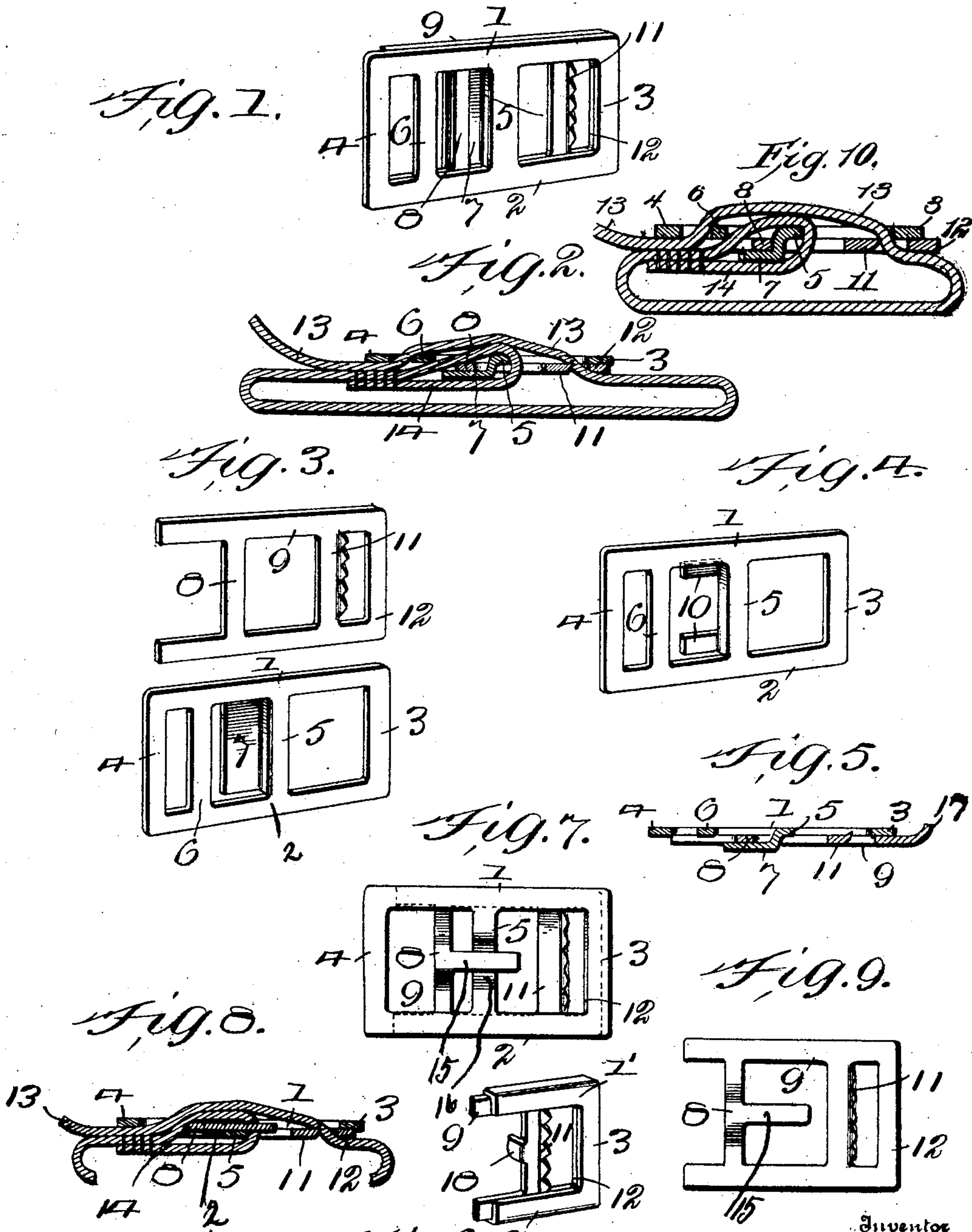


No. 803,546.

PATENTED NOV. 7, 1905.

R. A. BROWN.
BUCKLE.

APPLICATION FILED DEC. 21, 1904.



Witnesses
J. E. Boney.
S. W. Fitzgerald

Fig. 6. R. A. Brown
W. J. Fitzgerald & Co.
Attorneys

UNITED STATES PATENT OFFICE.

ROYL A. BROWN, OF ASHLAND, OHIO, ASSIGNOR OF ONE-HALF TO
GEORGE S. LUCAS, OF MANSFIELD, OHIO.

BUCKLE.

No. 803,546.

Specification of Letters Patent.

Patented Nov. 7, 1905.

Application filed December 21, 1904. Serial No. 237,854.

To all whom it may concern:

Be it known that I, ROYL A. BROWN, a citizen of the United States, residing at Ashland, in the county of Ashland and State of Ohio, have invented certain new and useful Improvements in Buckles; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

My present invention relates to buckle construction; and my object, among others, is to provide a buckle or securing device for coöperating with the end of a strap, whereby said end will be tightly engaged or clamped, and thus held securely in an adjusted position, whether the end of the strap or band is provided with perforations or not; and my invention consists of certain novel details of combination and construction of parts the preferred form whereof will be hereinafter clearly set forth and illustrated in the accompanying drawings, which are made a part of this application, and in which—

Figure 1 is a perspective view of my buckle in its assembled position. Fig. 2 is a longitudinal sectional view through the buckle and strap secured thereto and showing the position of the buckle members before pulled in opposite directions by the opposite ends of the strap, so as to move the buckle parts into strap-gripping relation. Fig. 3 is a perspective view showing the two parts of my device separated from each other. Fig. 4 is a perspective view of the upper half of the buckle. Fig. 5 is a longitudinal section through a modified form of buckle. Fig. 6 is a perspective view of one end of another modification. Fig. 7 is a plan view of a further modification employing a tongue. Fig. 8 is a longitudinal section through the buckle shown in Fig. 7 and showing belt or strap ends in position therein, and Fig. 9 is a plan view of the tongue member of the said modification. Fig. 10 is a view similar to Fig. 2 and showing the strap clamped by the coöperative action of the gripping parts.

Referring to the numerals on the drawings, which for convenience are employed to designate the various parts of my invention and accessories, 1 and 2 indicate the side sections of my buckle-frame, while 3 and 4 indicate the end sections thereof, and 5 and 6 the cross-bars. The cross-bar 5 is provided with the

downwardly-extending lip 7, designed to engage the cross-bar 8 upon the auxiliary frame-section 9, which fits upon the under side of the main frame-section. The auxiliary frame 9 is, in addition to the cross-bar 8, provided with the cross-bar 11 and with the end section 12, the cross-bar 11 being preferably serrated on its outer edge, so that when the strap is entered between the cross-bars 3 and 11 it will be securely engaged and held by said serrations.

One end of the strap 13 is looped around the bars 8 and 5 and lip 7 and is suitably secured, as shown at 14 in Fig. 2, said loop being loose enough to permit the bar 5 and lip 7 to move freely therein. The other end of the strap 13 is then inserted between the bars 11 and 12 of member 9 and between the bars 4 and 6 of the main buckle-frame. When the ends of the strap 13 are pulled away from each other, the loop 14 will pull the lip 7 and bar 5, together with main frame 1, in one direction, thereby sliding the bar 3 toward the adjoining portion of the strap, while the portion of the strap between bars 11 and 12 will be inclined by the pull thereon and caused to engage the teeth of bar 11 and one edge of bar 12. Said bars will therefore be moved by the strap 13 in one direction and the bar 3 by the loop 14 in another direction, thus causing the strap to become tightly clamped between bars 11 and 3 as long as longitudinal strain is exerted thereon in opposite directions. By pulling the free end of the strap backward over the bar 3 said bar 3 will be removed from clamping position, and the strap will at the same time be released from bar 11, so as to be readily removable.

In Fig. 4 of the drawings I have shown the upper half of the buckle, which is similar to the buckle shown in Figs. 1, 2, and 3, with the exception that a part of the downwardly-extending lip 7 is removed, leaving the tongue-like members 10 to engage the cross-bar 8. In Fig. 5 of the drawings I have shown the auxiliary section of the buckle extending beyond the end of the upper section, said extension being slightly curved upwardly, as indicated by the numeral 17, the object of which is to enable said extended end to be grasped by the fingers and the auxiliary frame held in such position with respect to the main frame that the end of the strap 13 may be readily inserted or removed from the buckle.

In Fig. 6 of the drawings I have shown a slightly-different form of controlling the auxiliary section while the strap is being inserted or removed from the buckle in that the cross-bar 11 is provided with the depending lip-section 18, which is designed to be engaged by the thumb. I have also shown in this view the side sections 1' and 2', projecting over the auxiliary frame 9, whereby lateral or twisting movement of said auxiliary frame will be prevented.

In Figs. 7, 8, and 9 I have shown another form of construction which may be adopted, wherein the depending lip 7 is dispensed with, and in lieu thereof I provide upon the cross-bar 8 an inwardly-directed tongue 15, which is received by a countersink 16 in the middle portion of the cross-bar 5 of the main frame. The auxiliary frame 9 in this instance is also provided with the cross-bar 11, preferably having a serrated edge, as before explained, and when the main and auxiliary frame-sections are mounted in their operative combination with each other the tongue 15 rests in the recess 16 and prevents said frame-sections from becoming casually separated.

I lay particular stress upon the great simplicity of construction involved in providing this form of buckle or securing device, inasmuch as the two coöperating members or frame-sections may be readily fashioned from suitable sheet metal, as by stamping the same out therefrom by means of suitable dies, when said parts may be quickly assembled in their operative positions, and are thus disposed in position for instant use, there being no special machining of the parts or expensive labor required in assembling the same.

My improved buckle or securing device may be used for a great variety of purposes and will be found to be strong and reliably efficient in every situation or use, and while

I have described the preferred construction and combination of parts I wish to comprehend all substantial equivalents and substitutes fairly falling within the scope and purview of my invention.

Having thus fully described my invention, what I claim as new, and desire to secure by Letters Patent, is—

1. A buckle comprising a main frame having cross-bars, an auxiliary frame, a serrated cross-bar upon the auxiliary frame projecting into the path of one of the cross-bars of the main frame, and longitudinally-extending means integral with the central part of one of the frames and overlapping a cross-bar of the other frame to hold the frames together in slidable relation.

2. A buckle comprising a main frame having cross-bars, an auxiliary frame, a serrated cross-bar upon the auxiliary frame projecting into the path of one of the cross-bars of the main frame, and a projection integral with a cross-bar of one of the frames and overlapping a cross-bar of the other frame to hold the frames in sliding relation.

3. A buckle and a strap comprising a main frame having cross-bars, an auxiliary frame, a serrated cross-bar upon the auxiliary frame projecting into the path of one of the bars of the main frame, and a projection integral with a cross-bar of one of the frames and overlapping a cross-bar of the other frame to hold the frames in sliding relation, and the strap looped at one end about the projection, its bar, and the overlapped bar.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

ROYL A. BROWN.

Witnesses:

C. T. REID,

ARTHUR L. VANOSDALL.