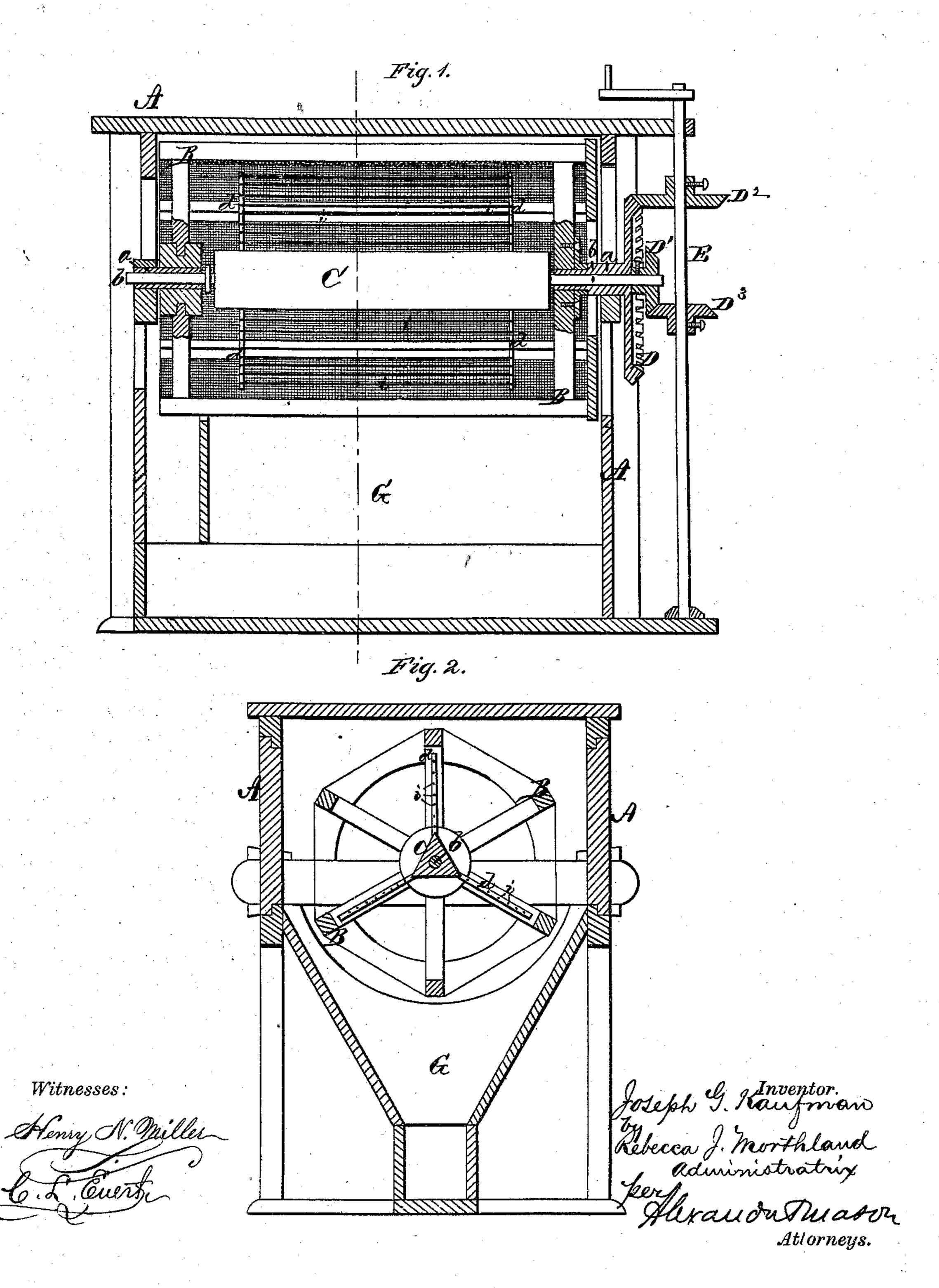
J. G. KAUFMAN, dec'd. REBECCA J. MORTHLAND, Adm'x. Flour-Bolts.

No. 143,910.

Patented Oct. 21, 1873.



UNITED STATES PATENT OFFICE.

REBECCA J. MORTHLAND, OF NEVADA, MISSOURI, ADMINISTRATRIX OF JOSEPH G. KAUFMAN, DECEASED.

IMPROVEMENT IN FLOUR-BOLTS.

Specification forming part of Letters Patent No. 143,910, dated October 21, 1873; application filed April 11, 1873.

To all whom it may concern:

Be it known that Joseph G. Kaufman, of Nevada, in the county of Vernon and State of Missouri, did invent certain new and useful Improvements in Flour-Bolts; and I do hereby declare that the following is a full, clear, and exact description thereof, reference being had to the accompanying drawing and to the letters of reference marked thereon.

The nature of this invention consists in the construction and arrangement of a revolving flour-bolt with interior beaters revolving in the opposite direction from that of the bolt, as will be hereinafter more fully set forth.

In order to enable others skilled in the art to which this invention appertains to make and use the same, I will now proceed to describe its construction and operation, referring to the annexed drawing, which forms a part of this specification, and in which—

Figure 1 is a longitudinal vertical section, and Fig. 2 a transverse vertical section, of the flour-bolt.

A represents the frame-work, within which the bolt B is placed. This bolt may be constructed in any of the known and usual ways, and is supported by hollow journals a a in the frame A. Through the bolt B passes a shaft, b, which also passes through and has its bearings in the hollow journals a a; and on said shaft, within the bolt, is secured a triangular or other suitably-shaped roller, C, extending nearly if not quite the entire length of the bolt. Near each end of the roller C are a series of arms, d d, attached to it, and extending radially from it. The corresponding arms at the two ends of the cylinder are connected by wires i i, each set thus forming a beater within the bolt. One or more of these beaters may

be used, as desired, and they may be attached direct to the shaft without the use of the roller C. Upon the outer end of one of the hollow journals a is attached a large gear-wheel, D, and on the shaft b, at the same end of the machine, is attached a smaller gear-wheel, D¹; and these two wheels gear with similar wheels D² and D³, respectively, attached to a vertical shaft, E, which may be revolved by any suitable means. Under the bolt is a hopper, G, which is to have a conveyer in its bottom.

The gearing above described is so constructed that the beaters run in the opposite direction to the bolt, and make two revolutions to one of the bolt. The beaters act upon the flour within the bolt, and prevent it from forming into balls, and also keeps the light particles (as fibers of the grain, &c.) up, preventing it from passing through the cloth, which, therefore, passes out at the end of the bolt, leaving only the pure flour to pass through the meshes of the cloth, making the flour pure, clear, and white, and improving it from one to three grades.

Having thus fully described the invention, what I claim as new, and desire to secure by Letters Patent, is—

In combination with the bolt B, the wire beater constructed as shown, and revolving in a direction opposite to that of the bolt, substantially as set forth.

In testimony that I claim the foregoing I have hereunto set my hand this 15th day of March, 1873.

REBECCA J. MORTHLAND.

Witnesses:

C. B. McAfee,

C. K. Scott.