J. H. HUME.

FURNACE.

APPLICATION FILED DEC. 1, 1917.

1,338,136.

Patented Apr. 27, 1920.

2 SHEETS—SHEET 1.

FIG. 1.

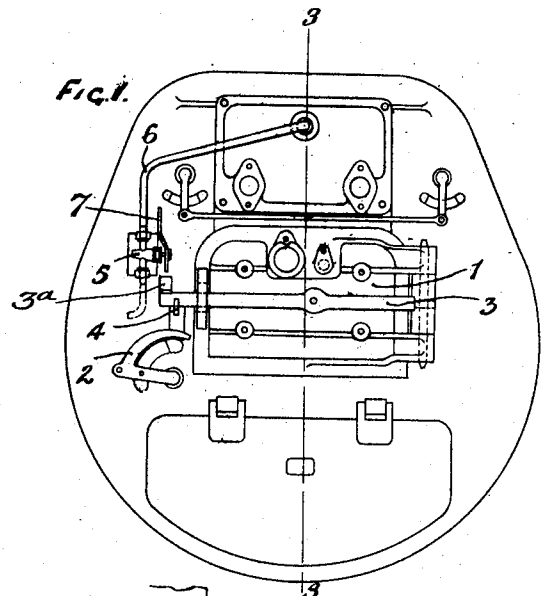
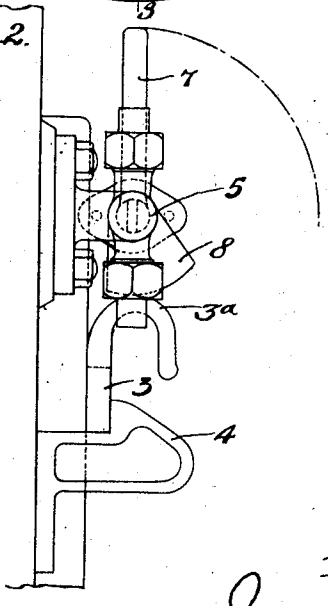


FIG. 2.



Inventor:
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2 SHEETS—SHEET 2.

FIG. 3.

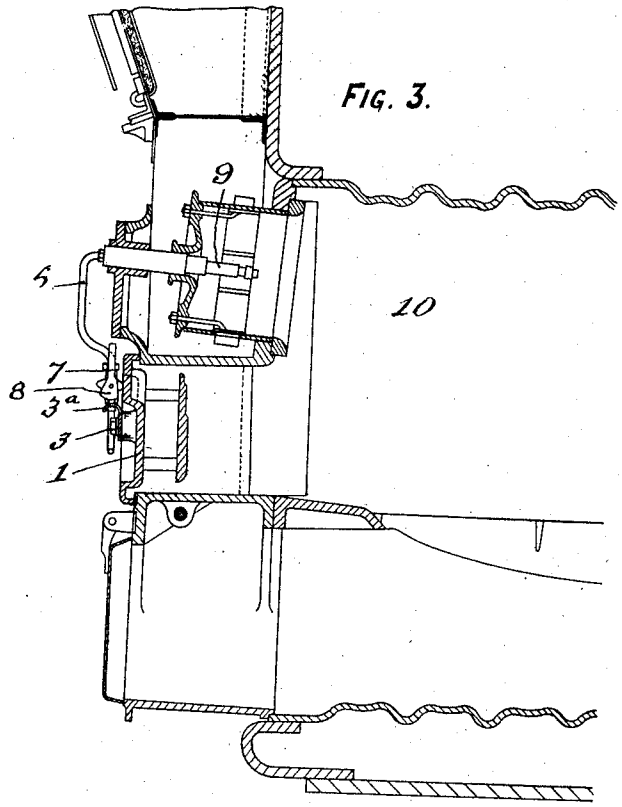
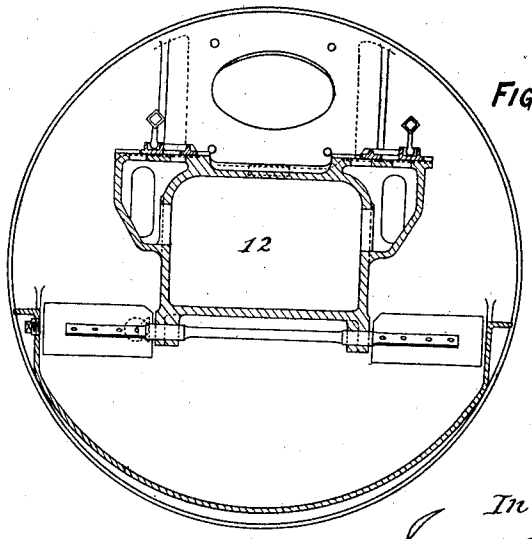


FIG. 4.



Inventor:
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UNITED STATES PATENT OFFICE.

JAMES HOWDEN HUME, OF GLASGOW, SCOTLAND, ASSIGNOR TO JAMES HOWDEN & COMPANY, LIMITED, OF GLASGOW, SCOTLAND, A COMPANY INCORPORATED AND REGISTERED UNDER LAWS OF GREAT BRITAIN AND IRELAND.

FURNACE.

1,338,136. Specification of Letters Patent. Patented Apr. 27, 1920.

Application filed December 1, 1917. Serial No. 204,819.

To all whom it may concern:

Be it known that I, JAMES HOWDEN HUME, a subject of the King of the United Kingdom of Great Britain and Ireland, and residing at Glasgow, Scotland, have invented a certain new and useful Improvement in Furnaces, of which the following is a specification.

This invention relates to improvements in furnaces, more particularly to furnaces operating on forced draft and adapted for burning oil only or coal only or both coal and oil and has for its object to provide an improved arrangement which insures that the oil fuel supply shall be cut off before the furnace door can be opened.

According to the invention, an interfering connection is interposed between a movable latch member on the furnace door and an oil cock fitted to the oil supply pipe.

The invention is illustrated in the accompanying drawing in which Figure 1 is an elevation of a furnace front fitted with the present improvements; Fig. 2 is a detail view at right angles to Fig. 1.

Fig. 3 is a central vertical section on line 3—3, Fig. 1.

Fig. 4 is a transverse section just back of the front plate of the furnace.

Referring to the drawings, 1 denotes the furnace door hinged to the furnace front and adapted to be locked in closed position by means of a latch element 2 movable from the position shown into a position in which it obstructs the opening movement of the door.

Mounted on the door 1 is a pivoted latch member 3 engageable with a stationary catch 4 and adapted to be lifted when the door is to be opened.

5 denotes a cock in the oil pipe 6 which leads to an oil burner 9 mounted in a chamber communicating with the combustion chamber 10.

Fitted to the handle 7 of the turning oil cock 5 is a depending extension 8 which, when the cock is in open position, obstructs the latch member 3 by engaging a part 3^a on said latch member and thus prevents the same from being lifted to open the furnace door, the extension 8 being so dimensioned that the path of the latch member 3 is cleared of obstruction only after the cock has been turned to closed position.

The part 3^a is on the latch member 3 and extends upward therefrom.

What I claim is:—

In a furnace, in combination with the furnace door, a pivoted latch member on the door, a catch to be engaged by said latch member, a fuel oil supply pipe for the furnace, a turning oil cock fitted to said pipe, a handle for turning said cock, and a depending extension connected to and movable with said cock and arranged to lock said latch member in its catch when said cock is turned to open position.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

JAMES HOWDEN HUME.

Witnesses:

HENRY MASON,

FLORENCE HOUSTON.