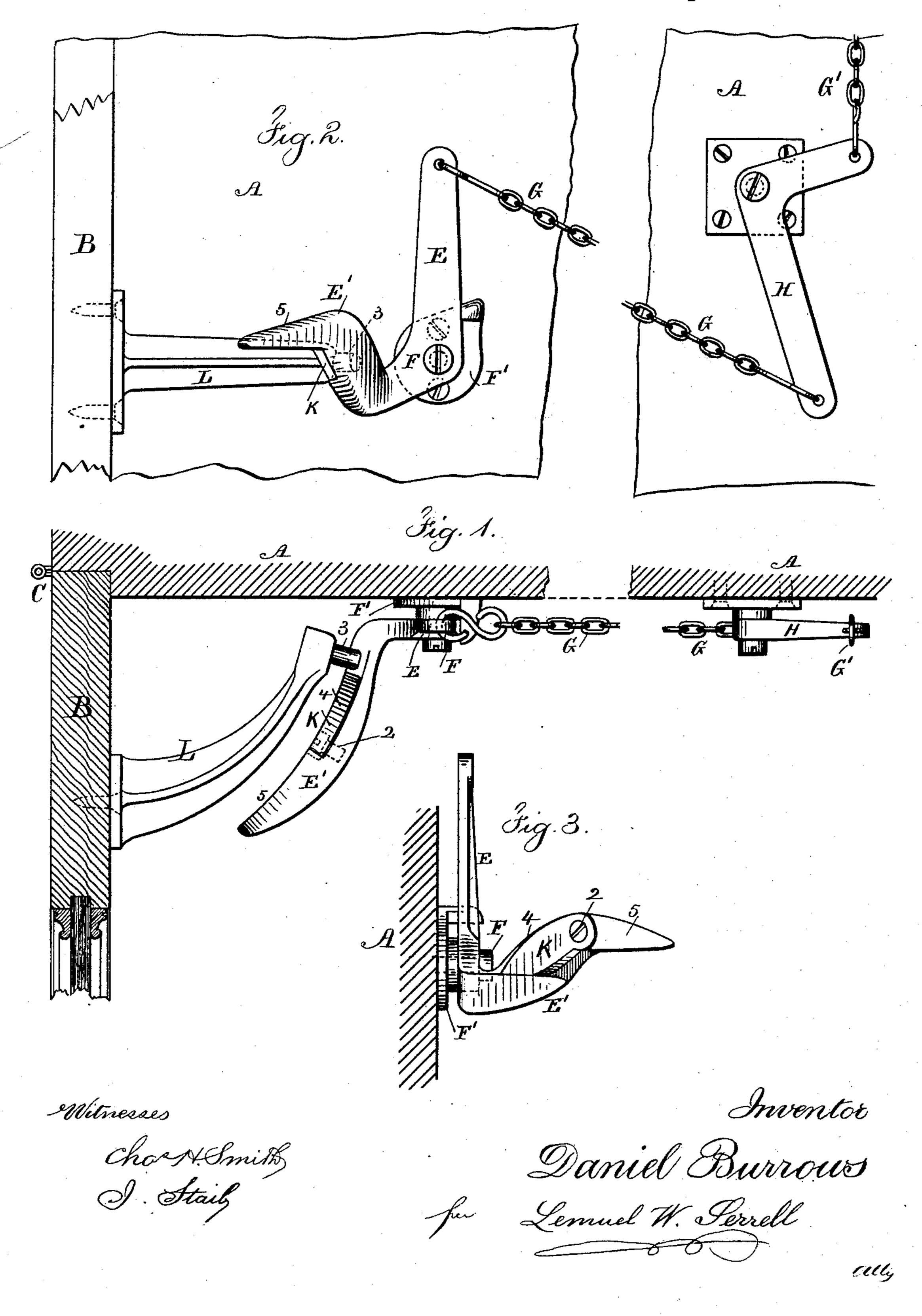
(No Model.)

D. BURROWS.

DOOR CONNECTION FOR WATER CLOSET CISTERNS.

No. 327,133.

Patented Sept. 29, 1885.



United States Patent Office.

DANIEL BURROWS, OF BROOKLYN, ASSIGNOR TO THE J. L. MOTT IRON WORKS, OF NEW YORK, N. Y.

DOOR-CONNECTION FOR WATER-CLOSET CISTERNS.

SPECIFICATION forming part of Letters Patent No. 327,133, dated September 29, 1885.

Application filed August 28, 1885. (No model.)

To all whom it may concern:

Be it known that I, DANIEL BURROWS, of Brooklyn, in the county of Kings and State of New York, have invented an Improvement in Door-Connections for Water-Closet Cisterns, of which the following is a specification.

The valve of a water-closet cistern has frequently been connected to the door of the closet in such a manner that when the door is opened the valve is lifted, so as to flush the closet or urinal each time the door is opened. In these connections the movement of the door is sometimes limited and the parts may become injured by opening the door too wide.

In my present improvement I fasten upon the door a rigid arm, and upon the wall or casing, adjacent to the door, a cam-latch lever, against which the arm on the door acts to give motion to a chain or rod leading to the water-closet valve when the door is being opened, and when the door is being closed the arm thereupon lifts the latch of the cam-latch of the lever in returning to its normal place.

In the drawings, Figure 1 is a plan view representing part of the door, the arm, and the cam-latch lever. Fig. 2 is an elevation of the same, and Fig. 3 is an elevation of the cam-latch upon the lever.

A represents a portion of the casing or wall of the water-closet, and B represents a portion of the door to the closet, the same being hinged at C.

E is a lever pivoted at F upon the wall or casing of the closet, and having a chain or rod, G, by which the water-closet valve is actuated. Usually there is a bell-crank lever, H, to which the rod or chain G passes, and a rod or chain, G', extends from said lever H to the valve-lever of the water-closet cistern. The pivot F of the lever E is of any desired character. I prefer, and use, a screw extending out from the plate F', that is fastened upon the wall or casing of the closet by screws from the lever E. A curved arm, E', projects in a

nearly horizontal direction, and at 2 a camlatch, K, is pivoted upon this arm E', and there is a curved arm, L, attached to the door B and terminating as a finger, 3, and the arm E' is undercut horizontally, so that if the 5 cam-latch K is removed the finger 3 can swing back and forth with the arm L and door and not move the lever E'; but by use of this cam-latch K, I am enabled to make the device operate.

As the door B is closed the arm L swings with it and the finger 3 passes in beneath the cam-latch K and lifts the same, and this camlatch K falls down behind the finger 3 when the door is closed. When the door is opened, 6 the finger 3, coming in contact with the camedge 4 of the latch K, overruns and depresses said latch, and the arm E' swinging the lever E and opening the valve of the closet-cistern, so as to flush the closet. The part 5 of the 6 arm E' allows the lever E to rise gradually.

By this improvement it will be apparent that the door B can be swung open more or less, because the finger 3 separates from the arm E' when the door has been swung about 7 forty degrees, thus insuring a full movement of the parts by a small motion given to the door, and when the door is closed by a weight or spring the finger 3 runs under the latch K, lifting the same, and the parts resume their 7 normal positions.

I claim as my invention—

The combination, with the arm L, having a finger, 3, at its end, of the lever E, a connection to the valve of the water-closet cistern, 8 and the curved arm E', projecting from the lever E, and the cam-latch K, pivoted to said arm, substantially as set forth.

Signed by me this 21st day of August, A. D. 1885.

DANIEL BURROWS.

Witnesses:

MAX GOEBEL,

HENRY MORFORD.