C. SPATSCHIL.

HINGE JOINT FOR BRACELETS AND OTHER ARTICLES.

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947,312.

Patented Jan. 25, 1910.

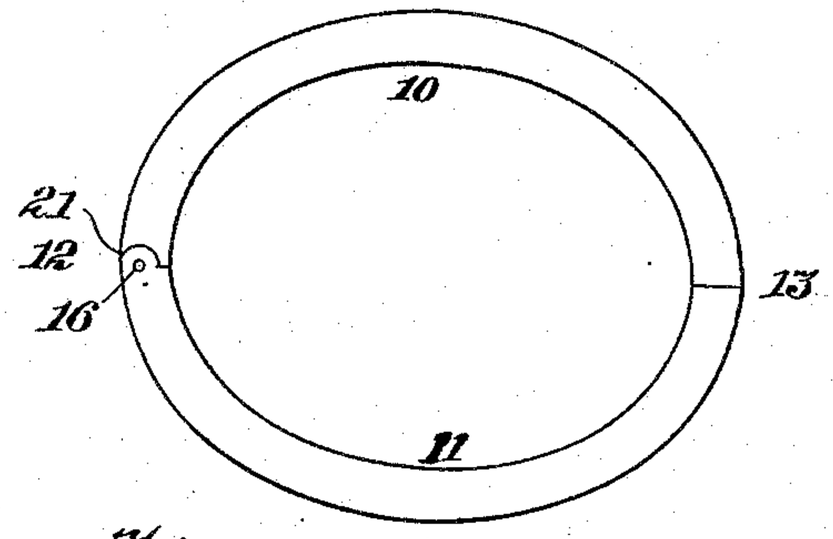

Fig. 1.

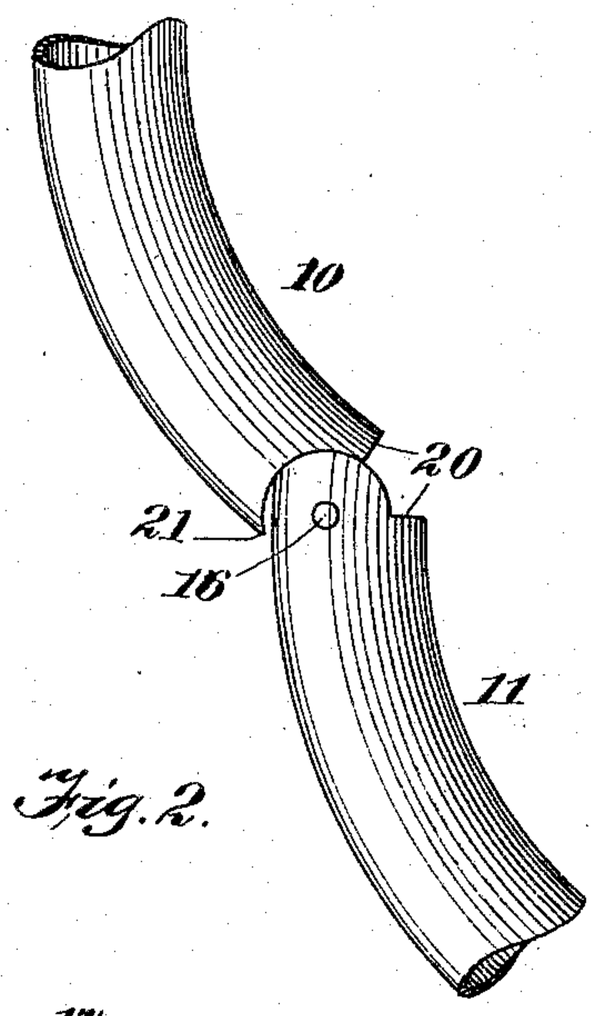

Fig. 2.

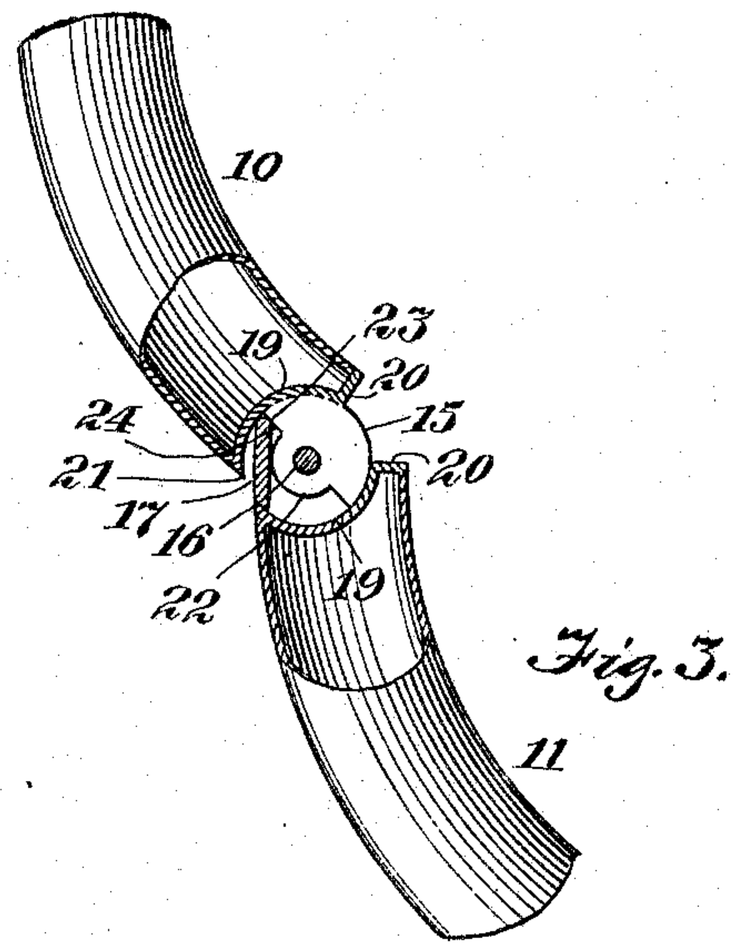

Fig. 3.

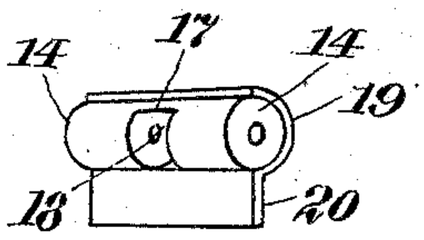

Fig. 4.

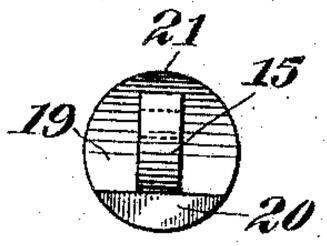

Fig. 6.

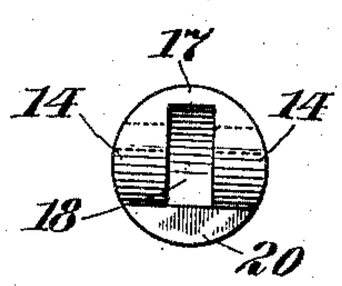

Fig. 7.

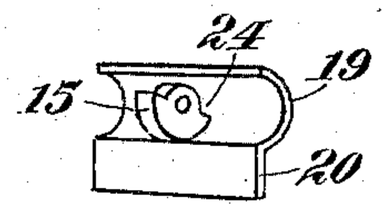

Fig. 5.

Witnesses:
Robert Stead.
Henry R. Bauer.

Charles Spatschil
Inventor

By his Attorney R. H. E. Starr.

UNITED STATES PATENT OFFICE.

CHARLES SPATSCHIL, OF JERSEY CITY, NEW JERSEY, ASSIGNOR TO THE SHIMAN MILLER MANUFACTURING COMPANY, OF NEW YORK, N. Y., A CORPORATION OF NEW YORK.

HINGE-JOINT FOR BRACELETS AND OTHER ARTICLES.

947,312. Specification of Letters Patent. Patented Jan. 25, 1910.

Application filed May 4, 1907. Serial No. 371,790.

To all whom it may concern:

Be it known that I, CHARLES SPATSCHIL, a citizen of the United States, and a resident of Jersey City, in the county of Hudson, State of New Jersey, have invented certain new and useful Improvements in Hinge-Joints for Bracelets and other Articles, of which the following is a specification.

This invention relates to hinge joints for bracelets and other articles, and the object of the invention is to provide a hinge joint that will be invisible and will also limit the extent of the opening of the two hinged sections and thereby prevent injury to the hinged ends of the two sections which, with the ordinary hinged joint now in use, frequently happens.

I will describe a hinge joint embodying my invention and then point out the novel features in claims.

In the accompanying drawings Figure 1 is a plan view of a bracelet having a hinge joint embodying my invention. Fig. 2 is a view of a portion of the bracelet showing the position of the hinged ends of the sections when the latter are opened to their full extent. Fig. 3 is a sectional view of Fig. 2. Figs. 4 and 5 are views of the members of the hinge and the casings to which they are secured; and Figs. 6 and 7 are end views of the two sections of the bracelet to which the hinge members are secured.

The two sections of the bracelet are indicated respectively by 10 and 11 and are hinged together at 12 and connected to each other at 13 by any suitable locking device which is not necessary to be illustrated, since it forms no part of the present invention which relates to the hinge joint.

The hinge consists of two lugs 14—14, a knuckle 15 and pintle 16. As shown the lugs are cylindrical and connected together by a web 17 with a recess 18 between their inner ends into which the knuckle extends. The lugs are secured to one section of the bracelet and the knuckle to the other and when the knuckle is in the recess 18 and the pintle 16 inserted through the bores in the lugs and knuckle the two sections are hinged together.

Bracelets are generally tubular and in order to be able to firmly secure the lugs and knuckle to the respective sections two casings are employed. These casings are similar in form, and comprise a semi-cylindrical portion 19 and a depending flange 20 as shown in Figs. 4 and 5, and the lugs are soldered to one and the knuckle to the other. The casings are then brought together with the knuckle 15 in the recess 18 and a hole is bored transversely through the bracelet where it is desired to have the hinge, the bracelet at this time being continuous except at the joint 13. The bracelet is then cut through from the bore to the inner periphery to make a space for the reception of the flanges 20 and the semi-cylindrical portions 19 are inserted in the bore. The bore is usually so made that a portion of the outer periphery of the bracelet is cut away and consequently when the casings are inserted they will project beyond the periphery of the bracelet. The casings are soldered to the end edges of the two sections and all the metal of the casings and the jaws which projects beyond the surface of the bracelet is removed and the exposed portions of the casings and lugs made to conform to the general outline of the surface of the bracelet. This method of securing the hinge members to the bracelet is not new, and is the method generally employed in the tubular bracelet, and the reason for describing it is to point out some of the results.

Referring to Fig. 3 it will be observed that in removing such portions of the casings and lugs as project beyond the outer periphery of the bracelet the outer edge of the casing which holds the knuckle is brought to a knife-edge as indicated at 21, and the outer surface of the web 17 and the lugs 14 is flattened to a considerable extent. With the usual construction of hinge where no positive stop is employed to limit the opening movement of the sections, the edge 21 is often pressed strongly against the surface indicated by 17 with the result that such edge is bent outwardly. This not only detracts from the appearance of the bracelet but also causes a sharp edge to project outwardly from the surface of the bracelet which is liable to cut or scratch the user of the bracelet. In the ordinary construction the surface indicated by 17 will be on the knuckle, because in such construction the two lugs are not connected by a web and the knuckle has the same cross-sectional shape as the lugs. In such construction also the

lines of division between the opposing ends of the lugs and the sides of the knuckle appear on the surface of the bracelet in addition to the transverse lines of the joint as indicated at 12.

My invention is designed to prevent any possibility of bending the edge 21 outwardly, and is also designed to entirely conceal the knuckle when the bracelet is closed.

It will be observed that the knuckle 15 when inserted in the recess 18 is covered by the web 17, and therefore it cannot be seen from the outer periphery of the bracelet. It will also be observed that it is segmental in cross-section with a hub portion 22 between which and the outer surface of the knuckle is a shoulder 23, and a recess 24 is thus formed between the hub and the casing secured to the section 10, and when the bracelet is opened, as shown in Figs. 2 and 3 the web 17 will move in this recess until it engages the shoulder 23, and the parts are to be so arranged that the web 17 will engage the shoulder 23 before the edge 21 can engage the outer surface of the web 17, and thus prevent liability of the edge 21 being bent outwardly.

By connecting the lugs 14 together by means of the web 17 the joint is strengthened and it will be also noticed the edge of the web which engages the shoulder 23 is comparatively thick and is not liable to be bent by contact with the shoulder.

While I have illustrated my invention as applied to a bracket its use is not confined to such articles.

Having described the invention, I claim:

1. A hinge joint for two sections one of which is movable with respect to the other, consisting of two separated cylindrical lugs connected together end to end by a narrow web at a portion of their periphery whereby a recess is formed between their opposing ends adjacent said web, said lugs being centrally bored, a segmental knuckle for insertion in said recess, said knuckle having a shoulder and being bored, a pintle inserted in the bores of the lugs and knuckle, the knuckle being secured to one section and the jaws to the other section in such relation that the said web will engage the shoulder on the knuckle when one section has moved a predetermined distance with respect to the other.

2. A bracket formed of two sections hinged together, the hinge consisting of two cylindrical lugs secured to one section of the bracelet and connected to each other by a web at a portion of their periphery whereby a recess is formed between their opposing ends adjacent the web, and the exterior surface of the web conforming to the adjacent exterior surface of the bracelet, a segmental knuckle secured to the other section of the bracelet and extending into the said recess, said knuckle having a shoulder within the recess and the lugs and knuckle having registering bores and a pintle secured in said bores, said lugs and knuckle being so arranged relatively to each other that the web will engage the shoulder on the knuckle when the sections are opened before the end edge of one section will engage the exterior surface of the other section.

3. A bracelet formed of two sections hinged together, the hinge consisting of two cylindrical lugs secured to one section of the bracelet and connected to each other by a web at a portion of their periphery whereby a recess is formed between their opposing ends adjacent the web and the exterior surface of the web conforming to the adjacent peripheral surface of the bracelet, a knuckle secured to the other section of the bracelet and extending into the said recess, said lugs and knuckle having registering bores, and a pintle secured in said bores.

In witness whereof, I have hereunto set my hand in the presence of two subscribing witnesses.

CHARLES SPATSCHIL.

Witnesses:

CHAS. B. BUTZFELDEY,

EDWIN CRUSE.