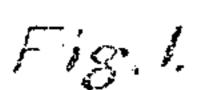
## HENRY SMITH.

## Improvement in Well Bottoms.

No. 120,216.

Patented Oct. 24, 1871.



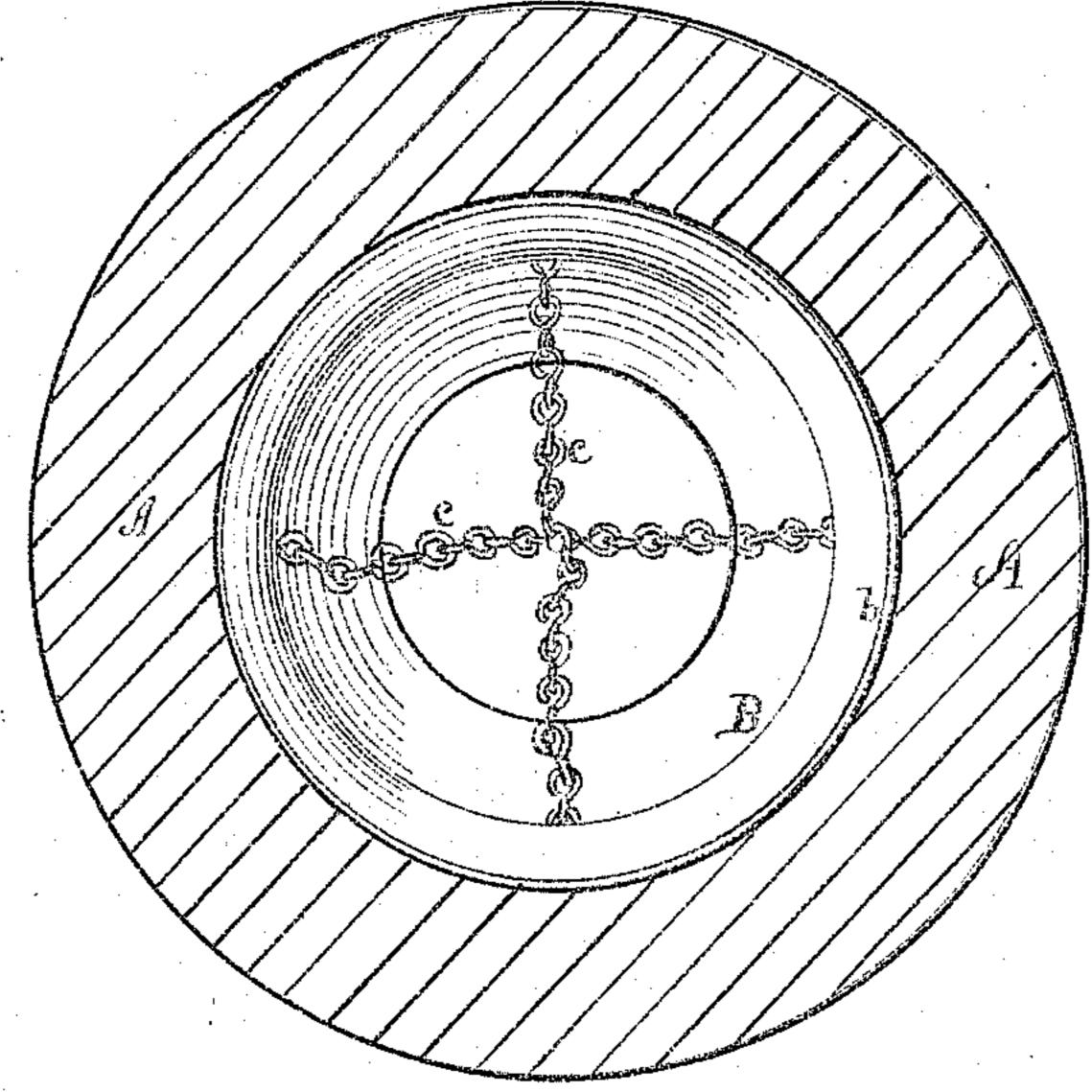
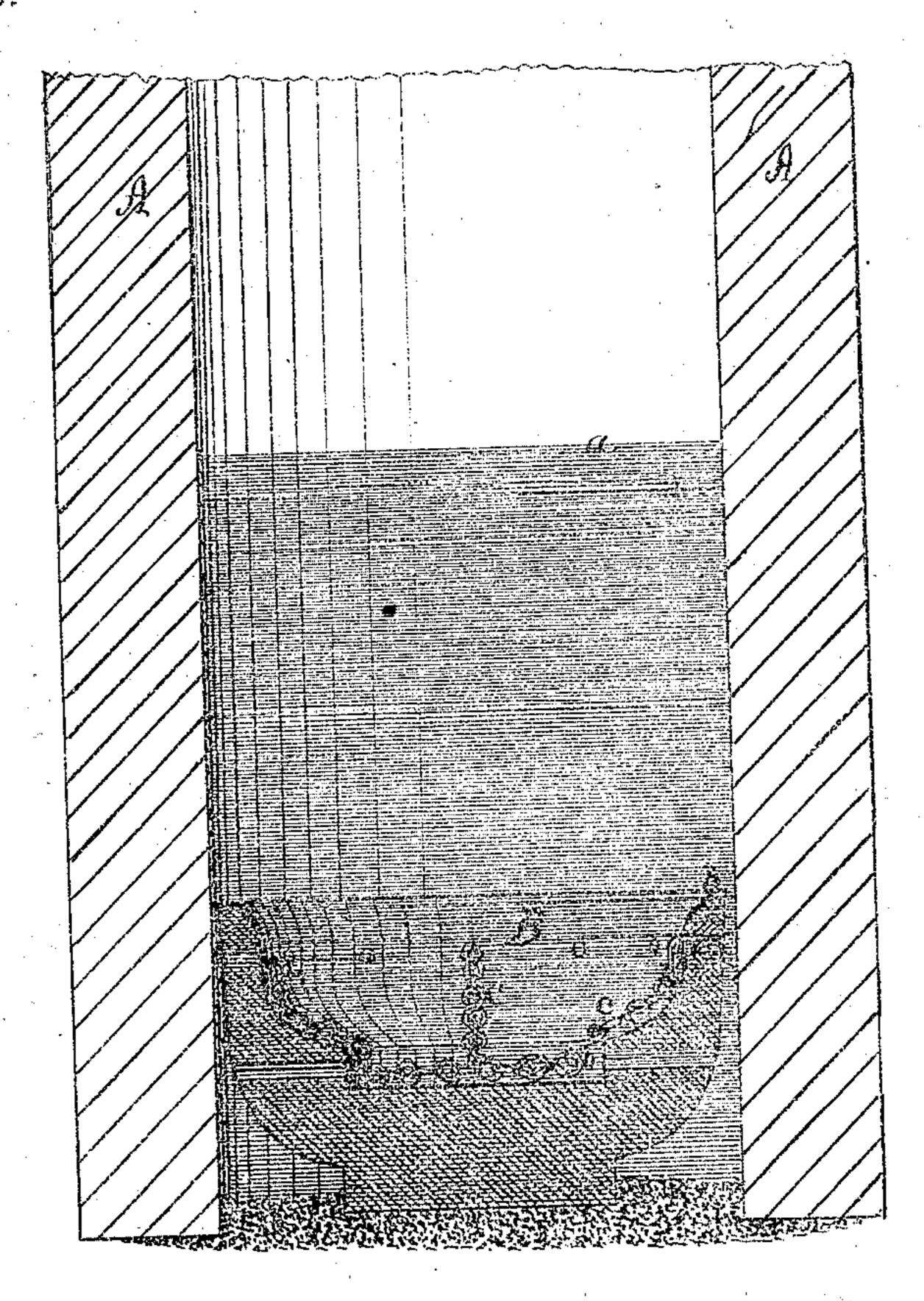


Fig. 2



Witnesses. Nettre Shepardi G. A. Olffand. Hony Smith. By James Shepard. Atty.

## UNITED STATES PATENT OFFICE.

HENRY SMITH, OF SOUTHINGTON, CONNECTICUT, ASSIGNOR TO HIMSELF AND FREDERICK SUTLIFF, OF SAME PLACE.

## IMPROVEMENT IN WELL-BOTTOMS.

Specification forming part of Letters Patent No. 120,216, dated October 24, 1871.

To all whom it may concern:

Be it known that I, HENRY SMITH, of Southington, in the county of Hartford and State of Connecticut, have invented certain new and useful Improvements in Well-Bottoms, of which the following is a specification:

My invention consists in the employment of a dishing-shaped bottom, adjusted so as to be inserted in and removed from the bottom of wells,

as hereafter described.

In the accompanying drawing, Figure 1 is a top view of the device embodying my invention, and Fig. 2 is a central vertical section of the same.

It is well known that cement tubing is now largely employed to form the walls of wells, and that the same is generally of so small a size as that it is very inconvenient for a person to enter such well to clean the bottom. It is also known that | even in cases where the well is large enough to give ample room for a person to work at its bottom, such work is an odious job, which only a few will perform, and often at exorbitant prices. To dispense with the odious and expensive operation of descending the well in order to clean it, and to furnish a means whereby a well of a small diameter can be as conveniently cleaned as can a larger one, is the object of my invention.

A designates a section of a well formed of cement tubing, but, of course, may be formed of brick or other material. The water-level is indicated at a, Fig. 2. A false and removable bottom, B, of suitable dishing form, and, if desired, perforated upon its side, is sunk into the water and rests upon the bottom of the well, as shown in Fig. 2. The rim b of the false bottom B should be of a size that will nearly fill the transverse section of the well A; but small enough so that

it may be readily raised and lowered through the same. The material of which the bottom B is formed should be earthen, galvanized iron, or some material having no deleterious properties. Two chain bails, cc, crossing each other are secured to the rim b of the bottom B, and lie closely upon the inside of the same and thus out of the way of the buckets that may be lowered and dipped in the well. When foreign substances of any kind accumulate in the well, they will, of course, settle in the false bottom B or float immediately over it. To remove such substances it is only necessary to hook up the chain-bails cc by a hook attached to a long pole, and secure said bails to a rope or chain, when, by means of the windlass used in drawing water, or other suitable device, the bottom B and all foreign matter in and over it may be lifted out of the well. After cleaning the bottom B it is restored to its place in the well, to be again lifted out when it shall be desired to clean the well. The perforations in the bottom B are not necessary, but are desirable to admit the water through the sides thereof, and to allow it to escape when the bottom is elevated. The chain-bails  $\bar{c}$  c, although desirable, may have some other device substituted therefor, without departing from or changing the nature of the false and removable bottom B.

I claim as my invention—

1. The false and removable well-bottom B, substantially as and for the purpose described.

2. The combination of the bottom B and chain bails cc, as and for the purpose described. HENRY SMITH.

Witnesses:

JAMES SHEPARD, R. A. NEAL.

(51)