of the tote bag made from still another kind of material. In this regard, the material for the pocket (or pockets) 44 may typically be solid so as to maintain the privacy of the contents of the pocket (or pockets) 44. The material for the basic body of the primary tote bag 20 may be solid or it may be seethrough.

**[0019]** Referring to FIG. 3, there is shown an assembly or kit of the present invention generally designated as 74. The assembly 74 comprises a primary tote bag 20 and a secondary tote bag generally designated as 78 (see FIG. 4).

[0020] Secondary tote bag 78 is generally structurally the same as primary tote bag 20 in that each one of the secondary tote bags 78 is made of a sturdy pliable material (e.g., a man-made material or fiber material or a combination of a man-made material and fiber material) that allows for the use of the tote bag over and over again. Secondary tote bag 74 has a first panel 80 with an exterior surface 82 and a second panel 86 with an interior surface 88. Secondary tote bag 78 has a bottom portion. Secondary tote bag 78 has a pair of handles 90 wherein each handle is attached to the interior surface of its respective panel (80, 86). The first panel 80 and the second panel 86 together with the bottom portion define an interior volume 92 of the secondary tote bag 78

[0021] The kit 74 is placed in a condition for storage and transportation by laying the primary tote bag 20 on a horizontal surface so that the single straps 56 is facing downward and is underneath primary tote bag 20. The secondary tote bag 78 is then placed on top of the primary tote bag 20 so that the primary tote bag 20 and the secondary tote bag 78 are in alignment with each other. Both tote bags (20 and 78) are rolled together, beginning at the bottom ends thereof, toward the top end so as to form a generally elongate cylindrical shape. The primary tote bag 20 and the secondary tote bags 78 are rolled up to the top edge of these bags so that handles thereof (36, 38 and 90) are projecting outwardly of the rolled up tote bags and are not included within the interior of the rolled up bags. Single strap 56 is circumferentially around the kit 74 similarly as with the primary tote bag 20 described above so as to form a secure belt around the entire kit 74.

**[0022]** In some instances, it is preferred if only the handles 36 and 38 of the primary tote bag 20 project from the kit 74. In this condition, the handles 90 of secondary tote bag 78 are folded so as to be in the interior of the roll of kit 74.

**[0023]** It should be appreciated that the pockets 44 on the primary tote bag 20 are accessible when the primary tote bag 20 is rolled up so as to encompass the rolled up secondary tote bag 78. The pockets 44 of the primary tote bag 20 are also accessible when the primary tote bag 20 is not in a rolled up condition.

[0024] FIG. 5 shows that more than one secondary tote bag 78 may be a part of the assembly or kit. In this regard, the kit generally designated as 96 shown in FIG. 5 has one primary tote bag 20 and one or more of secondary tote bags wherein the FIG. 5 there is shown a pair of secondary tote bags 78. The additional secondary tote bags 78 may be a part of the kit 96 by placing such secondary tote bags 78 on top of the primary tote bag and aligning the bags prior to rolling the kit 96 into the generally elongate cylindrical shape. The strap 56 then secures the entire assembly or kit 96 in a rolled condition. The handles 36 and 38 (and possibly handles 90 depending if these handles project from the kit) permit the kit 96 to be easily and conveniently transported from location to location.

**[0025]** For the specific embodiment of FIG. 5, it should be appreciated that the pockets 44 on the primary tote bag 20 are accessible when the primary tote bag 20 is rolled up so as to encompass the rolled up secondary tote bag 78. The pockets 44 of the primary tote bag 20 are also accessible when the primary tote bag 20 is not in a rolled up condition.

**[0026]** Referring to FIG. 6, there is shown a pattern for making the basic body of both the primary tote bag 20 and the secondary tote bag 78. For the purpose of this description, the reference numerals will refer to the structure of the primary tote bag 20. However, it should be appreciated that the description also applies to the secondary tote bag 78.

[0027] The pattern generally designated as 100 presents the first panel 22 that has a pair of edges 102 and 104. There is a notch 106 at the intersection of the edges 102 and 104. There is also an opposite notch 108 in the edge 104. The material 110 that is between the notch 106 and the notch 108 helps form the bottom of the tote bag as will be discussed hereinafter. Still referring to the pattern 100, the second panel 28 has a pair of edges 116 and 118. There is a notch 120 at the intersection of the edges 116 and 118. There is also an opposite notch 122 in the edge 118. The material 124 that is between the notch 120 and the notch 122 helps form the bottom of the tote bag as will be discussed hereinafter.

**[0028]** In making the basic body of the tote bag, the material is folded on itself along a crease or fold line 124. The edges 102 and 116 are sewn or attached together. The edges of the material that define the notches

106 and 120 is folded and attached together. The edges of the material that defines the notches 108 and 122 is folded and sewn together. The edges that define the material sections 110 and 124 are sewn together whereby these sections (110 and 124) define the bottom section of the tote bag.

[0029] It can thus be seen that the present invention provides an improved tote bag and tote bag system that is easier to secure by using a single strap as opposed to using two straps. It is also apparent that the present invention provides an improved tote bag and tote bag system that provides the shopper with the ability to carry a wallet or other items in the tote bag without getting these items mixed up with the purchased items. It is also apparent that the present invention provides an improved tote bag and tote bag system that is a more complete shopping system or kit than what has existed heretofore wherein the present invention relieves the shopper from carrying a separate purse or receptacle by providing pockets for storage. In this regard, the pocket or pockets are always accessible (no matter if the primary tote bag is in the rolled up condition or in the unrolled condition) and conveniently provide a place for storage of a wallet, checkbook, pen, keys, shopping list, or the like.

**[0030]** All patents, patent applications, articles and other documents identified herein are hereby incorporated by reference herein. Other embodiments of the invention may be apparent to those skilled in the art from a consideration of the specification or the practice of the invention disclosed herein. It is intended that the specification and any examples set forth herein be considered as illustrative only, with the true spirit and scope of the invention being indicated by the following claims.

#### Claims

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1. A tote bag assembly comprising:

a primary tote bag having at least one handle affixed thereto;

a secondary tote bag having at least one handle affixed thereto;

the secondary tote bag being in a rolled up condition, and the primary tote bag being in a rolled up condition so as to encompass the rolled up secondary tote bag; and

the primary tote bag having a single strap affixed thereto so as to be mediate of the handle, and the single strap being attachable to itself, the single strap being in either:

a secure condition wherein the single strap encircles the rolled up primary tote bag and

the rolled up secondary tote bag and the single strap being attached to itself so as to maintain the primary tote bag and secondary tote bag in the rolled up condition;

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an unsecure condition wherein the strap is not attached to itself.

2. The tote bag assembly of claim 1 wherein there are 10 a plurality of secondary bags.

3. The tote bag assembly of claim 1 or claim 2 wherein the handles of the primary tote bag project from the assembly of the rolled up primary tote bag and the 15 secondary tote bag in a rolled up condition.

4. The tote bag assembly of any one of claims 1 to 3 wherein the primary tote bag presents an exterior surface that has at least one pocket, and the pocket 20 being accessible when the primary tote bag and the secondary tote bag are in a rolled up condition.

5. The tote bag assembly of claim 4 wherein the primary tote bag may be in an unrolled condition, and the pocket being accessible when the primary tote bag is in an unrolled up condition.

6. The tote bag of claim 4 or claim 5 wherein the pocket includes a closable flap.

7. The tote bag assembly of any one of claims 1 to 6 wherein the primary tote bag is made from a pliable material.

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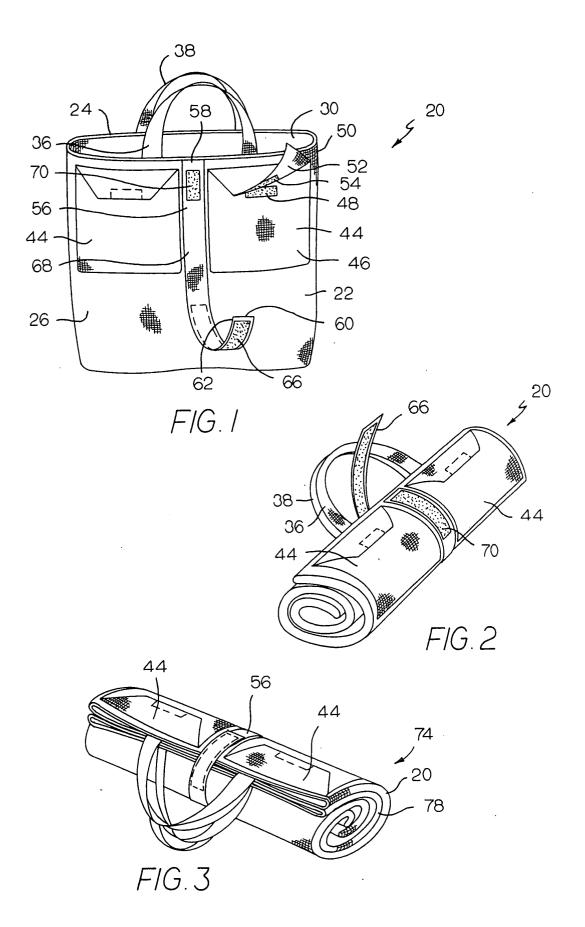
8. The tote bag assembly of any one of claims 1 to 7 wherein the secondary tote bag is made from a pliable material.

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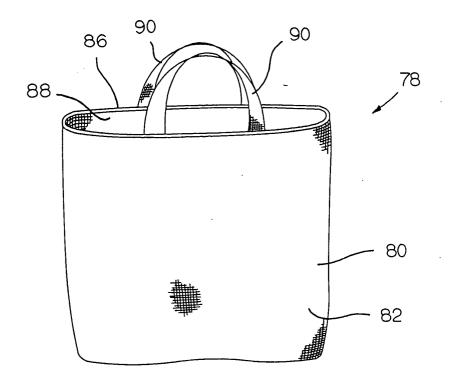
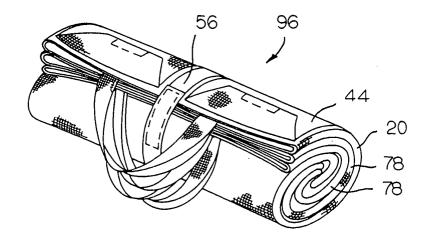
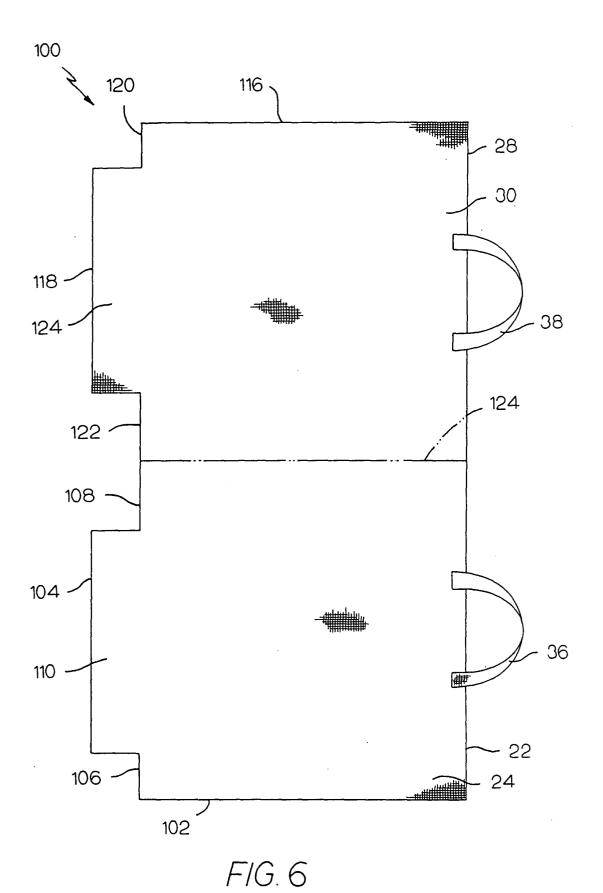


FIG. 4



F1G. 5





# **EUROPEAN SEARCH REPORT**

Application Number EP 04 01 2414

Category	Citation of document with indic		Relevant	CLASSIFICATION OF THE	
D,Y	US 5 044 699 A (DUTY 3 September 1991 (199 * abstract * * figures 1-5 * * column 2, line 39 -	CAROLYN) 1-09-03)	1-3,7,8	A45C3/04 A45C7/00	
Y	GB 2 292 516 A (KING 28 February 1996 (199 * abstract * * figures 2,8 * * page 2, paragraphs	6-02-28)	1-3,7,8		
Α	page 2, paragraphs	1,7	5		
А	GB 930 926 A (JANE SI 10 July 1963 (1963-07 * page 1, right-hand line 82 * * figures 1,2 *	′-10)	1		
A	US 1 666 704 A (HUNTE 17 April 1928 (1928-6 * the whole document	04-17)	4-6	TECHNICAL FIELDS SEARCHED (Int.CI.7)	
	The present search report has bee				
Place of search  The Hague		Date of completion of the search  1 December 2004			
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		T : theory or princi E : earlier patent d after the filing d D : document citer	T: theory or principle underlying the invention E: earlier patent document, but published on, or after the filling date D: document cited in the application L: document cited for other reasons		

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

EP 04 01 2414

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.

01-12-2004

Patent document cited in search report		Publication date		Patent family member(s)	Publication date
US 5044699	A	03-09-1991	CA	2042339 A1	09-12-199
GB 2292516	A	28-02-1996	NONE		
GB 930926	Α	10-07-1963	NONE		
US 1666704	Α	17-04-1928	NONE		
more details about this ann					