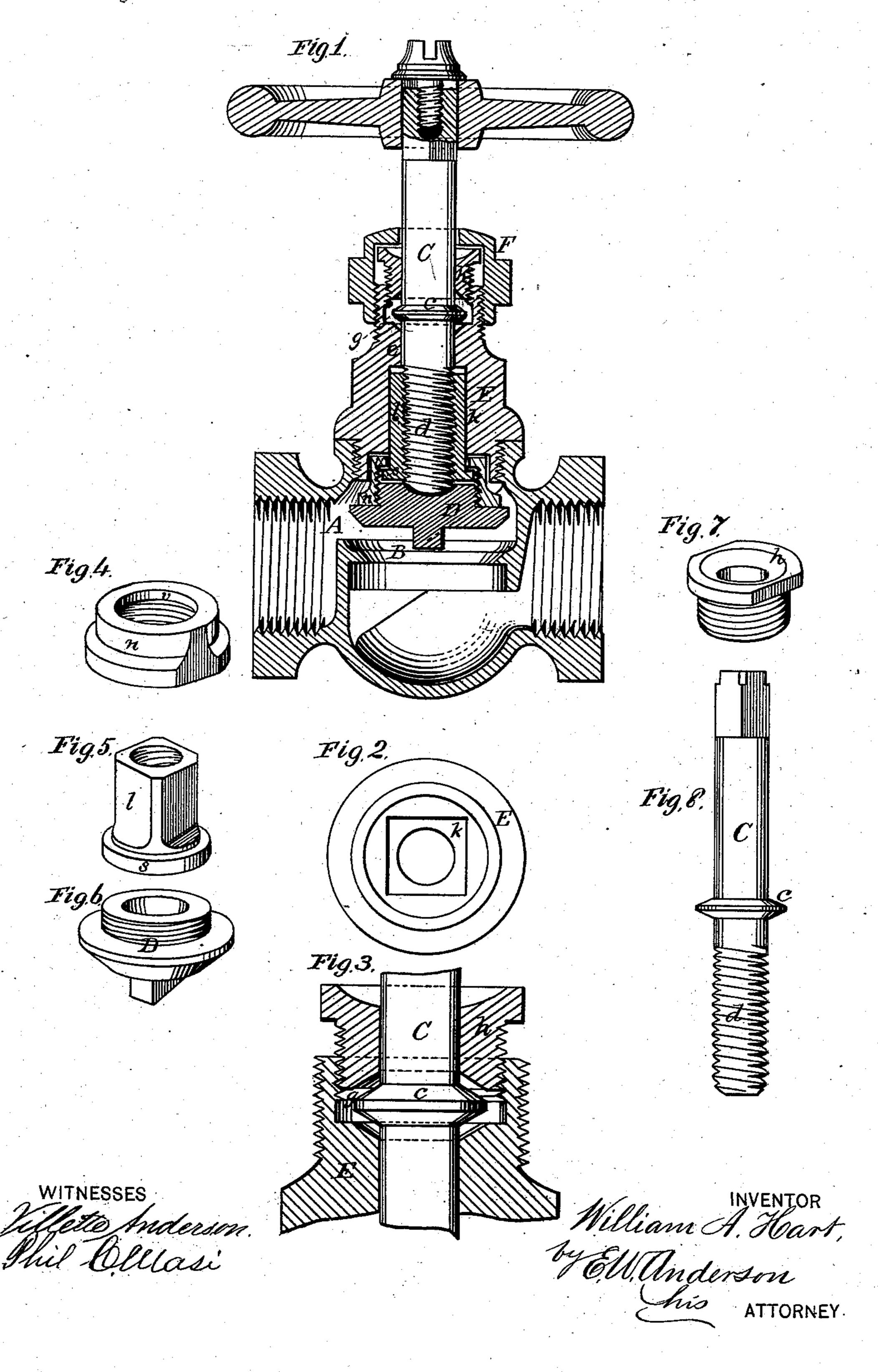
W. A. HART. Globe-Valve.

No. 225,369.

Patented Mar. 9, 1880.



United States Patent Office.

WILLIAM A. HART, OF BUFFALO, NEW YORK.

GLOBE-VALVE.

SPECIFICATION forming part of Letters Patent No. 225,369, dated March 9, 1880.

Application filed December 15, 1879.

To all whom it may concern:

Be it known that I, WM. A. HART, of Buffalo, in the county of Erie and State of New York, have invented a new and valuable Improvement in Globe-Valves; and I do hereby declare that the following is a full, clear, and exact description of the construction and operation of the same, reference being had to the annexed drawings, making a part of this specification, and to the letters and figures of reference marked thereon.

Figure 1 of the drawings is a representation of a vertical central section of this invention. Fig. 2 is a bottom view of the recessed hood. Fig. 3 is an enlarged view of the bushing, and stem, collar, and seat in the hood. Figs. 4, 5, 6, 7, and 8 are details.

This invention has relation to certain improvements in globe-valves; and it consists in the combination, with a freely-rotating valve-disk and a squared and shouldered tang having an internal thread, of a hood having a squared socket, a threaded cap, and threaded bushing, and a solid threaded valve-stem engaging by its lower end the internal thread of the squared tang, and by a collar the bushing, as hereinafter shown and described.

The object of this invention is to provide a peculiarly-constructed valve-disk which will 30 rise or fall quickly on the stem, and at the same time to effect an additional seat or stop above the rising disk to prevent the pressure of steam on the packing.

In the accompanying drawings, the letter A designates the valve-case, and b the valve-seat.

C represents the spindle or stem, having at about its middle portion a collar, c, and at its lower end a thread, d, which is made with a rapid pitch.

E indicates the hood above the valve, through which the stem passes, fitting it easily at e, where a circular way is formed. Above this way e the hood is provided with a threaded recess, g, of sufficient diameter and depth to receive the collar c of the stem; and above it the threaded bushing h, which is centrally bored for the passage of the stem, its lower

end being made concave to fit the collar c, thereby forming a seat or stop to prevent the 50 passage of steam or water upward to the packing.

F represents the cap which holds the packing, and is connected to the hood by screw-

threads in the ordinary manner.

In the lower portion of the hood E is formed a squared recess, k, extending upward around the stem and serving to receive the squared upper end or tang, l, of the valve-disk, said tang being internally threaded to engage with 60 and work easily on the end thread, d, of the stem. This tang is connected to the valve-disk D by a threaded band, n, having an inner flange, v, which engages with a circular rib or shoulder, s, at the lower end of said tang, so 65 that while the tang cannot rotate in its socket the valve-disk may turn freely.

The operation of turning the stem will cause the valve-disk to rise and fall thereon because of the threaded connection with the squared 70 tang and the socket-guide in the wod. The collar c allows the stem to turn freely, and at the same time forms a stop to prevent it from rising, thereby holding it to its work in keeping the valve-disk engaged with the valve-75 seat.

Having described this invention, what I claim, and desire to secure by Letters Patent, is—

In a globe-valve, the combination, with a free-ly-rotating valve-disk, Dn, and the squared and shouldered tang l, having an internal thread, of the hood E, having its squared socket k, the threaded cap F, threaded bushing h, and the solid threaded valve-stem C, engaging by 85 its lower end the internal thread of the squared tang, and by its collar c the bushing, all constructed and arranged to operate as shown and described.

In testimony that I claim the above I have 90 hereunto subscribed my name in the presence of two witnesses.

WILLIAM A. HART.

Witnesses:

FANNIE E. HART, J. J. TONKIN.