J. W. PATTERSON.
Washing-Machine.

No. 212,496. Patented Feb. 18, 1879.

Fig. 1.

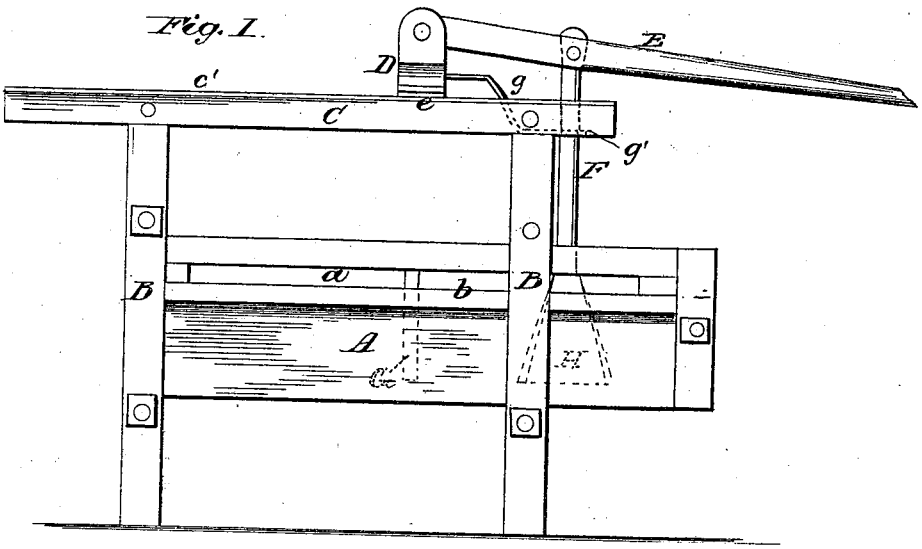


Fig. 2.

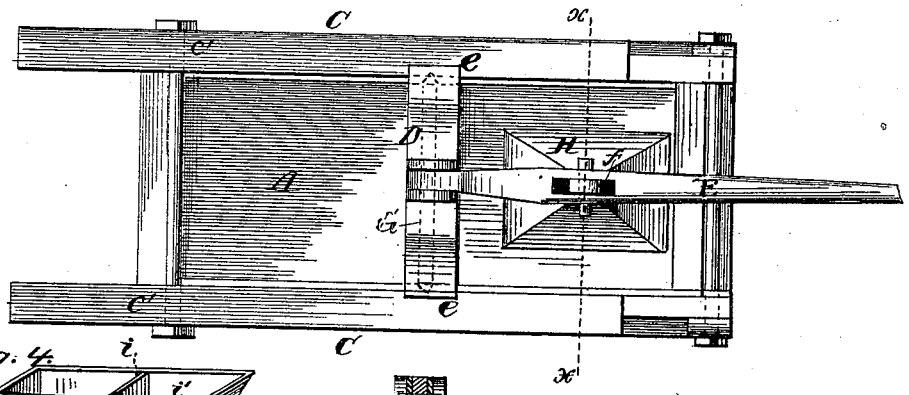


Fig. 4.

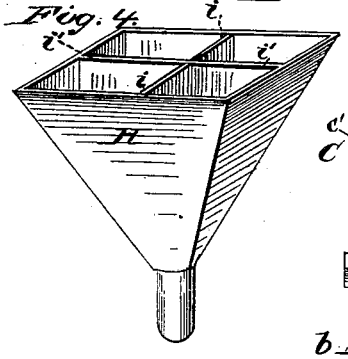
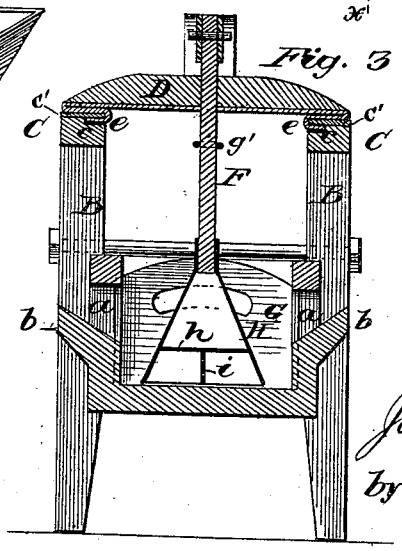


Fig. 3



Witnesses
Fred. G. Dieterich
Edwin L. Smith.

Inventor
John W. Patterson.
by A. Peterson & Co.
his Attorneys.

UNITED STATES PATENT OFFICE.

JOHN W. PATTERSON, OF SLAUGHTERVILLE, KENTUCKY, ASSIGNOR OF ONE-HALF HIS RIGHT TO S. A. PRATHER, OF SAME PLACE.

IMPROVEMENT IN WASHING-MACHINES.

Specification forming part of Letters Patent No. **212,496**, dated February 18, 1879; application filed June 18, 1878.

To all whom it may concern:

Be it known that I, JOHN W. PATTERSON, of Slaughterville, in the county of Webster and State of Kentucky, have invented certain new and useful Improvements in Washing-Machines; and I do hereby declare that the following is a full, clear, and exact description of the invention, which will enable others skilled in the art to which it appertains to make and use the same, reference being had to the accompanying drawings, which form a part of this specification, and in which—

Figure 1 is a side elevation. Fig. 2 is a top plan or view. Fig. 3 is a vertical section on the line *x x*, Fig. 2; and Fig. 4 is a perspective view of the under side of the reciprocating pounder or beater.

Similar letters of reference indicate corresponding parts in all the figures.

My invention relates to that class of washing-machines in which the clothes are cleansed by pounding or beating with a hollow pounder, the action or effect of which is to force air through the clothes by pressure and suction alternately; and it consists in an improved construction, combination, and arrangement of operating parts, substantially as hereinafter more fully described.

In the drawings, A is a rectangular-shaped trough, supported in a frame consisting of the uprights B B and cross-beams C C. The trough A has a slot, *a*, on each side, running its entire length, below which, upon the outside of the trough, is secured an inclined guard, *b*, for the purpose hereinafter set forth.

Each of the cross-beams C C has a groove or rabbet, *c c*, running its entire length, and is covered by a smooth metallic plate, *c' c'*, which forms a slide for the carriage D. If preferred, each of the beams C may be grooved or dovetailed on its inner sides, to form the longitudinal slot or groove, in which case the metallic straps or cap-plates *c' c'* may be dispensed with.

The sliding carriage D is provided with projecting guide-flanges *e e* on each side, which fit into the grooves *c c*, and prevent the carriage from being lifted off of the beams C C, upon which it travels and rests in operating the machine.

Upon the top of the carriage D is pivoted a long lever-arm, E, provided with a slot, *f*, in which is pivoted the pounder stem or handle F. *g* is an iron rod secured in the front side of the carriage, and terminating in a loop or eye, *g'*, which serves as a guide for the pounder-rod F, operated by the lever E.

The trough A is provided about midway with two vertical grooves, one on each side, to receive the partition-board G, by means of which the trough may be divided into two separate compartments. If a small quantity of clothes are to be washed, only one of these compartments is used; or one may be used for washing and the other for rinsing, or for washing different kinds of fabric, at the discretion of the operator.

The pounder or beater H, of which an inverted view is represented in Fig. 4, is preferably made of sheet tin or copper, of an inverted-funnel shape, having a diaphragm, *h*, and two vertical partitions, *i i'*, crossing each other at right angles, by which four divisions or compartments are formed.

In forcing the pounder down upon the clothes immersed in the water, the air contained in these compartments will be forced through them, thus expelling the water, while when the pounder is raised it will produce a suction through the clothes, thus creating a double current, which will effectually permeate all parts, and thoroughly remove, aided by the beating action of the pounder, all dirt therefrom. The side slots or openings, *a a*, in the trough permit the air to enter sidewise in under the pounder as this is being lifted up over the surface of the water, while the beveled or slanting guards *b* will prevent the water in the trough from spilling out through the slots.

Having thus described my invention, I claim and desire to secure by Letters Patent of the United States—

The improved washing-machine herein shown and described, consisting of the rectangular trough A, having the side slots or openings, *a*

a, guards *b b*, and removable partition G, supporting-frame B B, having grooved parallel cross-beams C C, sliding carriage D, having flanges *e e*, pivoted reciprocating lever arm or handle E, pivoted rod or stem F, and pounder H, all constructed and combined to operate substantially as and for the purpose herein shown and described.

In testimony that I claim the foregoing as my own I have hereunto affixed my signature in presence of two witnesses.

JOHN WILLIAM PATTERSON.

Witnesses:
R. D. REYNOLDS,
O. L. DRAKE.