(No Model.)

R. W. BEATTY & G. HOFFNER.

EGG RACK.

No. 381,523. Patented Apr. 24, 1888.

FIG. 1.

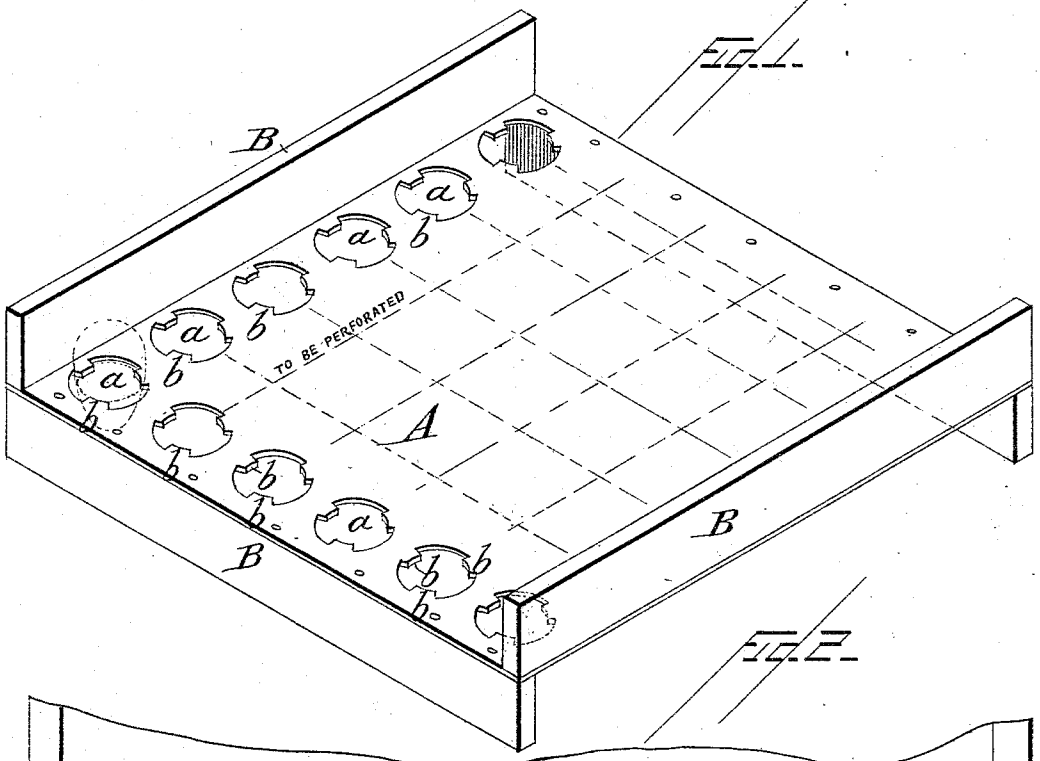


FIG. 2.

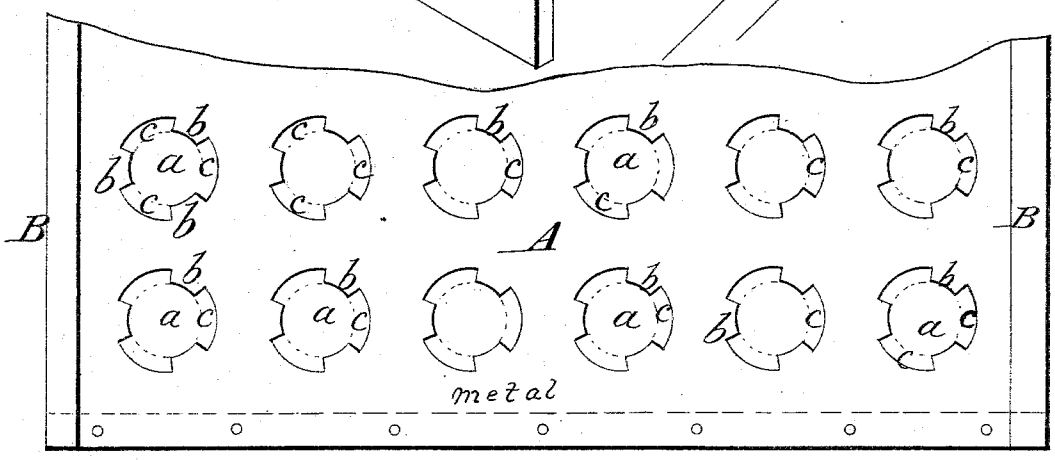
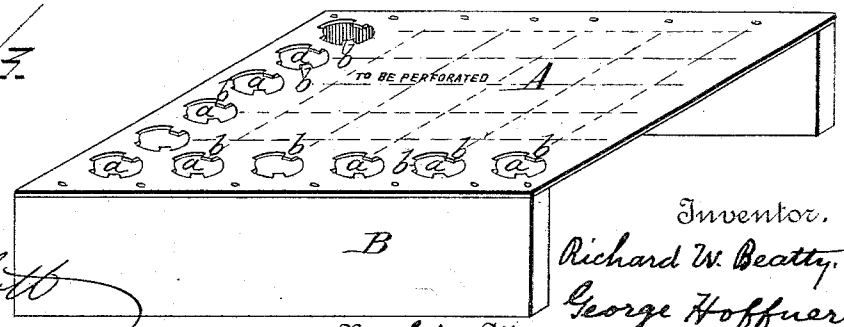


FIG. 3.



Witnesses.
F. H. Schott
H. A. Daniels.

Inventor.
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By his Attorney
W. Burris.

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UNITED STATES PATENT OFFICE.

RICHARD W. BEATTY AND GEORGE HOFFNER, OF PITTSBURG, PENNSYLVANIA.

EGG-RACK.

SPECIFICATION forming part of Letters Patent No. 381,523, dated April 24, 1888.

Application filed January 31, 1888. Serial No. 262,558. (No model.)

To all whom it may concern:

Be it known that we, RICHARD W. BEATTY and GEORGE HOFFNER, citizens of the United States of America, residing at Pittsburg, in the county of Allegheny and State of Pennsylvaia, have invented certain new and useful Improvements in Egg-Racks, of which the following is a specification, reference being had therein to the accompanying drawings.

My invention relates to egg-racks adapted for use in cold storage.

The carriers heretofore and now in use in storing and transporting eggs are made mostly of coarse heavy paper substances, and it is well known that moisture by the sweating of the eggs or the condensation of the surrounding air accumulates upon the surfaces of eggs in cold storage. This accumulated moisture runs down the surfaces of the eggs and is absorbed and retained by the paper substances, producing mustiness, which penetrates through the shells, imparting a musty taste to the eggs, and eventually causing them to decay.

It is also well known that in the manufacture of the heavy paper above named acids and other chemical substances are employed, and that eggs remaining in such paper carriers during the ordinary period of cold storage become impregnated with the unpleasant and perhaps unhealthful properties of such substances. Therefore, while such paper carriers, being of a spongy and yielding substance, are well adapted for transporting eggs, and produce no perceptibly bad effects upon them during the ordinarily brief period of transportation, it has been found by those engaged in the business desirable and necessary to employ some other means for holding eggs in cold storage. It is also found to be important that in such cold storage each egg shall be held in position for the cold air to circulate freely around it. To accomplish this purpose and to avoid the above-named difficulties, we have constructed egg-racks of metallic plates or sheets fastened to and carried by suitable frames. The metallic sheets are provided with holes, each the required size to hold one egg, and provided with bearings to hold the eggs in position, and having recesses forming air-spaces for the free circulation of air around each egg, as hereinafter fully described and claimed.

In the accompanying drawings, Figure 1 is a perspective view of one of our improved egg-racks. Fig. 2 is an enlarged plan view of a portion of the perforated plate, showing the egg-bearings and the recesses forming air-spaces. Fig. 3 shows a modified form of the rack-frame.

A desigates a metallic sheet or plate, preferably of tin, the edges of which are fastened to the frame B. This plate is usually made square and the requisite size, to be provided with six perforations, *a*, each way, each plate and its supporting-frame constituting one of my improved racks being made the same size and possessing the same capacity as the present cell egg-carriers, so that my improved racks may be placed in the same cases which are now employed for holding the paper cell-carriers. Each of the said perforations is provided with three or more lugs, B, formed on the said plate and extended inwardly on the same horizontal plane as the plate in position to form the recesses *c*, extending from lug to lug. The inner edges of these lugs are concaved to conform to the convex surfaces of the eggs, and the diameter of the space between the concaved edges is sufficient to allow the eggs when placed in the rack to extend nearly one-half their length through the plates, the lugs holding the eggs in position to allow free circulation of air around each egg, thus avoiding the liability of the accumulation or retention of moisture about the eggs and preventing the liability of the eggs becoming musty or having imparted to them the unpleasant and unhealthful properties of the chemically-prepared paper substances now in use for carrying and storing eggs.

It is evident that the paper substances above named, even if free from the objections named, could not be employed in the construction of my improved egg-racks, because such paper substances do not possess the requisite strength and firmness to form such supporting-lugs *b*, adapted to hold the eggs in position to allow a free circulation of air through the air-spaces *c*. While any material which possesses the requisite firmness may be used in the con-

struction of my plates, metallic sheets are preferable, because the perforations, with their lugs and recesses, may be readily stamped in such metallic sheets, thus costing less in manufacture than similar plates could be made of any other rigid material.

The frames B (shown in Fig. 1) are made with upper and lower sides, and of the requisite sizes to adapt the racks to be readily placed one above another in the ordinary carrying-cases now in use, for the purpose of enabling our improved racks to be readily used in the ordinary cases whenever desired for transporting eggs for short distances.

In constructing the racks for use in storage-rooms only, the upper pieces, *d*, are dispensed with, and the lower pieces are made wider than those shown in Fig. 1, as shown in Fig. 3 of the drawings, and the plates and frames may be increased in size, so that each rack may contain any required number of eggs.

What we claim as new is—

An egg-rack consisting of the metallic plate A and the frame B, the plate being attached to the frame and provided with apertures *a*, each aperture having three or more horizontal lugs, *b*, and recesses *c*, extending from lug to lug, the lugs having concaved ends, whereby the eggs are held in position and free circulation of air around them is permitted, substantially as and for the purposes described.

In testimony whereof we have affixed our signatures in presence of two witnesses.

RICHARD W. BEATTY.
GEORGE HOFFNER.

Witnesses:
GEO. JOHNSTON,
WILLIAM D. ARMSTRONG.