

N. S. THOMPSON.  
Buffing Mandrels.

No. 141,523.

Patented August 5, 1873.

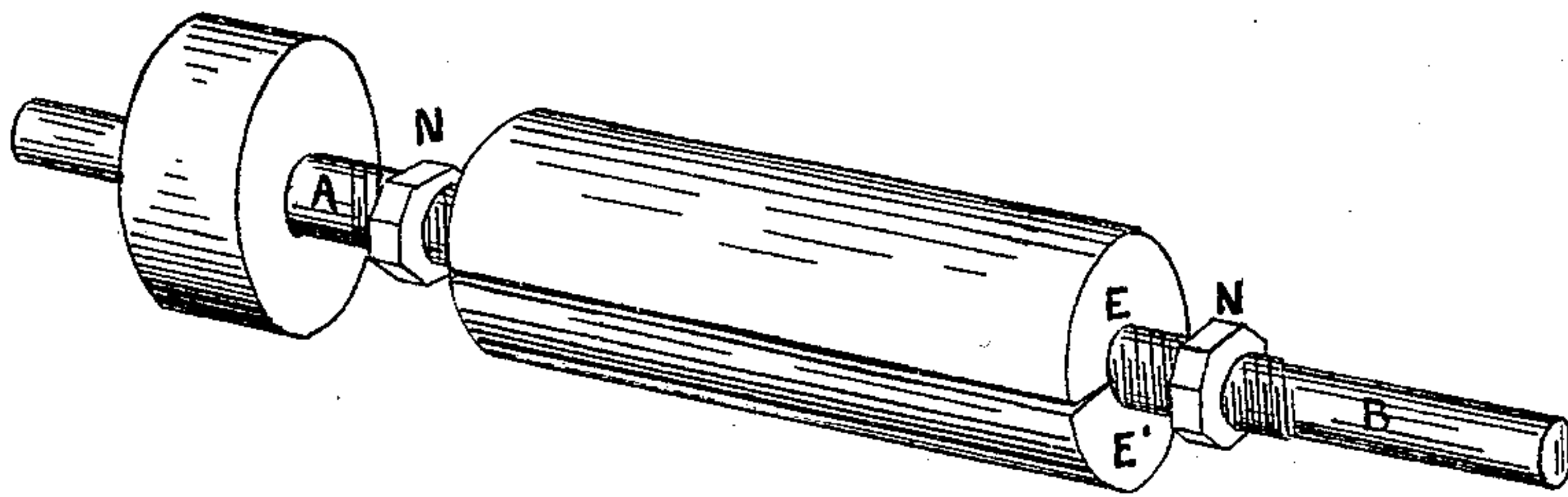


FIG. 1.

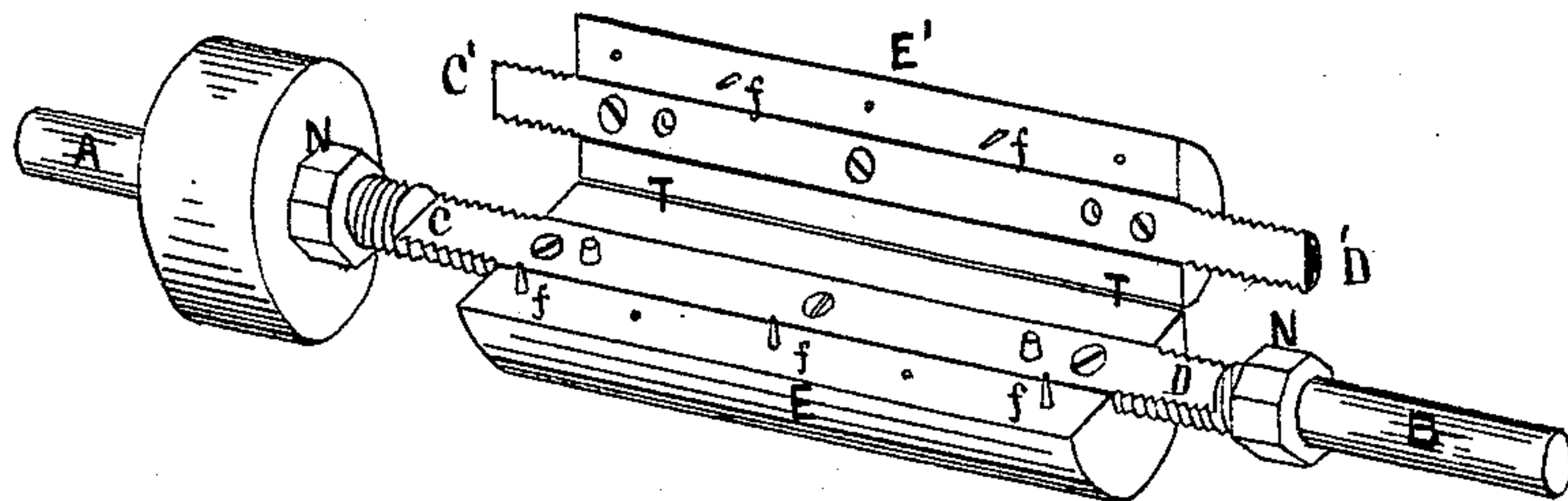


FIG. 2.

WITNESSES

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NATHANIEL S. THOMPSON, OF AUGUSTA, MAINE.

## IMPROVEMENT IN BUFFING-MANDRELS.

Specification forming part of Letters Patent No. **141,523**, dated August 5, 1873; application filed April 1, 1873.

*To all whom it may concern:*

Be it known that I, NATHANIEL S. THOMPSON, of Augusta, in the county of Kennebec and State of Maine, have invented certain new and useful Improvements in Sand-Paper Wheels, of which the following is a specification:

The nature of my invention consists in a new construction of a sand-paper burr or wheel, the burr being so made that it may be opened longitudinally through the center—that is, divided into two parts, which are each attached to a corresponding part of the mandrel. The mandrel, having a screw-thread cut upon each end, and being slightly coned, is provided with nuts, which, when screwed toward the end of the burr, will draw the parts together and securely hold them. The object of the invention is to afford a simple method of attaching the sand-paper to the burr. This is done by screwing the nuts back and opening the burr, and inserting the ends between the two parts, after which they may be closed together and fastened by the nuts, thus holding the paper.

Figure 1 is a perspective view of my invention. Fig. 2 is a perspective view, showing the parts open.

Let A B represent the shaft or mandrel upon which the sand-paper wheel is fixed. This mandrel is made, as indicated in Fig. 2, so that the parts C' D' fit into the parts C D at C D. The parts C' D' and A B form together

a round spindle, and have a screw-thread cut upon them, as shown, upon which the nuts N N fit. The ends D D' and C C' are slightly coned, the larger part being toward E E', so that, as the nuts N N are turned on, the parts are drawn tightly together. E and E' are two semi-cylindrical blocks, attached together by a hinge at T T, Fig. 2, and made fast to the parts C D and C' D' by screws or rivets, as shown in Fig. 2. *fff* are small points inserted in the blocks E and E', which serve to assist in putting the paper on and in holding it.

The circumference of the wheel or burr may be covered by any suitable padding, such as felt, rubber, &c.

To place the sand-paper on the wheel I have only to open it, as shown in Fig. 2, then to carefully place a piece of properly-cut paper so that the end will lap over onto the pins *fff*. Now the parts may be closed together and the nuts N N screwed up, as shown in Fig. 1, and the instrument is ready for use.

I claim as my invention—

The combination of the sectional shaft C D C' D' with the blocks E E' and nuts N N, substantially as described, and for the purpose set forth.

NATHANIEL S. THOMPSON.

Witnesses:

FRANK G. PARKER,  
JOHN J. HALEY.