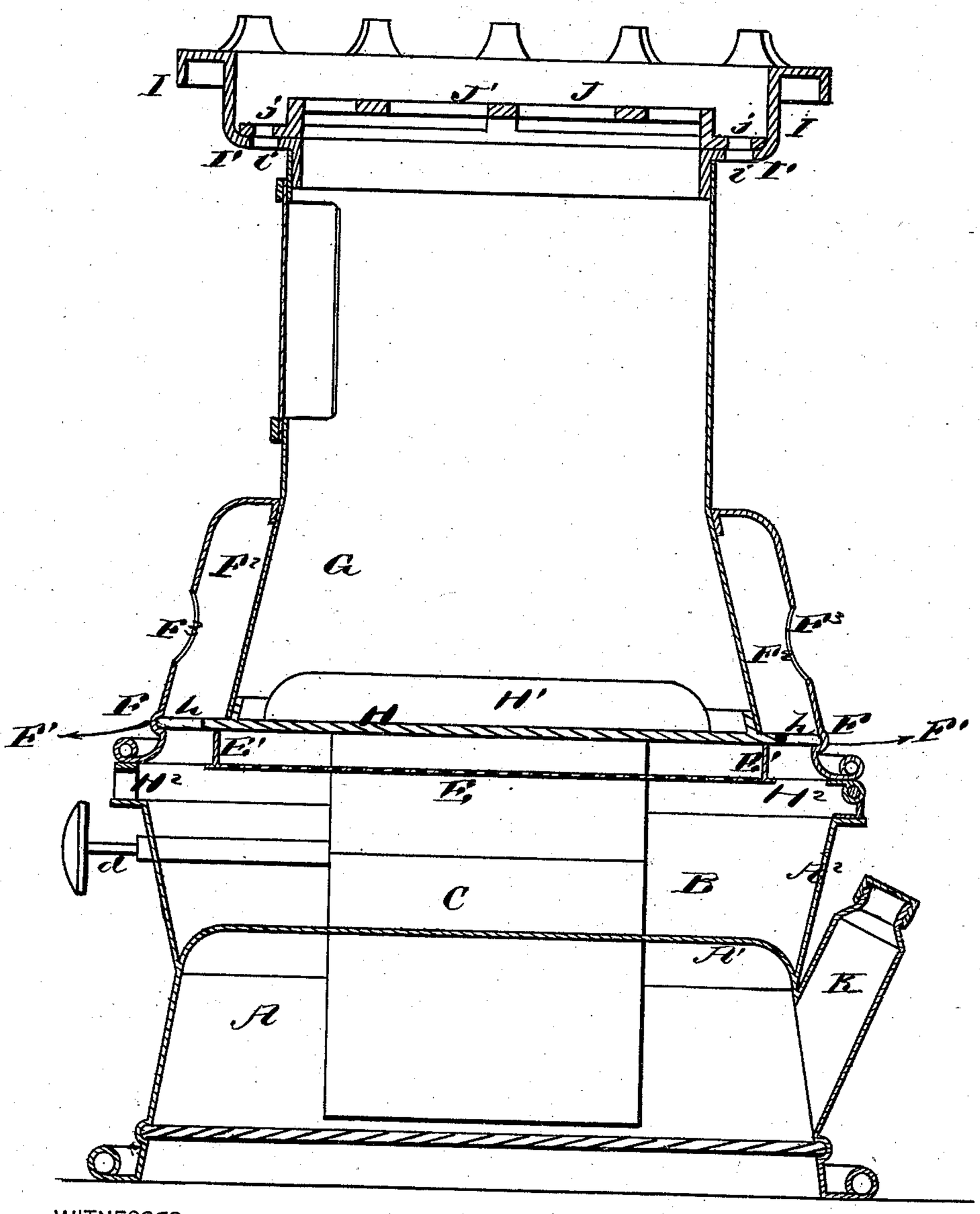
3 Sheets—Sheet 1.

J. H. SHAUT.

OIL BURNING STOVE.

No. 190,084. Patented April 24, 1877.

Fig. 1.



WITNESSES

E. H. Bates

George E. Upham

INVENTOR.

James H. Shaut

Gifford, Smith & Co.

ATTORNEYS.

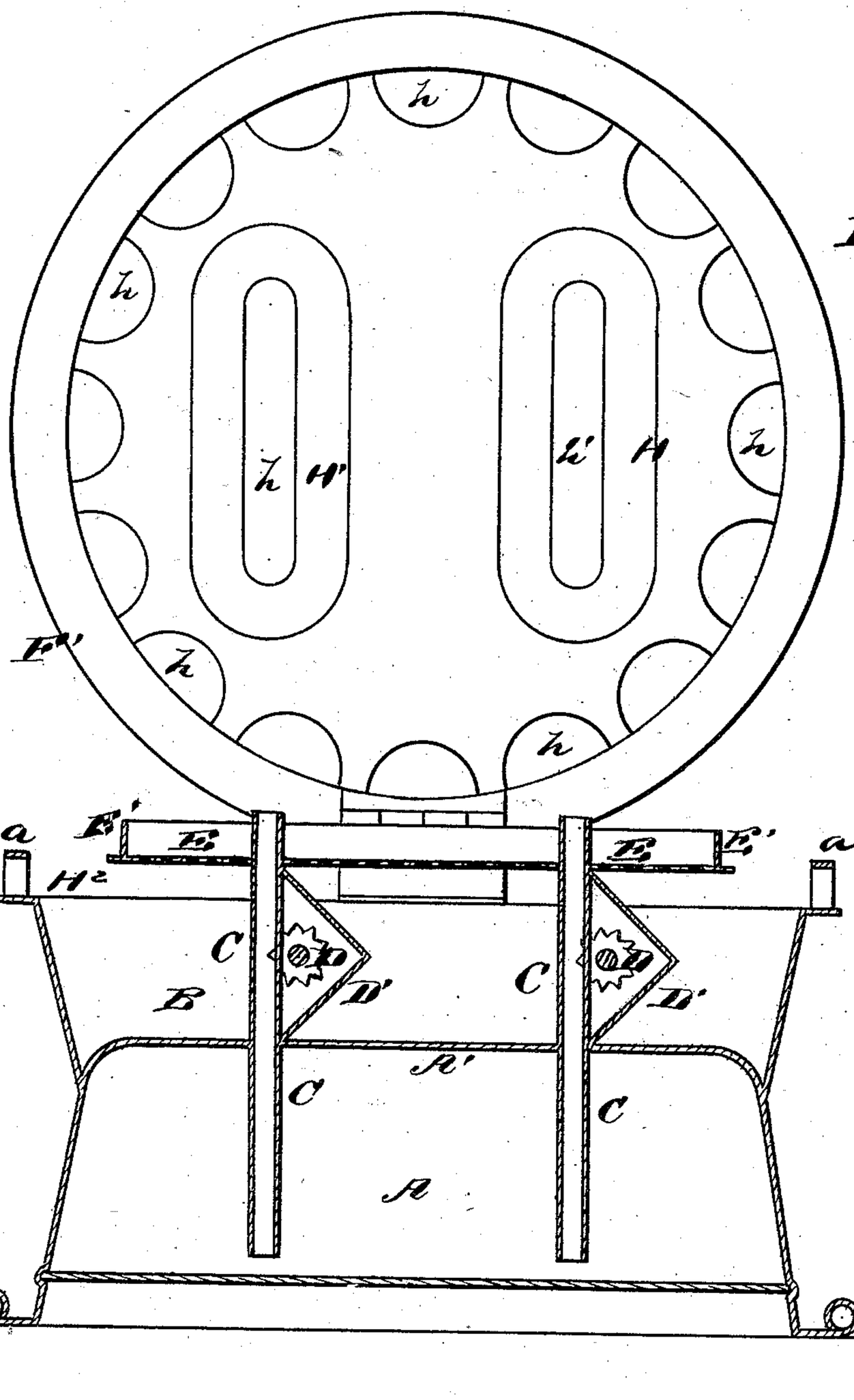
3 Sheets—Sheet 2.

J. H. SHAUT.

OIL BURNING STOVE.

No. 190,084. Patented April 24, 1877.

Fig. 2.



WITNESSES

E. H. Bates

George E. Upham

INVENTOR.

James H. Shaut.

Filmore, Church & Co.

ATTORNEYS.

3 Sheets—Sheet 3.

J. H. SHAUT.

OIL BURNING STOVE.

No. 190,084. Patented April 24, 1877.

Fig. 3.

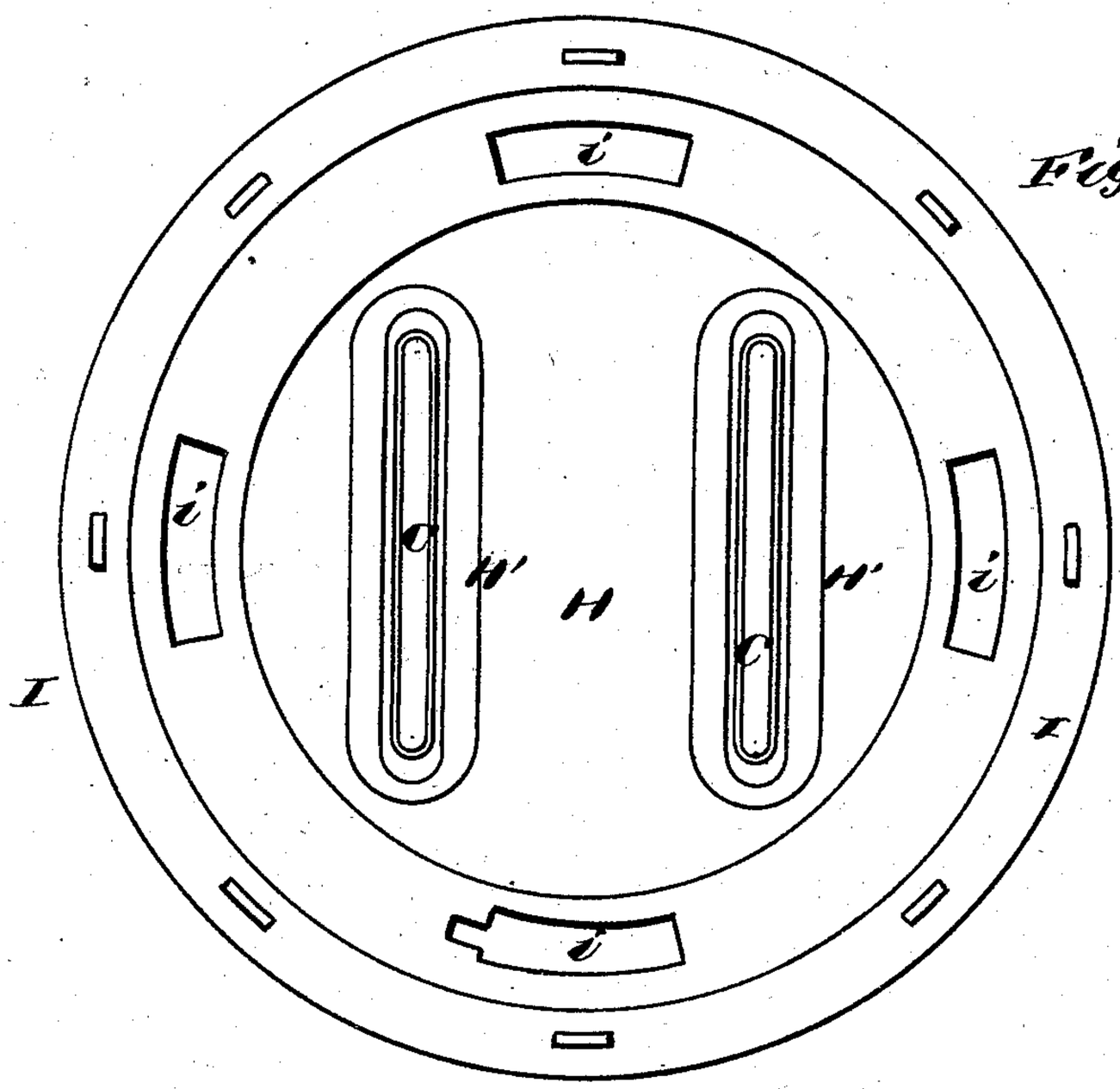
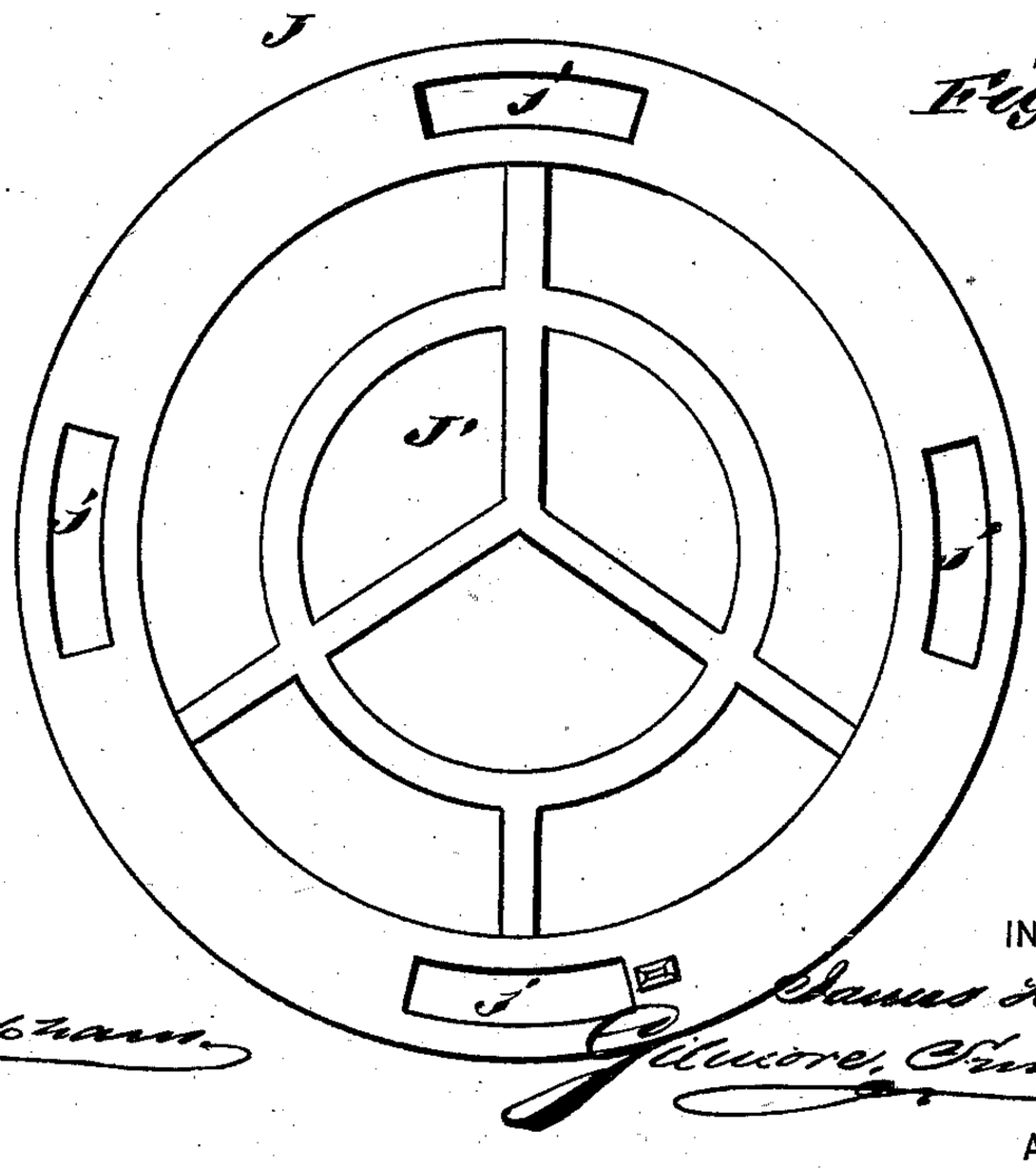


Fig. 4.



WITNESSES

E. H. Bates

George E. Upham

INVENTOR.

James H. Shaut.

Gilmore, Smith & Co.

ATTORNEYS.

UNITED STATES PATENT OFFICE.

JAMES H. SHAUT, OF HORNELLSVILLE, NEW YORK.

IMPROVEMENT IN OIL-BURNING STOVES.

Specification forming part of Letters Patent No. **190,084**, dated April 24, 1877; application filed March 24, 1877.

To all whom it may concern:

Be it known that I, JAMES H. SHAUT, of Hornellsville, in the county of Steuben and State of New York, have invented a new and valuable Improvement in Oil-Burning Stoves; and I do hereby declare that the following is a full, clear, and exact description of the construction and operation of the same, reference being had to the annexed drawings, making a part of this specification, and to the letters and figures of reference marked thereon.

Figure 1 of the drawings is a representation of a central vertical section, and Fig. 2 a central sectional view with the top thrown back. Fig. 3 is a plan view of my oil-stove, and Fig. 4 a plan view of the damper.

This invention relates to stoves in which oil is used as fuel; and it consists in certain devices for preventing the ignition of the oil in the reservoir; also, in certain devices for regulating the draft, as will be hereinafter more fully set forth.

In the accompanying drawings, A designates an oil-receptacle, which also serves as the base of my stove. The said receptacle is provided with a closed top, A^1, and a flaring rim, A^2, which incloses a water-chamber, B, that surrounds the upper parts of wick-tubes C C. Said tubes pass up through said top A^1, and down nearly to the bottom of oil-receptacle A. The wicks are adjusted up or down by feeding-ratchets D, carried by rods *d*, that have their outer bearings in said rim A^2, and are provided with knobs for convenience in rotating them. Said ratchets are protected by small casings D′, attached to said tubes C. The said wick-tubes C C support a horizontal disk, E, of perforated metal or wire gauze, which has a raised annular flange, E′. The upper edge of said flaring rim A^2 is provided with raised pieces *a*, which support a cap or casing, F, that is hinged to said rim. The central part of said cap is open, so that the cylindrical stove-body G passes up through the same. The bottom of said stove-body is formed by a casting, H, which has draft-openings *h* in or near its circumference, and openings *h′*, guarded by raised cones H^1, for the upper ends of the wick-tubes C.

Said cap F has an annular inward flange or shoulder, F^1, that supports the edge of said casting H, and the said cap incloses an annular space, F^2, surrounding the flaring lower part of said stove-body G. Said cap is also provided with a number of openings, F^3, which allow a draft to pass through space F^2, and perforations *h* at the bottom thereof, so as to cool casting H. The draft proper of the stove is through opening H^2, between rim A^2 and cap F, and up through the perforated bottom of disk-partition E. The flange or rim E′ of said partition separates these two drafts. The cooling of said casting by the draft through openings F^3 and *h* prevents the oil from being unduly heated, and enables me to dispense with the water in chamber B. The water may, however, be used as an additional safeguard, as already stated.

On the top of stove-body G sets a top piece or casting, I, consisting of a flat annular bottom, I^1, extending horizontally beyond said stove-body, and a small cylindrical side piece, I^2. Said annular bottom I^1 has openings *i*, and supports a damper, J, which has registering openings *j*, and a raised central part, J′. This raised part consists of several flat bars, which form a grating at the top of the stove, and support the "furniture" thereof, or the frying-pan or other article of cookery used therewith at any time. This construction of the damper and top piece allows any size of furniture to be used with said stove, since, when the openings *i* and *j* are made to coincide, there will always be a draft up through the furniture, even when the entire interior of said casting or top piece I is filled thereby.

Said oil-reservoir A is filled through an inlet-tube, K. By extending the wick-tubes C nearly to the bottom of said reservoir (the wicks being allowed to hang below said tubes) the coolest stratum of oil is continually used for fuel, and all danger of explosion by the ignition of gases through the wick is obviated.

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

1. The combination, substantially as herein described, of the hinged cap F, the central portion of which is open to receive the stove-body G, and provided with a shoulder, F^1, and a series of openings, F^3, and the stove-bottom H, having draft-openings *h* near its circumference, the said stove-body G and cap F form-

ing a space, F^2, as and for the purpose set forth.

2. The combination, with the casting H and perforated cap or casing F, of stove-body G and perforated disk or partition E, having raised rim E′, substantially as and for the purpose set forth.

3. The combination of top piece I, having openings *i*, with damper J, having raised grate J′, and openings *j*, substantially as and for the purpose set forth.

In testimony that I claim the above I have hereunto subscribed my name in the presence of two witnesses.

JAMES H. SHAUT.

Witnesses:
J. M. WEST,
C. ADSIT.