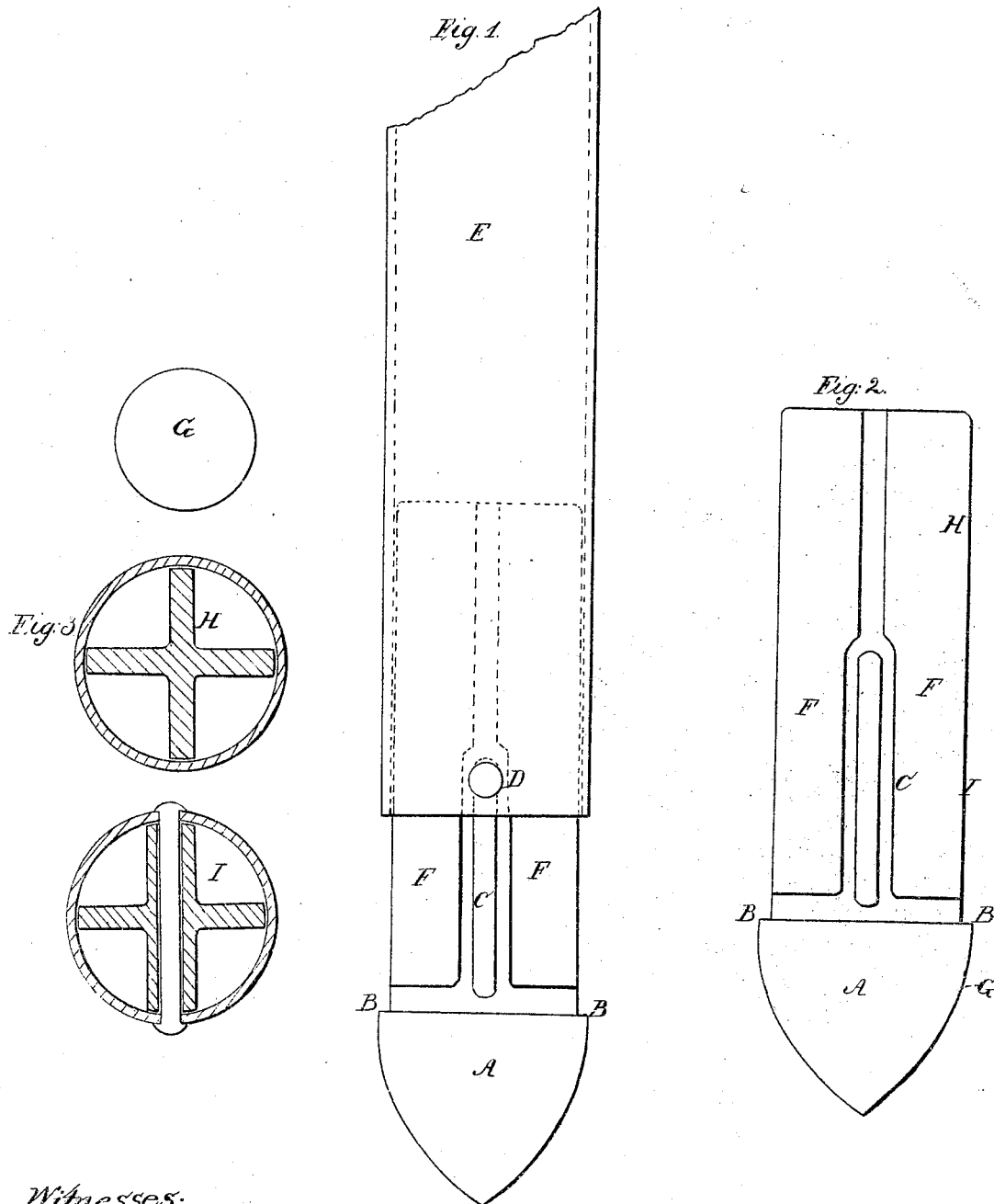


E. Huson.

Device for Opening Artesian Wells.

No 50,934.

Patented Nov. 14, 1865.



Witnesses;
A. M. Lucas
Samuel J. Parker.

Inventor;
Edgar Huson

UNITED STATES PATENT OFFICE.

EDGAR HUSON, OF ITHACA, NEW YORK, ASSIGNOR TO HIMSELF AND CHAS. D. JOHNSON.

IMPROVEMENT IN DEVICES FOR OPENING ARTESIAN WELLS.

Specification forming part of Letters Patent No. 50,934, dated November 14, 1865.

To all whom it may concern:

Be it known that I, EDGAR HUSON, of the town of Ithaca, in the county of Tompkins and State of New York, have invented an Improved Point for Sinking Artesian Wells; and I do hereby declare that the following is a full and exact description thereof, reference being had to the accompanying drawings, and to the letters of reference marked thereon, in which—

Figure 1 is a view of my point in the end of the well-tube. Fig. 2 is the point out of the tube, and Figs. 3 are sections of the point.

My object is to make a point in such a manner as to close the tube while it is sunk through clay, gravel, quicksand, objectionable veins of water, or other undesirable layers, veins, or materials, and yet be able to open the end of the tube at any distance from the surface of the earth, as well as repeatedly open and close the tube at pleasure. This I accomplish by making the point movable a certain distance, so that when the tube is driven or sunk in the power employed to sink it shall keep the tube shut, but when the sinking of the tube is stopped the retraction of the tube shall open it, or a rod let down into the tube shall press it open. When the sinking of the tube is recommenced it shall close by the first action of the power employed. To do this a shoulder is made just above the rounded or other shaped point or sharpened end, on which the tube rests and fits sufficiently tight to exclude objectionable substances; but when open the water passes in by grooves or apertures cut in that part of the point which is within the tube. The action of the point is regulated by a pin riveted to the sides of the tube and playing in

a slot cut in the point. This is seen in Fig. 1, where A is the rounded or sharpened end of the point; B, the shoulder on which the tube rests when the tube is being sunk. C is the slot in which the pin D plays, and E is the tube of the well. F F are the apertures cut in the internal portion of the point, by which the water is admitted when the point is open.

In Fig. 2 the point is represented as removed from the tube, and the parts of it just named are clearly seen.

In Figs. 3 are transverse sections of the point just described. G is a section of the sharpened end of the point. H is a section above the slot, and I a section through the slot and its pin. The places of these sections are marked on Fig. 2 by the same letters.

The slot represented in the point may be made in the tube. Other methods of regulating the opening of my point from the tube may be made; and the apertures, figured as four, may be three, five, six, or more grooves in the part of the point within the tube when closed; but these are equivalents of my invention.

The manner of use and the objects accomplished are apparent to those skilled in the art to which it appertains.

What I claim as my invention, and desire to secure by Letters Patent, is—

A tube, E, in combination with an opening point, A, to which a grooved shank, F, is attached, provided with a slot, C, all arranged and operating in the manner described.

EDGAR HUSON.

Witnesses:

A. M. LUCAS,
SAMUEL J. PARKER.