

(No Model.)

C. E. TROWBRIDGE.  
TRAVELER CLEARER.

No. 438,659.

Patented Oct. 21, 1890.

Fig: 1.



Fig: 2.

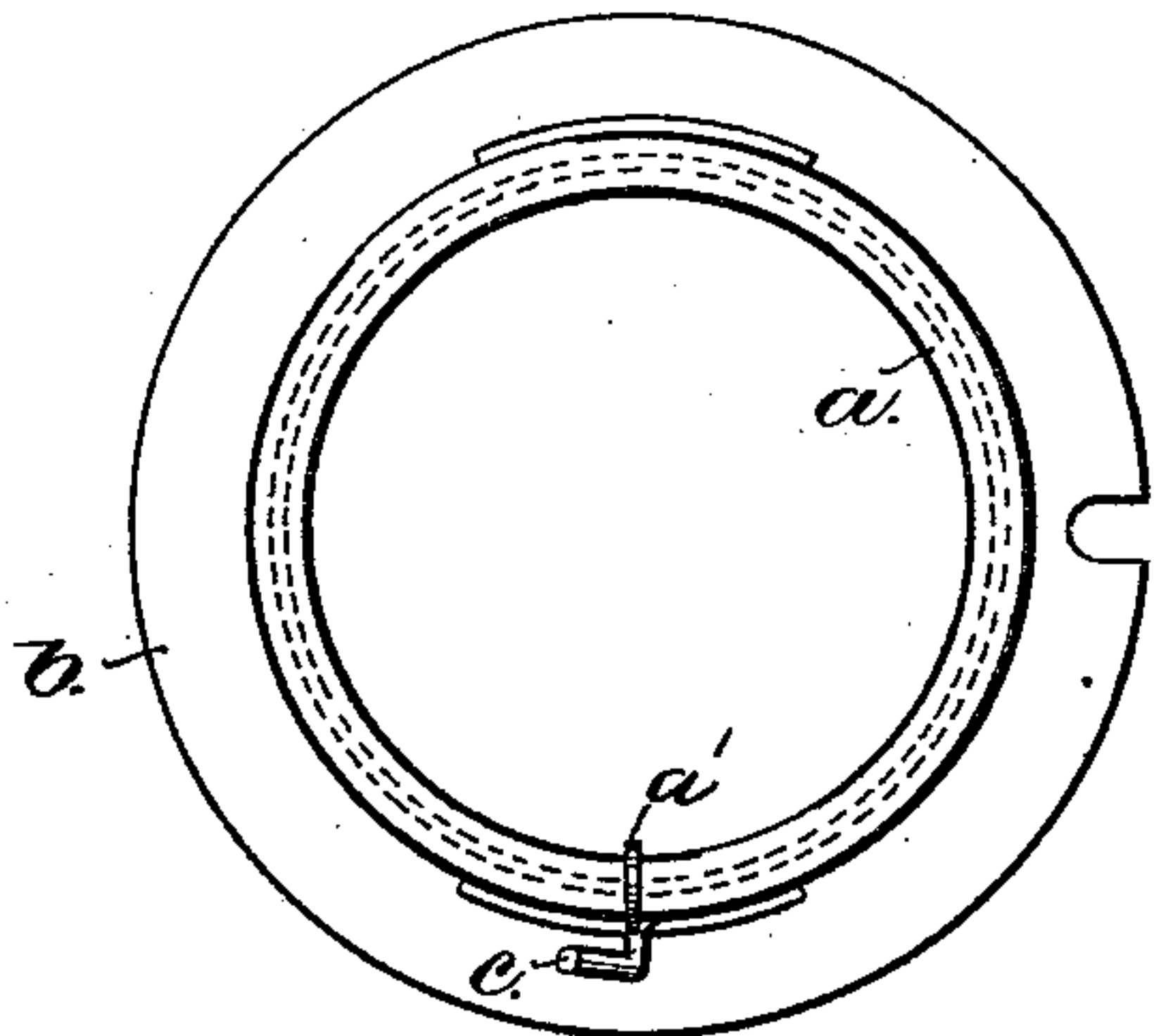


Fig: 3.

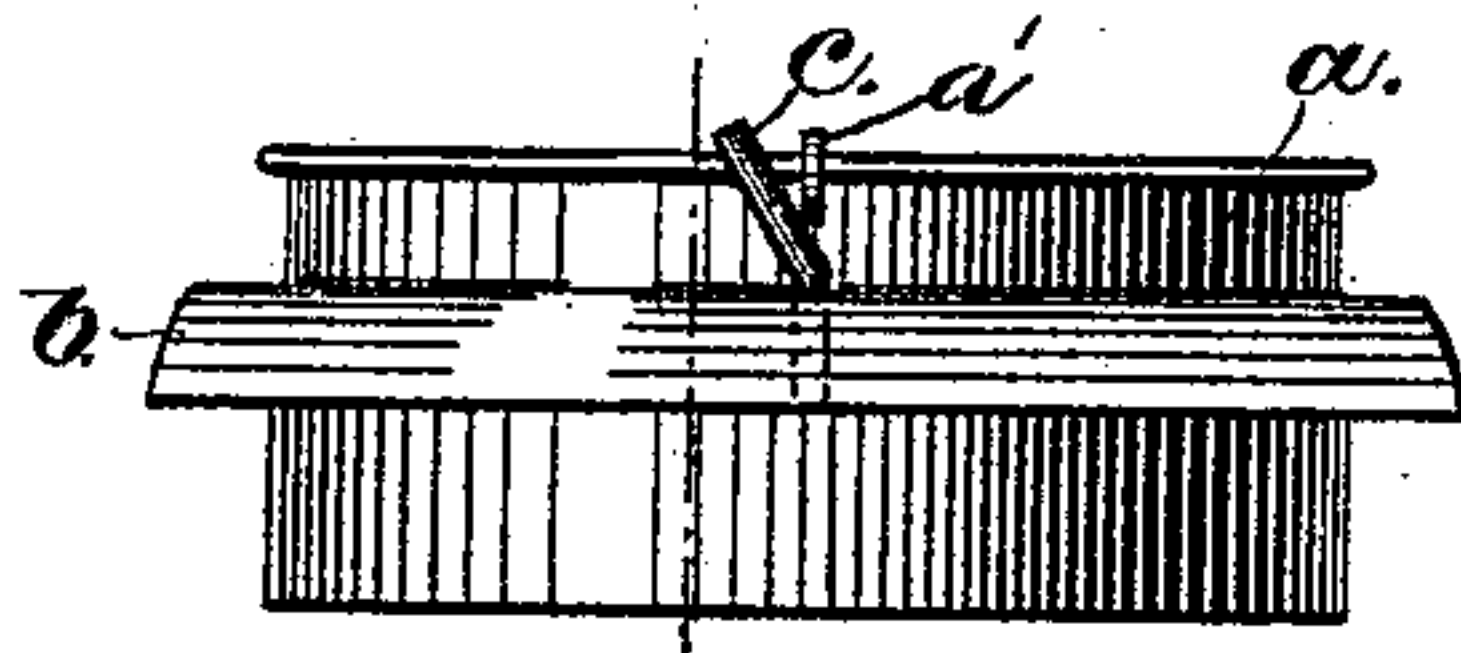
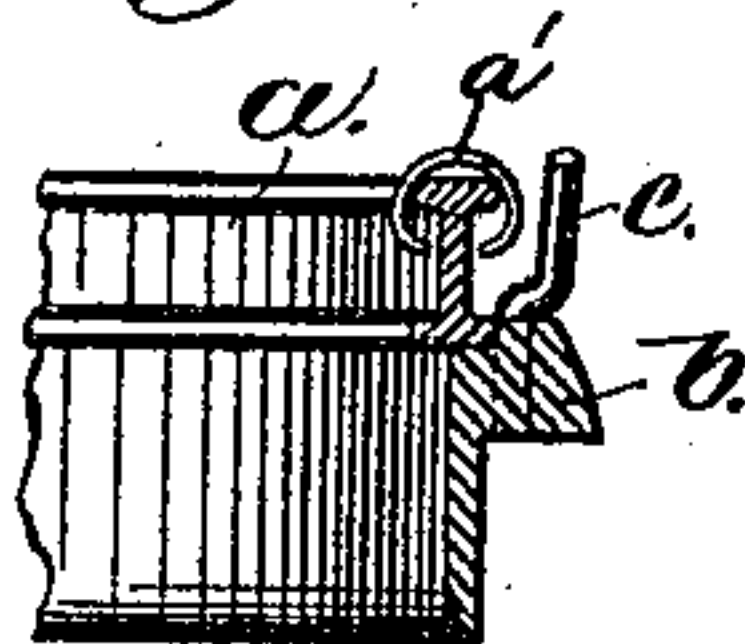


Fig: 4.



Witnesses.

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# UNITED STATES PATENT OFFICE.

CHARLES E. TROWBRIDGE, OF WHITINSVILLE, MASSACHUSETTS, ASSIGNOR  
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## TRAVELER-CLEARER.

**SPECIFICATION** forming part of Letters Patent No. 438,659, dated October 21, 1890.

Application filed April 8, 1890. Serial No. 347,041. (No model.)

*To all whom it may concern:*

Be it known that I, CHARLES E. TROWBRIDGE, of Whitinsville, county of Worcester, State of Massachusetts, have invented an Improvement in Traveler-Clearers, of which the following description, in connection with the accompanying drawings, is a specification, like letters on the drawings representing like parts.

Traveler-clearers heretofore constructed, so far as I am aware, have consisted of a vertical post or upright located at one side of the ring, and having suitable means to hold it in position. In some instances clearers have been held in position on the ring, and in other instances they have been attached to a ring-support; but in all instances the post or clearer proper has been arranged truly vertical.

In practice the clearer removes fiber from the traveler, which fiber remains on and partially embraces the clearer, and soon the clearer becomes so loaded with fiber that the fiber has to be removed by hand, and if not removed the clearer ceases to be effective.

This invention has for its object to construct a traveler-clearer which shall be self-cleaning, so that any fiber caught thereon will be at once removed. To this end I have so placed the clearer that it occupies an inclined or diagonal position with relation to the direction of movement of the traveler, so that the fiber caught thereon is immediately carried up the inclined clearer and off the end of the same.

The essential feature of this invention is a traveler-clearer containing an upright incline in the line of progress of the traveler.

Figure 1 shows in side elevation a traveler-clearer embodying this invention, it being shown as held in position on the ring; Fig. 2, a plan view of the traveler-clearer shown in Fig. 1; Fig. 3, a side elevation of the traveler-clearer attached to the ring-support, and Fig. 4 a sectional detail of the traveler-clearer shown in Fig. 3.

The ring *a*, the traveler *a'* thereon, and the ring-support *b* are all of usual construction.

The traveler-clearer (see Figs. 1 and 2) consists, essentially, of a post or upright *c*, shown as composed of a piece of wire inclined in the line of progress of the traveler. The traveler-clearer (see Figs. 1 and 2) is shown as composed of a piece of wire of such length and shape that a part *c'* forms a kind of spring-clasp to fit the body of the ring. In Figs. 3 and 4 the traveler-clearer is shown as a post or upright *c* inclined in the line of progress of the traveler, the post being attached to the ring-support.

The clearer *c* is in all instances shown as composed of a piece of wire; but my invention comprehends any form of clearer having an inclined side or part in the line of progress of the traveler, so I do not desire to limit my invention to any particular construction of clearer or to the means employed to confine it in position with relation to the ring.

I claim—

1. A traveler-clearer consisting of an upright having an inclined side in the line of progress of the traveler, substantially as described.

2. A traveler-clearer consisting of a piece of wire-like material inclined in the line of progress of the traveler, substantially as described.

3. The combination, with a spinning-ring and traveler, of a traveler-clearer having its end located near the ring and inclined in the direction of the progress of the traveler, substantially as described.

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

CHARLES E. TROWBRIDGE.

Witnesses:

WILLIAM H. WHITIN,  
ARTHUR F. WHITIN.