

J. GORTON.  
Chimney-Cap.

No. 160,668.

Patented March 9, 1875.

Fig: 1.

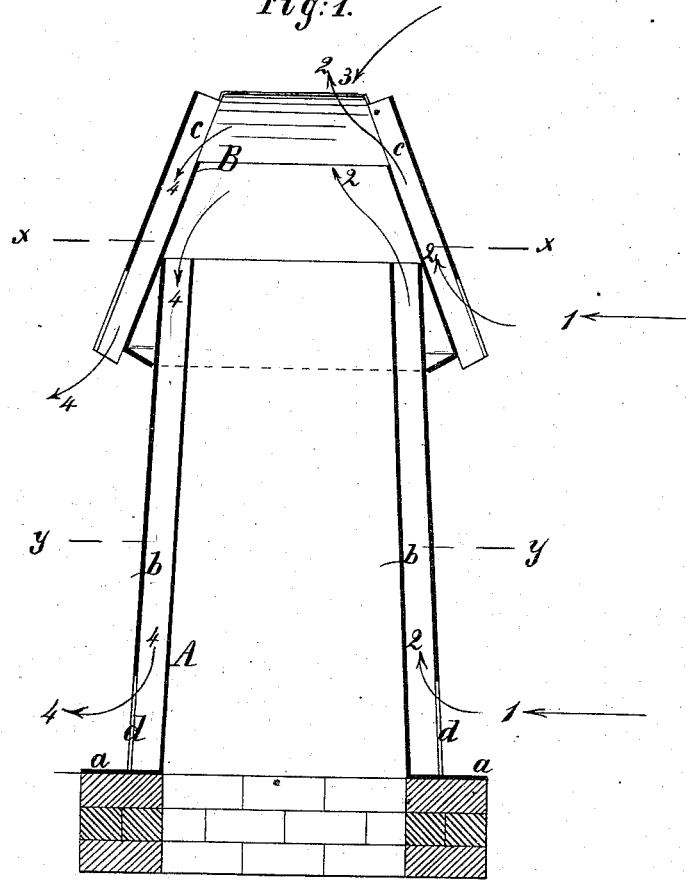


Fig: 2.

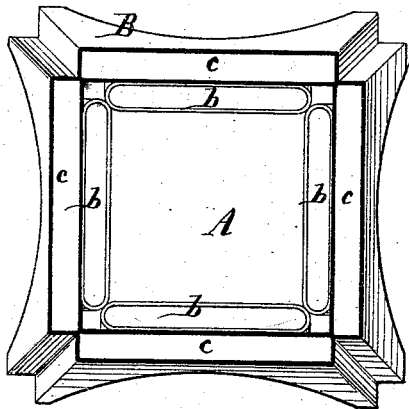
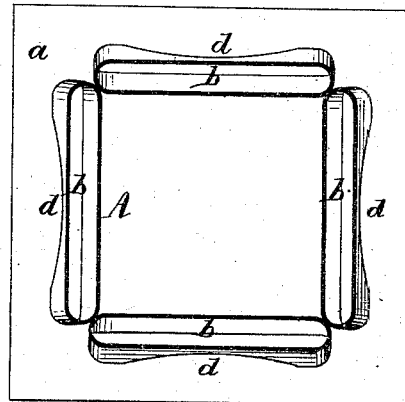


Fig: 3.



Witnesses:  
Emil Billuber.  
Chas. Wahlers.

Inventor:  
James Gorton  
per  
Van Santwood & Hauff  
attys

# UNITED STATES PATENT OFFICE.

JAMES GORTON, OF NEW YORK, N. Y.

## IMPROVEMENT IN CHIMNEY-CAPS.

Specification forming part of Letters Patent No. **160,668**, dated March 9, 1875; application filed December 17, 1874.

*To all whom it may concern:*

Be it known that I, JAMES GORTON, of the city, county, and State of New York, have invented a certain new and Improved Chimney-Cap, of which the following is a specification:

This invention is illustrated in the accompanying drawing, in which—

Figure 1 represents a vertical central section. Fig. 2 is a transverse section in the plane  $x x$ , Fig. 1. Fig. 3 is a similar section in the plane  $y y$ , Fig. 1.

Similar letters indicate corresponding parts.

This invention relates to that class of chimney-cowls in which a vertical pipe is provided at its upper end with a top or cap and surrounding shells, in such a manner as to create an upward draft through the pipe, and prevent the currents of air from passing down the chimney.

This invention consists in a chimney-cap composed of a square central flue, provided on each side with a lateral flue or passage, and surmounted by one or more truncated pyramids, in such a manner that currents of air which strike the sides of the chimney-cap cause an upward draft in the central smoke-flue, and currents of air which strike the top of the cap pass out between the sides of the truncated pyramids without interfering materially with the draft of the smoke-flue.

In the drawing, the letter A designates the central flue of my chimney-cap, which is provided with a bottom flange,  $a$ , by means of which it can be secured to the top of a chimney. Said central flue is made square, and to each of its sides is secured a lateral flue or passage,  $b$ , extending up to the top of the central flue, as shown in Fig. 1. On these pas-

sages is placed a top, B, composed of two or more truncated pyramids, between which are formed air-channels  $c$ . The outer sides of the passages  $b$  are provided with holes  $d$  near the bottom flange  $a$ . If a gust of wind strikes my cap in the direction of arrow 1, it produces currents through the lateral flue or passage, and through the air-channel  $c$  on the wind side in the direction of arrows 2, and the draft of the chimney is promoted; and if a gust of wind strikes the cap in the direction of arrow 3, the current of air, on striking the inner sides of the truncated pyramids, is turned downward through the air-channel  $c$ , and through the passages on the lee side of the cap, and it rushes out, as indicated by arrows 4, without checking materially the draft of the chimney.

In all cases my cap protects the chimney, so that the draft will not be impaired, no matter in what direction the wind blows.

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

The central flue A, having upon its sides independent or separated lateral flues  $b$ , each having at its lower end an opening,  $d$ , in combination with the top B, consisting of two truncated pyramids, having these separated air-chambers  $c c$ , substantially as described, whereby currents of air are induced up and down the lateral flues or passages and the air-channels, in the manner herein described.

In testimony that I claim the foregoing I have hereunto set my hand and seal this 9th day of December, 1874.

JAMES GORTON. [L. S.]

Witnesses:

E. F. KASTENHUBER,  
W. HAUFF.