

(No Model.)

A. D. & A. B. LINN.
CARPET SWEEPER.

No. 562,771.

Patented June 23, 1896.

Fig. 1.

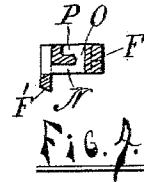
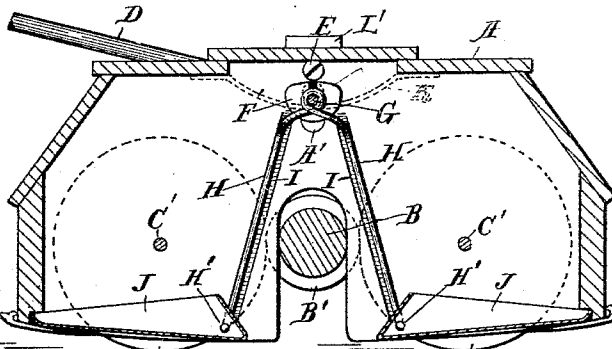


Fig. 2.

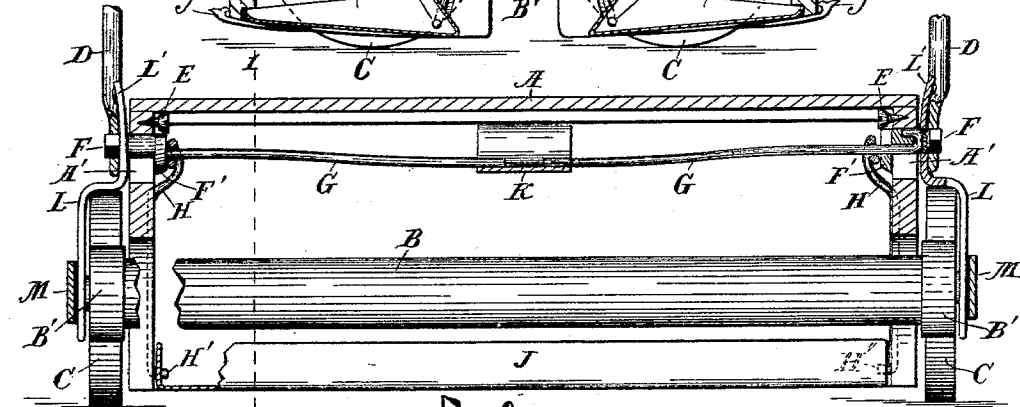


Fig. 3.

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ALLEN D. LINN AND ALLEN B. LINN, OF GRAND RAPIDS, MICHIGAN, ASSIGNORS TO T. STEWART WHITE, THOMAS FRIANT, GAIUS W. PERKINS, AND CHARLES J. REED, OF SAME PLACE.

CARPET-SWEEPER.

SPECIFICATION forming part of Letters Patent No. 562,771, dated June 23, 1896.

Application filed June 10, 1895. Serial No. 552,238. (No model.)

To all whom it may concern:

Be it known that we, ALLEN D. LINN and ALLEN B. LINN, citizens of the United States, residing at Grand Rapids, in the county of Kent and State of Michigan, have invented certain new and useful Improvements in Carpet-Sweepers; and we do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

Our invention relates to improvements in carpet-sweepers; and its object is to provide the same with certain new and useful features hereinafter more fully described, and particularly pointed out in the claims, reference being had to the accompanying drawings, in which—

Figure 1 is a transverse vertical section on the line 1 1 of Figs. 2 and 3. Fig. 2 is a longitudinal vertical section on the line 2 2 of Fig. 3; Fig. 3, a plan view with the top removed, and Fig. 4 is a detail in longitudinal section of the pivot-pin F.

Like letters refer to like parts in all of the figures.

A represents the case; B, the brush-shaft, having pulleys B'; C, the drive-wheels journaled on rods C' and engaging the pulleys B'.

D is the bail rigidly attached to the outer ends of pivot-pins F, which pins are rotative and vertically movable in vertical slots A' in the ends of the case. Journaled on said pins are hangers L, having their upper ends L' bent outward and adapted to engage the bail to hold the same in a vertical position. Said hangers extend downward and are provided with journals for the brush-shaft B and engage the guard-bars M opposite said journals. Said hangers are pressed inward at their lower ends by said guard-bars and rest against the end of the case as a fulcrum near the pivot-pins and are adapted to rock upon the same, and are held in engagement with the bail by the said guard-bars. The pivot-pins are yieldingly pressed upward in the slots A by means of spring-arms G, of wire, attached to said pivot-pins by inserting the outer end of each wire and bending the same to fit within a longitudinal groove N, transverse opening O, and recess P, opposite the groove N, formed in said pin, as shown in

Fig. 4. The inner ends of said arms engage a strap K, attached to the top of the case, said arms being bent laterally in a direction opposite to the bail D, as shown in Fig. 3, and when said bail is turned from a vertical position said ends travel along said strap toward the side of the case opposite the operator, and by their spring action hold said side down and prevent its rising on the backward stroke of the device. Said arms G traverse the strap K and shift from side to side as the bail is shifted. On the ends of the pivot-pins F are cams F', which have small sides engaging the screws E, thus permitting the brush to rise to a high position as the bail is inclined in one direction, and larger sides to engage said screws to normally adjust said brush to a lower position as the bail is oppositely inclined. To provide for further adjusting the brush for wear or otherwise, the face of the cams F' and the heads of the screws E are made conical, whereby turning the screws in lowers the brush and turning them out raises the same.

To vertically adjust the pans J simultaneously with the brush B, said pans are pivoted, near their inner sides, on the inwardly-turned ends H' of wires H, which wires extend upward in grooves I I in the ends of the case, and near the middle are looped around the arms G. Thus, as said arms rise and fall with the pivot-pins F, the wires H move longitudinally in the slots I I, thus moving the pan-pivots and pans simultaneously with the brush, raising the pans so they do not drag on a soft carpet and lowering them closer to a hard carpet to prevent the dust from escaping beneath the pans. Spring-catches J', adapted to hold said pans closed, are secured to the bottom of the same near their outer edges and engage projections on the outer side of said case.

What we claim is—

1. In a carpet-sweeper, in combination with a carpet-sweeper casing, a bail pivoted to the case, a guard-bar, and a hanger having its respective ends engaging the bail and guard-bar, and intermedially fulcrumed, substantially as described.

2. In a carpet-sweeper, a case having guard-bars, a bail pivoted to said case, hangers journaled on the pivots of said bail and ful-

crumed on said case; and having outwardly-bent upper ends to engage and hold said bail; and also engaging the guard-bars at their lower ends, substantially as described.

5 3. In a carpet-sweeper, in combination with a case, and a bail having pivot-pins rotative in openings in said case, a strap attached to said case, and flexible arms attached to said pins and engaging said strap at one side of
10 the line of the axis of said pins, and also traversing said strap as the bail is turned, substantially as described.

4. In a carpet-sweeper, in combination with a case and a bail attached to pivot-pins vertically movable in said case, and hangers attached to said pins, and a brush-shaft journaled on said hangers; a strap attached to the case, and flexible arms attached to said pins and engaging and traversing said strap, substantially as described.

5. In a carpet-sweeper, a pivot-pin having a longitudinal groove in its side, a chamber in its opposite side, and a transverse opening connecting said groove and chamber, and a
25 wire in said groove, chamber and opening, substantially as described.

6. In a carpet-sweeper, having a case vertically movable and rotative pivot-pins, supporting a bail and a brush, and cams on said
30 pins; screws having conical portions engaging said cams, whereby said pins may be adjusted by turning said screws, substantially as described.

7. In a carpet-sweeper, in combination with
35 a case, a bail, a brush, and pans, a vertically-movable spring connected to the case, and

means for connecting said bail, brush, and pans, with said spring, whereby the bail, brush and pans are all simultaneously adjusted, substantially as described. 40

8. In a carpet-sweeper, a case having vertical slots in its end walls, pivot-pins movable in said slots, springs supporting said pivot-pins, a bail, a brush, and dust-pans, connected to and supported by said pivot-pins, 45 substantially as described.

9. In a carpet-sweeper, a case having vertical slots, pivot-pins movable in said slots, a bail and hangers attached to said pins, a brush journaled on said hangers, dust-pans, vertically-movable pivots for said pans connected to said pivot-pins and means for holding said pans in a closed position, substantially as described. 50

10. In a carpet-sweeper a case having
55 grooves and vertical slots in its end walls, pivot-pins movable in said slots, a bail and hangers attached to said pins a brush journaled on said hangers, flexible arms supporting said pivot-pins, wires movably engaging
60 said grooves and having loops engaging said flexible arms, and inwardly-turned ends, and means for holding said pans in closed position, substantially as described.

In testimony whereof we affix our signatures in presence of two witnesses. 65

ALLEN D. LINN.
ALLEN B. LINN.

Witnesses:

LUTHER V. MOULTON,
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