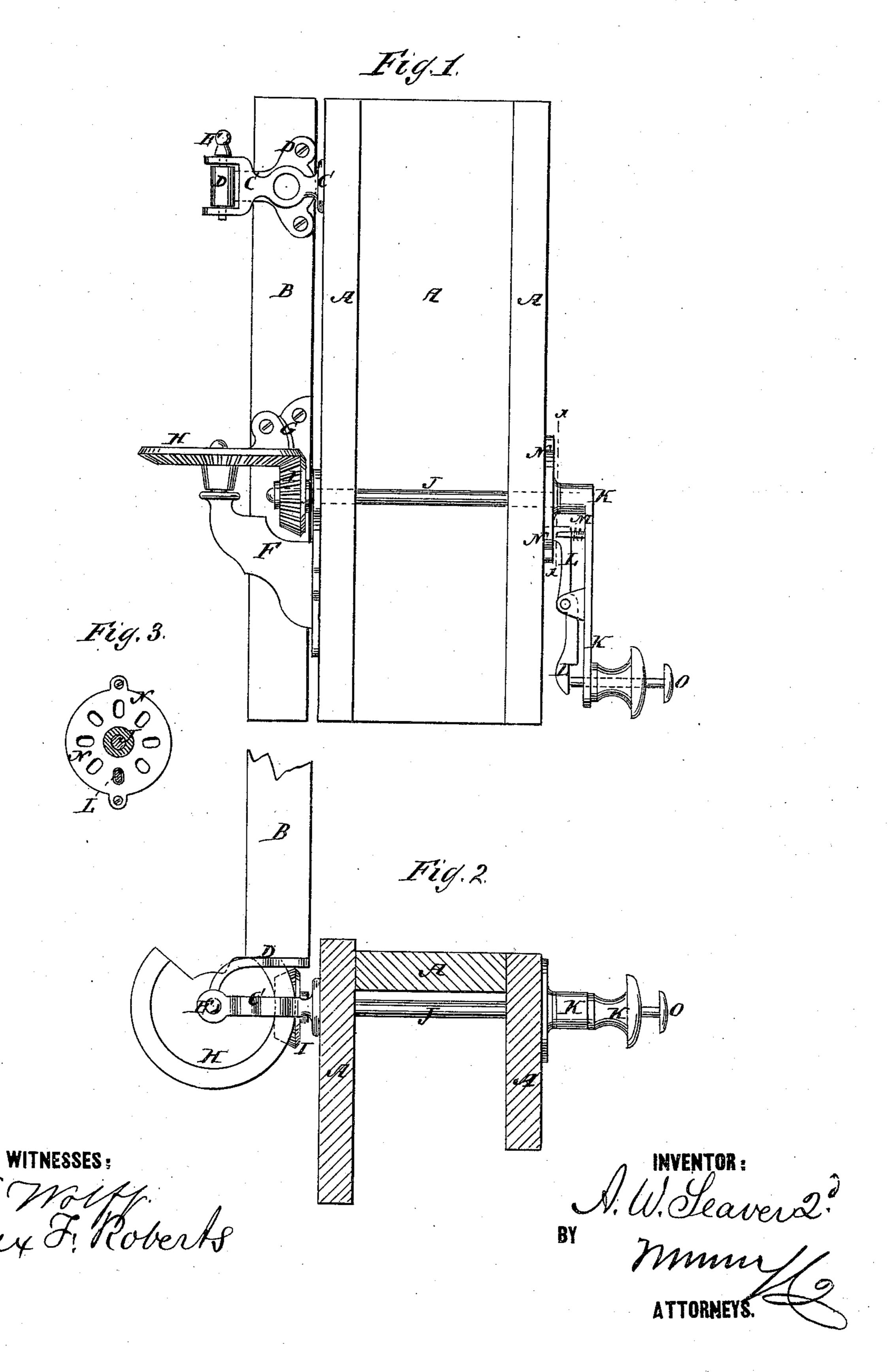
## A. W. SEAVER, 2nd. SHUTTER-WORKER.

No. 174,309.

Patented Feb. 29, 1876.



## United States Patent Office.

ABRAHAM W. SEAVER, 2D, OF NORTHBOROUGH, MASSACHUSETTS.

## IMPROVEMENT IN SHUTTER-WORKERS.

Specification forming part of Letters Patent No. 174,309, dated February 29, 1876; application filed December 4, 1875.

To all whom it may concern:

Be it known that I, ABRAHAM W. SEAVER, 2d, of Northborough, in the county of Worcester and State of Massachusetts, have invented a new and useful Improvement in Window-Blind Hangings, of which the following is a specification:

Figure 1 is a side view of my improved hangings, shown as applied to a window casing and blind. Fig. 2 is a top view of the same, the casing being shown in section. Fig. 3 is a face view of the locking-plate, the shaft being shown in section through the line x x, Fig. 1.

Similar letters of reference indicate corre-

sponding parts.

The object of this invention is to furnish improved blind-hangings, which shall be so constructed as to enable the blind to be opened and closed to any desired extent, and locked in place when adjusted, without its being necessary to raise the sash, and which shall be simple in construction and convenient in use.

The invention consists in the combination of the lever, the spring, the lock-plate, and the pin with the crank of device that operates the blind, as hereinafter fully described.

A represents the casing, and B the blind, of a window. C D E is the upper hinge. F is the part of the lower hinge that is attached to the casing A, and which has a pintle formed upon its outer end. Upon the pintle of the part F of the hinge is pivoted the part G of the lower hinge that is attached to the blind B. The part G of the hinge has a bevel-gear wheel, H, formed upon it, the teeth of which mesh into the teeth of the smaller bevel-gear wheel I attached to the outer end of the shaft

J. The shaft J passes through the casing A, and has a crank, K, attached to its inner end, so that by turning the crank K the blind may be opened and closed partly or wholly, as may be desired. L is a lever pivoted to the inner side of the arm of the crank K, and the inner end of which works in a guide formed upon the inner part of the said crank-arm, and is held out by a spiral spring, M, interposed between it and the crank K. Upon the inner end of the lever L is formed a toe, which enters one of the holes of a circle of holes formed in a plate, N, attached to the casing A, and through the center of which the shaft J passes. The lever L is operated to release it from the lock-plate N and allow the crank K to be turned by a pin, O, which passes through the knob or handle of said crank, and its inner end rests against the outer end of the said lever L.

With this construction the crank K, and with it the blind B, can be securely locked in any desired position.

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

The combination, with bevel wheels H I, shaft J, and crank K, of spring-held lever L, pivoted to lugs of crank, and having toe at inner end, pin O passing through knob of handle, and resting against outer end of lever and the plate N, having a circle of elongated holes, as and for the purpose specified.

ABRAHAM WOOD SEAVER, 2D.

Witnesses:

THOS. F. SEAVER, J. D. ROGERS.