W. F. CLASS.
Faucet.

No. 197,249. Patented Nov. 20, 1877.

Fig. 1.

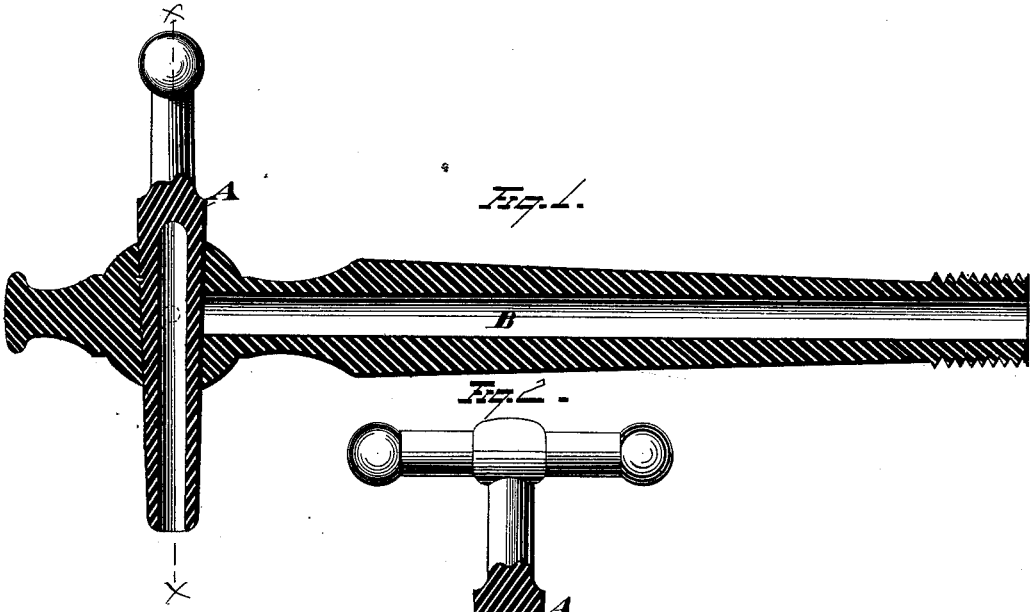


Fig. 2.

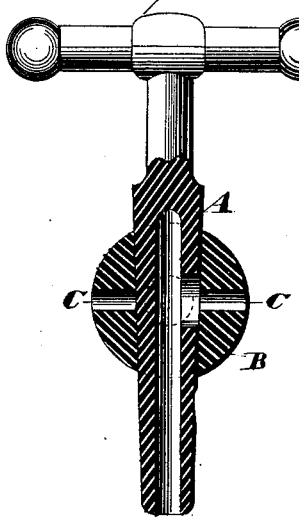
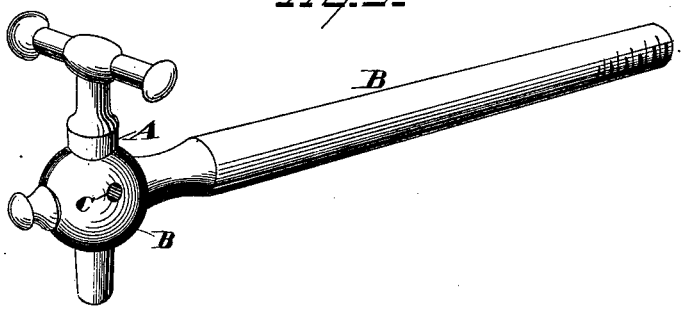


Fig. 3.



WITNESSES
Edm. J. Nottingham
A. W. Bright.

INVENTOR.
Wm F. Class.
By Eggett and Leggetts.
ATTORNEYS.

UNITED STATES PATENT OFFICE.

WILLIAM F. CLASS, OF CLEVELAND, OHIO, ASSIGNOR TO WORSWICK MANUFACTURING COMPANY, OF SAME PLACE.

IMPROVEMENT IN FAUCETS.

Specification forming part of Letters Patent No. **197,249**, dated November 20, 1877; application filed October 17, 1877.

To all whom it may concern:

Be it known that I, WILLIAM F. CLASS, of Cleveland, in the county of Cuyahoga and State of Ohio, have invented certain new and useful Improvements in Faucets; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it pertains to make and use it, reference being had to the accompanying drawings, which form part of this specification.

My invention relates to faucets; and consists in such a construction of the same, as will hereinafter appear, that when the valve is closed the discharging-nozzle shall have a free vent, thus preventing any liquid from being retained in said discharging-nozzle after the valve is closed.

In the drawings, Figure 1 is a view, in longitudinal section, of my device. Fig. 2 is a view in cross-section, taken on the line *x x* of Fig. 1. Fig. 3 is a perspective view of my device.

My invention is equally adaptable to faucets of almost any description, and I shall not, therefore, describe the construction of the faucet proper further than by mere reference to the drawings hereto.

As in ordinary faucets, A is simply a hollow cylindrical or conical plug or valve, having a vent or opening from one side of that portion that comes into line with the cavity of the tube B. As the plug or valve A is turned one way or the other, the end of the tube B is opened or closed, and fluid permitted to escape, or prevented from escaping, through the cavity of the plug or valve, A. This form of device, as thus far specified, constitutes the most common form of faucet.

A great objection to this form is this: When the valve A is closed, its cavity is still filled with the fluid being drawn, and the atmospheric pressure operates to retain said fluid within the plug A for a considerable time after the valve has been closed, which afterward escapes, causing loss and damage.

This state of things would not obtain if air could be admitted above the fluid in the cavity of the discharging-nozzle; and my invention has for its sole object the accomplishment of this end, and it is effected as follows: The tube B, in that portion where it surrounds and envelopes the plug A, is pierced by one, two, or more holes, C, that are made to open into the cavity of the tube B in such a manner that the plug or valve A, while fluid is being drawn off, shall close said hole or holes; but when the valve A is turned so as to close the faucet, then these holes C, one or more of them, shall open into the upper end of the plug or cavity B, and into the adjacent part of the discharging-nozzle, thus admitting air to that point, the obvious effect of which will be to equalize the atmospheric pressure upon the fluid remaining in the discharging-nozzle of the faucet, and thus permit said fluid immediately to escape by its own gravity.

What I claim is—

1. A faucet consisting of the plug A and tube B, the latter provided with one or more vents, C, extending through its body at the juncture of the passages extending through he plug A and tube B, whereby the fluid is prevented from dripping through the air-vents, substantially as described.

2. The tube B, provided with one or more air-vents, leading from the outside air to the opening, constituting the seat for plug A, whereby the latter, when open, operates to cut off the admission of air, and when closed allows air to enter the upper portion of the chamber of said plug, substantially as described.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

WILLIAM F. CLASS.

Witnesses:
F. TOUMEY,
WILLIAM E. DONNELLY.