

(No Model.)

M. O. BARKE.
CHURN.

No. 512,574.

Patented Jan. 9, 1894.

Fig. 1.

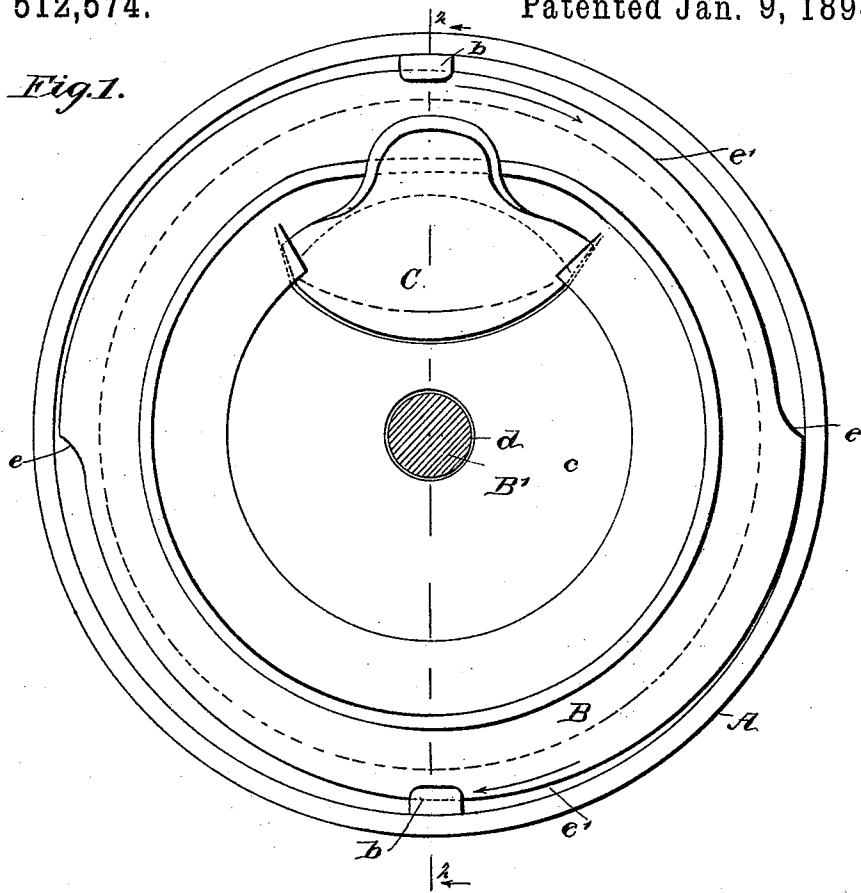
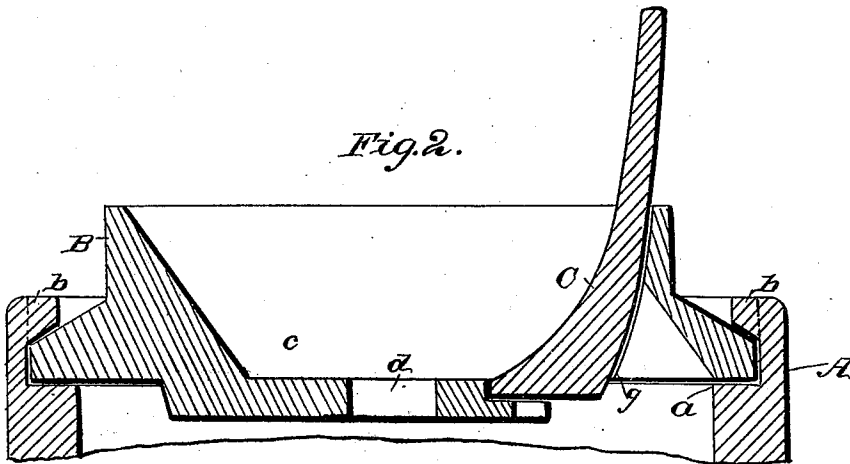


Fig. 2.



WITNESSES:

J. M. Arde
C. Sedgwick

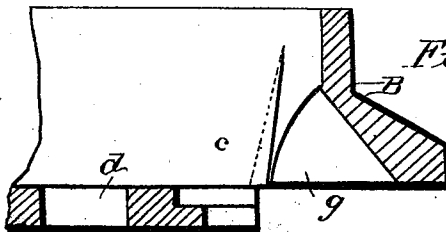


Fig. 3.

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CHURN.

SPECIFICATION forming part of Letters Patent No. 512,574, dated January 9, 1894.

Application filed March 22, 1893. Serial No. 467,115. (No model.)

To all whom it may concern:

Be it known that I, MARTIN O. BARKE, of Fergus Falls, in the county of Otter Tail and State of Minnesota, have invented a new and useful Improvement in Churns, of which the following is a full, clear, and exact description.

My invention relates to improvements in churns of the vertical dasher type, and has for its object to provide a churn of the cylindrical barrel, vertical dasher class, with a novel and superior lid.

To this end my invention consists in the construction and combinations of parts, as are hereinafter described and claimed.

Reference is to be had to the accompanying drawings, forming a part of this specification, in which similar letters of reference indicate corresponding parts in all the figures.

Figure 1 is a plan view of the improvement in place on a churn barrel, the dasher rod being in section. Fig. 2 is a transverse sectional view on the line 2—2 in Fig. 1; and Fig. 3 is a transverse sectional view in part, of the churn lid detached.

The churn barrel A, partly shown, may be formed from wood or stoneware, the latter being preferred, and in complete form is cylindrical and of a sufficient capacity for service, the sizes being graduated to suit the varied wants of butter producers. The neck and open mouth of the churn body A, are circular, and have a seat *a* produced within them at a proper distance from the upper edge, and at opposite points above said seat, two inwardly-projecting lugs *b*, are formed or secured, a suitable space being permitted to intervene the lower surface of the lugs and the seat *a*.

If the churn body is made of earthenware, of a kind usually termed stoneware, the ears *b*, should have their lower surfaces sloped from their inner edges outwardly and downwardly, to insure strength, as shown in Fig. 2.

The lid B, which is of a novel form, consists of a circular block made of the same material as the churn body, and cupped on top, as at *c*, the dished cavity forming a rather deep receptacle for cream that may work upwardly between the dasher rod B', and the central circular, and neatly fitting wall of the aperture *d*, made to receive said rod, and permit it and an attached dasher (not shown) to ver-

tically reciprocate in the churn body as usual in this class of churns.

The edge portion of the substantially circular lid B, is oppositely cut away, as at *e*, and the peripheral surface shaped to produce cam curves *e'*, in opposite directions, the portions of the eccentric curved edges that are depressed the greatest, forming the shoulders *e*. There should be a sufficient removal of material from the edge of the lid at these opposite shoulders to allow the lid to drop upon its seat *a*, in the churn neck when the lugs *b*, are located opposite the points *e*, which will locate the bevel sloped top surface of the eccentric cams *e'*, on a level with the lower surface of the lugs, so that a partial rotation of the lid in the direction of the curved arrow in Fig. 1, will cause the lid to be tightly drawn upon the seat *a*, and prevent its displacement or any escape of cream. In the dished cavity *c*, an aperture is cut through its bottom wall, as at *g*, in Figs. 2 and 3, said aperture being located close to the concave wall of the cupped cavity, and of a width and form to permit a spoon-like implement C, to neatly fit and fill the aperture when it is introduced therein, as shown in Figs. 1 and 2, said implement having a wide shallow bow that in concavity conforms with the curvature of the dished surface of the cavity *c*, so that when in place and its handle piece projected upwardly, as represented in Fig. 2, the removable scraper spoon C, will seal the aperture *g*, and prevent any escape of cream around its margin.

It will be seen that when the lid and the scraper spoon C, are adjusted to seal the churn body A at its upper end, any cream may be agitated within the churn and that might work slightly through the dasher rod aperture *d*, will be received and retained by the dished cavity *c*, and thus be prevented from splashing outwardly from the churn upon surrounding persons or objects.

By the removal of the scraper spoon C and a scraping manipulation of the same around the dasher rod B' any cream that may have been deposited in the cavity *c*, may be returned to the churn body and the device thus be kept in a condition of cleanliness. The aperture *g*, is also useful to permit an inspection of the progress of churning at inter-

vals, and afford means for the introduction of hot water if this is necessary to expedite the formation of butter, and when butter has been produced, the implement C, becomes useful
5 to gather the butter into a lump for ready removal from the churn.

Having thus described my invention, I claim as new and desire to secure by Letters Patent—

10 1. A churn lid, cupped on its upper surface, apertured for the discharge of cream into the churn, and provided with a scraper spoon that

when in place, fills said aperture, substantially as described.

2. A churn lid having peripheral cam sur- 15
faces a recessed upper face, a central dasher rod opening, an opening to one side thereof and a removable scraper closing said opening and conforming to the contour of the recess or cup, substantially as set forth.

MARTIN O. BARKE.

Witnesses:

AND. W. CLAMBAY,
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