G. L. VOSE & A. S. SOUTHWICK.

BUTTONS.

No. 187,203. Patented Feb. 6, 1877.

Fig 1

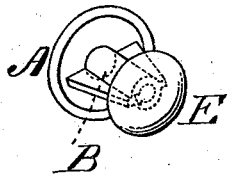


Fig 2

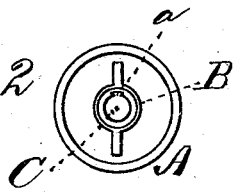


Fig 3

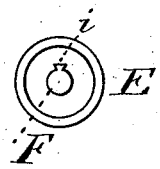


Fig 4

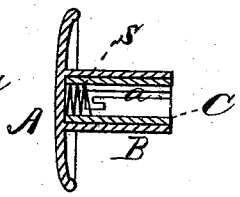


Fig 5

Fig 6

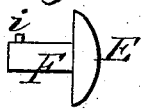
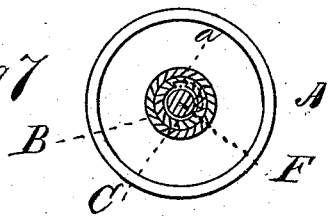


Fig 7



WITNESSES

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UNITED STATES PATENT OFFICE.

GEORGE L. VOSE AND ANDREW S. SOUTHWICK, OF PROVIDENCE, R. I.

IMPROVEMENT IN BUTTONS.

Specification forming part of Letters Patent No. **187,203**, dated February 6, 1877; application filed September 30, 1876.

To all whom it may concern:

Be it known that we, GEORGE L. VOSE and ANDREW S. SOUTHWICK, of Providence, in the county of Providence and State of Rhode Island, have invented a new and valuable Improvement in Stud-Buttons; and we do hereby declare that the following is a full, clear, and exact description of the construction and operation of the same, reference being had to the annexed drawings, making a part of this specification, and to the letters and figures of reference marked thereon.

Figure 1 of the drawings is a representation of a perspective view of our stud. Fig. 4 is a longitudinal section of the face-plate and shank and interior tube. Fig. 7 is a transverse section of the neck of the stud. Figs. 2, 3, 5, and 6 are detail views.

This invention has relation to improvements on sectional stud-buttons; and it consists in the combination, with a tube having an L-shaped longitudinal slot, and a back plate having a tubular shank, of the cylindrical shank of the face-plate, having a locking-spur, and the helical spring seated at the bottom of said tube, as hereinafter shown and described.

In the annexed drawings, the letter A indicates the face-plate of our improved stud, having a tubular shank, B. C is an inner cylindrical tube, which is passed into the shank B, and is secured therein by soldering or other suitable means. This sleeve is provided with an L shaped slot, *a*, which is originally cut in a tube, D, which, being inserted into the tubular shank and secured thereto, is then filed off, leaving its outer end flush with that of the shank. In this way the outer end of the slot *a* is left open. E represents the inner disk of the stud, having a preferably solid shank, F, provided near its free end with a spur, *i*. This shank fits snugly in the bore of the inner tube C, and spur *i* in the groove *a*. The parts are united in the following manner, to wit: The shank F is inserted in the bore of the inner lining C, spur *i* entering the open end of slot *a*, and the two parts of the stud pushed toward each other. Spur *i* will go to the bottom of the longer branch of the said slot, when, by a slight turn of the inner disk, it will pass through the connecting-arm into the shorter branch, into the end of which it will be pushed by the recoil of a helical spring, *s*, at the bottom of the said inner tube, which had been compressed by shank F during its insertion. This spring will also hold the spur up into this branch, and prevent its casual disengagement therefrom.

In order to prevent the stud from rotating, the tubular shank of the face-plate will have two wings, *l*, on opposite sides, in line with each other, which, being engaged in the button-hole, will effectually accomplish the desired result.

The inner tube may be made of any suitable metal, and, when combined with the shank F, the neck connecting the two disks will be, to all intents and purposes, solid.

What we claim as new is—

In combination with the tube C, having a longitudinal L-shaped slot, *a*, the tubular shank of the back plate, the cylindrical shank F of the face-plate, having a locking-spur, *i*, and the helical spring seated at the bottom of tube C, substantially as specified.

In testimony that we claim the above we have hereunto subscribed our names in the presence of two witnesses.

GEORGE L. VOSE.
ANDREW S. SOUTHWICK.

Witnesses:
CHARLES J. BROWN,
ARTHUR D. SAWIN.