

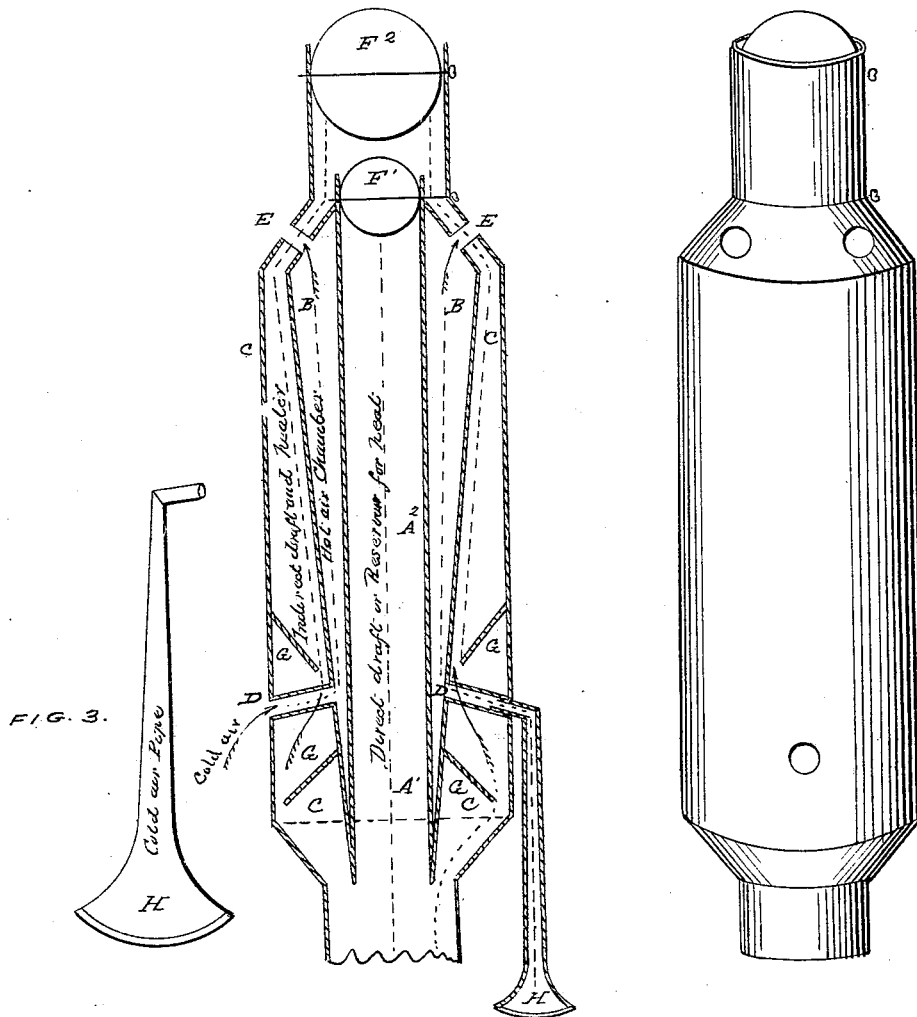
J. C. PAINE.
Stove Pipe Drum.

No. 48,716.

Patented July 11, 1865.

FIG. 1.

FIG. 2.



WITNESSES:
Austin Adams
Geo B Rand

INVENTOR.
Joseph C Paine

UNITED STATES PATENT OFFICE.

JOSEPH C. PAINE, OF DUBUQUE, IOWA.

IMPROVEMENT IN STOVE-PIPE DRUMS.

Specification forming part of Letters Patent No. 48,716, dated July 11, 1865.

To all whom it may concern:

Be it known that I, JOSEPH C. PAINE, of Dubuque, county of Dubuque, State of Iowa, have invented an Improvement in Stove-Pipe Drums; and I do hereby declare that the following specification is a full and exact description of the same, reference being had to the accompanying drawings, and to the letters of reference marked thereon.

A' is the direct draft through the center of the cone A².

B'' B'' is the air-chamber, which is supplied from D'' D'', cold-air tubes or pipes near the lower extremity of the cone, this air constantly being thrown off into the room at tubes E'' E'', at the upper extremity of the cone, about 150° hotter than when it is received into the chamber.

C'' C'' is the indirect draft, passing upon the outer surface of the cone and upon the inner surface of the drum.

The double deflectors G'' G'', one upon the cone below the tubes D'' D'', the other upon drum above the same, serve to check the heat before it passes off, (when the damper F' is

closed in direct draft,) which is spent immediately upon the cone or surface of the chamber and pipes D'' D'', thus rendering the air more highly heated before it escapes into the room. F², the upper damper, shuts off all draft, and thus stops the heat from passing off through the main pipe, which, being kept or retained within the drum, must be thrown out into the room.

By the use of this invention more than double the heat is obtained from the same amount of fuel than by any other stove-damper in use.

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

The combination of cone A² within the drum with the hot-air chamber B'' B'', the tubes or pipes D'' D'' and E'' E'', the double deflectors G'' G'', and the double damper F' F², for the purpose and in the manner set forth.

JOSEPH C. PAINE.

Witnesses:

AUSTIN ADAMS,
G. B. RAND.