Burt & Hildreth.

Seed Stripper.

No. 107,445. Patented Sept. 20, 1870.

Fig. 1.

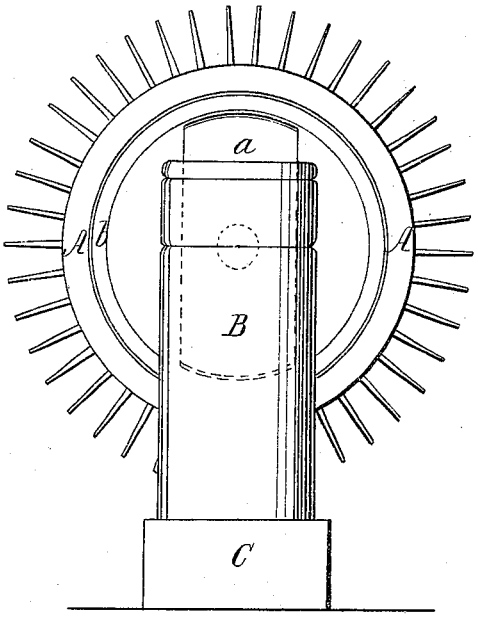
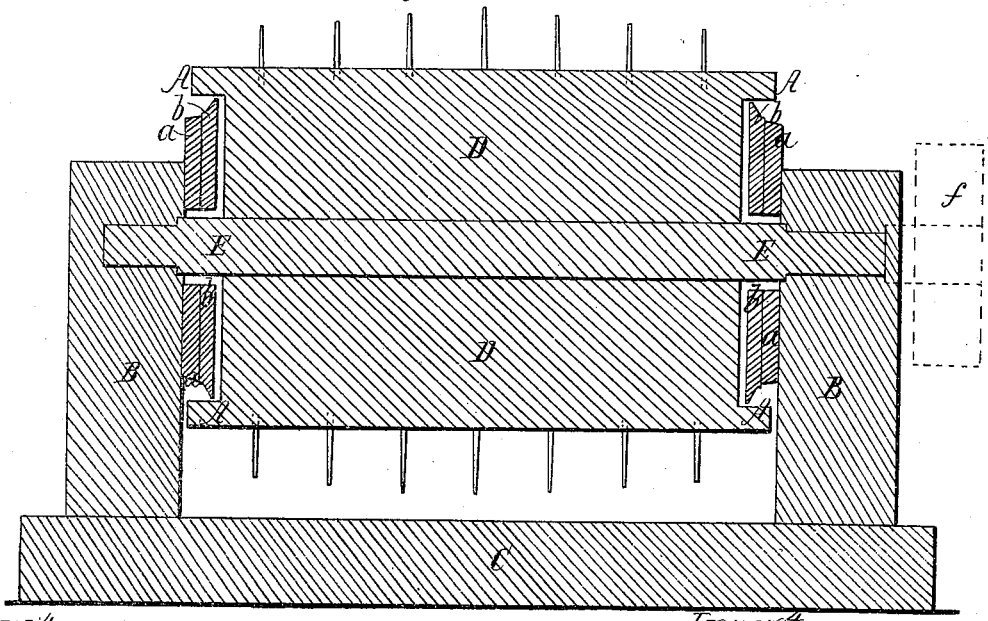


Fig. 2.



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GEORGE E. BURT AND EDWIN A. HILDRETH, OF HARVARD, MASSACHUSETTS.

Letters Patent No. 107,445, *dated September* 20, 1870.

IMPROVEMENT IN BROOM-CORN SEED-STRIPPERS.

The Schedule referred to in these Letters Patent and making part of the same.

We, GEORGE E. BURT and EDWIN A. HILDRETH, both of Harvard, county of Worcester, and State of Massachusetts, have invented a new and useful Improvement in Broom-corn Seed-Strippers or Scrapers, of which the following is a specification.

Nature and Objects of the Invention.

It has been found, in stripping or scraping the seed from broom-corn by means of revolving cylinders armed with teeth, that the long limber fibers of the brush, if not kept entirely away from the revolving parts of the bearings, are very liable to wind around the cylinder-shaft at the ends, clogging them, and causing the boxes and bearings to heat, compelling the operators to stop running the machine to free the bearings, thus causing liability of injuring the machine, annoyance, and loss of time at a very busy season.

To overcome this objection is the object of this invention.

The nature of this invention consists in constructing an auxiliary stationary head, having a beveled edge, and fixed permanently to the frame, in such a position that the lags or periphery of the cylinder shall project beyond the bevel of the auxiliary head, which is constructed to cover entirely all the revolving parts at the ends of the cylinder except the outer rim or lags, into which the teeth are fixed.

We construct our broom-corn scraper cylinders either solid or with heads and lags armed with steel teeth, and firmly attach them to a strong main frame of any suitable material.

Description of the Accompanying Drawing.

Figure 1 is an end view of the cylinder, and shows the projecting lags or rim, the teeth, the auxiliary stationary head, and supporting-box.

Figure 2 is a vertical section through the central axis of the cylinder, showing all the parts.

General Description.

D is a cylinder.

E is the shaft or axle.

B B are boxes.

C is the frame.

b b are stationary or auxiliary heads, constructed with beveled edges, and are firmly attached to the boxes B B by means of screws or bolts.

A A are lags or projecting rims, that entirely surround the stationary heads *b b*, and project beyond them.

The auxiliary heads *b b* are constructed with the outer edge beveled, and fit into the recess formed by the projecting rim A, which is made to extend beyond the beveled edge.

The rib *a* acts to strengthen the head *b*, and holds it into the recess, and saves material in constructing the stationary head.

A pulley, *f*, for driving the cylinder is represented by the dotted lines in fig. 2.

When the cylinder D, armed with teeth, is made to revolve rapidly, and broom-brush filled with seed is placed in contact with the teeth, in order to strip the seed from the brush, the long limber fiber of the brush tends to wind on the periphery of the cylinder, but the diameter of the cylinder is so great that the brush is not of sufficient length to reach around it on the main body, but at the end of the cylinder, between the supporting-box B and the revolving end, the cylinder draws the brush toward the shaft or the center.

Now, as the stationary head *b* is sunk into the end of the revolving cylinder D, and its outer edge is beveled, as shown in fig. 2, the brush is guided, by the auxiliary or stationary head, beyond the open joint between the revolving head of the cylinder and the supporting-box, the beveled edge of the stationary head guiding the brush and freeing it from the revolving cylinder, the whole making a complete shield for the bearing, and keeping it completely free from clogging, by fiber being wound upon it.

Having thus described the construction and operation of our invention,

What we claim as new, and desire to secure by Letters Patent, is—

1. In combination with a machine for stripping broom-corn, constructed substantially as described, the auxiliary stationary head *b*, when provided with a beveled edge, as shown, as and for the purpose herein specified.

2. The combination, in a machine for stripping broom-corn, of the cylinder D, shaft E, auxiliary and stationary head *b*, provided with a beveled edge, as shown, and the supporting-boxes B, substantially as described, and for the purpose set forth.

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