

*S. Baxendale.*  
*Making Wadding.*

*N<sup>o</sup> 43,894*

*Patented Aug. 23, 1864.*

FIG. 1.

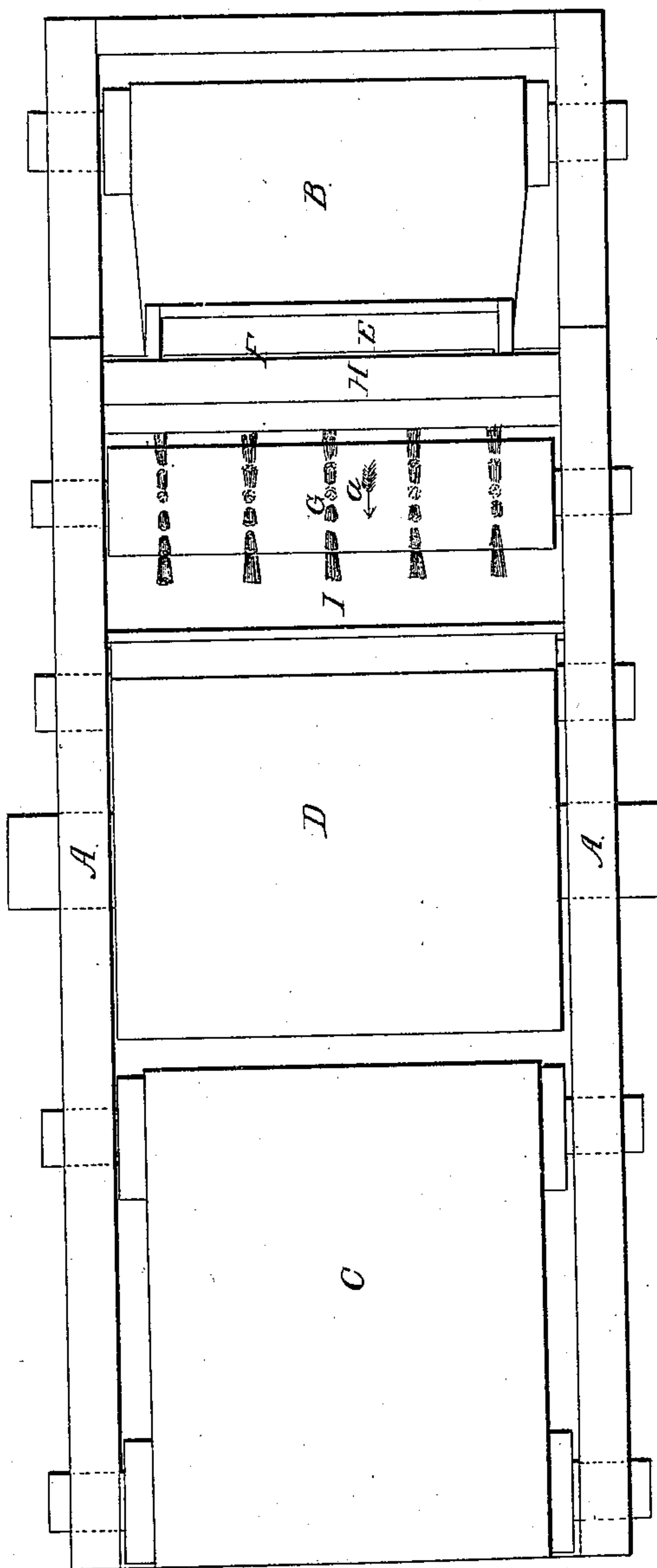
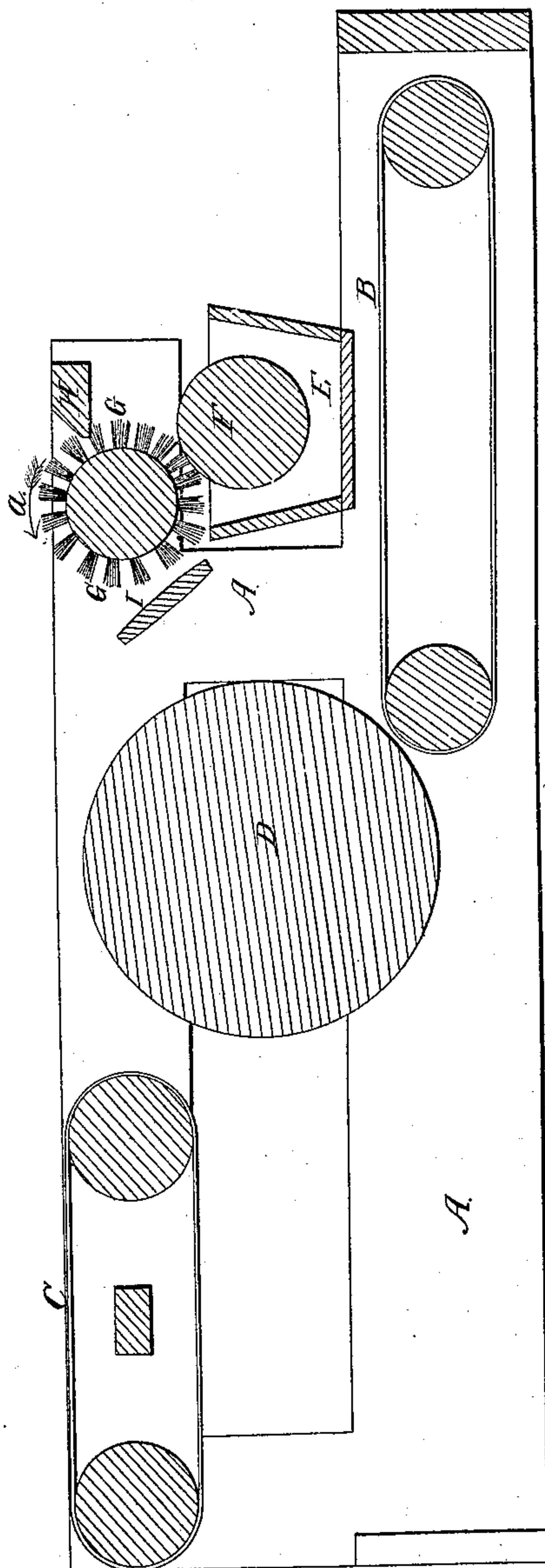


FIG. 2.



Witnesses:

*S. P. Hale Jr*  
*Frederick Custer*

Inventor:

*Saml Baxendale*  
*per my attorney*  
*R. H. Cady*

# UNITED STATES PATENT OFFICE.

SAMUEL BAXENDALE, OF SOUTH MALDEN, MASSACHUSETTS.

IMPROVEMENT IN MACHINES FOR SURFACE-SIZING, WADDING. &c.

Specification forming part of Letters Patent No. 43,894, dated August 23, 1864.

*To all whom it may concern:*

Be it known that I, SAMUEL BAXENDALE, a resident of South Malden, in the county of Middlesex and State of Massachusetts, have invented a new and useful or Improved Machine for Sizing the Surface of Fibrous Batting or Wadding; and I do hereby declare the same to be fully described in the following specification and represented in the accompanying drawings, of which—

Figure 1 is a top view, and Fig. 2 a longitudinal section, of it.

The nature of my invention or improvements consists as follows—that is to say, in the combination of a deflector with the sizing apparatus and its brush, and with the machinery for supporting the bat or wadding, and moving it along.

In the drawings, A denotes the frame of the machine, within which there are two endless aprons, B C, and a carrying-drum, D, arranged with respect to one another, as shown in Fig. 2.

Over the apron B there is a sizing-trough, E, within which there is a sizing roller, F, for transferring size from the trough to a rotary cylindrical brush, G, which is disposed over and so as to touch the roller F.

A stationary bar, H, extended across the frame A, is so arranged with reference to the brush G<sup>x</sup> that, while the latter may be in revolution in the direction denoted by the arrow a, it will cause the bristles of the brush to strike against the said bar and be bent backward by it, in order that, as the said bristles may pass by the bar, they may be sprung suddenly forward by their inherent elasticity, in

such manner as to throw sizing from them, and upon the upper surface of the bat, as it may be traveling over the carrying-drum D.

In the operation of the machine the bat is to be moved along by the apron B, by which it is to be delivered upon the said drum D, which raises it upward and transfers to and upon the apron C, which is to aid in moving it along or carrying it toward a drying room or apparatus.

Between the drum D and the brush G there is an inclined board or deflector, I, which extends upward from the inner edge of the size-trough, and serves not only to intercept the surplus size that may be thrown off by the brush, but also to break the current of air induced by the brush, and cause part of it to pass downward toward the trough, while the rest of it may be passing over the upper edge of the deflector, and carrying size upon the bat.

The endless aprons and the curved surface of the carrying-drum are to travel at an equal speed. The brush is to be revolved independently of the trough-roller, which is also to have mechanism by which it may be rotated within the sizing-trough.

I claim—

The combination of the deflector I with the rotary brush G, the sizing roller and trough, and machinery for supporting the bat and moving it along, substantially as specified.

SAMUEL BAXENDALE.

Witnesses:

R. H. EDDY,  
F. P. HALE, Jr.