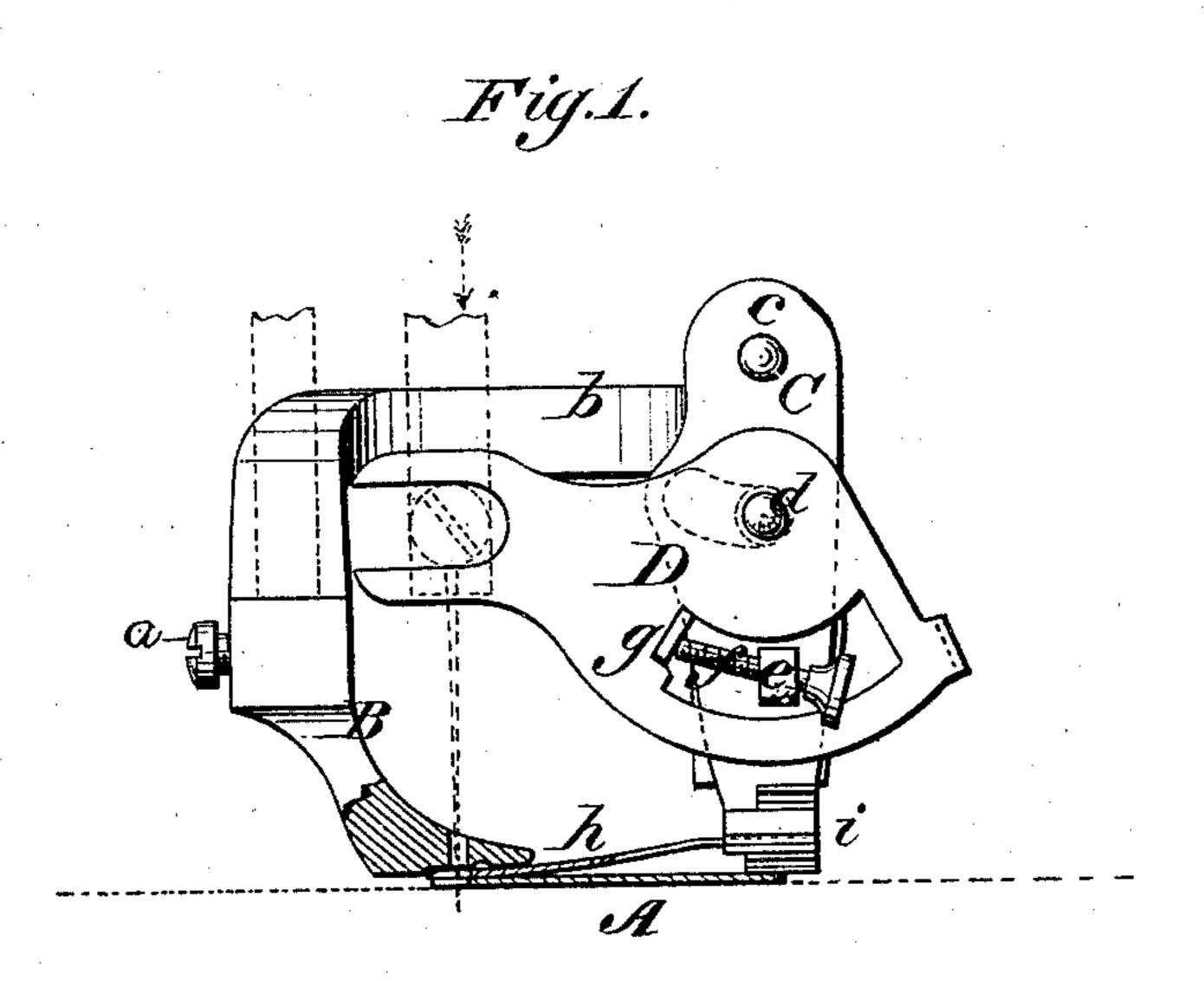
(Model.)

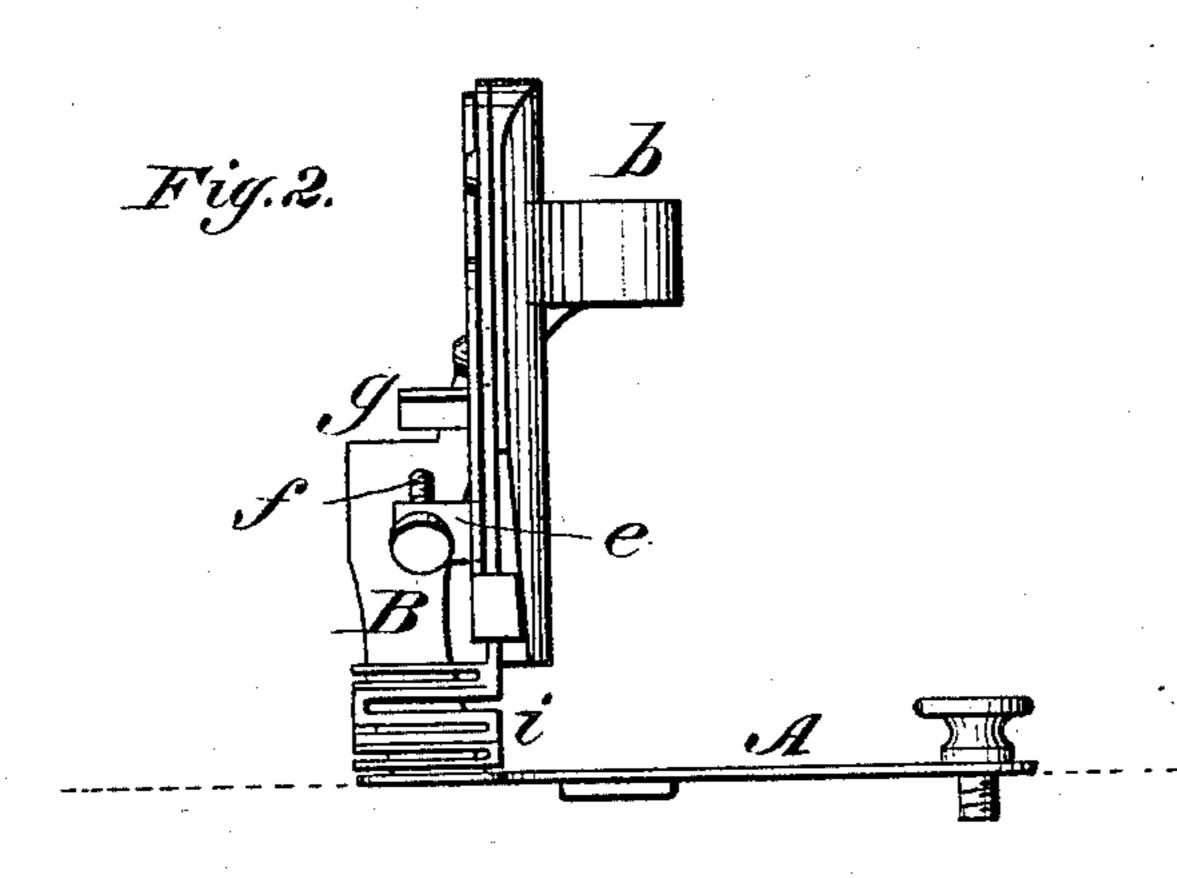
S. N. ROWLEY.

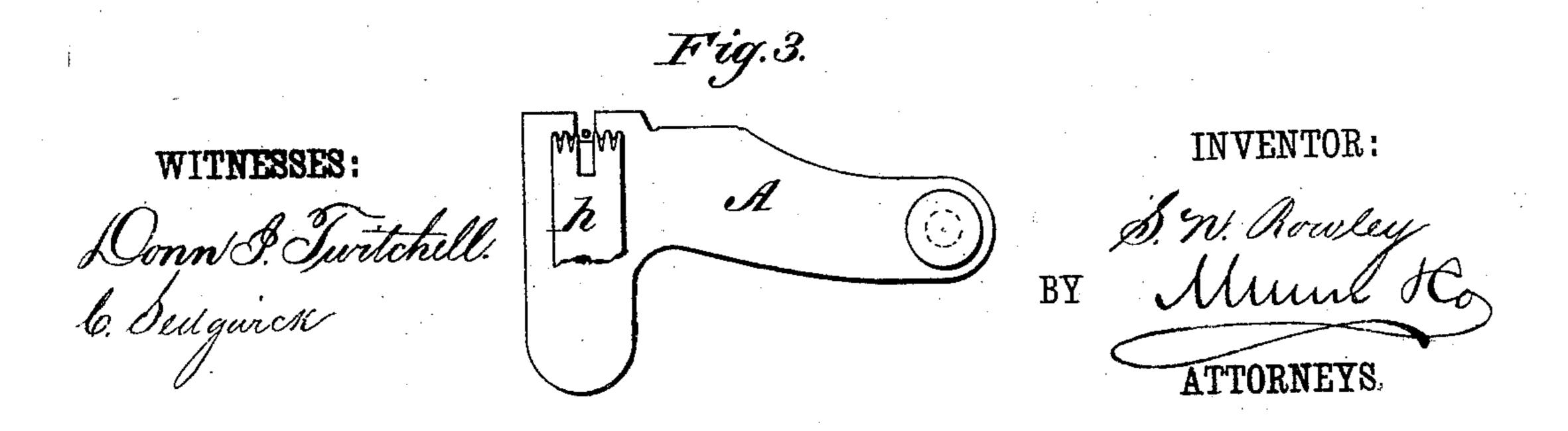
Ruffling Attachment for Sewing Machines.

No. 233,025.

Patented Oct. 5, 1880.







## United States Patent Office.

STEPHEN N. ROWLEY, OF ADRIAN, MICHIGAN.

## RUFFLING ATTACHMENT FOR SEWING-MACHINES.

SPECIFICATION forming part of Letters Patent No. 233,025, dated October 5, 1880. Application filed April 27, 1880. (Model.)

To all whom it may concern:

Be it known that I, STEPHEN N. ROWLEY, of Adrian, in the county of Lenawee and State of Michigan, have invented a new and useful 5 Improvement in Ruffling Attachments for Sewing-Machines, of which the following is a specification.

My improvement relates to ruffling attachments for under-feed sewing-machines.

The object of my invention is to furnish an attachment which, in use, will allow the goods to extend at either or both sides, and thereby permit a wider range of work than is possible with ruffling attachments for under-feed ma-15 chines as heretofore constructed. These features are shown in the accompanying drawings, and will be described with reference thereto.

Figure 1 is a sectional side elevation of my 20 improved ruffler. Fig. 2 is a front view, representing the end toward the operator. Fig. 3 is a plan view of the plate for covering the under feed.

Similar letters of reference indicate corre-

25 sponding parts.

The ruffler, in the form shown, is adapted for the "Domestic" sewing-machine, but may be applied to any under-feed machine by slightly

changing the supporting arm.

A is a plate of metal having an aperture at one end, so that it may be attached to the bed of the machine by a thumb-screw, and made of suitable size and shape for covering the feed-points of the machine close up to, and 35 partially behind, the needle. This plate presents a smooth surface for the ruffling-points to slide on.

B is the presser-foot of the ruffler, formed with an aperture and fitted with a set-screw, 40 a, so that it may be placed upon and clamped to the presser-bar of the machine, as shown by dotted lines in Fig. 1. The foot B is formed with an arm, b, that extends upward and forward and supports the working parts of the 45 ruffler. These parts, as next described, are hung upon a vertical extension of the forward end of arm b.

C is a plate, hung on arm b by a pin, c, so | that it may swing in a plane parallel to the

50 direction of feed.

D is a plate, hung on arm b by a pin, d, which passes into the arm b through a slot in plate C, so that the pin d serves also as a stop for

the plate C. Beneath the pivot d the plate D is slotted, and through this slot projects a stud, 55 e, from the plate C. In the stude is tapped a set-screw, f, which extends in contact with or toward a lug, g, which projects from the plate D. The plate D also extends backward toward the presser-foot, and is slotted for con- 60 nection with the needle-bar of the machine.

h is the ruffling-finger, attached to the lower end of ruffling-blade C, and extending back beneath the presser-foot B. This finger h consists of a spring-plate serrated at its outer end, 65 which is also slotted for the needle, and is attached rigidly to the folded lower end, i, of plate C. The end i forms a side extension of the plate C, and is slotted above and below the finger h, to serve as a guide for the goods.

In operation the plate D is reciprocated by its connection to the needle-bar, and imparts a similar movement to plate C by contact with screw f and stud e.

The extent of movement of plate C, and con- 75 sequently the fullness of the ruffle, may be regulated by adjustment of screw f.

The finger h is carried forward and back by

plate C, and rests upon the plate A.

It will be seen that, the operative parts be- 8c ing supported from above, there is nothing to prevent the goods extending either side of the ruffler, whereby the attachment can be used to ruffle or gather on any part of a dress-skirt, and also for other work, which cannot be done 85 with ordinary ruffling attachments.

If desired, the arm b and foot B may be made in separate pieces, and the arm b fitted for at-

tachment to the head of the machine.

Having thus described my invention, I claim 90 as new and desire to secure by Letters Patent--

The ruffling attachment for sewing-machines, consisting of the plate A, fitted for attachment on the bed of the machine, the foot B, with 95 arm b, plate C, hung on arm b, and carrying the spring-finger h, lug e, and screw f, and plate D, hung on arm b, provided with a slot for lug e, and forked for connection to the needle-bar, substantially as and for the purposes 100 specified.

## STEPHEN NELSON ROWLEY.

Witnesses:

CHAS. HUMPHREY, FRED. H. KNAPP.