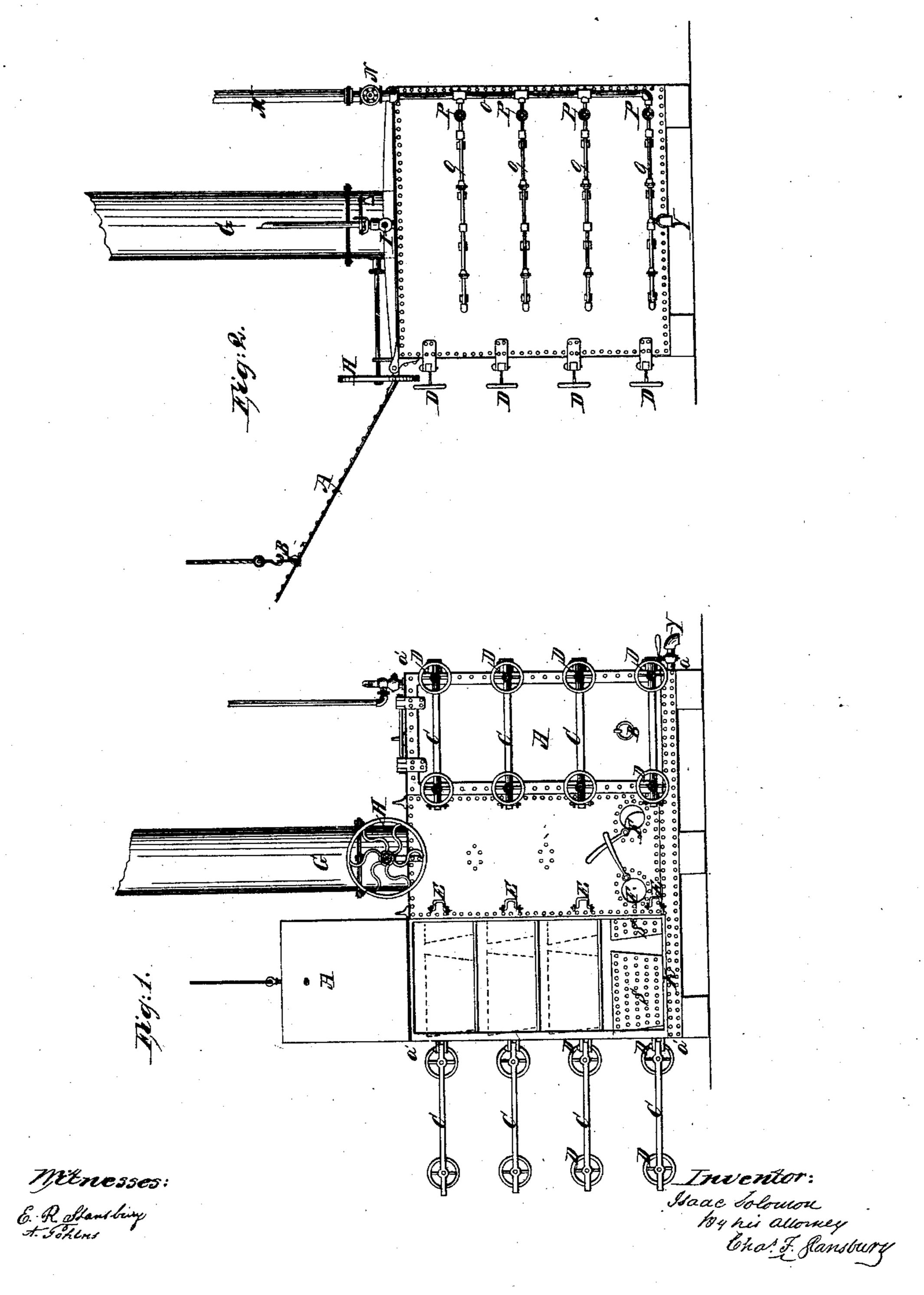
I. Solomon, 35hects. Sheet-1.

Apparatus for Steaming Dysters in the Shell.

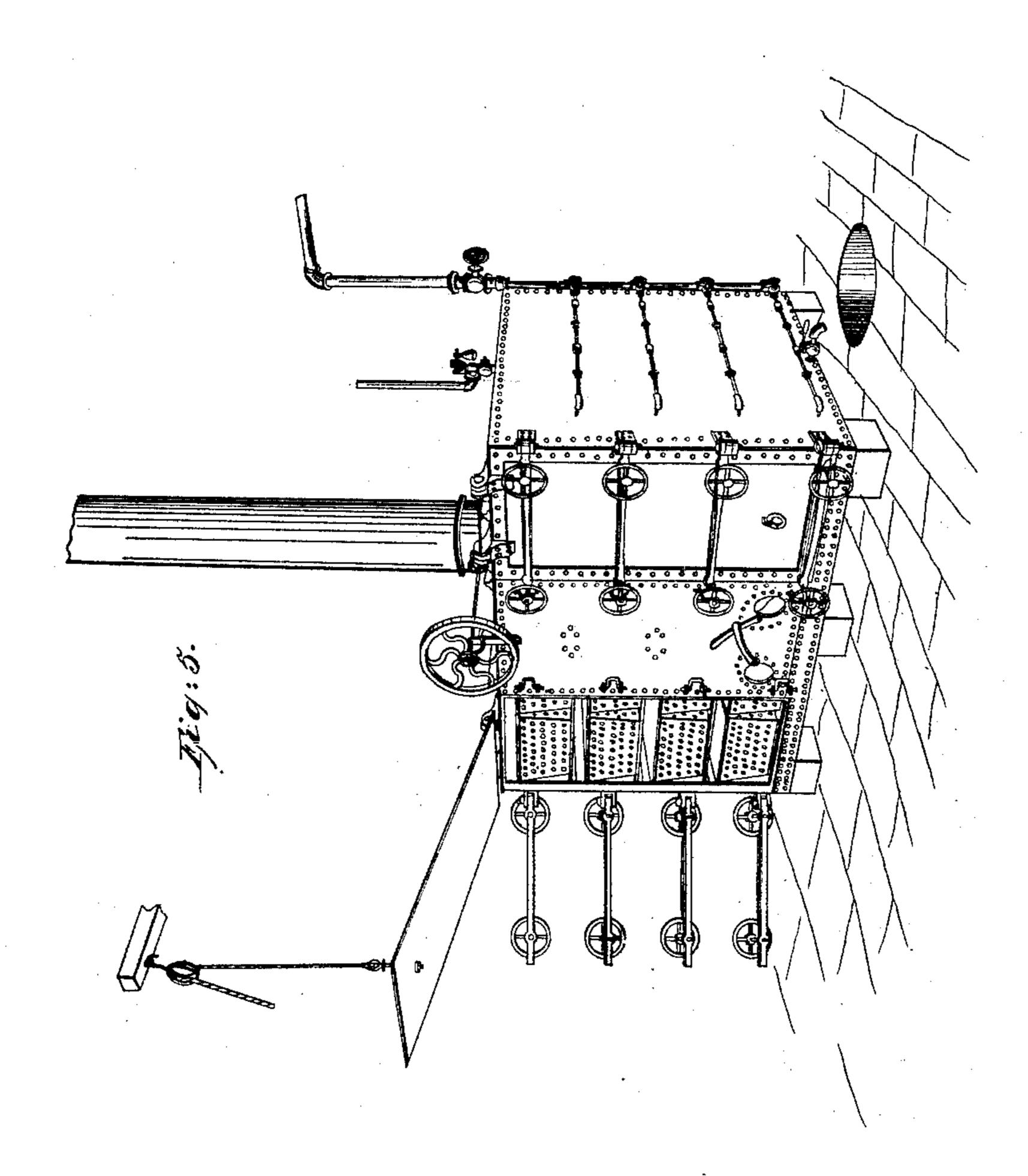
19237, 182.

Patente of Dec. 16, 1862.



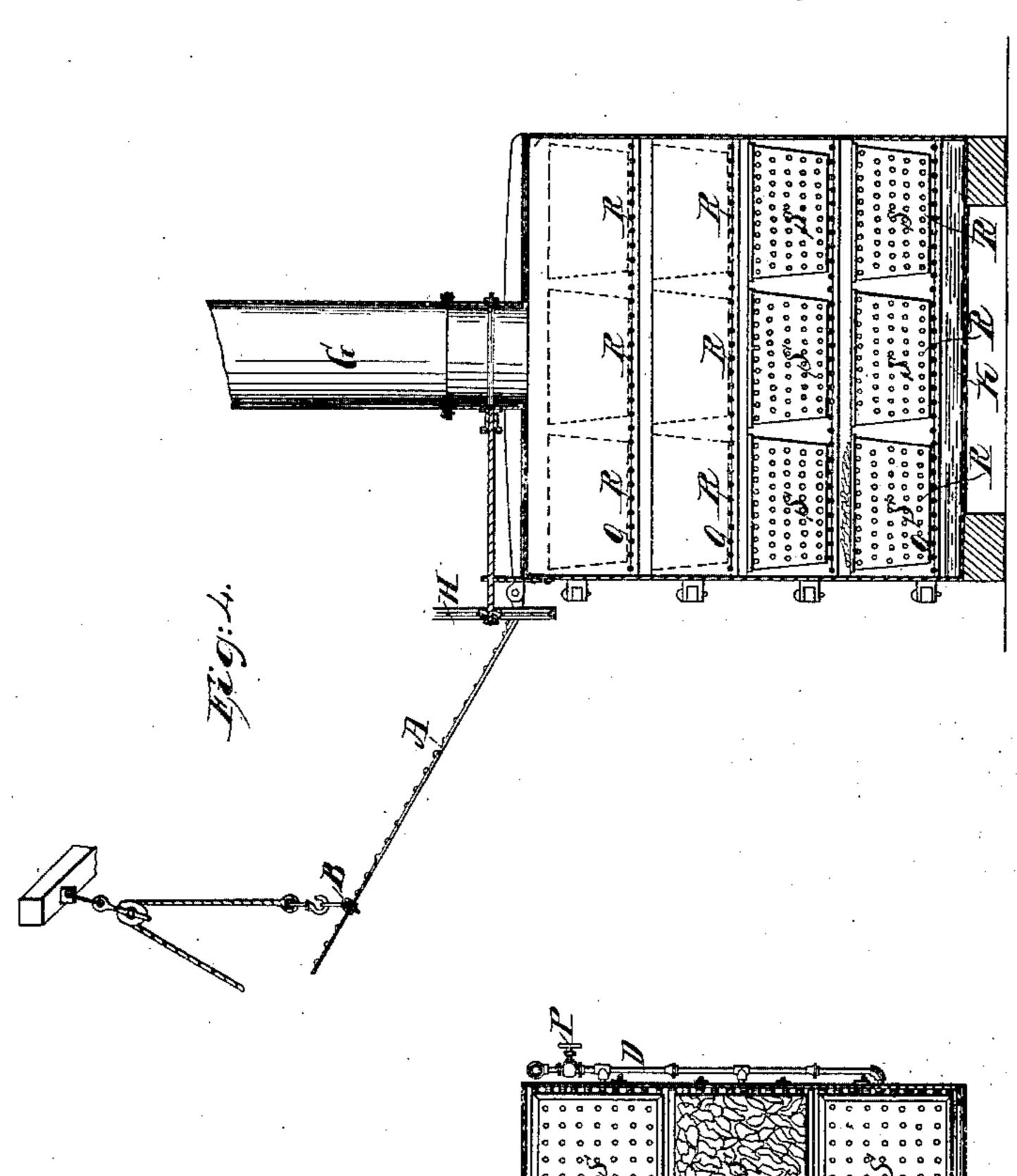
3,5 heets,5 heet 2. I. 5010111011,

Apparatus for Steaming Oysters inthe Shell.
Nº 37, 182.
Patented Dec. 16, 1862.

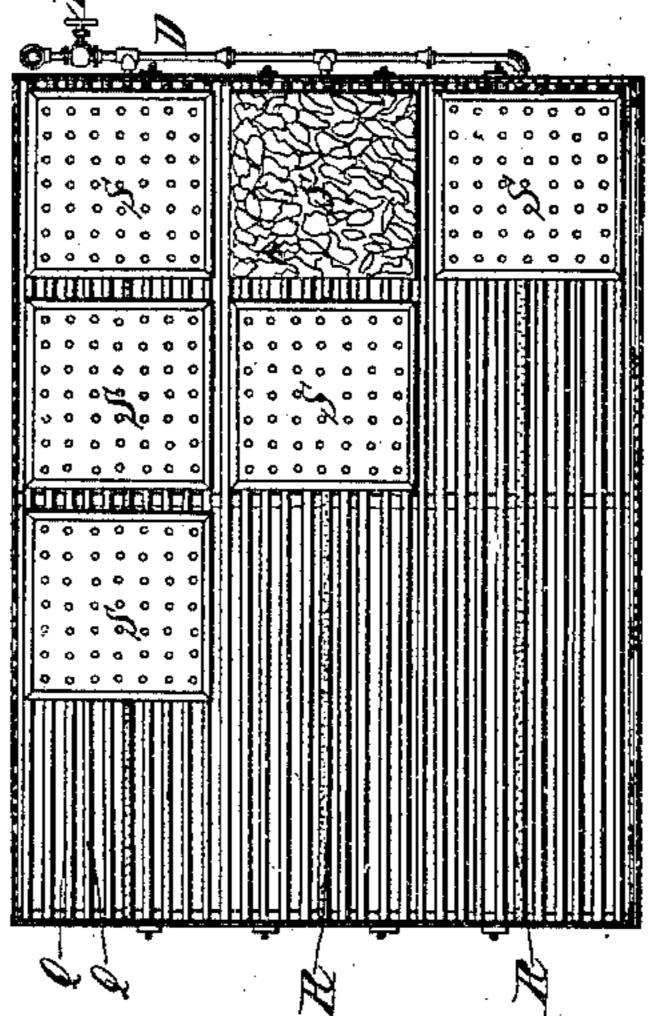


Mit resses: E. R. Hansbury S. Tihlm Jaac Solvmon By his allowing Cha! F. Jansbury

I. Solomon, Inparatus for Steaming Ousters in the Shell. I Patenteal Dec. 16, 1862.



1,69:3.



Mitnesses: 6. A. Stansbury A. Bluers Trecestor: Saac Solomon By his attorney Cha! F. Jansbury

United States Patent Office.

ISAAC SOLOMON, OF BALTIMORE, MARYLAND.

IMPROVEMENT IN APPARATUS FOR STEAMING OYSTERS IN THE SHELL.

Specification forming part of Letters Patent No. 37,182, dated December 16, 1862.

To all whom it may concern:

Be it known that I, ISAAC SOLOMON, of the city of Baltimore and State of Maryland, have invented an Improved Apparatus for Steaming Oysters in the Shell; and I do hereby declare the following to be a full and correct description of the same, reference being had to the accompanying drawings, in which—

Figure 1 is a front view of the apparatus with one door open. Fig. 2 is a side elevation; Fig. 3, a plan; Fig. 4, a central vertical section from front to rear, and Fig. 5 a perspective view of the apparatus complete.

Where the same part occurs it is marked by the same letter of reference in all the figures.

My invention consists in the peculiar construction, arrangement, and combination of parts, hereinafter more fully described, forming an apparatus for steaming oysters in the shell, whereby the operation is more perfectly under control and attended with less loss of heat and steam and less discomfort to the operator, while at the same time a saving is effected of all the liquor of the oyster, which by the present methods is wholly lost, all as hereinafter more fully set forth.

To enable others to make and use my improved apparatus, I will proceed to describe its construction and operation, referring to the accompanying drawings.

The body of the apparatus consists of a large cubical receiver, a' a' a' a', made of boileriron riveted together steam-tight, and provided with doors A, hinged at their upper edge and opening from below upward, as seen in the drawings. These doors have each a ring, B, attached, to which a chain or cord can be fastened for the purpose of raising them up out of the way, as shown in Figs. 4 and 5, where the cord is represented as passing through a pulley suspended from a beam overhead. To retain these doors firmly in place when closed and enable them to resist internal pressure, they are supported each by four hinged arms, C, attached to the angle of the receiver. (See Figs. 1 and 5.) Through these arms pass the clamp-screws D. The hooks E receive the free ends of the arms C and confine them when they are closed over the doors A, as shown in Figs. 1 and 5. The clamp-screws D are then applied to force the doors firmly against their bearings in such a manner as to be steamtight.

F F mark air-valves placed near the bottom of the receiver, and operated by projecting handles, as shown. G is the steam-escape pipe leading from the top of the receiver, and controlled by a valve, g, operated by the wheel H. (See Fig. 4.)

I marks the safety-valve, arranged in the same manner as that of an ordinary steamboiler. K is the receptacle for the liquor which escapes from the oysters during the steaming process, and L the cock for drawing off the same.

M marks the steam-supply pipe leading from the steam-boiler, and N the throttle or regulating-valve to the same. O marks the branch steam-supply pipes leading to the shelves of the receiver, and P the regulating-valves of these pipes. (See Figs. 2, 3, and 5.)

The receiver a' a' a' a' is provided with shelves Q, formed of iron bars and of perforated iron tubing R, the latter connected with the steam-pipes O. The perforations in the tubes R are about an inch apart, and are so placed in their sides as to throw the steam out in jets inclining upward.

S marks the metallic baskets for holding the oysters to be operated on. These are formed of galvanized iron, and are perforated with three-fourth-inch holes to allow of the free passage of steam. Their sides are inclined in the manner shown in Figs. 4 and 5, for the purpose of allowing a free passage for steam between and around them.

Operation: The baskets S are filled with oysters in the shell and placed on the shelves of the receiver, twelve on each shelf. The doors A are then let down and closed, and made perfectly air-tight by means of the arms C and clamp-screws D. The valves F and H are also closed. Steam is now admitted through main supply-pipe M and smaller supply-pipes O, its distribution in the apparatus being governed by the valves P. The steaming is continued as long as may be required to perfect the cooking of the oysters, when the steam is shut off and the escape and air valves opened. The steam in the receiver is thus carried off into the open air instead of escaping into the operating-room. The doors are now opened and the baskets of oysters removed and re-

placed by others for a renewal of the operation. The liquor is drawn off from the trough in the bottom of the receiver through cock L.

The apparatus here represented is designed to contain forty-eight baskets, each containing one bushel and three pecks of oysters. As it can be replenished every twenty minutes, it is capable of steaming one thousand bushels of oysters per day.

Having thus fully described my invention, what I claim, and desire to secure by Letters

Patent of the United States, is-

1. The combination and arrangement, in an apparatus for steaming oysters, of the receiver a' a' a' a', constructed substantially as described, with the steam-supply pipes, valves, and perforated shelf-tubes, constructed and arranged for conjoint operation in the manner set forth.

2. In an oyster-steaming apparatus, the combination of the steam-tight doors A, constructed and operating substantially as set forth, with the air-valves F and steam-escape valve, arranged and operating as and for the purpose described.

3. The employment, in an oyster-steaming apparatus, of a receiver at bottom for the reception and preservation of the liquor from the oysters, to be drawn off for use, as described.

The above specification signed and witnessed this 30th day of April, A. D. 1862.

ISAAC SOLOMON.

Witnesses:
CHAS. F. STANSBURY,
JOHN P. HAMLIN.