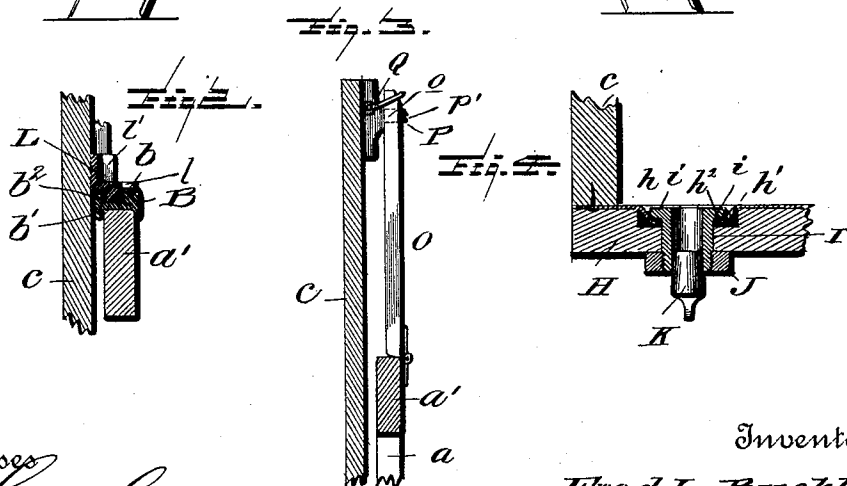
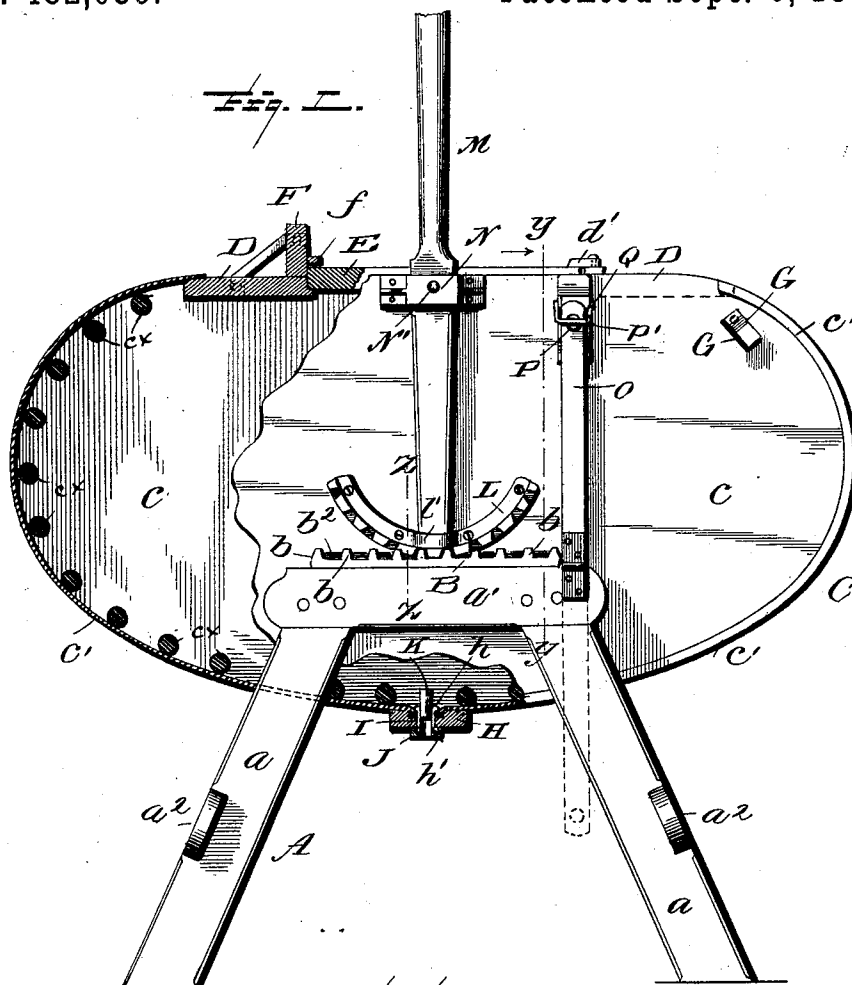


F. L. BUCKLEY.
WASHING MACHINE.

Patented Sept. 6, 1892.



Witnesses
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UNITED STATES PATENT OFFICE.

FRED L. BUCKLEY, OF ANNIN CREEK, PENNSYLVANIA.

WASHING-MACHINE.

SPECIFICATION forming part of Letters Patent No. 482,036, dated September 6, 1892.

Application filed March 11, 1892. Serial No. 424,567. (No model.)

To all whom it may concern:

Be it known that I, FRED L. BUCKLEY, a citizen of the United States, residing at Annin Creek, in the county of McKean, State of Pennsylvania, have invented certain new and useful Improvements in Washing-Machines, of which the following is a specification, reference being had therein to the accompanying drawings.

This invention relates to certain new and useful improvements in washing-machines; and it has for its objects, among others, to improve generally in this class of devices, to render the machine easy to operate, and yet be strong and durable and most efficient in its operation.

Other objects and advantages of the invention will hereinafter appear, and the novel features thereof will be specifically defined by the appended claim.

The invention is clearly illustrated in the accompanying drawings, which, with the letters of reference marked thereon, form a part of this specification, and in which—

Figure 1 is a side elevation of my improved washing-machine with portions broken away and parts in section. Fig. 2 is a sectional detail on the line $z z$ of Fig. 1. Fig. 3 is a vertical section on the line $y y$ of Fig. 1. Fig. 4 is a sectional detail showing the vent.

Like letters of reference indicate like parts throughout the several views in which they occur.

Referring now to the details of the drawings by letter, A designates the stand or support, which may be of any approved form, and should be suitably braced to give sufficient strength. As shown, the support consists of the inclined legs a , connected by the horizontal timber a' , the two supports being connected by the horizontal braces a^2 . The tub is disconnected from the supports, so as to be readily removed therefrom when desired. It is arranged to be rocked between the supports in the following manner: On the upper faces of the timbers a' are secured in any suitable manner the castings B, each of which has along its outer edge a plurality of teeth b and along its inner edge a downwardly-extending flange b' , to bear against the inner face of the horizontal timber a' , and with an

upwardly-extending flange b^2 , the object of which will hereinafter appear.

The tub C is preferably of the shape shown, and is formed of the ends or rather sides c and the zinc c' , secured to the said heads or sides, with the edges of the zinc overlapping, as shown in Fig. 1, to strengthen the tub, the ends of the zinc being secured to the upper cross-pieces D, which join the heads. c^x are rods let into the sides of the tub. A suitable cover E is provided, which may be hinged or made removable in any suitable manner to provide access to the interior of the tub. It is shown as held by a turn-button d' . To one of the upper cross-pieces is secured the vertical cross-piece F, suitably braced, as seen in Fig. 1, and which serves as a wringer-support. It is provided upon its face adjacent to the cover with a horizontal lug f , beneath which the adjacent edge of the cover is designed to engage, as seen in said Fig. 1. Upon one of the heads is provided a stop-lug G, designed to engage the leg of the support A and prevent the complete revolution of the tub, as will be understood from Fig. 1.

Across the bottom of the tub is arranged a strip H, and in the bottom of the tub at any desired location along this strip is made a hole h , which extends through the said strip, the strip being countersunk upon its upper face, as shown at h' . The countersink is packed with some suitable packing material, as wicking h^2 , and then the vent-tube I is packed upon the under side of its collar or flange i and inserted through the hole from the inside of the tub and driven home, the zinc around the hole being compressed upon the packing, which is compressed in the countersink, and thus a water-tight joint is formed. The nut J is then screwed onto the screw-threaded end of the vent, as seen best in Fig. 4, and then the plug K may be inserted either from the inside or outside of the tub.

Lare segmental castings secured to the heads of the tub, as seen in Fig. 1, each casting being formed with a depending flange l , as seen best in Fig. 2, which is toothed or notched, as seen in Fig. 1, to engage the teeth of the casting B. The forming of this flange provides a shoulder and recess or groove to the rear, as seen in Fig. 2,

which receives the upwardly-extending flange b^2 of the casting B, and thus the two castings are prevented from side play, so as to work true and evenly. The casting L is formed
 5 with an enlargement L' to receive the lower end of the handle M, by which the tub is oscillated. The handle near its upper end is held in the socket N, secured to the head of the tub, and the handle may be held therein
 10 by frictional contact of the parts or by a removable or permanently-held fastening, as the pin N'. (Shown in Fig. 1.)

In order to hold the tub in a horizontal position when inserting or removing the clothes
 15 or when not in use, I have provided the following device: O is a bar hinged at its lower end to support A and at its upper end provided with a hole o , which is adapted to receive the pin P on the head of the tub, as
 20 seen best in Fig. 3.

Q is a gravity-loop hinged to the head of the tub or to the block carrying the pin P, and designed to drop over the upper end of the bar O when the latter is turned up into
 25 the position in which it is shown in full lines in Figs. 1 and 3, the outer end of the pin be-

ing provided with a transverse groove or slot p' , into which the cross-bar of the loop is engaged to hold the parts against accidental dis-
 engagement.

The operation will be readily understood from the foregoing description, when taken in connection with the annexed drawings, and a detailed description thereof is not deemed
 30 necessary.

What I claim as new is—

The combination, with the support and the oscillating tub, of a bar hinged to the tub and having a hole at its upper end, a pin on the
 40 tub to engage said hole, the outer end of the pin being provided with a transverse groove, and a gravity-loop hinged to the tub and adapted to embrace the upper end of said bar and enter said groove, as and for the purpose specified.

In testimony whereof I affix my signature in presence of two witnesses.

FRED L. BUCKLEY.

Witnesses:

M. J. COLCORD,
 RAY FOOTE.