

No. 663,657.

Patented Dec. 11, 1900.

S. KANEY.  
WASHING MACHINE.

(Application filed June 29, 1899.)

(No Model.)

Fig. 1

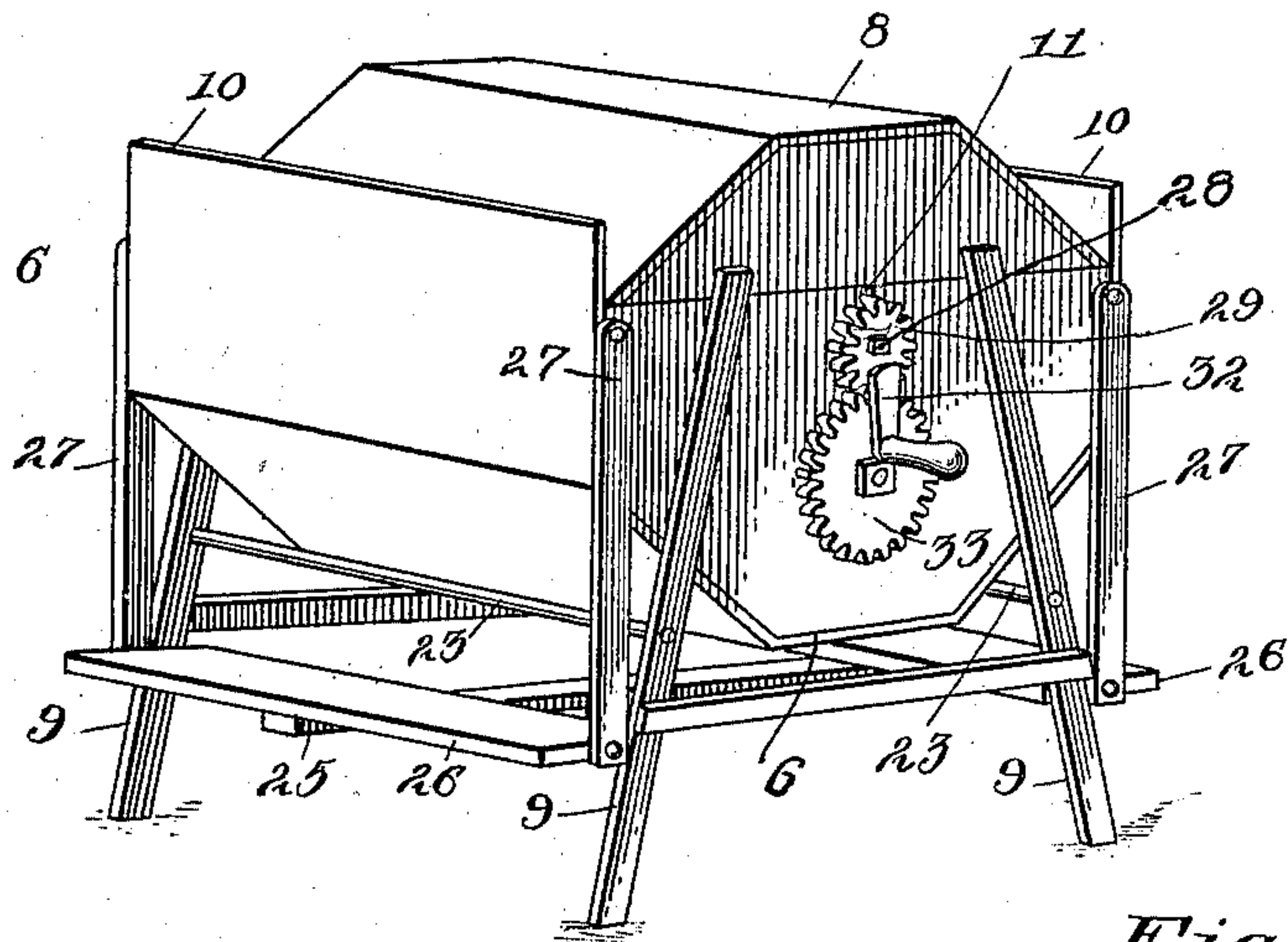


Fig. 3.

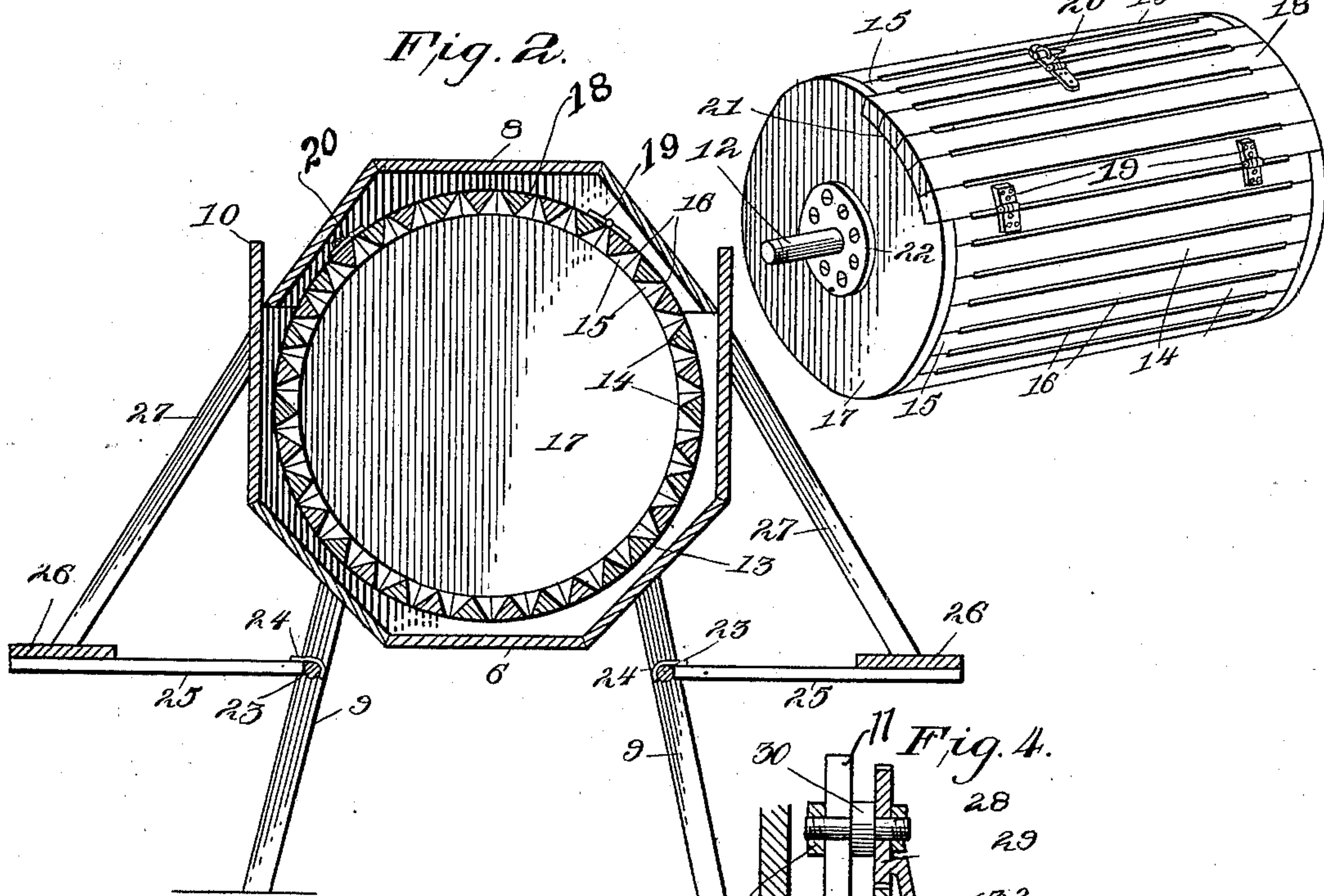
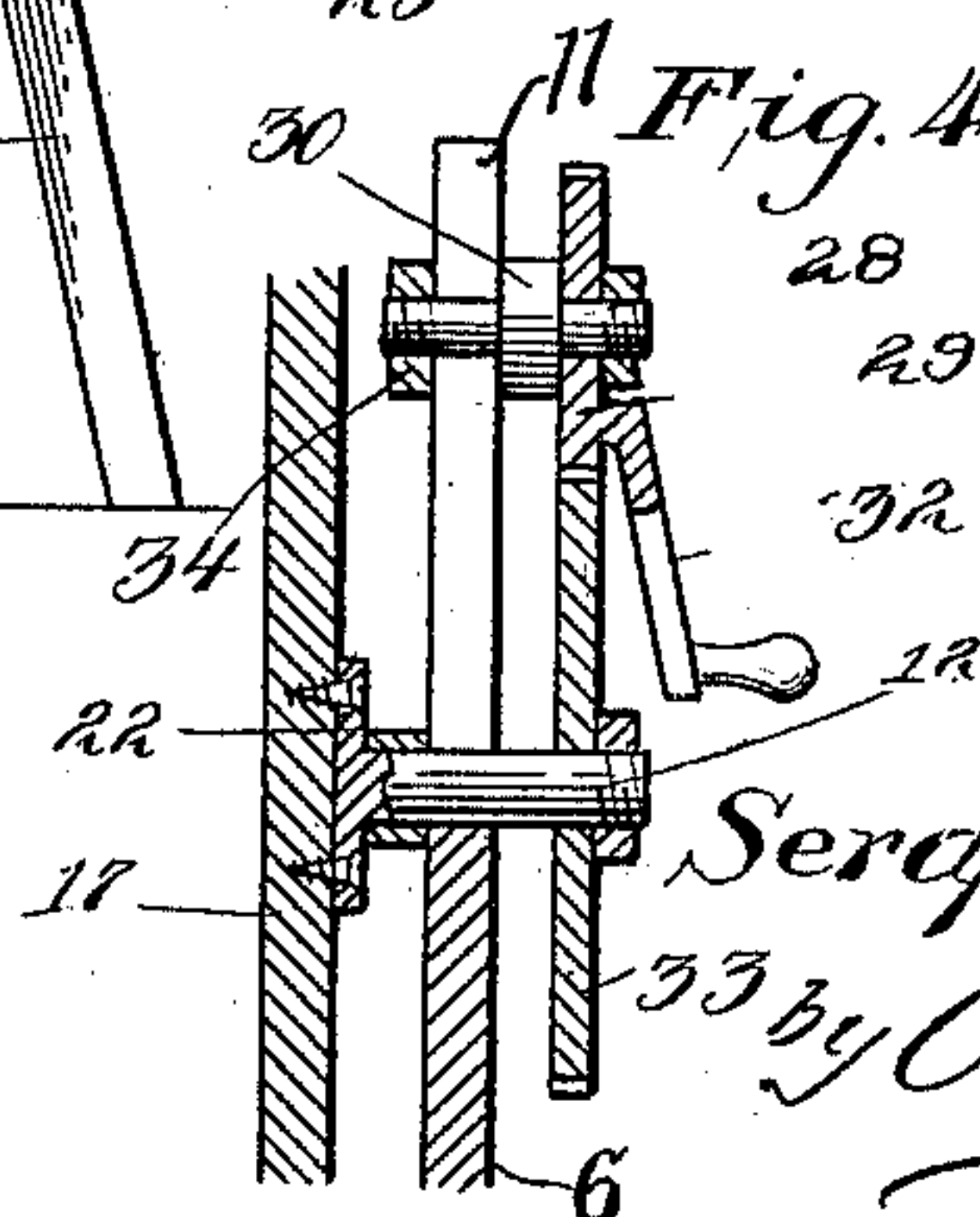


Fig. 4.



Witnesses

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# UNITED STATES PATENT OFFICE.

SERAPHIM KANEY, OF TARENTUM, PENNSYLVANIA.

## WASHING-MACHINE.

SPECIFICATION forming part of Letters Patent No. 663,657, dated December 11, 1900.

Application filed June 29, 1899. Serial No. 722,254. (No model.)

*To all whom it may concern:*

Be it known that I, SERAPHIM KANEY, residing at Tarentum, in the county of Allegheny and State of Pennsylvania, have invented a new and useful Washing-Machine, of which the following is a specification.

My invention relates generally to washing-machines, and more particularly to that class of washing-machines in which the clothes are washed by inserting them into a skeleton cylinder journaled in a box and rotating the cylinder through a quantity of suds or soapy water contained in the box, the object of the invention being to generally improve the construction and operation of this class of machines.

With this object in view my invention consists in the improved construction, arrangement, and combination of parts hereinafter fully described and afterward specifically pointed out in the appended claims.

In order to enable others skilled in the art to which my invention most nearly appertains to make and use the same, I will now proceed to describe its construction and operation, reference being had to the accompanying drawings, forming part hereof, in which—

Figure 1 is a perspective view of a machine constructed in accordance with my invention. Fig. 2 is a vertical sectional view on a plane cutting transversely through the machine at right angles to the axis of the cylinder. Fig. 3 is a perspective view of the cylinder with the door closed. Fig. 4 is a detail vertical sectional view on a plane parallel with the axis of the cylinder, showing the gearing.

Like numerals of reference mark the same parts wherever they occur in the several figures of the drawings.

Referring to the drawings by numerals, 6 indicates the box or tub, which with its lid or cover 8 in place is of octagonal form and supported on spreading legs 9, which project slightly above the top to prevent endwise displacement of the cover 8, while extensions 10 of the front and rear of the box serve the double purpose of wringer-boards and stops to prevent lateral displacement of the cover. The ends of the box are vertically slotted, as at 11, to receive pintles or journals 12, secured

centrally to and projecting endwise from the heads of a cylinder 13. This cylinder is skeleton in form, being composed of a number of longitudinally-arranged slats 14, with thickened ends 15, so as to leave spaces 16 between them, secured to the peripheries of two circular heads 17, the inner faces of the slats being V-shaped. The cylinder is provided with a door 18, secured at one side by hinges 19 and at the other by a hasp 20, said door consisting of a number of the slats 14, adapted to fit in the cut-away portions 21 in the heads. The journals 12 of the cylinder are formed integrally, by casting, with disks 22, secured on the heads of the cylinder by screws or bolts.

The legs 9 are connected below the box by cross-rods 23, which serve as points of engagement of hooks 24 on the inner ends of bars 25, projecting inwardly from boards 26, pivotally mounted in the outer ends of bars 27, pivoted at their inner ends to the ends of the box. These boards serve as tub-supports when extended, as shown in Fig. 2, and by disengaging the hooks 24 the bars 25 and the boards 26 may be slipped under the box between the legs and out of the way, as in Fig. 1.

28 indicates a short shaft carrying a rigid flange or washer 30. A pinion 29 is mounted on the shaft and provided with a crank-handle 32. The journals 12 being in position in the slots 11 of the box ends, the short shaft 28 is dropped into the slot until its pinion 29 engages a gear-wheel 33 on one of the journals, when the short shaft will be secured against vertical movement by a clamping-nut 34 on its inner end. By turning the crank-handle 32 the cylinder will thus be rotated and the soiled clothes in the cylinder will be tumbled and rolled upon the V-shaped inner faces of the cylinder-slats.

Inasmuch as the box is filled with suds or soapy water to a height to partially immerse the cylinder when in working position, the clothes in their tumbling and rolling motion will be moved in and out of the suds and thoroughly cleansed.

While I have illustrated and described what I consider to be the best means now known to me for carrying out my invention, I do not wish to be understood as restricting myself to the exact forms and constructions



shown, as many slight changes therein or variations therefrom might suggest themselves to the ordinary mechanic, all of which would be clearly included within the limit and scope  
5 of my invention.

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

1. In a washing-machine, the combination,  
10 with a suds-box, one end of which is slotted vertically, of a cylinder journaled therein, the journal of which at one end projects through said slot and is provided with a gear-wheel, a short shaft in the slot above the cyl-  
15 inder-shaft, the intermediate portion of which is provided with a rigid collar to bear against the outer surface of the side of the suds-box and the inner end is screw-threaded and pro-  
20 vided with a nut for engaging with the inner surface of the side of the box and holding the

shaft rigidly in the slot, and a gear-pinion provided with a crank and mounted on the outer end of the short shaft in position for engaging with the gear-wheel on the cylinder-shaft.

2. In a washing-machine, the combination, with a suds-box, of legs secured to the ends thereof, cross-rods between the legs at opposite sides of the box, bars pivotally secured to the ends of the box, a board pivotally se- 30 cured to the ends of the bars at each side of the machine, and an inwardly-projecting bar secured to each board, the inner end of which is provided with a hook for engaging with the cross-rods and holding the boards beyond the 35 sides of the suds-box.

SERAPHIM KANEY.

Witnesses:

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