(No Model.)

W. B. MURPHY.

FASTENING DEVICE FOR GLOVES, &c.

No. 591,989. Patented Oct. 19, 1897.

Fig. 1.

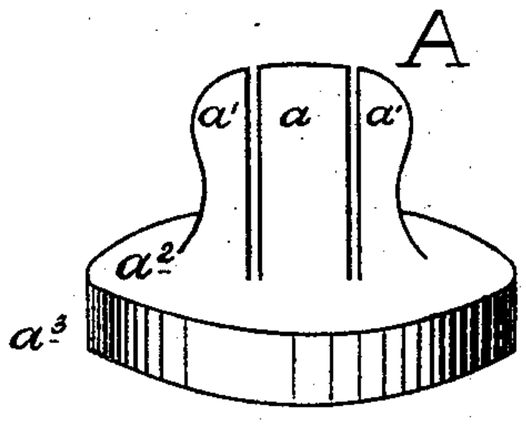


Fig. 2.

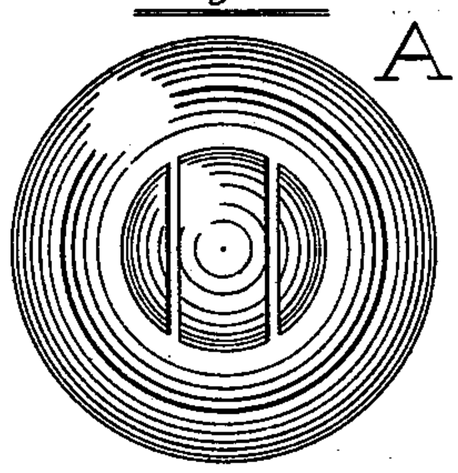


Fig. 3.

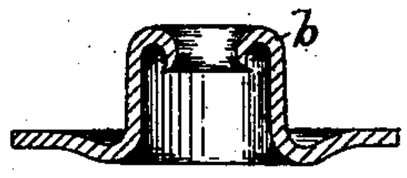


Fig. 4.

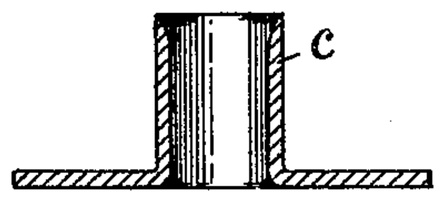


Fig. 5.

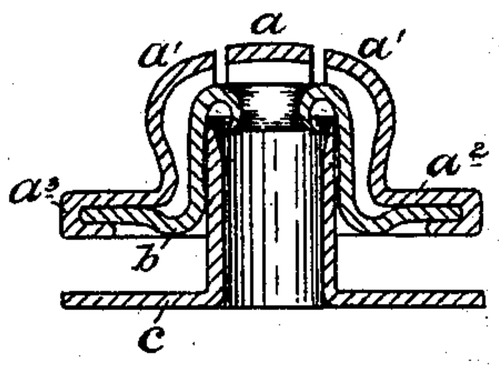
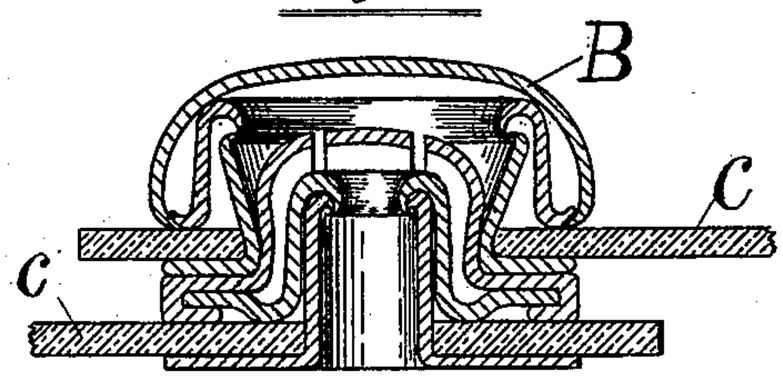


Fig. 6.



Witnesses
Percy Hopfel
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Inventor

UNITED STATES PATENT OFFICE.

WILLIAM B. MURPHY, OF NEW YORK, N. Y., ASSIGNOR TO LUCIUS N. LITTAUER, OF GLOVERSVILLE, NEW YORK.

FASTENING DEVICE FOR GLOVES, &c.

SPECIFICATION forming part of Letters Patent No. 591,989, dated October 19, 1897.

Application filed February 6, 1897. Serial No. 622,330. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM B. MURPHY, a citizen of the United States, residing at the city of New York, in the county of New York and State of New York, have invented a certain new and useful Improvement in Fastening Devices for Gloves and other Articles, of which the following is a specification.

My improvement relates to that class of fastening devices for gloves and other articles which are composed of a resilient or spring stud member and a rigid socket member adapted to receive and hold the stud member, the former being adapted to be attached to one flap and the latter to the other flap of the glove or other article, so that when the head of the resilient stud member is made to occupy the socket member the two flaps become firmly fastened, permitting also a ready disengagement.

The object of my present invention is to improve upon constructions heretofore known and to combine the advantages of that class of resilient studs of which the Letters Patent to F. E. Williams, No. 511,482, dated December 26, 1893, illustrates one construction in which the sections composing the head are compressed together when the head is made to enter the socket or is withdrawn therefrom, and that class of which the Letters Patent to P. A. Raymond, No. 349,453, dated September 21, 1886, No. 369,882, dated September 13, 1887, and No. 405,179, dated June 11, 1889, are illustrations in which the stud is elongated vertically under the same operations.

In the accompanying drawings, Figure 1 is a view in perspective of the head and base plate of my improved stud, and Fig. 2 is a top view of the same. Figs. 3 and 4 are vertical sectional views of the pieces whereby the stud is attached to the fabric. Fig. 5 is a vertical sectional view of the various parts, showing their relations to each other; and Fig. 6 is a vertical sectional view of the complete stud-head attached to a fabric and in engagement with a rigid socket also attached to a fabric.

The exterior piece A, constituting the spring-head, is struck up from sheet metal and is composed of the head portion, which is divided by two parallel vertical slits into the central section a and the side sections a' a', a^2 being the base of the stud, and a^3 a flanged portion thereof which, in a suitable press, is turned over and made to tightly embrace the flanged base of the piece b, Fig. 3. The pieces A and b being firmly attached together, as shown in Fig. 5, the stud is placed upon the fabric over a suitable hole which has been pierced therein, and a flanged tubular eyelet c Fig. 4 is introduced from behind, and by means of a suitable press is forced upward, so that the top of the eyelet is turned over, clenched, and held by the turned-over portion of the piece b, all as shown in Fig. 6, which figure illustrates the various parts composing the stud and the parts for fastening the same to the fabric in operative relation, C being the fabric, and said figure also shows the stud in engagement with a socket B, attached to the opposite flap.

I have shown in Fig. 5 the stud-head arranged for attachment to a fabric by means of the pieces b and c, but these pieces b and c do not constitute any part of my present invention, as the stud-head may be attached to the fabric by other well-known devices adapted thereto which do not interfere with the necessary compression of the stud-head when it enters the socket or is withdrawn therefrom.

The socket shown at B, Fig. 6, does not constitute any part of my present invention, the same being of the construction shown in Letters Patent No. 545,906, dated September 10 1895, granted to me as assignor, &c., and the stud constituting my present improvement can be used with any suitable rigid socket.

Instead of the stud-head being provided with only one central section, as a, Fig. 1, there may be several central sections made by parallel vertical slits without departing from the spirit of my invention, but one central section is sufficient. When a stud of this construction is forced into or withdrawn from the socket, the side portions a' a' are pressed toward the central section and the central section a is slightly elongated. In this manner the movement of the side portions a' a'

is extremely slight and less than the movement would be if the central section *a* was not interposed, and there is therefore considerably less force required to insert the stud-head into the socket and withdraw it therefrom and less danger of the metal acquiring a permanent set. The central section *a* also undergoes less movement in the operation of engaging or disengaging with the socket than if the stud-head were composed of radial arms, as shown in the Raymond patents above referred to, and the danger of the stud being accidentally twisted or crushed is very materially diminished and practically avoided altogether because the central section *a* is supported on either side by the spherical portions *a' a'*. I have, in the manner described, devised a stud which besides being very simple in construction combines all desirable resiliency with great durability, and a less degree of nicety and exactness is required in proportioning the stud to the socket with which it is intended to engage.

What I claim as new, and desire to secure by Letters Patent, is—

1. A spring-stud intended for engagement with a socket having a central section *a* and two side sections *a' a'*, substantially as described.

2. A spring-stud intended for engagement with a socket, the head of which is divided into three or more sections by slits parallel or nearly so, substantially as described.

3. A spring-stud intended for engagement with a socket composed of three sections of which the two exterior sections are capable of lateral compression and the central section is capable of vertical elongation, substantially as described.

In witness whereof I have hereunto set my hand this 1st day of February, 1897.

WILLIAM B. MURPHY.

Witnesses:
WILLIAM LITTAUER,
G. A. TAYLOR.