

*A. Denison,
Washing Machine,*

No 68,851,

Patented Sept. 17, 1867.

Fig 1

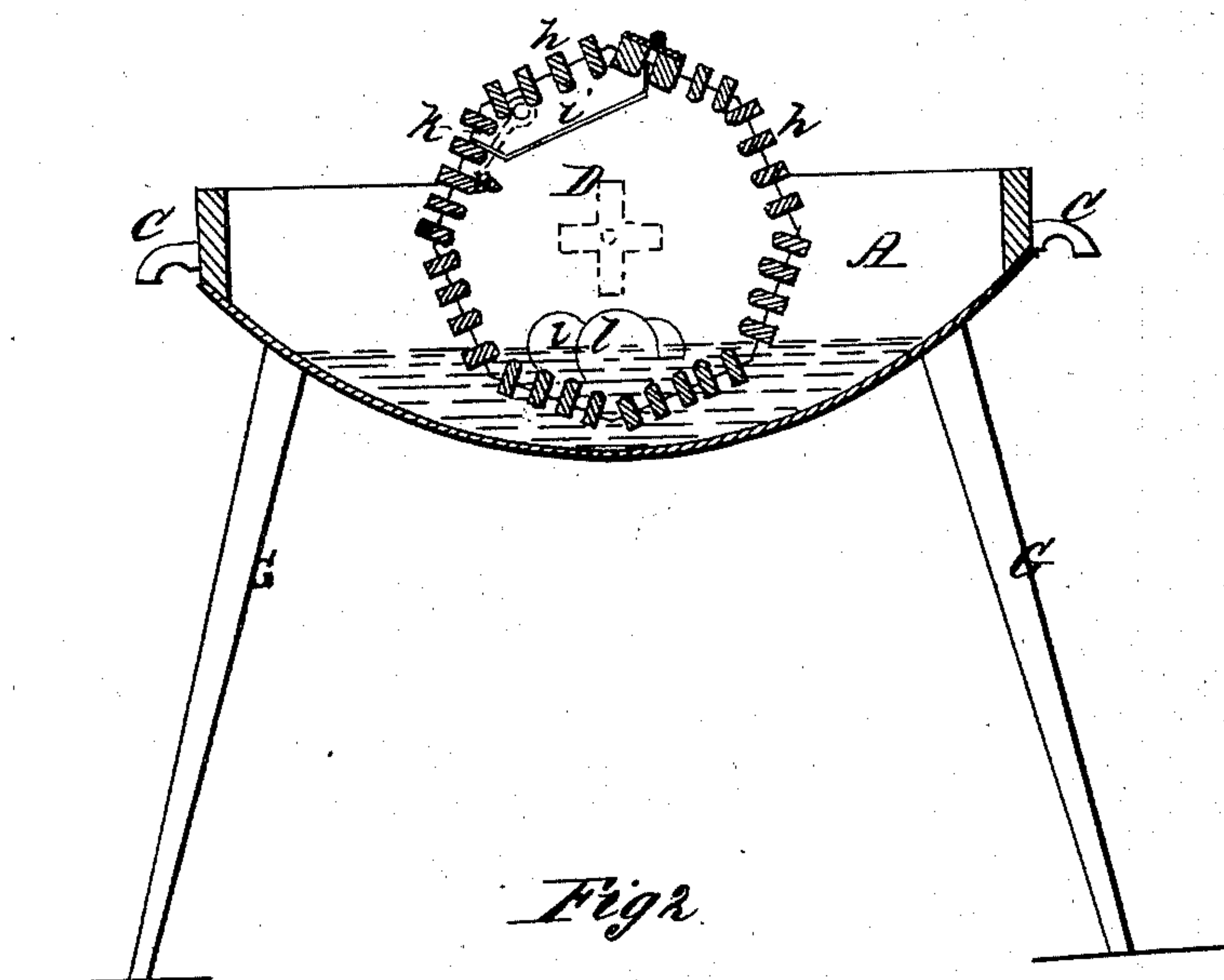
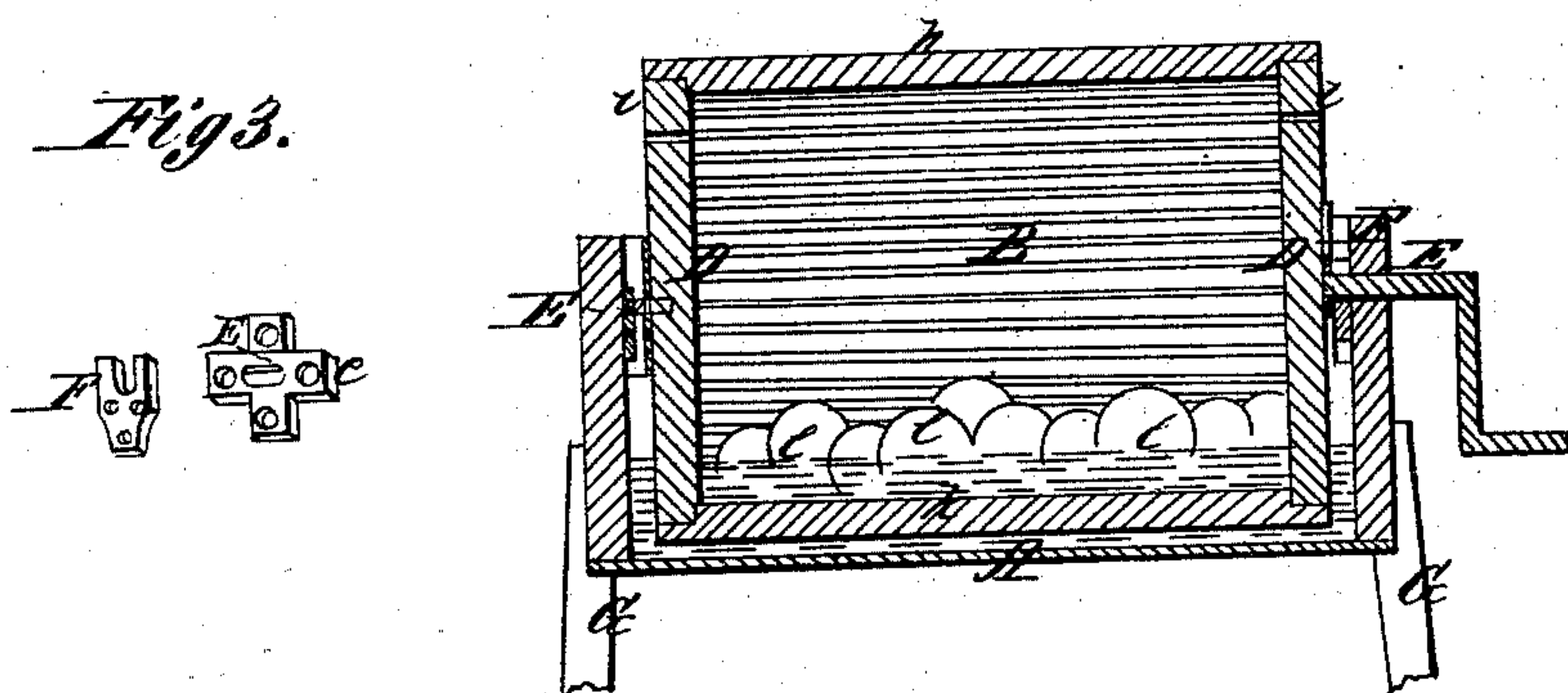


Fig 2

Fig 3.



Witnesses.

*J. W. Master
C. A. Peltier*

Inventor:

*A. Denison
by Allen & Co
Attorneys.*

United States Patent Office.

ALBERT DENISON, OF STILLWATER, NEW YORK.

Letters Patent No. 68,851, dated September 17, 1867.

IMPROVED WASHING MACHINE.

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

TO ALL WHOM IT MAY CONCERN:

Be it known that I, ALBERT DENISON, of Stillwater, in the county of Saratoga, and State of New York, have invented a new and improved Washing Machine; and I do hereby declare the following to be a full, clear, and exact description of the same, reference being had to the accompanying drawings, forming part of this specification, and in which—

Figure 1 is a longitudinal sectional elevation of my invention, and

Figure 2 is a transverse section of the same, and

Figure 3 shows the journal E and journal-box F detached.

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

This invention relates to that class of washing machines in which the clothes are placed in a revolving box, together with loose balls, and cleansed by the action of the balls in connection with the water.

The invention consists in the use, in combination, of a water-tank and revolving box of peculiar construction, within which latter the clothes to be washed are placed and subjected to the pounding action of a series of falling balls, as will be hereinafter described.

In order that others skilled in the art to which my invention appertains may be enabled to make and use the same, I will proceed to describe it in detail.

In the drawings, A represents the water-tank, supported upon legs G G, and provided with the arms C C for convenience in lifting and moving. The bottom of the tank may be lined inside with zinc or other material, to make it water-tight and prevent shrinking. The bottom is made concave, in order to accommodate it to the clothes-box which works in it. Placed directly across the centre of the water-tank is the clothes-box B, working on journals E E', which run in boxes F F' attached to the tank A. The form of this box is peculiar. It is always a polygonal prism and never a cylinder. Its sides may be three or any greater number within reasonable and practicable limits, say any number less than twelve. In the drawings the box is represented with eight sides. The box is made with two end pieces, D D', attached together by parallel slats h h h. On one side these slats are attached to movable pieces i i, hinged to the adjoining side, and provided with pins or hooks k k, by which to fasten it down. This side thus hinged serves as a lid, through which the clothes may be placed in or removed from the box B. Balls l l, of wood or other suitable material and of different sizes, are to be placed in the box B with the clothes, and the tank A is to be partially filled with water. The journals E E', upon which the box B turns, are formed of a cruciform piece of metal, e, with a pin, E, at its centre, perpendicular to its plane. The cruciform plate is nailed or screwed to the ends of the box B, so that the pin at its centre shall come in the centre of the ends of the box. Journal-boxes F F' are made in the form shown in the drawings, and screwed to the inside of the tank A at a suitable point in its walls. One of the journals, e', projects through the wall of the tank A, and has a crank, M, attached to it, by which the box B is revolved.

In using my invention, as the box is revolved both the clothes and the balls are caught in the angles at the junction of the sides of the polygon, and are not allowed to slip back, but are raised out of the water to some distance till the side of the box upon which they rest becomes too vertical, when they fall back, the balls striking upon the clothes and rolling over with them, and the clothes often being completely inverted in the water. Indeed, in my machine, if the number of sides of the polygonal prism be but few, as, for instance, three or four, and it be made to revolve rapidly, the clothes will be carried entirely round with it, and will be made to beat the water, and thus be rapidly cleansed.

The clothes, falling back when the box is not revolved at too high a speed, will drop from one angle only to strike the next angle upon the next rising side of the box, thus being successively beaten by every side of the box, and necessarily much more thoroughly cleansed than if they fell back into the water only.

By my construction of journals and boxes only one journal passes through the walls of the tank, and the danger of leakage around the journal-boxes is proportionately diminished.

Having thus described my invention, what I claim as new, and desire to secure by Letters Patent, is—

The revolving box B, constructed of wooden bars or slats h and end pieces D in the form of a polygonal prism, with a hinged section extending its entire length, and having journals attached to it as described, in combination with the journals E E', journal-boxes F F', balls l, and open tank A, when arranged to operate in the manner and for the purpose specified.

ALBERT DENISON.

Witnesses:

CHAS. A. PETTIT,
SOLON C. KEMON.