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(71) Applicant: PRECISION DYNAMICS CORPORATION [US/US]; 13880 Del Sur Street, San Fernando, CA 91340-3490 (US).

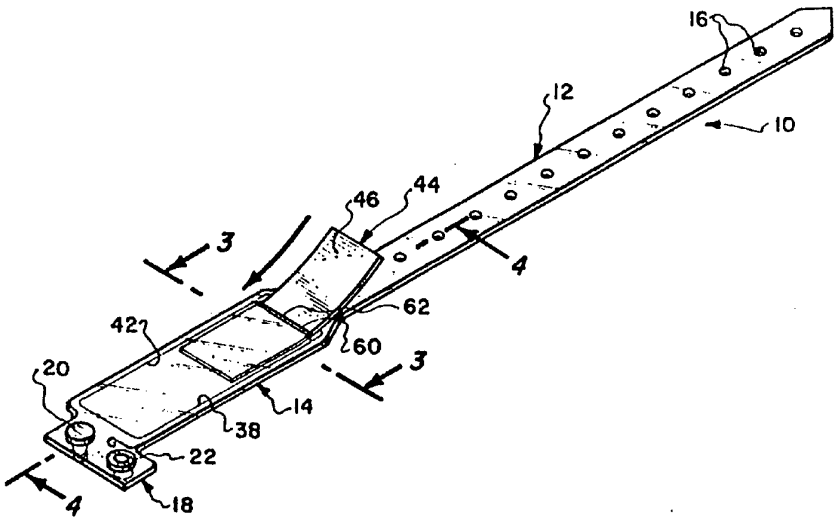
(72) Inventor: PETERSON, Dean, D.; 15455 Glen Oaks Boulevard #531, Sylmar, CA 91342 (US).

(74) Agents: MAHONEY, Thomas, P. et al.; Mahoney & Holland, Suite 6200, 4000 MacArthur Boulevard, Newport Beach, CA 92660 (US).

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(54) Title: IMPROVED POCKET-STYLE IDENTIFICATION BRACELET



(57) Abstract

A laminated identification bracelet (10) which incorporates a window type pocket (42) created by not adhering the pocket area (38) of the laminate (36) which incorporates it to the underlying laminate (34).

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IMPROVED POCKET-STYLE IDENTIFICATION BRACELET

This invention relates to identification devices and is embodied in an identification band or bracelet which is intended for multiple uses including hospital patient identification, article identification, crowd control where individuals in attendance at concerts or festivals are provided with identification bands or bracelets and numerous other uses and applications.

BACKGROUND OF THE INVENTION

Identification devices or bracelets of the type under consideration here are conventionally manufactured from synthetic plastic sheet material with the sheets being adhered or secured to each or one another by heat sealing or adhesive means. Therefrom laminates are fabricated which constitute the raw material for forming the identification devices or bracelets in the requisite configuration.

Conventionally, such devices or bracelets are provided in configurations incorporating strap portions and identification portions, cooperating fastener means being provided on the devices or bracelets to secure them to the objects or persons being identified.

In bracelets or devices such as those under consideration here, a pocket is formed at the identification portion of the bracelets for the reception of information means which is associated with the object or individual identified by the bracelet.

Prior art devices incorporate pockets which are fabricated from a separate, partial laminate of suitable sheet material which is secured in overlying relationship with the previously described laminate structure. Such laminate structures can include two or more sheets secured in the aforementioned manner to

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which is applied the subsequent partial sheet defining the pocket structures.

Providing the pockets in this manner entails the use of additional material and, frequently, the necessity for the performance of additional manufacturing steps to secure the pocket material to the surface of the previously fabricated laminate.

These additional steps increase the cost of fabricating the bracelets and, also, increase the thickness of the bracelet at the identification portion of the bracelet rendering it less flexible at that portion than at the other portions of the bracelet.

OBJECTS AND ADVANTAGES OF THE INVENTION

It is, therefore, an object of my invention to provide an identification bracelet or device which consists of a plurality of laminates in a bracelet configuration wherein the bracelet has strap and identification portions, the pocket of said bracelet being provided by an outer laminate of said plurality subsequently to the laminating process.

A corresponding object of my invention is the provision of a bracelet of the aforementioned character in which the pocket laminate is transparent so that a window portion will be provided on the identification bracelet.

A further object of my invention is the provision of a window portion on the transparent laminate which is created in the identification portion of the bracelet by creating a gap in the adhesive utilized to secure the laminates together and which is equal in size to the desired pocket size.

Another object of my invention is the provision, in a device of the aforementioned character, of access means to said pocket provided by a slit formed in one of said laminates which permits the insertion of

information means into underlying relationship with said window and containment in the pocket defined thereby.

An additional object of my invention is the provision of a device of the aforementioned character in which said slit is provided at one end of said window.

BRIEF DESCRIPTION OF THE DRAWINGS

Other objects and advantages of the invention will be apparent from the following specification and the accompanying drawings in which:

FIG. 1 shows the bottom of a sheet of identification bracelets;

FIG. 2 is an isometric bottom view of an identification bracelet after removal from the sheet;

FIG. 3 is a transverse sectional view taken on the broken line 3-3 of Fig. 2;

FIG. 4 is a longitudinal sectional view taken from the broken line 4-4 of Fig. 2; and

FIG. 5 is a fragmentary view showing the top of the identification portion of the bracelet.

DESCRIPTION OF PREFERRED EMBODIMENT OF THE INVENTION

Referring to the drawing, and particularly to Figs. 1-5 thereof, I show an identification bracelet 10 constructed in accordance with the teachings of the invention and including a strap portion 12 at one extremity and an identification portion 14 at the other extremity thereof.

The strap portion 12 incorporates spaced fastener receiving openings 16 for the reception of fastener means 18, said fastener means 18 consisting of a male member 20 and female receptacle 22 fabricated from a suitable plastic, such as high-density polyethylene, and operating as snap fasteners but

incorporating self-locking means, not shown, to maintain the bracelet 10 in operative relationship with an object or person identified by the bracelet and to prevent the unauthorized removal thereof.

As previously indicated, the identification bracelets 10 are customarily fabricated from laminates of synthetic plastic sheet material and the sheet 30 of bracelets 10 shown in fig. 1 of the drawings is typical of such fabrication. In the processing of the sheet material, a plurality of laminations is utilized to provide the necessary strength and flexibility in the bracelet 10. In the present embodiment of the bracelet 10, the superimposed sheets consist of an upper flexible transparent laminate 32, an intermediate transparent laminate 34, and a lower laminate 36, said laminates being alternatively referred to as, respectively, first, second, and third laminates.

As is well known to those skilled in the art, there is a wide variety of synthetic plastic sheet materials available for lamination, but I have found that the materials more suitable for the patent application bracelet of the present invention include transparent flexible polyethylene sheeting for the first laminate 32; transparent polyester sheeting for the intermediate or second laminate 34 and polyethylene sheeting for the third laminate 36. The polyester intermediate laminate 34 is intended to impart structural stability and strength to the bracelet 10. The first and second laminates 32 and 34 are transparent at least in the identification area, but the third laminate can be opaque or translucent or have applied decorative elements thereupon.

During the processing of the laminates prior to imparting to the sheets the precise configuration of the bracelets 10, a water-proof adhesive 37, Fig. 4, is applied to the upper surface of the lower or third

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laminate 36 and the intermediate laminate 34 is adhered to said upper surface from edge to edge of the resulting laminated structure, leaving a plurality of gaps 38 of rectangular configuration, as best shown in Figs. 1 and 2 of the drawings.

After this lamination has been accomplished, the first, upper laminate 32 is ready to be applied to the upper surface of the intermediate laminate 34. However, prior to such application, a coating of adhesive is applied to said upper surface.

These gaps or uncoated portions 38 of the upper surface of the third laminate 36 are located at the identification portions 14 of the intermediate laminate 34.

When the first, uppermost laminate 32 is secured to the upper surface of the intermediate laminate 34, all of the first laminate 32 will be secured to the intermediate laminate 34, thus providing that the resulting bracelets 10 will be fabricated from laminates which are adhered to each other from one end of the bracelet to the other while still providing the unadhered areas 38.

As previously indicated, the unadhered area 38 lies below a transparent window 40 on the top of the bracelet 10 while simultaneously defining a pocket 42 for the reception of information means 44, in a manner to be described in greater detail below. Obviously while the utilization of three laminates to form a sheet 30 is described hereinabove, two or more than three laminates can be utilized, if necessary.

Because the manufacture of the bracelets 10 from the laminated sheet which results in the sheet of bracelets 30 requires that the strap portions 12 be formed in internesting relationship with the identification portions 14 being formed at the edges of the laminated sheet, the unadhered portions 38 are

provided at the opposite edges of the sheet 30. After the lamination of the sheets has been completed, the laminated sheet is translated to die means (not shown) which form score lines 50 defining the final configuration of the bracelets 10. Subsequently, the fastener receiving openings 16 are formed in the strap portions 12. Access means 60 is provided in the window 40 by a slit 62 which constitutes the entrance to the pocket 42.

Fastener receiving openings are provided in the identification portion 14 of the bracelet 10 for the reception of the fastener means 18 and the sheets 30 are then cut to the desired number of bracelets 10 which can be separated from one another at the point of use.

A suitable water-base adhesive for use in laminating the plastic sheets is Lamal, which is manufactured by Morton Thiokol Corp.

One of the major advantages of the bracelet 10 is that it has a uniform profile and thickness in that no material is added to the bracelet to provide the windows and pockets thereupon. Obviously, the amount of material utilized in fabricating the bracelet is substantially reduced as is the amount of time consumed in the manufacture of the bracelets since the addition of the pocket material is obviated by the present integrated construction.

The utilization of the bracelet 10 involves the insertion of information means constituted by a card 46 through the slit 62 to locate it within the pocket 42 and beneath the viewing window 40. The card 46 should be slightly shorter than the length of the pocket 42 so that the slit can be returned to its substantially closed position by the subsidence of the window material.

It will be noted that the card 46 bears a bar code 48 but it is contemplated that various types of

magnetic tape and other information storing and dispensing means may be utilized. For instance, the card 46 bearing a patient's name could contain imprinted patient information. Alternatively, data storing devices such as chips can be installed in the pocket in conjunction with a visually readable imprint of the patient's name.

I thus provide by my invention an identification bracelet which is characterized by the fact that it can be manufactured more cheaply and expeditiously than prior art devices by the elimination of additional material and additional steps to provide information containing pockets thereupon. Although I have described the invention as embodied in a hospital patient identification bracelet, it will be obvious to those skilled in the art that the device of the invention can be incorporated in a wide variety of identification articles and it is not intended that the scope of the invention be limited to the particular embodiment shown but that the invention be interpreted in the light of the disclosures and claims.

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I CLAIM:

1. In an identification device, the combination of: a first transparent, flexible laminate; and a second flexible laminate secured to said first laminate for the entire length of said first and second laminates, there being a portion of said first laminate which is not adhered to said second laminate to provide a transparent window in said first laminate overlying a pocket between said window and the upper surface of said second laminate.

2. The identification device of claim 1 in which an opening is provided in said second laminate to permit the insertion of information means into said pocket below said window.

3. The device of claim 2 in which said opening is at one end of said window.

4. In an identification device, the combination of: a first transparent laminate, said transparent laminate having a strap portion and an identification portion; and a second laminate having a strap portion and an identification portion corresponding to said first laminate, said first and second laminates being secured to each other from one to the other extremities thereof, said first laminate being unsecured to said second laminate at said identification portions to provide a window in said first laminate.

5. The device of claim 4 in which an opening is provided in said second laminate for the insertion of information means below said window.

6. In an identification device, the combination of: a first, transparent, flexible laminate having a strap portion at one extremity and an identification portion at the other extremity; a second laminate having strap and identification portions corresponding to those of said first laminate, said

first and second laminates being secured to each other and said first laminate providing a window overlying an unsecured portion of said second laminate at said identification portions and providing a pocket between said first and second laminates.

7. The identification device of claim 6 in which said strap and identification portions are provided with apertures for the reception of fastener means for maintaining said identification device in operative relationship with an object to be identified.

8. The identification device of claim 6 in which said pocket is provided with an access opening formed in one of said laminates.

9. The identification device of claim 8 in which said access opening is located adjacent one extremity of said window.

10. In a laminated identification device, the combination of: a first flexible, transparent laminate; and a second flexible laminate secured in operative relationship with said first laminate and corresponding to the configuration of said first laminate, said first laminate being secured to said second laminate so that a portion of said first laminate overlying said second laminate remains unsecured to provide a viewing window in and a pocket below said first laminate.

11. The device of claim 10 in which said first and second laminates are provided with corresponding strap and identification portions and said window and pocket are located on said identification portion of said first laminate.

12. The device of claim 10 in which an access opening to said pocket is provided in one of said laminates.

13. The device of claim 12 in which said access opening is located at one extremity of said window.

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AMENDED CLAIMS

[received by the International Bureau on 29 November 1994 (29.11.94); original claims 1,4,6 and 10 amended; new claims 14-17 added; remaining claims unchanged (3 pages)]

1. In an identification device, the combination of: a first transparent, flexible laminate incorporating a transparent window portion; and a second flexible laminate having a surface area co-extensive with that of said first laminate, said surfaces other than that adjacent said window being secured to each other for the entire areas of said first and second laminates, said first and second laminates defining a pocket between the underside of said window and the upper surface of said second laminate.

2. The identification device of claim 1 in which an opening is provided in said second laminate to permit the insertion of information means into said pocket below said window.

3. The device of claim 2 in which said opening is at one end of said window.

4. In an identification device, the combination of: a first transparent laminate having a strap portion and an identification portion, said identification portion incorporating a transparent window therein; and a second laminate having a strap portion and an identification portion co-extensive with corresponding portions of said first laminate, said first and second laminates, other than said window, being secured to each other from one to the other extremities thereof, there being a pocket between said window and the upper surface of said second laminate.

5. The device of claim 4 in which an opening is provided in said second laminate for the insertion of information means below said window.

6. In an identification device, the combination of: a first transparent, flexible laminate having a strap portion at one extremity and an identification portion at the other extremity, said

identification portion having a transparent window therein; a second laminate having strap and identification portions co-extensive with those of said first laminate, said first and second laminate strap and identification portions being adhesively secured to one another, said window overlying an unsecured portion of said second laminate to provide a pocket between said first and second laminates.

7. The identification device of claim 6 in which said strap and identification portions are provided with apertures for the reception of fastener means for maintaining said identification device in operative relationship with an object to be identified.

8. The identification device of claim 6 in which said pocket is provided with an access opening formed in one of said laminates.

9. The identification device of claim 8 in which said access opening is located adjacent one extremity of said window.

10. In a laminated identification device, the combination of: a first flexible transparent laminate having a transparent window adjacent an extremity thereof and a second flexible laminate adhesively secured in operative relationship with said first laminate and corresponding to the configuration of said first laminate, said first laminate being secured to said second laminate so that said window of said first laminate overlying said second laminate is unsecured to provide a pocket below said window with the remainders of said first and second laminates being secured to each other.

11. The device of claim 10 in which said first and second laminates are provided with corresponding strap and identification portions and said window and pocket are located on said identification portion of said first laminate.

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12. The device of claim 10 in which an access opening to said pocket is provided in one of said laminates.

13. The device of claim 12 in which said access opening is located at one extremity of said window.

14. In a laminated identification device, the combination of: a top flexible, transparent laminate having a transparent window adjacent an extremity thereof; an intermediate, flexible laminate adhesively secured in operative relationship with said top laminate and corresponding to the configuration thereof, said top laminate being secured to said intermediate laminate so that said window of said top laminate overlying said intermediate laminate is unsecured to provide a pocket below said window; and a bottom laminate of the same configuration as said top and intermediate laminates adhesively secured over its entire area to said intermediate laminate.

15. The device of claim 14 in which said second and third laminates are provided with corresponding strap and identification portions and said window and pocket are located on and in said identification portion of said first laminate.

16. The device of claim 14 in which an access opening to said pocket is provided in one of said laminates.

17. The device of claim 16 in which said access opening is located at one extremity of said window.

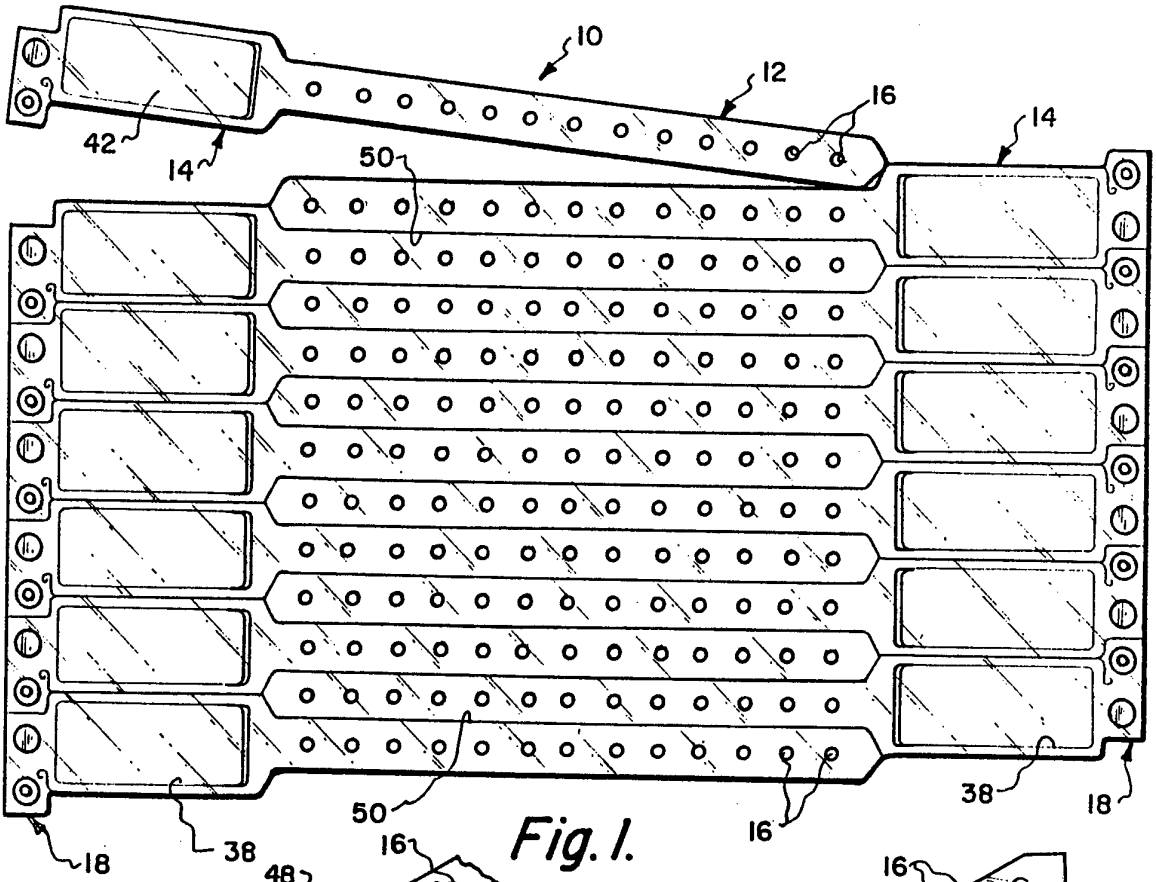


Fig. 1.

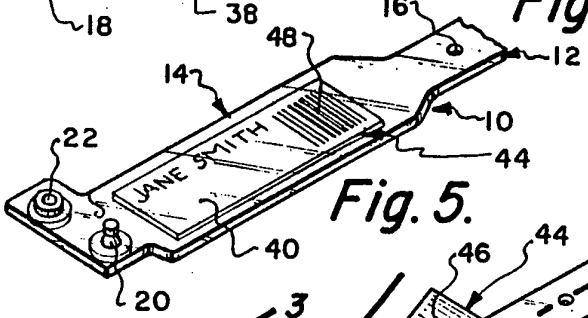


Fig. 5.

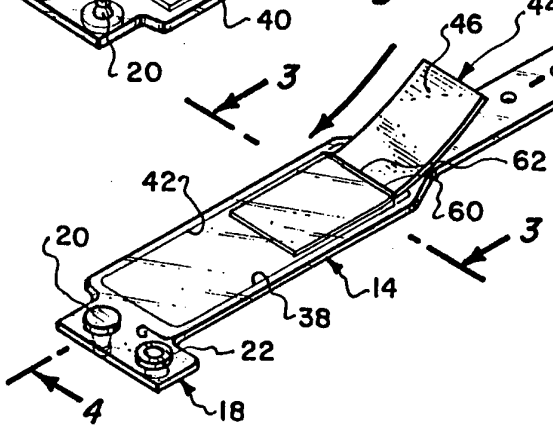


Fig. 2.

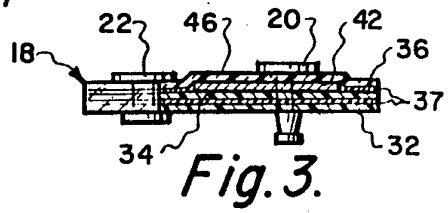


Fig. 3.

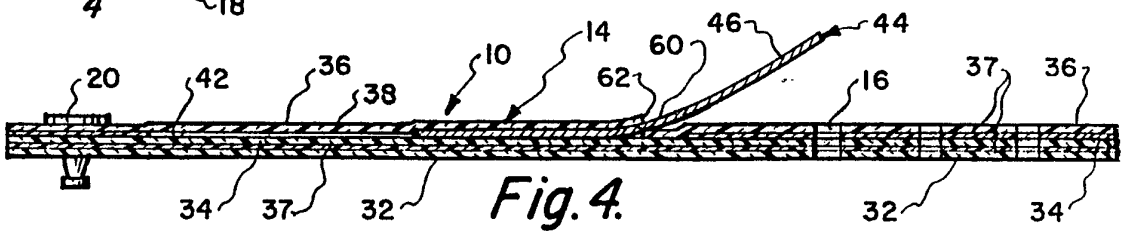


Fig. 4.

INTERNATIONAL SEARCH REPORT

International application No.
PCT/US94/06748

A. CLASSIFICATION OF SUBJECT MATTER

IPC(5) :G09F 3/20
US CL : 40/633
According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

U.S. : 40/633, 299, 625, 159

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)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X ----- Y	GB, A, 2,160,492 (SMITH ET AL) 24 December 1985, page 1, line 109 - page 2, line 14.	1, 4, 6, 10-11 ---------- 2-3, 5, 7-9, 12-13
X ----- Y	GB, A, 2,067,506 (BURDON) 30 July 1981, page 1, lines 92-110, figures 1, 3.	1, 4, 6, 10-11 ---------- 2-3, 5, 7-9, 12-13
X ----- Y	GB, A, 1,227,497 (LONG ET AL) 7 April 1971, page 3, lines 51-79, figure 5.	1-13 --------- 2-3, 5, 7-9, 12-13

☐ Further documents are listed in the continuation of Box C. ☐ See patent family annex.

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Name and mailing address of the ISA/US
Commissioner of Patents and Trademarks
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Washington, D.C. 20231
Facsimile No. (703) 305-3230

Authorized officer
RICHARD A. BERTSCH
Telephone No. (703) 308-0861

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