

(No Model.)

J. WALSH, Jr.

STOP VALVE.

No. 334,315.

Patented Jan. 12, 1886.

FIG. 1.

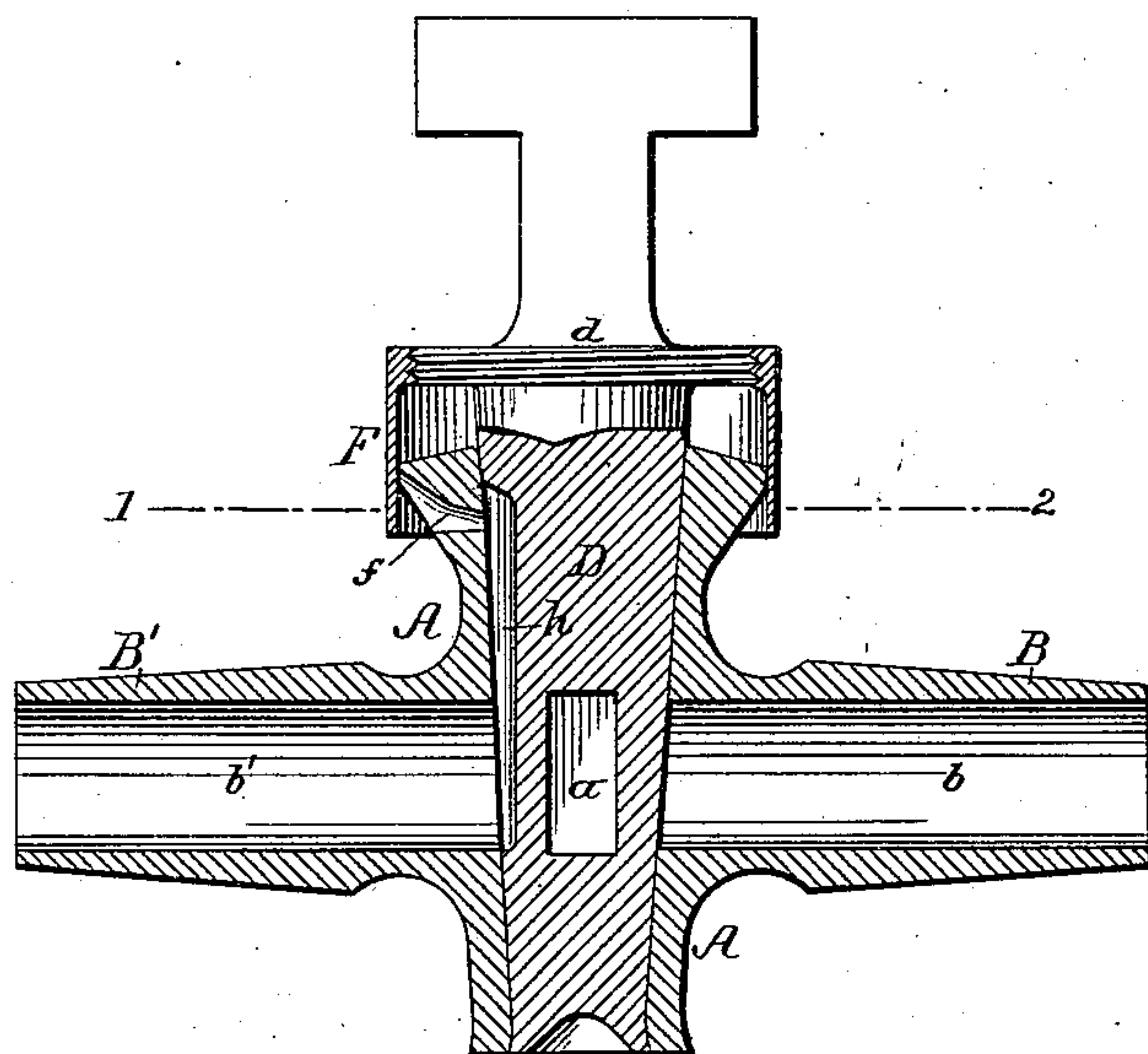
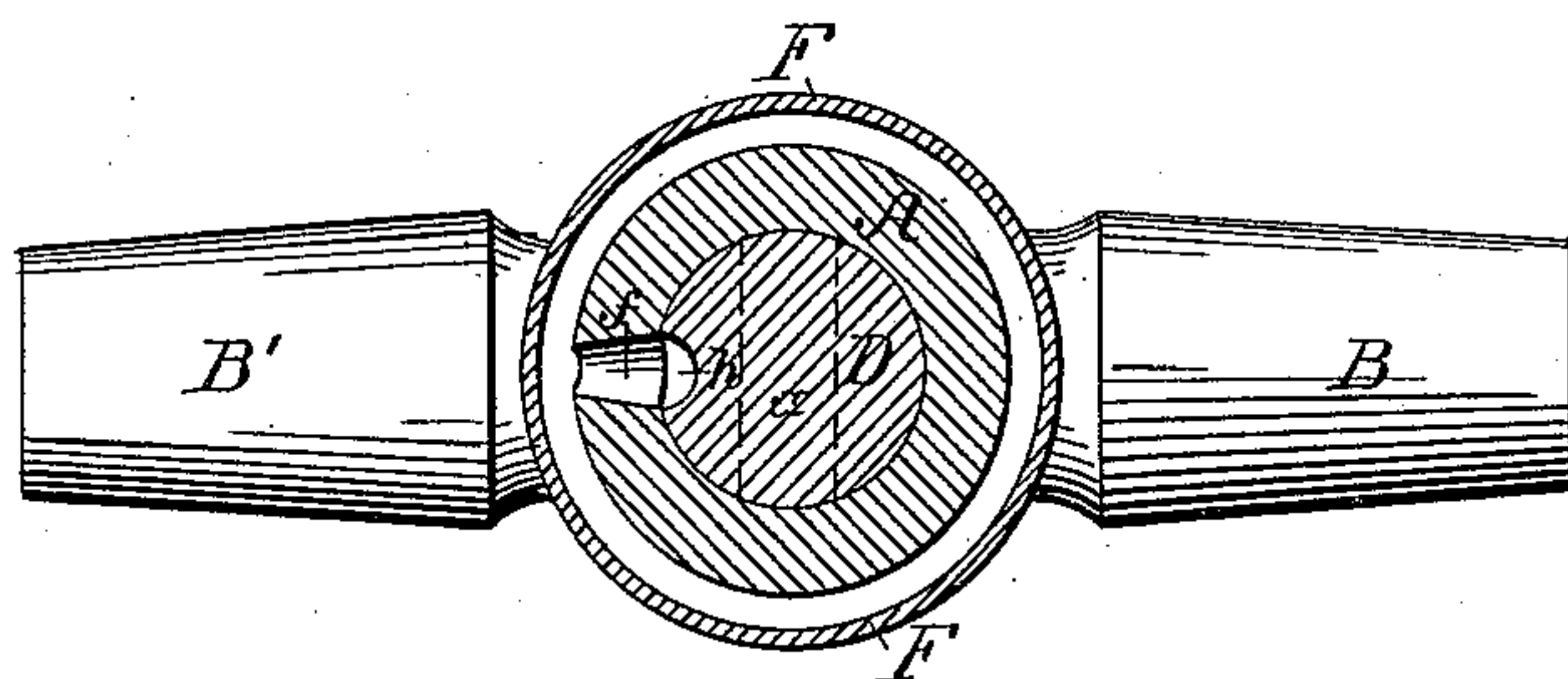


FIG. 2.



Witnesses:

George E. Gibson.
Harry Drury.

Inventor:

James Walsh Jr.
by his Attorneys
Howson & Sons

UNITED STATES PATENT OFFICE.

JAMES WALSH, JR., OF PHILADELPHIA, PENNSYLVANIA.

STOP-VALVE.

SPECIFICATION forming part of Letters Patent No. 334,315, dated January 12, 1886.

Application filed August 6, 1885. Serial No. 173,730. (No model.)

To all whom it may concern:

Be it known that I, JAMES WALSH, Jr., a citizen of the United States, residing in Philadelphia, Pennsylvania, have invented certain
5 Improvements in Stop-Valves, of which the following is a specification.

My invention relates to that class of stop-valves in which a plug adapted to a seat in the casing has a port which may form a continuation of the passage through the casing,
10 or may be turned at right angles thereto when it is desired to cut off the flow through said casing.

The object of my invention is to prevent the
15 access of sand or grit to the face of the valve or its seat; and this object I attain in the manner which I will now proceed to describe, reference being had to the accompanying drawings, in which—

20 Figure 1 is a longitudinal section, partly in elevation, of a stop-valve constructed in accordance with my invention; and Fig. 2, a sectional plan view on the line 1 2, Fig. 1.

A is the casing of the valve, which has opposite branches, B B', for attachments to pipes in the usual manner, and has a tapered opening for the reception of the plug D, which is confined within the opening by flaring the lower end of the plug, as shown, or by means
30 of a screw stem and nut or other suitable retaining device.

In the plug D is a transverse port or passage, *a*, which may form a continuation of the passage *b b'* of the valve, or may occupy a position at right angles thereto, as shown in the drawings, when it is desired to cut off the flow of liquid through said passage. A great defect of these valves as usually constructed, especially when used in connection with the underground pipes of hydrants, wash-paves, &c.,
40 is the rapid wearing of the plug and its seat

due to the access of sand or grit thereto from the top, the upper portion of the casing and the plug projecting therefrom being exposed. In order to overcome this objection, I form on the plug D a threaded flange, *d*, to which is
45 secured a hood, F, the latter extending down below the top of the casing A, which is expanded so as to fit snugly to the hood, as shown in Fig. 1. By this means sand or grit is prevented from gaining access to the top of the casing or to the projecting portion of the plug, and the objection above alluded to as incident to the usual construction is effectually overcome. The accumulation of sand or grit
50 within the hood at a point below the top of the casing A is prevented by the water escaping from the waste-opening *f* in said casing, the water gaining access to this opening from the passage *b'* of the valve-casing through the recess *h*, formed in one side of the plug D, as shown in Figs. 1 and 2.

The hood F may be secured to the plug D by other means than the threaded flange *d*; but the use of the latter is preferred on the score
65 of convenience.

I claim as my invention—

The combination of the casing A, the plug D, and the hood F, carried by the plug and fitting snugly to but projecting below the upper portion of the casing A, said hood and casing having passages whereby the waste water is discharged into that portion of the hood which projects below the bearing on the casing, all substantially as specified.
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In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

JAMES WALSH, JR.

Witnesses:

WILLIAM F. DAVIS,
HARRY SMITH.