

No. 807,698.

PATENTED DEC. 19, 1905.

J. E. TRAHAN & J. A. GRANT.
FASTENING DEVICE.

APPLICATION FILED SEPT. 14, 1905.

Fig. 1.

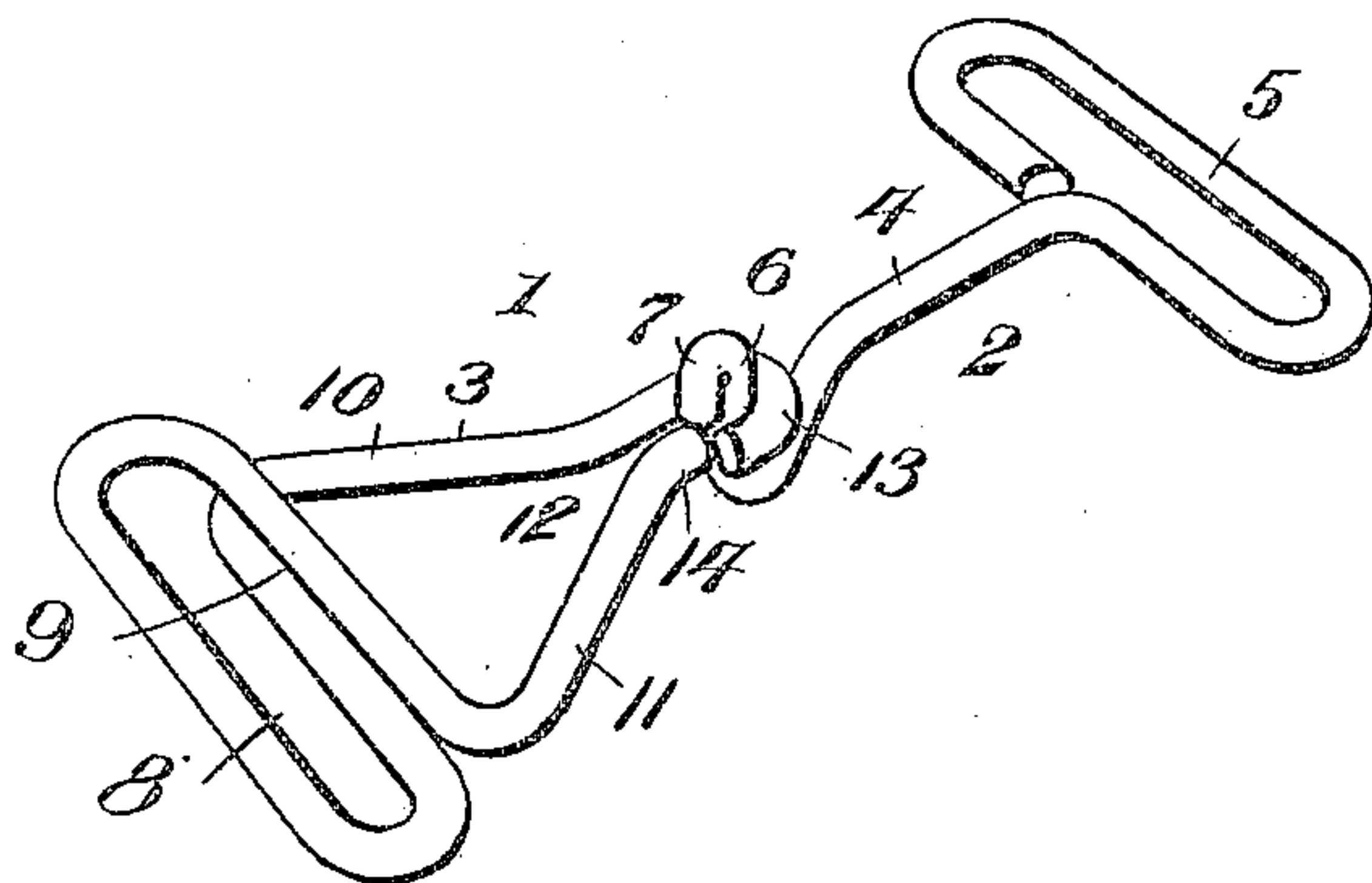


Fig. 2.

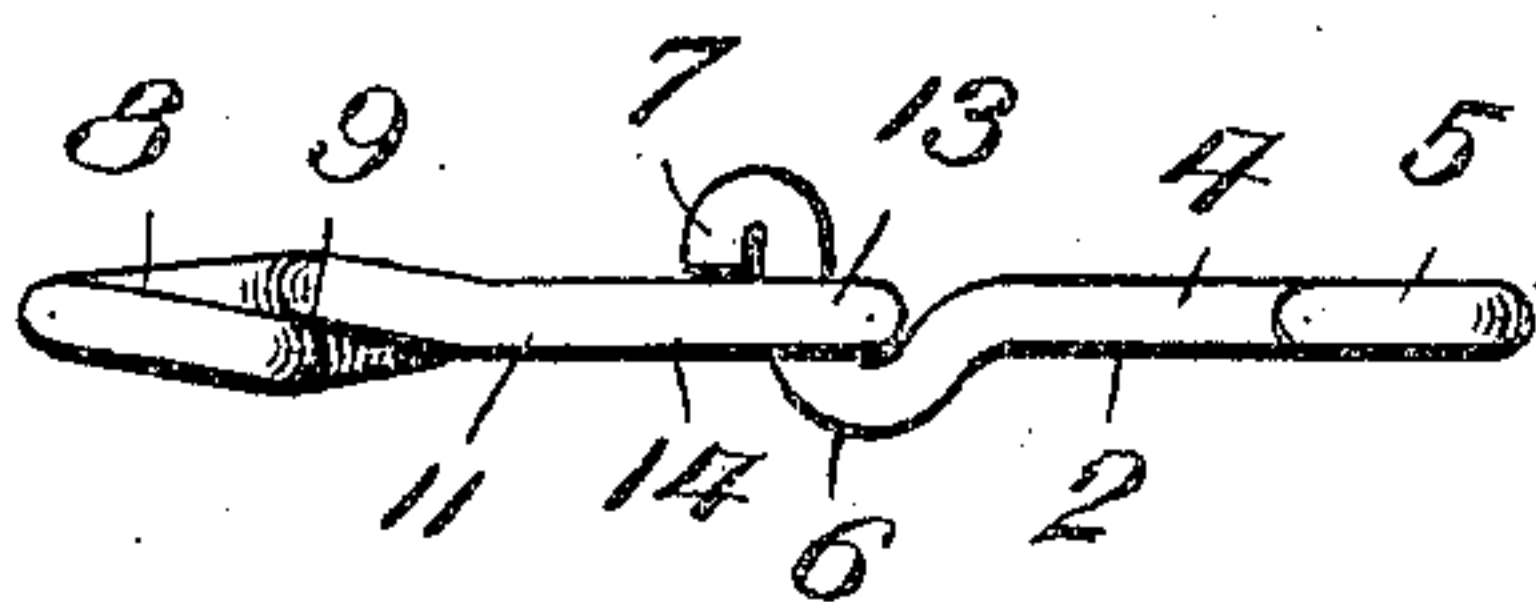


Fig. 4.

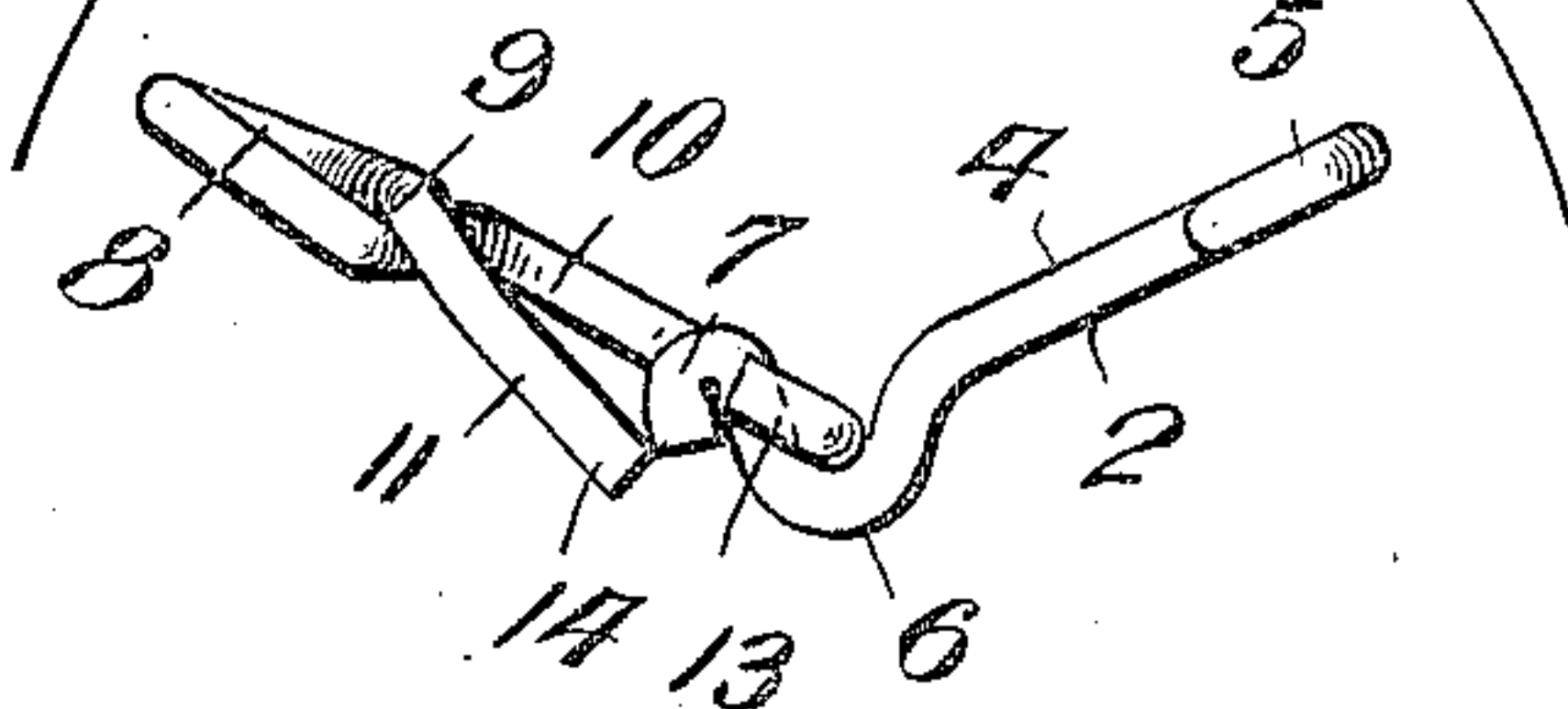


Fig. 3.

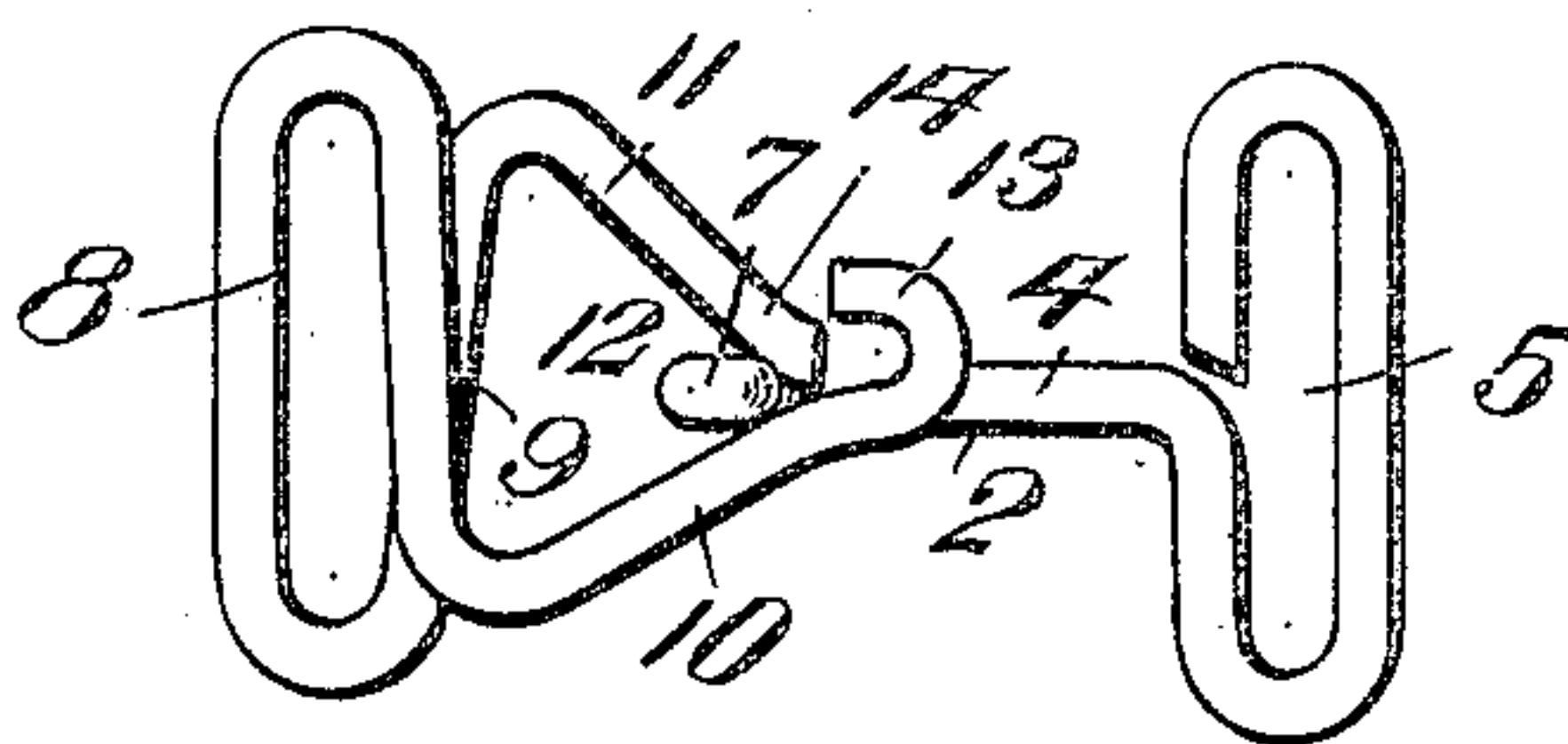
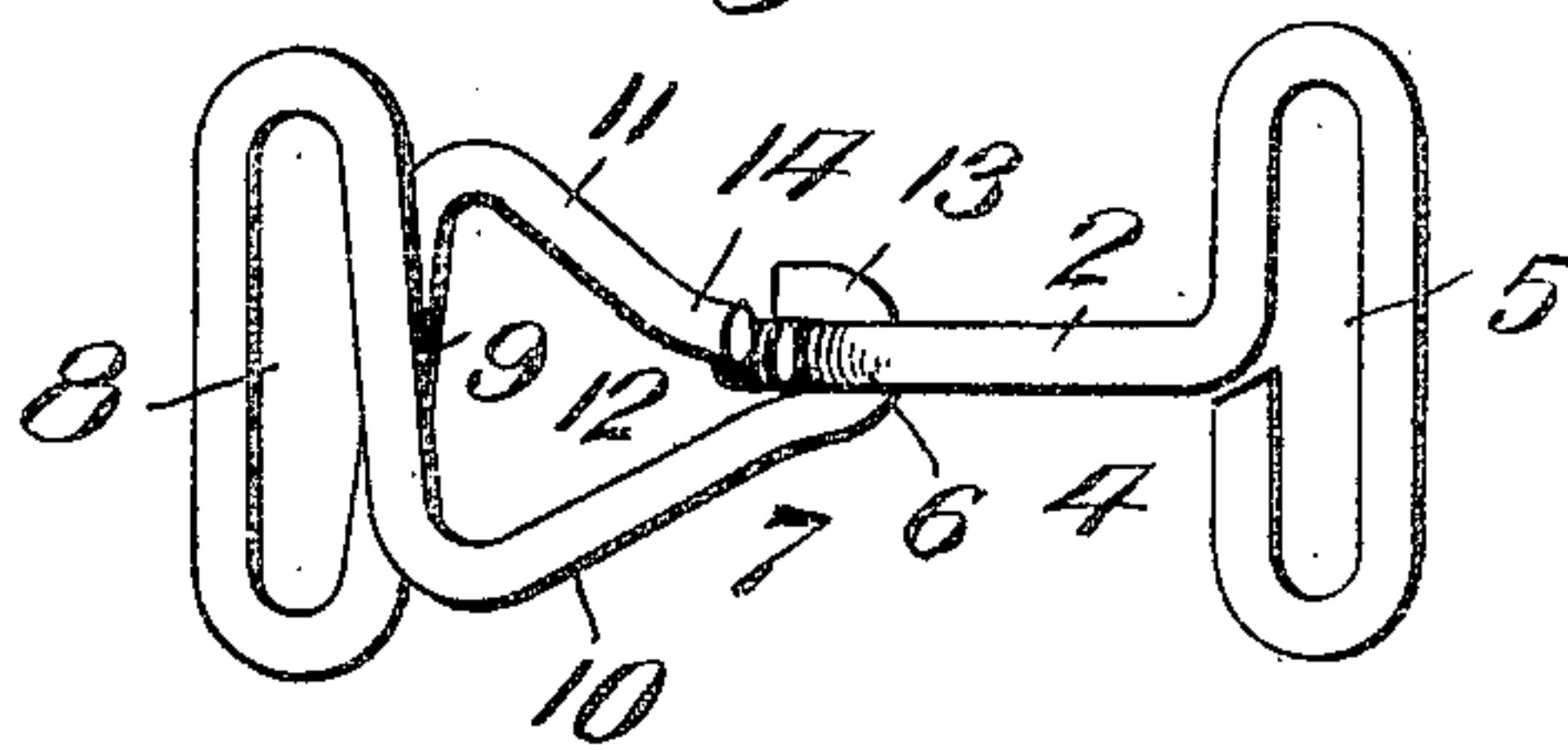


Fig. 5.



Witnesses

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UNITED STATES PATENT OFFICE.

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FASTENING DEVICE.

No. 807,698.

Specification of Letters Patent.

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To all whom it may concern:

Be it known that we, JOSEPH E. TRAHAN and JAMES A. GRANT, citizens of the United States, residing at Watertown, in the county of Jefferson and State of New York, have invented certain new and useful Improvements in Fastening Devices; and we do 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.

This invention relates to improvements in fastening devices that are particularly adapted for use upon horse-blankets and the like, but which may be used as flexible detachable connections for any purpose.

The object of the invention is to provide a simple and efficient hook-and-eye fastening in which the parts or members may be quickly and easily engaged and disengaged and when engaged will have a free laterally-swinging or pivotal movement independent of each other.

A further object of the invention is to improve and simplify the construction and operation of devices of this character, and thereby render the same more durable, convenient, and at the same time less expensive.

With the above and other objects in view the invention consists of certain novel features of construction, combination, and arrangement of parts, as will be hereinafter described and claimed.

In the accompanying drawings, Figure 1 is a perspective view showing the two members of the fastening device in their engaged position. Fig. 2 is an edge view of the same. Fig. 3 is a view showing the positions of the members as they are about to be engaged with each other. Fig. 4 is a detail edge view of the members, showing the manner in which they are disengaged; and Fig. 5 is a plan view of the parts shown in Fig. 4.

Our improved fastening 1 comprises a hook member 2 and a coacting eye member 3, each being preferably formed from a single piece of resilient metal by bending the same, as shown. The hook member comprises a straight body 4, having one of its ends bent to form an elongated loop 5 and its other end bent to form a laterally-offset hook 6, having an enlarged bill or head 7, formed, preferably, by bending or doubling the extreme end of the piece of metal from which the member is formed upon itself, as shown. The eye member 3 is formed by bending a piece of metal adjacent to its center to form an elongated

loop 8 and by bending its ends across each other, as shown at 9, and then angularly, as at 10 11, so that they converge toward each other and form a tapering space 12 between them. The end 10 is then bent to form a substantially U-shaped eye 13, which has its open mouth or end turned rearwardly and normally closed by a resilient stop-tongue 14, formed by the other end 11 of said piece of metal. The spring-tongue 14 is of about the same width as the mouth of the eye 13, so that the hook 6 will be effectively retained in said eye and at the same time permitted to have a free lateral swinging or pivoted movement. The crossing or overlapping of the ends 9 gives tongue 14 sufficient resiliency, so that it may move in any direction. When the two members are to be engaged with each other, the hook 6 is placed in the converging space 12 and the two members are drawn away from each other, so that said hook will push the tongue 14 laterally and enter the eye 13, in which it will be retained by the enlarged bill or head 7 upon its end. When it is desired to separate the two members, they are swung upon each other, as indicated by the arrows in Fig. 4, so that the bill or head 7 of the hook 6 will engage the tongue 14 and push the latter first outwardly at right angles to the plane of the member and then laterally until the hook leaves the eye.

The construction, use, and advantages of the invention will be readily understood from the foregoing description, taken in connection with the accompanying drawings. The meeting edges or ends of the parts or elements to be connected are secured to the loops 5 and 8 in any desired manner. It will be seen that the members may be quickly and easily engaged with and disengaged from each other and that when engaged they will have a free movement independent of each other, but will not be liable to become casually or accidentally separated. Owing to the simplicity of the construction, the parts may be manufactured at a comparatively small cost.

Having thus described our invention, what we claim as new, and desire to secure by Letters Patent, is—

1. In a fastening, the combination of a hook member comprising a body, a hook at one end thereof provided with an enlarged bill, and a coacting eye member comprising a body, a rearwardly-turned hook at one end thereof having an open mouth, and a stop-tongue to close said open mouth.

2. In a fastening, the combination of a hook member comprising a body, a hook at one end thereof provided with an enlarged bill, and a coacting eye member comprising a body, a rearwardly-turned hook at one end thereof having an open mouth, and a resilient stop-tongue movable laterally and in planes at right angles to the longitudinal axis of the eye member and adapted to close the open mouth of said eye.

3. In a fastening, the combination of a hook member comprising a body having a laterally-offset hook at one end provided with an enlarged bill or head, and a coacting eye member comprising a body having at one end a substantially U-shaped eye with its open end or mouth turned rearwardly, and a resilient stop-tongue adapted to close the open mouth of said eye to retain said hook therein.

4. In a fastening, the combination of a hook member comprising a body, a laterally-offset hook formed by bending one end of said body and a head or bill at the end of said hook formed by doubling the end of the latter upon

itself, and a coacting eye member comprising a body having at one of its ends converging arms, one being bent to form a substantially U-shaped eye having its open mouth turned rearwardly, and the other being adapted to form a spring stop-tongue to close the open mouth of said eye, substantially as described.

5. In a fastening, the combination of an eye member formed by bending a piece of metal to form the loop 5, the straight body 4, the offset hook 6, and the enlarged bill or head 7, and a coacting eye member formed by bending a piece of metal to form the loop 8, the crossed portions 9, the ends of arms 10, 11, the eye 13, and the spring stop-tongue 14, substantially as shown and described.

In testimony whereof we have hereunto set our hands in presence of two subscribing witnesses.

JOSEPH E. TRAHAN.
JAMES A. GRANT.

Witnesses:

HERBERT C. TEEPPELL,
L. H. ROBBINS.