H. W. CASS.

Refrigerator-Door Packing.

No. 212,896. Patented Mar. 4, 1879.

FIG. 1.

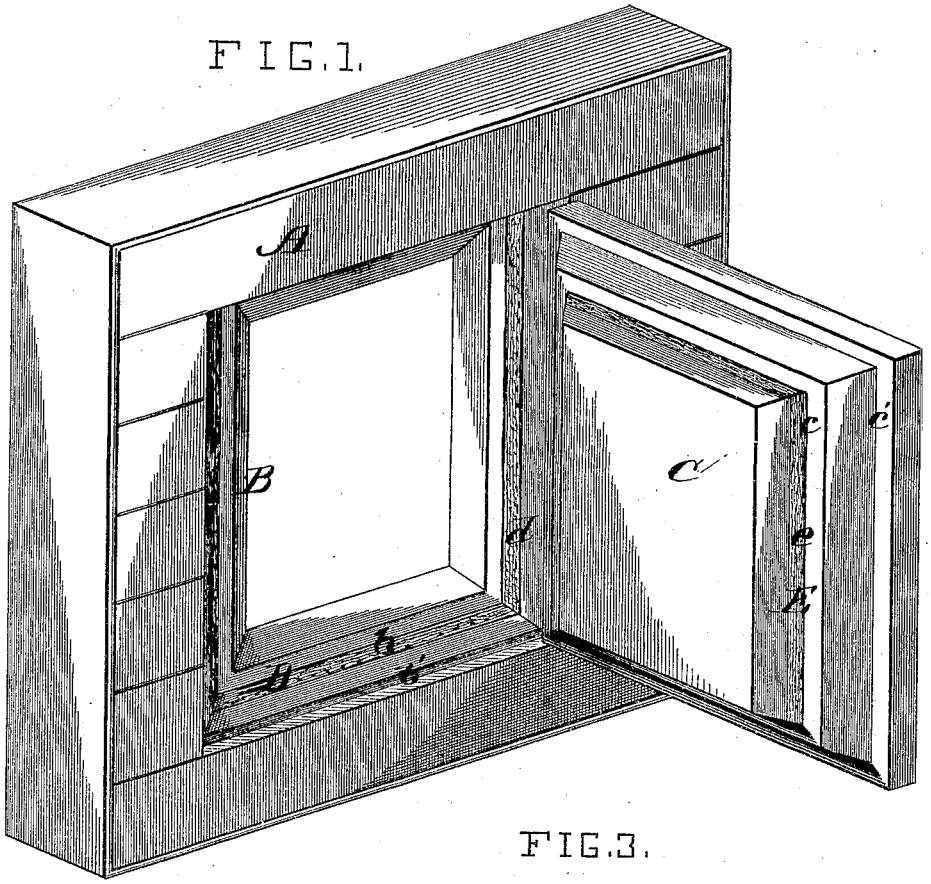


FIG. 2.

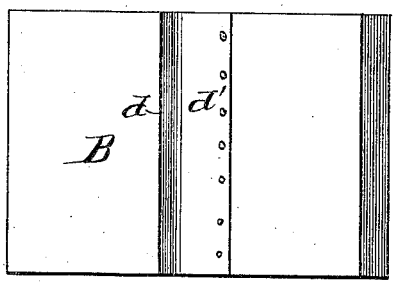


FIG. 3.

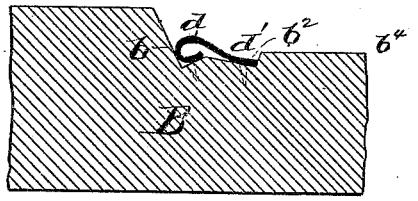
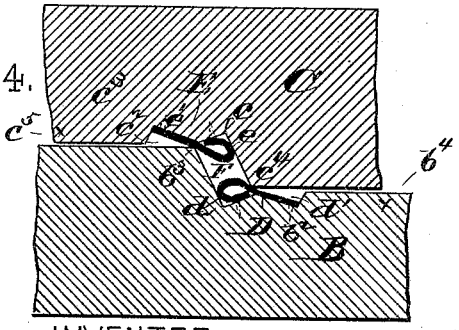


FIG. 4.



ATTEST.

Samuel S. Boyd

Paul Bakewell

INVENTOR.

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by Chas. D. Moody,

atty.

UNITED STATES PATENT OFFICE.

HENRY W. CASS, OF ST. LOUIS, MISSOURI, ASSIGNOR TO SAINT LOUIS REFRIGERATOR AND WOODEN GUTTER COMPANY, OF SAME PLACE.

IMPROVEMENT IN REFRIGERATOR-DOOR PACKING.

Specification forming part of Letters Patent No. **212,896**, dated March 4, 1879; application filed June 7, 1878.

To all whom it may concern:

Be it known that I, HENRY W. CASS, of St. Louis, Missouri, have made a new and useful Improvement in Refrigerators, of which the following is a full, clear, and exact description, reference being had to the annexed drawings, making part of this specification, in which—

Figure 1 is a perspective view of the front of a refrigerator having the improvement; Fig. 2, a plan or face view of a portion of the door-jamb; Fig. 3, a cross-section of the part shown in Fig. 2; and Fig. 4, a cross-sectional view, showing a portion of the jamb, and also of the door, and as the door is nearly closed.

The same letters of reference denote the same parts.

My aim is to provide means for effectually packing the joint of a refrigerator-door.

Referring to the drawings, A represents the front of a refrigerator; B, the door frame or jambs, and C the door. The jamb, as well as the door, is double-rabbeted, as shown at b b^1 and c c', respectively, and the jambs and door are beveled in the usual manner. An elastic (preferably rubber) packing, D, is inserted all around the jambs in the corner of the inner rabbet b. The packing is preferably in the shape of a bead, d, having a flange, d', and in attaching it the flange is turned toward the door, and is made to lie in a groove, b^2, in the jambs of the inner rabbet, while the bead d occupies the corner of the rabbet. A similar packing, E, is attached to the door C in the corner of the inner rabbet c, the flange e' being toward the interior of the refrigerator, and lying in a groove, c^2, in the edge c^3 of the door, and the bead e being in the corner of the rabbet.

When the door is opened the beads d e stand up, as in Fig. 3; but when the door is closed, the corner c^4 of the door encounters the bead d of the frame, and the corner b^3 of the jambs encounters the bead e of the door, and as indicated in Fig. 4. When the door is fully closed the two beads are compressed, closing the joints, respectively, opposite the beads, and inclosing between the beads an air-space, F, which acts as a non-conductor of heat, and aids materially in sealing the joint around the door.

If desired, the packings D and E can be arranged upon the door-jambs and door, respectively, so as when the door is closed to come farther apart than in the above-described arrangement. For instance, the packing D can be attached at the point b^4, and the packing E at the point c^5. The packings also can be used upon jambs and doors having a continuous bevel, and a further modification would be attaching both of the packings either to the jambs or to the door; but I prefer the arrangement and construction shown.

The walls of a refrigerator are necessarily very thick, and it is difficult to make the parts so that the door-edge (even if originally accurately fitted) will continue to fit evenly and perfectly against the jambs throughout the thickness of the parts, and hence it is better to arrange the packings as close to each other as is shown, as thereby there is more likelihood of both packings being compressed when the door is closed, even if the latter does not touch the jambs evenly all around. It is also desirable to double-rabbet the jambs and door, and to arrange the beads d e so as to be pressed by the corners c^4 b^3, as described.

This improvement is also applicable to doors in other structures, and also to windows and where one part is closed against another.

I am aware that a single strip of packing has heretofore been used upon the door or door-jamb of a refrigerator; but a single strip will not answer my present purpose, which is to form an air-space in and around the joint between the door and jamb.

I claim—

1. The combination of the jambs B, door C, and packings D and E, inclosing the air-space F, substantially as described.

2. The combination of the double-rabbeted jambs B, double-rabbeted door C, and the packings D and E, inclosing the air-space F, substantially as described.

HENRY W. CASS.

Witnesses:
CHAS. D. MOODY,
CHARLES F. WHORF.