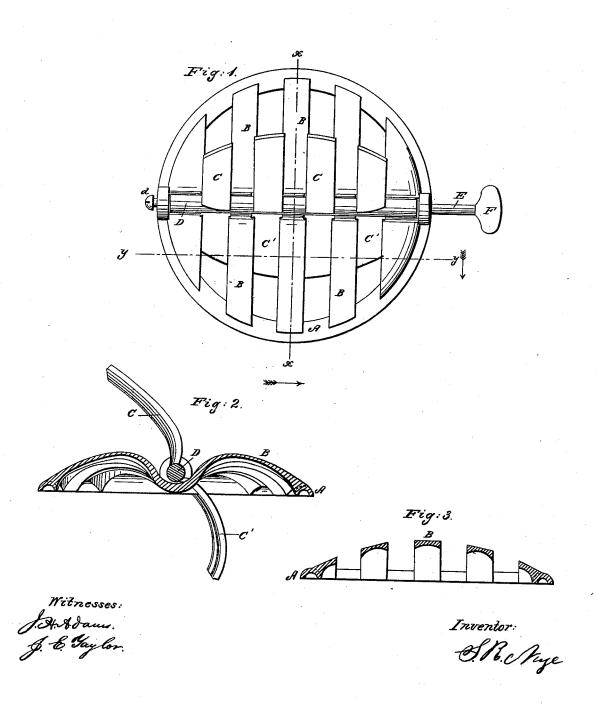
S. R. NYE. Stovepipe Damper.

No. 54,197.

Patented April 24, 1866.



## UNITED STATES PATENT OFFICE.

SHERMAN R. NYE, OF BARRE, MASSACHUSETTS.

## STOVE-PIPE DAMPER.

Specification forming part of Letters Patent No. 54,197, dated April 24, 1866.

To all whom it may concern:

Be it known that I, S. R. NYE, of Barre, in the county of Worcester and State of Massachusetts, have invented a new and useful Improvement in Dampers for Stove Pipes or Flues; and I hereby declare that the following is a full and exact description thereof, reference being had to the accompanying drawings, making a part of this specification, in which-

Figure 1 represents a top view, showing the damper partially open. Fig. 2 is a section of the same on a line, x x, and Fig. 3 is a section on the line y y of Fig. 1.

Similar letters indicate like parts in the sev-

eral figures.

The object of my invention is to graduate the escape of the smoke and products of combustion in the pipe or flue so that heat shall be retained and radiated to the greatest advantage while escaping through the pipe; and the invention consists in constructing the damper in two separate parts or sections, each part being composed of curved concave ribs, one of the said parts being made to turn either in connection with or independently of the other.

Referring to the drawings, A represents an annulus, made concave on its under side, as shown in Figs. 2 and 3, and designed to fit closely, but allowed to turn within the pipe or flue, being supported in the same by the projection or screw d on one side and the rod E

B represents a series of curved parallel ribs or bars, made concave on their under sides, and cast with or forming a part of the annulus A. These ribs or bars B are curved from circumference to center, as shown in the drawings. At the center they form a reverse curve or groove extending across the damper. Fitting within this groove is a spindle or shaft, D, upon

which is cast a series of concave curved ribs, C C', of similar form with the ribs B, and designed to cover the spaces between the same.

In joining the two parts of the damper together the ribs C' are passed through between the ribs B, so as to close the same on the under side, while the ribs C are made to close the spaces on the upper side of the damper. A screw, d, is then inserted in the end of the spindle, and a rod, E, provided with a thumb-piece, F, is screwed into the opposite end. By turning the ribs C C' the openings in the damper may be graduated for the escape of more or less of the smoke and gases, as circumstances require. By closing the ribs C C'entirely and continuing to turn the thumbpiece F the damper will be turned so as to admit of a free passage for the smoke and gases when necessary.

A ledge or projection may be provided on one side of the pipe, if necessary, in order to prevent the damper from turning in the oppo-

site direction.

The annulus A is made concave on its under side, and the two series of ribs are curved and also made concave on their under sides for the purpose of deflecting the smoke and gases as they come in contact with the said concave surfaces, and thus serve to retain and radiate the heat as it ascends the chimney or

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

ent, is-

The above-described damper, consisting of the concave annulus A, the curved concave bars or ribs B, and the ribs C C', constructed and operating as and for the purpose specified. S. R. NYE.

Witnesses: JOHN D. BLOOR, JOHN S. HOLLINGSHEAD.