

(No Model.)

C. SCHMIDT.

TIME ATTACHMENT TO STOP COCKS FOR WATER METERS.

No. 268,733.

Patented Dec. 5, 1882.

Fig. 1.

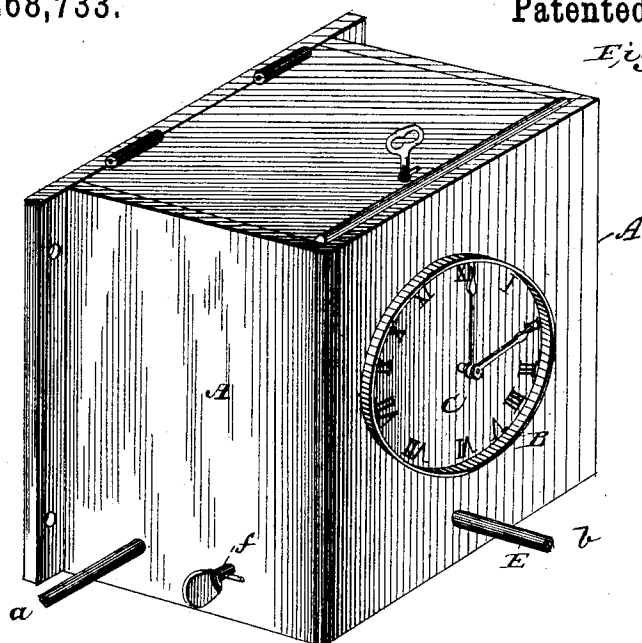


Fig. 2.

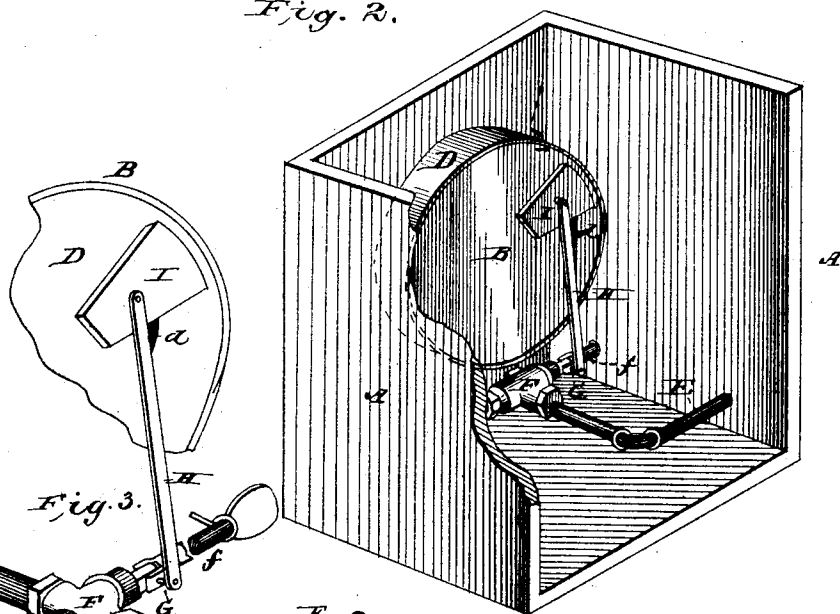
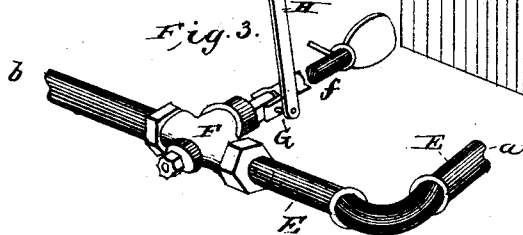


Fig. 3.



WITNESSES:

And. S. Dutentch
A. M. Long

Christian Schmidt
INVENTOR,
by Louis Bagger & Co
ATTORNEYS.

UNITED STATES PATENT OFFICE.

CHRISTIAN SCHMIDT, OF MIAMISBURG, OHIO, ASSIGNOR TO FERDINAND SWARTZTRAUBER, FRANZ LIEZENHOFF, JOHN STOCKER, AND ADAM SILBERMAN, ALL OF SAME PLACE.

TIME ATTACHMENT TO STOP-COCKS FOR WATER-METERS.

SPECIFICATION forming part of Letters Patent No. 268,733, dated December 5, 1882.

Application filed April 22, 1882. (No model.)

To all whom it may concern:

Be it known that I, CHRISTIAN SCHMIDT, of Miamisburg, in the county of Montgomery and State of Ohio, have invented certain new and useful Improvements in Water-Meters; 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 perspective view of my improved water-meter. Fig. 2 is a perspective view of the interior of the same, the back plate having been removed; and Fig. 3 is a detail view of the stop-cock with its arm and connecting-rod for stopping the clock mechanism.

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

My invention has relation to that class of water-meters in which the quantity of the water supplied through it is indicated by a mechanism registering the length of time of its flow; and it consists in so combining the registering mechanism with a stop-cock that the former only indicates the length of time of the flow independent of the speed of the same, as hereinafter more fully described, and particularly pointed out in the claim.

In the accompanying drawings, the letter A represents a box or casing, of cast-iron or other suitable material, the top or back part or one of the sides of which is hinged, so as to form a door, by which access may be had to the interior of the box. This door is securely locked, and the key should be in possession of a duly-authorized inspector of water-meters.

Into the face-plate or front side of box A is inserted a clock, B, of any suitable construction, the dial C of which may be left exposed; or, if desired, it may be covered by a hinged or sliding cover. The casing D, which contains the clock mechanism, projects into and is contained in the box A.

E is the supply-pipe, which has an inlet, *a*, and outlet *b*; or *b* may be the inlet and *a* the outlet.

The stop-valve F, which may be of any approved construction, is located within box A, with its neck *f* projecting through the side of the same, so that it may be opened or shut from the outside. Valve F has an arm, G, projecting on one side, at the outer end of which is a rod or pitman, H, that connects it with a plate, I, which slides on the back plate of the clock-casing D. This plate is connected by a pin or stud, which projects into the interior of the clock mechanism through a slot, *d*, in the back plate, with the escapement of the clock in such a manner that when the valve is turned to open the supply-pipe, arm G, pushing rod H, shoves plate I up, so as to release it from the escapement and set the clock going, while when the valve is turned in the opposite direction to shut off the water, arm G and rod H operate to so adjust plate I that the clock will be stopped.

As there are many ways by which the connection between the sliding plate I and the clock-escapement may be made, so as to stop the clock when plate I is shoved in one direction, but set it going when it is shoved in the opposite direction, I do not confine myself to any particular construction or combination of these parts.

From the foregoing it will be seen that the clock will run only while water flows through pipe E, the elbow of which passes through the casing A, and the capacity of the pipe and pressure or speed of flow of water being approximately known, the quantity of water which has passed through the pipe can readily be deduced by reading off the length of time the flow has lasted in hours and minutes; or, if desired, the clock-dial C may be marked with figures indicating the quantity of water in barrels, by cubic feet, or any other approved measure, corresponding to the quantity of water that has passed through the pipe in a given time—viz., the running-time of the clock.

I am aware of Patent No. 8,725, of 1852, for an air and gas meter in which greater or less speed is given to mechanism as the cock is more or less open, and such construction is not sought to be covered in this application, my

invention being adapted to simply denote automatically the length of time a water-cock is open.

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

10 In a water-meter, a supply-pipe having a given capacity, and provided with a suitably-constructed valve or stop-cock, so combined with a clock-dial and clock mechanism that said mechanism will be stopped on closing the valve, but set in motion on opening the same,

the clock mechanism being otherwise independent of the flow of water through the supply-pipe, substantially as and for the purpose 15 shown and set forth.

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

CHRISTIAN SCHMIDT.

Witnesses:

FERNAND SWARZTRAUBER,
J. F. REILY.