R. Cornelius.

Oil Pump.

No. 55,822. Patented June 26, 1866.

Fig. 1.

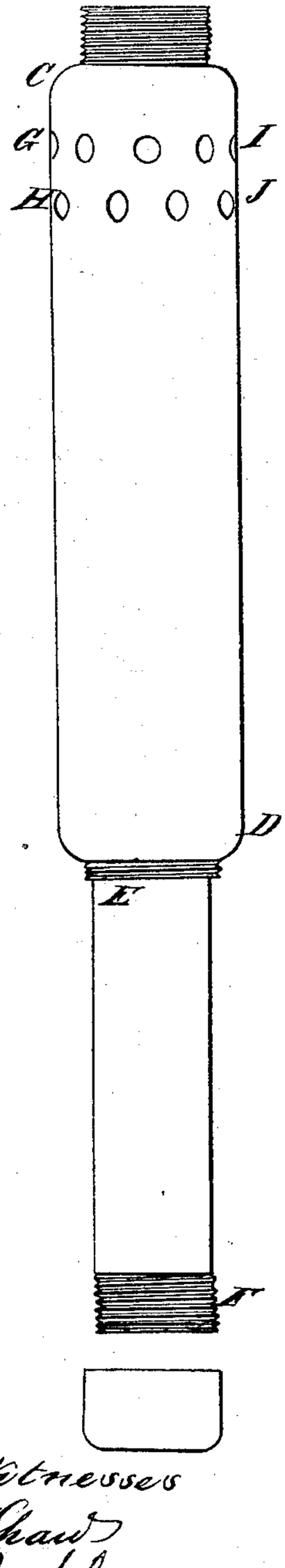
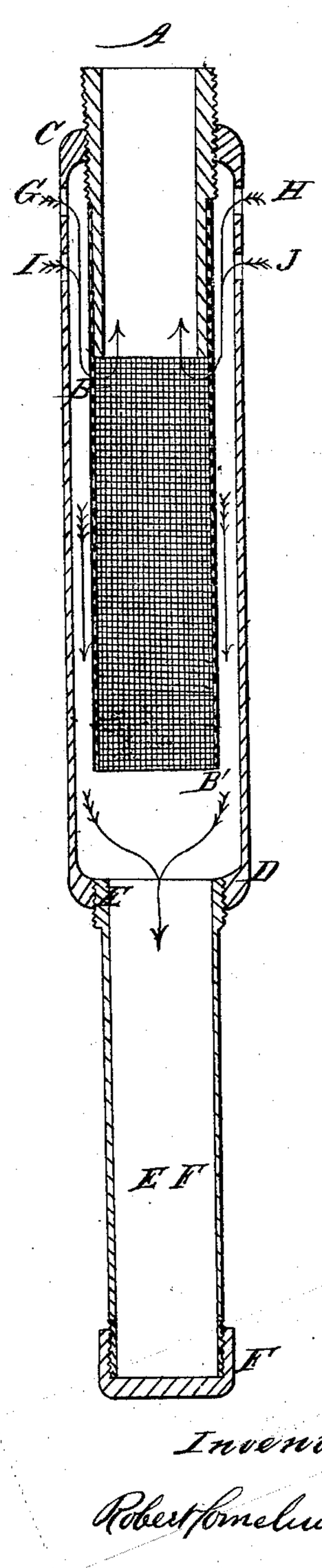


Fig. 2.



Witnesses

J. E. Shaw

Geo. Buckles

Inventor.

Robert Cornelius

UNITED STATES PATENT OFFICE.

ROBERT CORNELIUS, OF PHILADELPHIA, PENNSYLVANIA.

IMPROVEMENT IN PUMPS FOR DEEP WELLS.

Specification forming part of Letters Patent No. **55,822,** dated June 26, 1866.

To all whom it may concern:

Be it known that I, ROBERT CORNELIUS, of the city of Philadelphia and State of Pennsylvania, have invented a new and useful Improvement in the Construction of Apparatus to be Attached to Oil-Well Pumps; and I do hereby declare the following to be a full and exact description of the same, reference being had to the annexed drawings, making a part of the same, in which—

Figure 1 represents an outside view of my pump attachment. Fig. 2 is a vertical section of the same.

In the ordinary oil-well pump a quantity of débris is drawn into its interior from time to time, deranging its action.

My improvement consists in adding to the lower end of the pump a strainer to prevent this difficulty.

My appendage is to be attached to the ordinary oil-well pump and is composed as follows: A B is a cylinder or tube, two inches in diameter and five inches long, with a perforated or gauze cylinder, B B′, two inches in diameter and sixteen inches long, attached to it below. This cylinder is surrounded by a cylinder or casing, C D, somewhat larger in diameter—say two and seven-eighths inches diameter and twenty four inches long. A third cylinder, E F, two inches in diameter, projects up into C D, and is from fifteen to thirty feet long, and closed by means of a screw cap or plug at its lower extremity. Apertures G H I J are made at the upper end of C D. The upper extremity of A B is screwed onto the lower end of the ordinary pump.

The operation is as follows: The rising of the piston causes the oil from the well to pass in through the apertures G H I J and downward and inward through the cylindrical wire-gauze screen B B′ and up into the pump. Any débris will be retained on the outside of the screen B B′ and necessarily fall into the tube E F, where they will accumulate and can be removed at any time desired in quantity. Thus the débris is entirely excluded from the body of the pump and cannot impair the action of the pump.

Having thus described my improvement, what I claim is—

The combination of an outer case with apertures, an interior wire-gauze or perforated screen, and a receptacle below for the débris, substantially as described.

ROBERT CORNELIUS.

Witnesses:

J. E. SHAW,

GEO. BUCKLEY.