

United States Patent

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| [33] | | Great Britain |
| [31] | | 53,263/68 |

- [54] BRACELET CONSTRUCTION**
14 Claims, 3 Drawing Figs.

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| [52] | U.S. Cl..... | 59/35,
59/80, 63/4 |
| [51] | Int. Cl..... | F16g 13/00 |
| [50] | Field of Search..... | 59/35, 80,
78, 82, 81; 63/4 |

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ABSTRACT: A tile bracelet formed of staggered rows of tiles joined by cross pins has the pins secured within the tiles at the edge of the bracelet by means of an indentation formed along the length of the underneath surface of the bracelet at a position spaced from the outer edge of those tiles so that the indentation presses the material of the pins and tiles into a mutual curve.

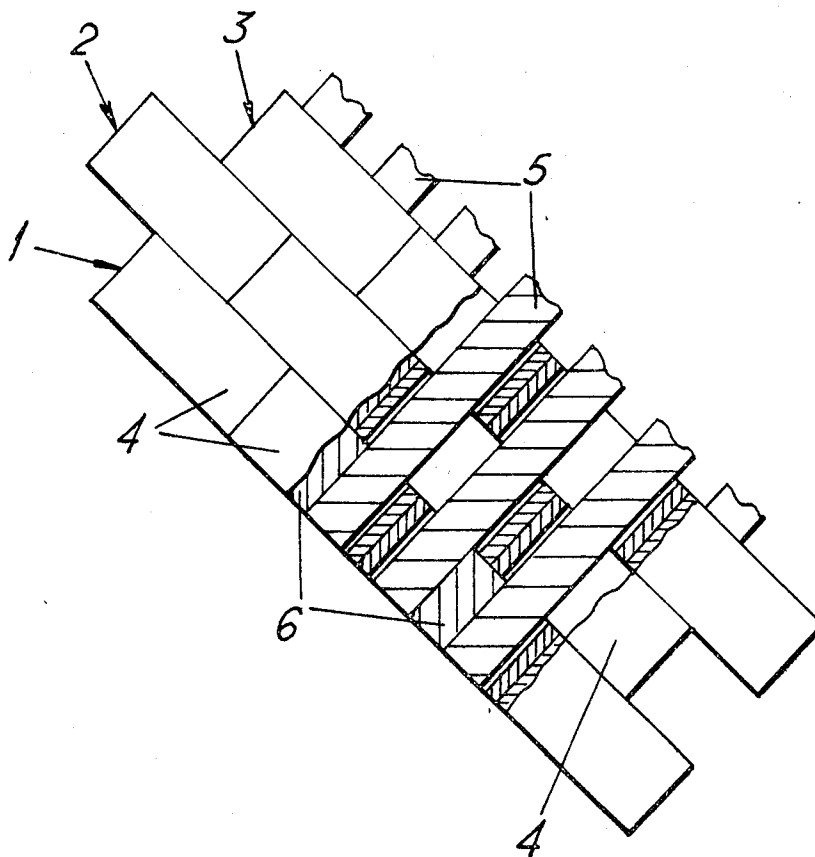


Fig. 1.

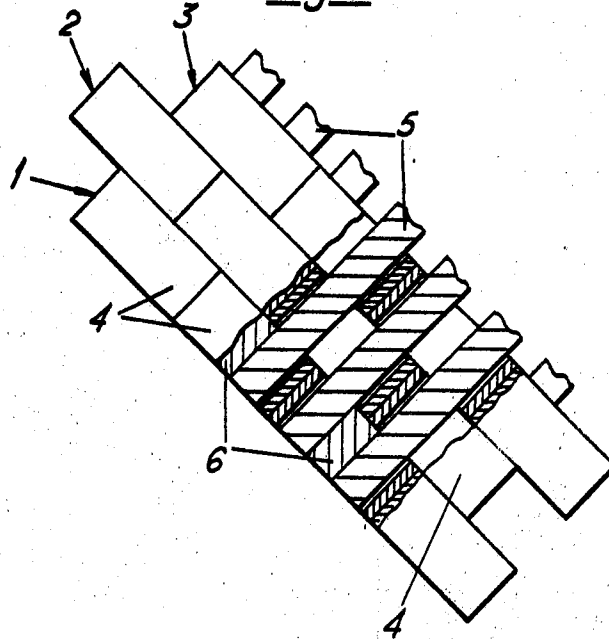


Fig. 2.

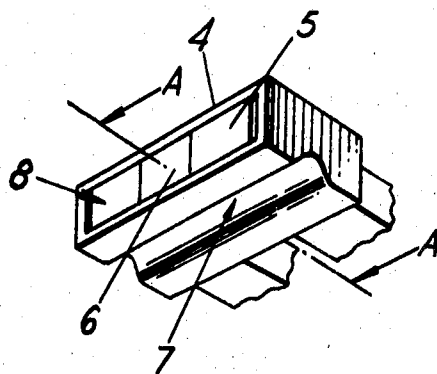
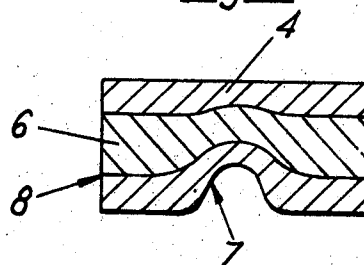


Fig. 3.



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BRACELET CONSTRUCTION

BACKGROUND OF THE INVENTION

Tile bracelets are formed by passing pins through aligned holes in adjacent tiles and securing the pins within the outermost tiles so that the inner tiles can pivot about the pins. The securing of the pins is usually accomplished by means of soldering, welding, riveting, etc. which is a lengthy operation, particularly since each tile has to be dealt with separately. An alternative method involves the use of pins having a corrugated surface so that the edges of the outer tiles can be pressed down onto the pin with the result that the material of the link molds itself into the shape of the corrugations on the pin so that the pin cannot be withdrawn. This method suffers from the disadvantages that specially prepared pins have to be used and that the edges of the bracelet are thinner (due to the pressing) than the body of the bracelet.

SUMMARY OF THE INVENTION

In accordance with the object of this invention to provide a new form of bracelet or the like construction of an effective yet relatively cheap and simple nature, there is provided a flexible bracelet or like article formed from staggered rows of tiles joined by pins passing through aligned holes in adjacent tiles across the article, wherein the pins have been secured within the tiles at the edge of the article by means of an indentation formed on the underneath surface of the article at a position spaced from the outer edge of the tiles forming the edge of the article and in a direction along the length of said article.

It will be appreciated that the effect of this indentation will be to cause a kink in the material of the tiles and the pins such that the pins cannot be withdrawn from the holes in the tiles at the edges of the article. Also, because the indentation is formed approximately centrally of the undersurface of the outer tiles of the article, the indentation will not be visible when the article is worn, nor will the thickness of the edge of the article be affected.

It is possible to form each tile so that two holes for the pins pass therethrough. It is however simpler to manufacture each tile as a tubular construction, hollow in the transverse direction, so that the pins will pass therethrough at each side of the tube. This construction also reduces the weight of the article, and thus the cost also where precious metals are used. However, at the edges of the article, there will be a gap between the ends of the two pins, but this can be filled by a spacer of the same metal (preferably) which will be held in place when the indentation is formed along the length of the tile.

The invention also extends to a method of forming a bracelet or like article as defined above wherein, after the cross pins have been inserted to link the staggered rows of tiles together, an indentation is formed on the inside surface of the article at a position between the sides of the tiles at the edges and in a direction along the length of said article.

The indenting can be achieved by a single stamping operation along the whole length of the row of tiles at the edge of the bracelet and could also be effected by a stamping wheel run along the surface of the row of tiles. Subsequent to the indentation being formed, the sides and/or surfaces of the article can be smoothed and finished and, if desired, additional ornament and decoration can be provided.

BRIEF DESCRIPTION OF THE DRAWINGS

IN order that the invention may be fully understood, a preferred embodiment thereof will now be described with reference to the accompanying drawing, in which:

FIG. 1 is a part sectional plan view of a portion of a bracelet constructed in accordance with the invention;

FIG. 2 is a side perspective view from below of one of the links in an outer row of the links of the bracelet shown in FIG. 1; and

FIG. 3 is a vertical section on the line A—A of FIG. 2.

DESCRIPTION OF THE PREFERRED EMBODIMENT

From the drawings it will be seen that three rows 1, 2, 3 of tiles 4 for a five-row tile bracelet are shown, partly in section to indicate the cross pins 5 which pass through transverse holes in the tiles and link the tiles together. The pins 5 are secured within the outer row 1 of the tiles 4 by a means to be described and the other rows 2, 3 are free to pivot about pins 5 so that the bracelet can flex. A spacer member 6 is provided between pins 5 in the outer row 1 of tiles to fill in the edge of the bracelet as can be seen more clearly in connection with FIG. 2.

The pins 5 are secured within the tiles 4 in the outer row 1 (and in a like manner at the other edge of the bracelet—not shown) by means of an indentation 7 formed on the undersurface of the tiles 4 as shown in FIG. 3. This indentation 7 has the effect of forcing the material of the spacer 6 (and pins 5) and the material of the tile 4 into a mutually curved configuration so that the spacer 6 and pins 5 cannot move out of the hole in the tile 4. The formation of the indentation will normally be effected by a stamping along the whole length of both rows of tiles 4 at the edges of the bracelet. It will be seen from FIG. 3 that the thickness and appearance of the edge 8 of the tile 4 is not affected in any way.

While the indentation in the tiles 4 has been shown as being precisely centrally formed along the length of each tile it will be appreciated that the invention is not limited to this particular construction. Thus, the indentation could be formed more to one edge or the other, particularly the edge nearer the middle of the bracelet (and could even be formed by crushing the whole of the edge towards the middle of the bracelet) always provided that the outer edge of the bracelet will not show any signs of the indentation, such as by a diminishing of the thickness of the edge of the bracelet. It will also be appreciated that the pins 5 (and spacer 6) can be individually secured within a tile by a series of small indentations in the form of a point above each pin and spacer so as to form an indentation row along the length of the article. Other variations in the positioning and form of the indentations formed in the tiles will also be possible to those skilled in the art.

The construction as described with reference to the drawings will normally be applied to articles of jewelry such as bracelets, watch straps and necklaces and thus will in many cases be formed from precious metal. Also ornamentation in the form of an embossed pattern or precious or semiprecious stones may be applied to the surfaces of the article. The face 8 of the article can of course be smoothed even to the extent of hiding almost entirely the presence of the pins 5 and spacers 6.

I claim:

1. An article such as a bracelet comprising a plurality of rows of tiles, outer ones of said rows forming an edge of the article, said tiles having holes defined therethrough, a pin passing through aligned holes of adjacent tiles and extending across the article, and an indentation formed into the surface of each tile at a location in alignment with each pin on each tile of the row forming the outer edge of the article and extending into the hole of the tile and engaged with said pin whereby to secure the pin within the tile.

2. An article according to claim 1 wherein each tile comprises a hollow tubular member, said pin extending transversely through the tile between adjacent rows, each tile having two pins extending transversely through the hole and a spacer between said pins, the indentation extending into the hole and also securing said spacer with said pin.

3. An article such as a bracelet comprising a plurality of rows of tiles arranged in side-by-side relationship, each of said tiles having an opening therethrough and a pin extending transversely between said rows through the opening of said tiles at least one surface of said tiles having an indentation formed thereon extending into the surface of each tile completely through the wall of the tile and being indented into said pin to hold said pin within said tile.

4. An article according to claim 3 wherein said rows each comprise tiles which are staggered from the adjacent row.

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5. An article according to claim 3 wherein the indentation formed in said tile extends in a direction along the associated tile row, said tile having an opening of a size to accommodate two pins and a spacer between said pins, the material of said tile and the associated pin being indented into tight holding engagement.

6. A method of forming a bracelet and similar article made up of a plurality of tiles having openings therethrough and using pins which extend through the openings comprising arranging the tiles in rows, directing pins through the openings of the tile to extend across the rows and to engage through openings of adjacent tiles, and thereafter forming an indentation into a surface of the tiles which extends inwardly and forms the tile into indented engagement with the pins to hold the rows in an assembled manner.

7. A method according to claim 6 wherein an indentation is formed on the side of the surface of the article which will be the undersurface and at a position spaced from the outer edge of the article on each outer row of tiles and extending in a direction along the length of the article.

8. A method according to claim 6 wherein an indentation is formed by stamping.

9. A flexible bracelet or like article comprising staggered

rows of tiles, pins passing through aligned holes in adjacent tiles extending across the article, and an indentation forming a recess extending inwardly from the surface of the article at a position spaced from the outer edge of the tiles forming the edge of the article and in a direction along the length of said article and in alignment with said pins to secure the pins within the tiles at the edge of the article.

10. An article as claimed in claim 9 wherein each tile is formed to define a hollow tubular construction in the transverse direction.

11. An article as claimed in claim 10 wherein a spacer is provided within the tubular portion of the tiles at the edge of the bracelet between the two pins secured therein.

12. An article as claimed in claim 9 wherein said indentation is formed as a complete straight line along the whole length of each tile.

13. An article as claimed in claim 12 wherein said straight line occurs on each tile at a central position thereof.

14. An article as claimed in claim 9 formed wholly or partly of precious metal and carrying ornamentation on the surfaces thereof.

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