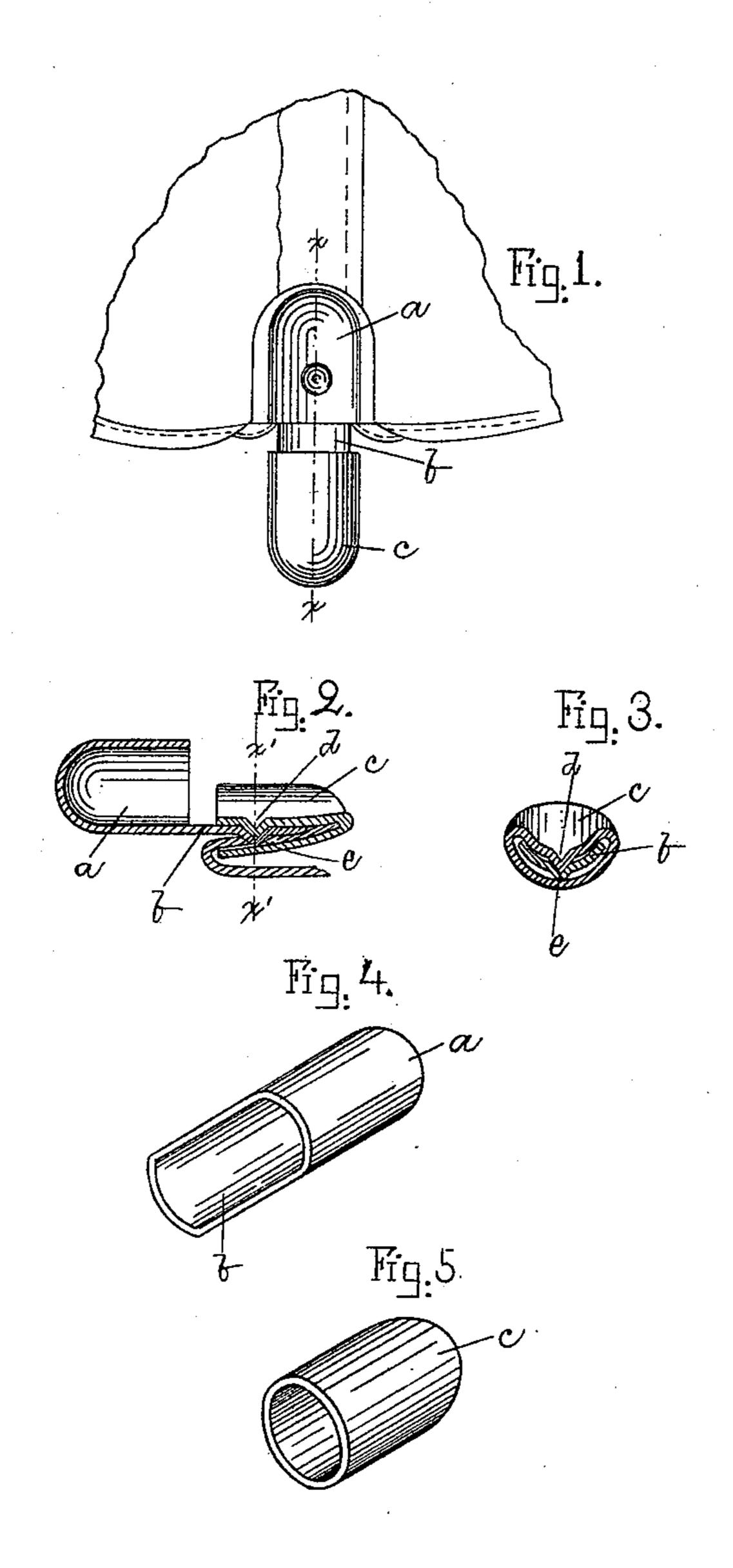
(No Model.)

## A. J. ROBINSON.

FASTENING FOR UMBRELLA TIPS AND THE LIKE.

No. 435,979.

Patented Sept. 9, 1890.



Wilgesses.
Fred. S. Greenleaf
Maderick Europ-

Inventor.

andrew J. Robinson,

by lendy Gregory

Other

## UNITED STATES PATENT OFFICE.

ANDREW J. ROBINSON, OF BOSTON, MASSACHUSETTS, ASSIGNOR TO THE F. P. ROBINSON COMPANY, OF PORTLAND, MAINE.

## FASTENING FOR UMBRELLA-TIPS AND THE LIKE.

SPECIFICATION forming part of Letters Patent No. 435,979, dated September 9, 1890.

Application filed April 4, 1890. Serial No. 346,555. (No model.)

To all whom it may concern:

Be it known that I, Andrew J. Robinson, of Boston, county of Suffolk, State of Massachusetts, have invented an Improvement in 5 Fastenings for Umbrella-Tips and the Like, of which the following description, in connection with the accompanying drawings, is a specification, like letters on the drawings representing like parts.

This invention has for its object to construct a fastening device for attaching tips to the covers of umbrellas, parasols, and the like, although my invention comprehends the use of such device for any other purpose.

In accordance with this invention the tip has a tongue, and a hollow cylindrical shell of suitable size and shape embraces or incloses the said tongue, said hollow cylindrical shell preferably having a closed end. The mate-20 rial to which the tip is attached is placed between the tongue and the inner side wall of the hollow shell, and the latter is then pressed down firmly upon it, binding the material firmly between said tongue and the said in-25 ner side wall. To further assist in holding the material, a slight depression is formed by compressing the parts, which form a slight projection on the tongue, which enters or it may puncture the material. The fastening 30 device thus formed presents, therefore, a tongue and two connected inclosing or embracing plates or sides, between which the said tongue and the material are placed.

Figure 1 shows in front elevation a fasten-35 ing device embodying this invention shown as applied to the tip used particularly on umbrella and parasol covers; Fig. 2, a longitudinal section of the fastening device and tip shown in Fig. 1, taken on the dotted line xx; 40 Fig. 3, a cross-section of the fastening device shown in Fig. 2, taken on the dotted line x' x'; Fig. 4, a perspective view of a tip having a tongue formed on or integral with it; Fig. 5, a perspective view of a hollow cylindrical 45 shell, which, when compressed, forms inclosing or embracing sides for the fastening device.

herein to be described is applied, consists of a hollow cylindrical shell. A tongue b is 50 formed on or integral with the tip a. A hollow cylindrical shell c, preferably having a closed end, is placed on the tongue b, embracing or inclosing it, and the material to which the device is to be attached is placed between 55 the tongue b and the inner side wall of the shell c. The shell c is then compressed, so that one of its walls is pressed down onto the tongue b, as shown best in Figs. 2 and 3, to thereby bind the material firmly between the 60 tongue b and the opposite wall and then hold it. To further assist in holding the material in place, a depression d is formed in the shell c, which in turn forms a depression e in the tongue b and presents a slight projection 65 thereon, which enters, or, it may be, punctures, the material placed between the tongue and the inner side wall of the shell c, such depression being preferably formed by a pointed instrument or die. The material is thus held 70 firmly as between two plates, and no liability of said material becoming removed by any ordinary strain upon it exists.

This fastening device may be used for many purposes, so I do not desire to limit its 75 use in connection with an umbrella or parasol tip.

The tongue b, as herein represented, terminates near the closed end of the shell c, leaving, however, a small space in which the ma- 80 terial is crowded.

I claim—

1. The rib-receiving tip and an extended tongue, as b, on it, combined with an independent compressible hollow cylindrical shell, 85 as c, said shell and tongue co-operating, as shown and described, to bind the material in place, as and for the purposes set forth.

2. The rib-receiving tip and an extended tongue b on it, combined with two connected 90 side walls adapted to inclose the tongue and bind the material between the tongue and one of the said side walls, substantially as described.

3. The hollow rib-receiving tip a and tongue 95 The tip a, to which the fastening device on it having a depression, as d, combined

with two connected side walls embracing both the tongue and the material placed between said tongue and one of the said walls, and a depression, as e, formed in one of the 5 said walls, substantially as described.

4. The hollow rib-receiving tip a and tongue b on it, combined with two connected side walls embracing both the tongue and the material placed between said tongue and one of

the side walls, substantially as and for the ro

purposes specified.

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

7

Witnesses:

BERNICE J. NOYES, EMMA J. BENNETT.