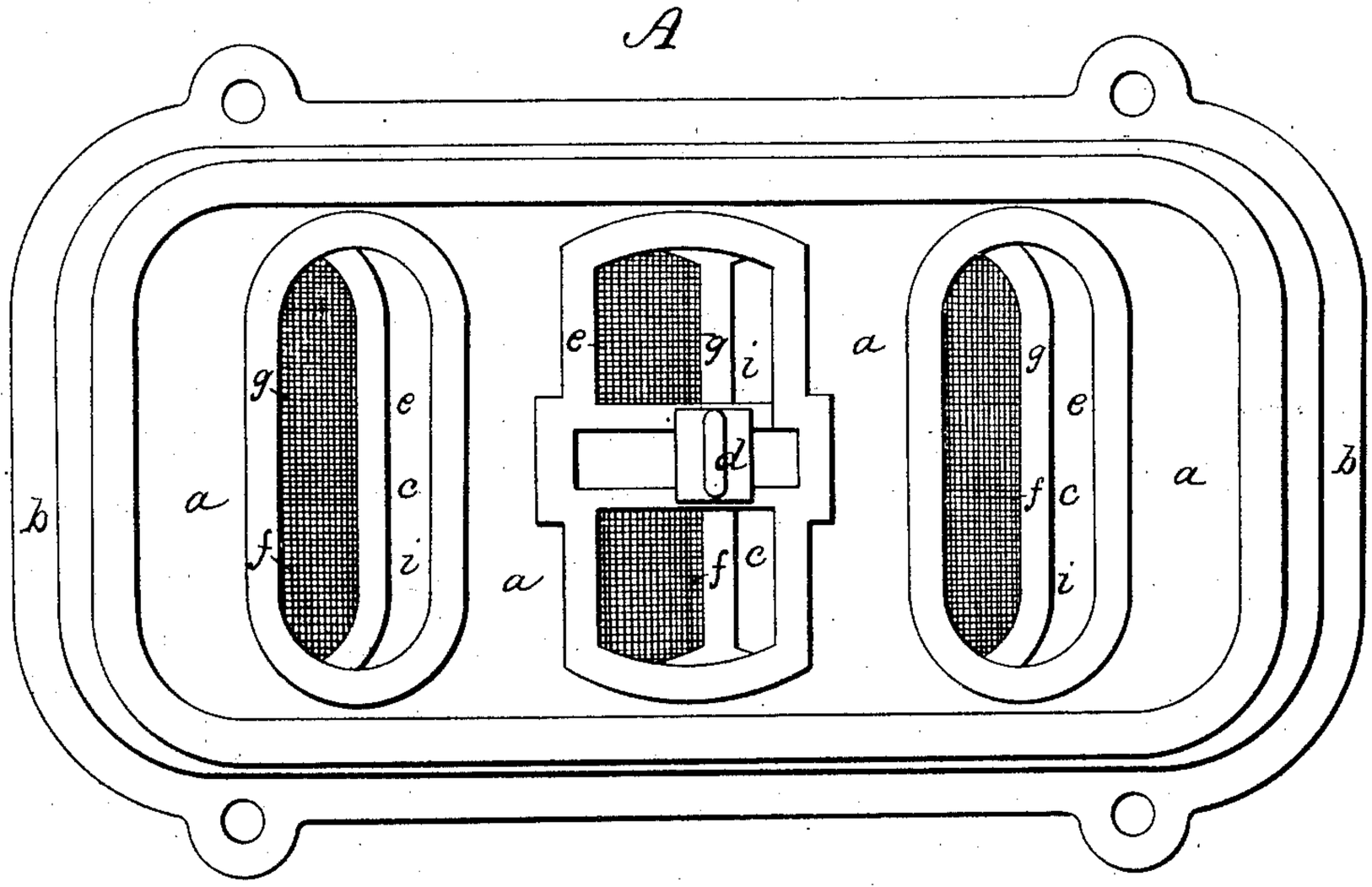
G. W. Walker.

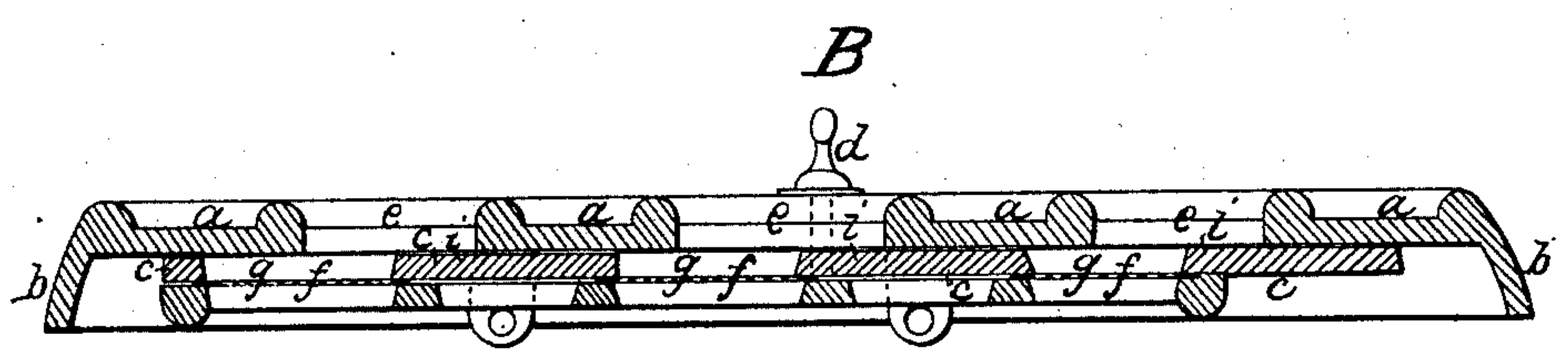
Damper.

No. 55,751. Patented Jun. 19, 1866.

A



B



Witnesses.

J. B. Kidder
M. W. Frothingham

Inventor.

Geo. W. Walker
by his Attys.
Crosby & Gould

UNITED STATES PATENT OFFICE.

GEORGE W. WALKER, OF BOSTON, MASSACHUSETTS.

IMPROVEMENT IN STOVE-DAMPERS.

Specification forming part of Letters Patent No. **55,751**, dated June 19, 1866.

To all whom it may concern:

Be it known that I, GEORGE W. WALKER, of Boston, in the county of Suffolk and State of Massachusetts, have invented an Improvement in Stoves; and I do hereby declare that the following, taken in connection with the drawings which accompany and form part of this specification, is a description of my invention sufficient to enable those skilled in the art to practice it.

The improvement relates to the application of gauze or perforated plate to the draft-openings of stoves, and whether applied to the ash-pit or fire-pot doors thereof or to register-slides; and the invention consists in such application of the perforated plate as will permit the passage of air through the plate to be regulated or shut off entirely, as may be deemed desirable.

As perforated plates are usually applied to stoves for admitting minute currents of air for the support of combustion of fuel they are always open for the passage of air; and though in many forms of such application it is generally considered advisable by manufacturers to always maintain such open passage, to keep up a slow degree of combustion, yet it will be found that in use there are always times and circumstances under which it is necessary to close such openings, either to prevent the admission of air to the fuel or the expulsion of gases from the stove.

In my improvement I employ the perforated or foraminous plate or gauze, to admit the air in finely-divided jets, (and to permit the live coals to be seen through the plate, as through mica;) but I make provision for regulating the extent of such openings and to close them entirely when it may be necessary.

The drawings represent a register-plate for a stove with my invention embodied therein, A showing a front view, and B a horizontal section, of the same.

a denotes the plate, having a flange, *b*, which abuts against the face of the stove and surrounds an opening into the same. The flange forms a recess, in which is contained a register-slide, *c*, which is applied to the rear surface of the plate *a*, and is slid laterally to and fro by a knob or finger-piece, *d*. The plate *a* is provided with openings *e* for entrance of air, and the slide *c* has corresponding openings *f*, which, however, are covered by gauze or foraminous plate *g*, so that when the two sets of openings in the plate *a* and slide *c* are brought opposite to each other air can enter the stove through them by passing through the perforations. By moving the slide *c* from this position the solid parts *i* of said slide are brought more or less opposite to the openings *e*, as seen in the drawings, from which it will be obvious that the extent of foraminous (air-entering) surface may be regulated as circumstances may require, or that the openings *e* may be closed entirely when desirable.

The perforated plate or gauze *g* is shown as applied to and so as to move with the slide *c*; but it will be obvious that it may be applied directly to the stationary plate *a*, or in such manner as not to move with the register-slide.

I claim—

In combination with a foraminous plate or gauze through which air is admitted at the front of the stove for the support of combustion, a provision for regulating or shutting off the admission of such air, substantially as set forth.

GEO. W. WALKER.

Witnesses:
J. B. CROSBY,
F. GOULD.