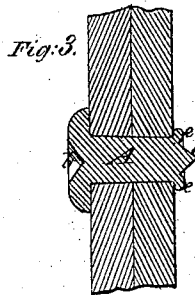
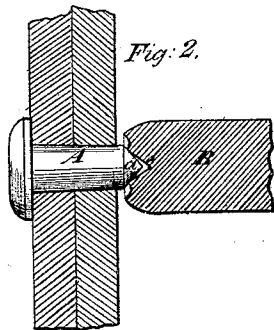
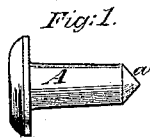


H. E. COPELEY.
RIVET.

No. 101,352.

Patented Mar. 29, 1876



Witnesses:
Fred. Haines
R. R. Rabreau

Inventor:
H. E. Copeley

United States Patent Office.

HUMPHREY E. COPELEY, OF BROOKLYN, NEW YORK.

Letters Patent No. 101,352, dated March 29, 1870.

IMPROVEMENT IN RIVETS.

The Schedule referred to in these Letters Patent and making part of the same.

To all whom it may concern:

Be it known that I, HUMPHREY E. COPELEY, of Brooklyn, in the county of Kings and State of New York, have invented a new and useful Improvement Rivets and Rivet-Sets; and I do hereby declare that the following is a full, clear, and exact description of the same, reference being had to the accompanying drawings.

This invention consists in a rivet having its point made of conical form, and a punch or set having a conical recess, whereby rivet is centered in the closing or riveting punch, and the riveting is enabled to be performed more uniformly all around the point, and security is obtained with a less displacement of metal than when the point is made of flat or irregular shape, and a very neat and ornamental appearance is given to the end of the rivet.

Figure 1 is a side view of a rivet constructed according to my invention.

Figure 2 exhibits a similar view of the same, representing it inserted through two thicknesses of material which are to be secured together by it, and showing the closing or riveting-punch applied to its point ready for riveting, the material and the punch being shown in section.

Figure 3 represents a longitudinal section of the rivet, showing it closed or riveted upon the material.

Similar letters of reference indicate corresponding parts in the several figures.

A is the rivet.

The conical point, which constitutes my invention, is shown at *a* in figs. 1 and 2.

In other respects the rivet may be of the common or any suitable form, but it is represented, in fig. 3, with a conical cavity, *b*, in the center of the head, for

the purpose of centering it in or upon a die of corresponding form.

The closing or riveting-punch B to be used for the rivet has a conical cavity, *c*, in its center, as shown in fig. 2, the outer circumference of the said cavity being somewhat less than that of the point of the rivet, and the angle of the cone of the cavity being somewhat more acute, so that, when the point of the rivet is received into the said cavity, as shown in fig. 2, it will not bottom therein, but the edge only of the said cavity will bear upon the rivet.

The end of the punch is countersunk around the cavity *c*.

When the rivet is placed between the punch and die for closing it, and pressure is applied to the punch, the latter displaces the metal around the circumference of the end of the rivet, and turns it over all around, as shown at *e e* in fig. 3, in a uniform manner, and a very neat appearance is given to the end of the rivet. Moreover, the riveting is performed effectively by a less pressure, which is of especial advantage when the riveting is done in a pair of pliers, as is often the case when rivets are employed for light work, such as securing buttons to garments and other like operations.

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

1. The punch or set B, constructed with a central cavity, *c*, and countersink around it, for operation substantially as set forth.

2. A rivet finished with the punch or set B, essentially as specified.

Witnesses:

FRED. HAYNES,
R. E. RABEAU.

H. E. COPELEY.