R. KING.

CLASP FOR STRAPS OR RIBBONS.

APPLICATION FILED NOV. 10, 1917.

1,272,675. Patented July 16, 1918.

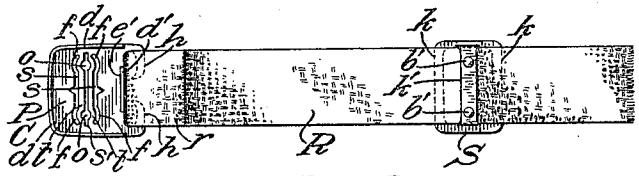


Fig. 1.

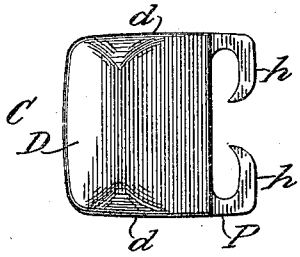


Fig. 2.

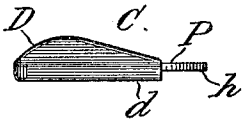


Fig. 3.

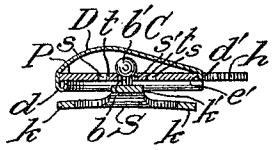


Fig. 4.

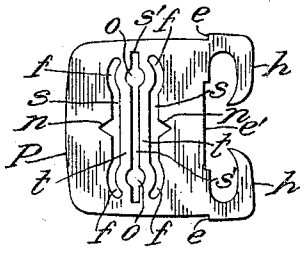


Fig. 5.

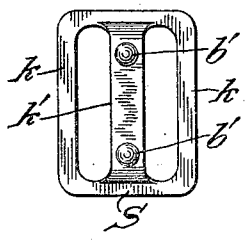


Fig. 6.

INVENTOR:
Rufus King
BY Arthur P. Mennington
ATTORNEY

THE NORRIS PETERS CO., PHOTO-LITHO., WASHINGTON, D. C.

UNITED STATES PATENT OFFICE.

RUFUS KING, OF PLAINVILLE, MASSACHUSETTS, ASSIGNOR TO BUGBEE AND NILES CO., OF NORTH ATTLEBORO, MASSACHUSETTS, A CORPORATION OF MASSACHUSETTS.

CLASP FOR STRAPS OR RIBBONS.

1,272,675. Specification of Letters Patent. Patented July 16, 1918.

Application filed November 10, 1917. Serial No. 201,198.

To all whom it may concern:

Be it known that I, RUFUS KING, a citizen of the United States, residing at Plainville, in the county of Bristol, State of Massachusetts, have invented certain new and useful Improvements in Clasps for Straps or Ribbons, of which the following is a specification.

My invention is an improved clasp for fastening the straps or ribbons of wrist-watches. The object of my improvement is to provide a device for this purpose which may be quickly and easily clasped and unclasped and which will fasten the strap in place with greater security. Further objects of the improvement are to provide a clasp which is neat and ornamental in appearance without projections or sharp edges on its surface, liable to catch in the garments of the wearer or on other objects; while being simple in structure, stanch and durable, and proof against derangement or damage under hard usage.

The manner and means for carrying out these improvements are fully described in the following specification, illustrated by the accompanying drawings, in which like reference characters designate like parts. In the drawings:—

Figure 1 is a view showing the parts of my improved clasp applied to the wrist-strap or ribbon;

Fig. 2, an enlarged, plan view of the main clasp-member;

Fig. 3, a side view of the same;

Fig. 4, a sectional view taken in a vertical plane through both clasp-members and showing the latter in engaged relation;

Fig. 5, an enlarged, plan view of the perforated, bottom plate of the main clasp-member; and

Fig. 6, a similar view of the coöperating clasp-slide which is provided with ball-ended studs or projections for engaging the openings in the perforated plate.

Referring first to Fig. 1, my improved clasp or fastener comprises two essential parts: the main member C adapted to be hooked into the looped end of the strap or ribbon R and the slide S formed to embrace the strap R and provided with projections *b*, *b* for insertion through apertures on the under side of the member C.

As shown more particularly in Figs. 2, 3 and 4, the clasp-member C is constructed in two pieces comprising a flat plate P, formed at one end with opposite, inturned prongs *h*, *h* adapted to hook into the looped end *r* of the strap R, see Fig. 1; and a shell or backing D having its rim crimped or rolled around the edges of the plate P to fasten it in superimposed position thereon. Fig. 5 illustrates the plate P in detail and it will be noted that its edges are cut away or recessed at *e*, *e* to adapt the rim *d* of the shell D to be rolled over them to form a flush joint, with the prongs or hooks *h*, *h* projecting at one side without leaving any sharp corners or projections. Between the two hooks *h*, *h* the plate *p* is recessed or cut away along its edge at *e'* and a lip *d'* on the shell D is bent down into this opening to hold the plate from slipping out of place when assembled with the shell, see Figs. 1 and 4. As shown in Fig. 4 the marginal edges of the plate P abut the inner face of the shell D along its sides and the top of the shell is swelled upwardly or crowned to provide a space for the studs *b*, *b* on the slide S which project through its openings. As illustrated in Figs. 2 and 3 the top of the shell D slopes from its highest point toward the rear with a relatively flat face, while toward the front it is more rounded to correspond with the rounded sides, this form or contour providing a smooth, unbroken surface, while also heightening the ornamental effect of the clasp.

Referring to Fig. 5, the plate P is punched from flat stock and is perforated with substantially parallel slits *s*, *s* and *s'* to form two opposite, lateral bars or spring-members *t*, *t*. The central slit *s'* extends straight across the plate P, and at a slight distance inwardly from its ends are circular openings *o*, *o* through which the studs *b*, *b* on the slide S may be inserted. The two outer, parallel slits *s*, *s* in the plate P are also straight throughout their central portions, but opposite the openings *o*, *o* they curve outwardly in the crescent-shaped ends *f*, *f* to provide for a uniform thickness of the cross-bars *t*, *t* at all points. At their centers the slits *s*, *s* are notched on the sides with triangular cuts *n*, *n*, these being provided merely to add to the ornamental appearance of the perforated design. Through the above described arrangement of the perforations the plate P is provided with the two coöperating spring-members *t*, *t* formed integral therewith and adapted to spring over the ball-ended studs

b, *b* to lock the two parts of the clasp together as later explained. It is obvious, however, that the shape of the perforations might be varied with curves or scrolls of different design to provide for the same action of the spring-members, and I do not herein limit myself as to this feature of the improvement.

Referring now to Figs. 4 and 6, the slide S may be of any desired conformation, and as here shown is constructed in rectangular shape with two opposite, cross-bars *k*, *k* and a third intermediate bar *k'* extending between its sides in parallel relation with each other. The central bar *k'* is arched above the plane of the two end-bars *k*, *k*, to allow the strap R to pass under it as it is drawn through the slide in the manner illustrated in Fig. 1. On the top of the cross-bar *k'* are the vertically-projecting studs *b*, *b* which are formed with reduced shanks and spherically-shaped ends *b'*, *b'* slightly greater in diameter than that of the openings *o*, *o* in the plate P. The studs *b*, *b* are preferably riveted or swaged onto the cross-bar *k* to provide a secure joint therebetween, and are spaced apart equidistant with the openings *o*, *o* in the plate P.

The manner of applying my improved clasp to use is as follows: The end of the strap R is doubled over and sewed or otherwise fastened to form the loop *r* and the prongs *h*, *h* on the member C are then hooked into its sides with the points engaging the fold of the fabric or leather to hold it in place. The slide S is slipped on over the opposite end of the strap and the latter can be drawn through its sides to adjust it in position thereon while the strap is loose. There is enough frictional resistance between the strap and slide, however, to prevent the latter's free movement, and when the strap is drawn tightly around the wrist the slide is held from sliding thereon. The strap R is provided with a loop at its opposite end by which it is fastened to the lug or ear on the side of the watch, leaving the clasp end free. This latter end is inserted through the opposite lug on the watch and is then turned back and clasped to the slide S, the latter being adjusted in proper position to draw the strap tightly around the wrist. In clasping the two members C and S together it is only necessary to register the ball-ends *b'*, *b'* of the studs *b*, *b* on the slide S with the openings *o*, *o* in the plate P, and to then exert a slight pressure against the top of the member C. The studs *b*, *b* will thereby be caused to spring the bars *t*, *t* apart to allow their entrance therebetween, the ball-ends *b'*, *b'* snapping into place above the top of the plate as shown in the sectional view, Fig. 4. In this way the two parts of the clasp are secured together against any lateral or longitudinal force tending to pull them apart; while to unclasp them it is only required to lift the member C upwardly from the slide S. The balls-ends *b'*, *b'* of the studs *b*, *b* will then be withdrawn from the openings *o*, *o* by their action of prying the spring-members *t*, *t* apart, and in either event, whether fastening or unfastening the clasp, only a single, simple movement is required, rendering its operation especially easy and convenient.

It is to be noted that when the parts of the clasp are fastened together, the shell or back D of the member C completely covers and hides the slide S and the parts which coöperate to effect the clasping action. That is to say, the studs or projections *b*, *b* are inclosed within the shell D and prevented from protruding into position where they would be liable to catch in the garments of the wearer, or on objects carried in the hands or adjacent thereto. It is also to be observed that the complete clasp when fastened together presents a smooth, unbroken surface contour without sharp corners or projections liable to catch in other objects and interefere with the free movement of the hand. My improvement also provides a clasp which serves to fasten the ends of the strap together more snugly and securely than with the usual type, while presenting a neater and more ornamental appearance, besides being stancher in structure and less liable to derangement or breakage from hard usage. Moreover, the improved structure comprises a minimum of parts and these latter may be struck up or stamped out in the manner explained to provide for manufacturing and assembling them at a relatively low cost.

For some types of straps, for instance with the ribbons on which ladies' watches are usually worn, the upper shell-member D may be dispensed with and the plate P used alone. With such an adaptation of the device the piercings in the plate serve to embellish and ornament its appearance, besides providing the improved feature of the opposed spring-elements or bars *t*, *t* made integral with the main piece P. Through this arrangement I avoid the complication of extra spring-wires or sockets and at the same time add to the strength and durability of the whole structure.

Various modifications might be made in the structure and coöperation of the parts of the device, or in the manner of applying it to use, without departing from the spirit or scope of the invention; therefore, without limiting myself to the exact embodiment shown and described, what I claim is:—

1. In a clasp for the straps and ribbons of wrist-watches or for like purposes, the combination with a slide adapted for adjustment on the strap and provided with ball-

ended studs, of a plate-member having perforations forming two integral parallel spaced yieldable bars with circular openings in their opposed edges adapted to admit the balls on the ends of the studs therebetween by snapping them into place therethrough.

2. In a clasp for fastening the ends of straps, ribbons or the like, the combination with a substantially flat plate pieced with openings to form opposite, spaced spring-members having circular apertures at their ends, of a crowned shell surmounting the top of the plate with its rim rolled over the edges thereof to form a flush joint therebetween, and a slide-member having studs with spherically-shaped ends adapted to be snapped into place between the spring-members with their protruding ends inclosed and protected by the shell.

3. In a clasp for fastening the ends of straps, ribbons or the like, the combination with a plate-member having prong-like hooks at one end and perforations in its main part to provide integral, spaced spring-arms with circular apertures at their ends, of a relatively thin shell formed with a crowned top overlying the plate and having its rim rolled over the edges of the latter with the hooks projecting at the side, and a slide-member having studs with spherically-shaped ends adapted to be snapped through the apertures between the spring-arms to secure the two parts of the clasp together.

4. In a clasp for fastening the ends of straps, ribbons or the like, the combination with a base-plate perforated with openings to form integral, spaced spring-arms having circular apertures at their ends, a coöperating slide-member having ball-ended studs adapted to be forced through the apertures in the spring-arms to seat their balls in position above the base-plate, and a crowned shell surmounting the top of the base-plate with its rim secured to the edges thereof to adapt it to inclose the ends of the studs projecting therethrough whereby to provide a smooth unbroken covering for the two cooperating parts of the clasp.

In testimony whereof I affix my signature.

RUFUS KING.

Witnesses:
HAROLD W. MASON,
JONATHAN P. EDWARDS, Jr.

Copies of this patent may be obtained for five cents each, by addressing the "Commissioner of Patents, Washington, D. C."