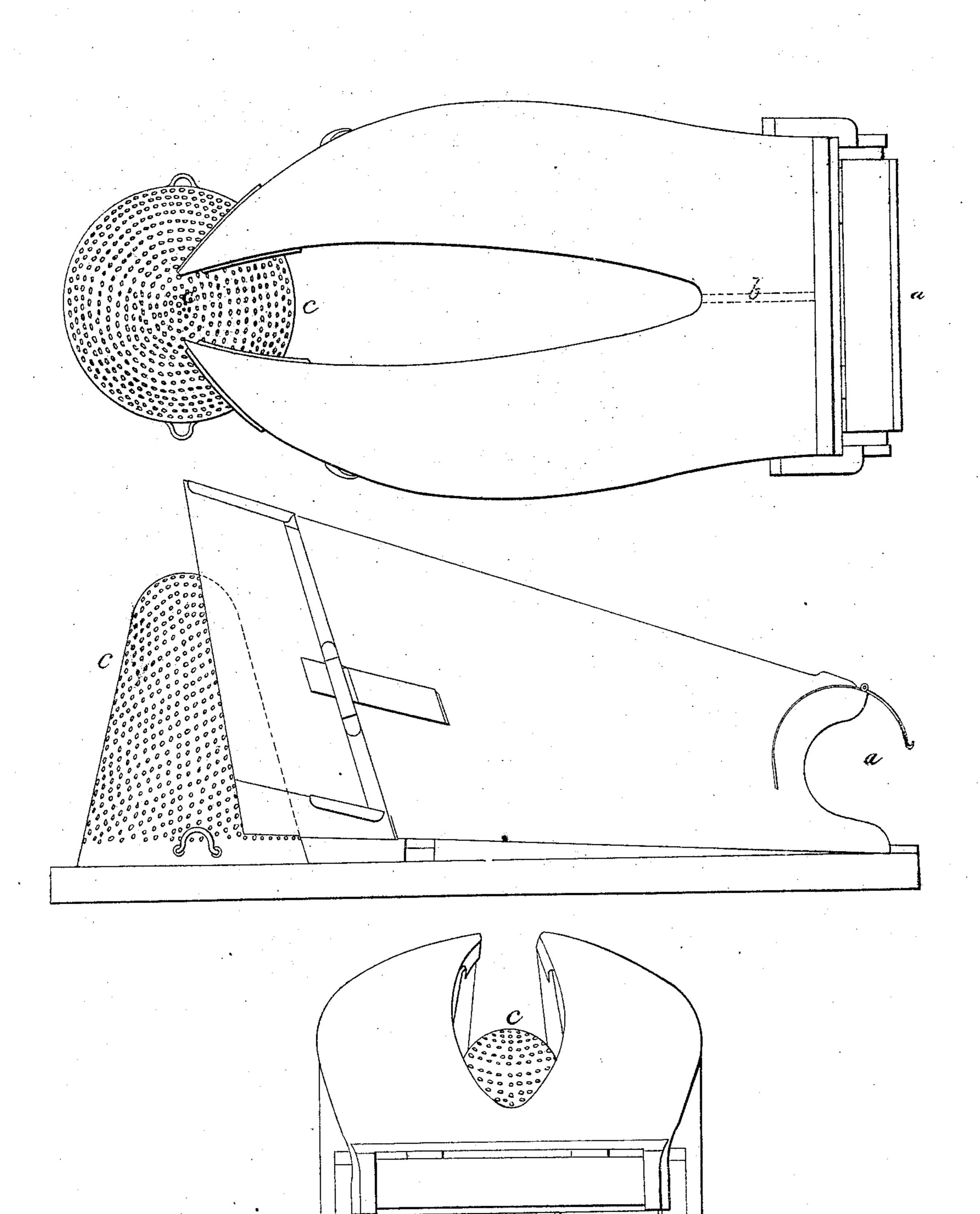
I. E. Hopkins. Forming Bats. №9970 Patented Aug 30,1853



## United States Patent Office.

LANSING E. HOPKINS, OF NEW YORK, N. Y.

IMPROVEMENT IN CONDUCTORS IN MACHINES FOR FORMING HAT-BODIES.

Specification forming part of Letters Patent No. 9,970, dated August 30, 1853.

To all whom it may concern:

Be it known that I, Lansing E. Hopkins, of New York, in the county of New York and State of New York, have invented a certain new and useful Improvement in Manufacturing Hats; and I do hereby declare that the following is a full, clear, and exact description of the principle or character which distinguishes it from all other things before known, and of the usual manner of making, modifying, and using the same.

My improvement in forming hat bodies consists in a bifurcated conductor so constructed and arranged as to place the exhaust-cone between two jets of fur.

The construction of that part of the machine by which this new effect is produced consists of two tubes of curved form uniting in one at the picker, which is of ordinary construction and not shown in the drawing. Its place is at a. From thence the tubes run a short distance parallel, having but a single partition, b, between them. They then branch outward with a gentle curve, and their cross-section gradually narrows in breadth and increases in height, their extreme ends curving inward till

their openings are opposite each other. Between these openings stands the cone c, upon which the hat-bodies are formed. On either side of the tubes, near their extreme ends, are sliding shutters, that can be made to slide forward, and by so doing in some degree close the opening. By regulating these shutters on one or the other, or both, I produce the effect above named of strengthening the body in any desired part. I effect this by the double outlet with more accuracy than could be done in any other way, throwing the fur upon the cone in more than one point.

Having thus fully described my improvement in hat-forming machinery, what I claim therein as new, and for which I desire to secure Letters Patent, is—

The bifurcated conductor and blast above described, said conductor having its openings opposite each other, or nearly so, and having the cone between them, substantially in the manner and for the purpose set forth.

LANSING E. HOPKINS.

Witnesses:
Thos. E. Warren,
Robert W. Shore.