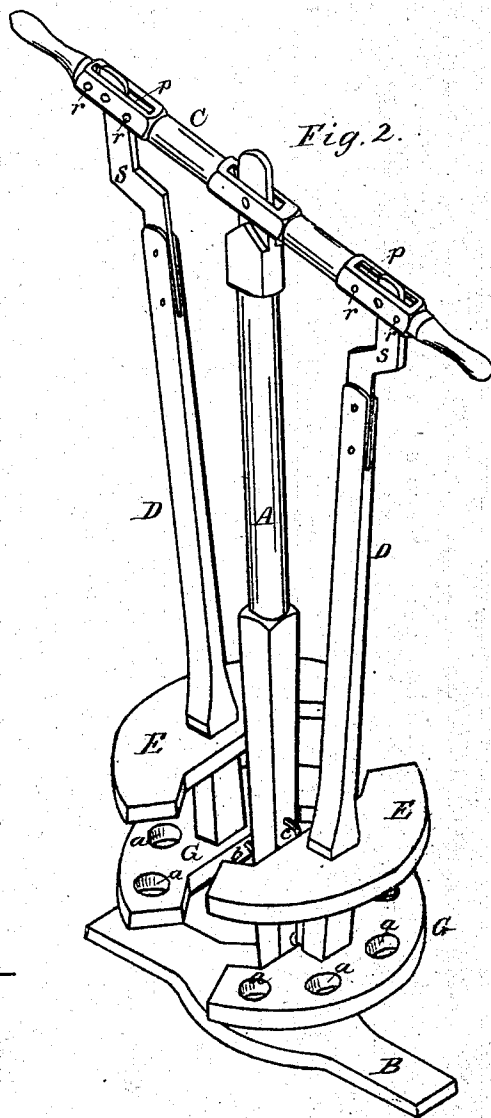
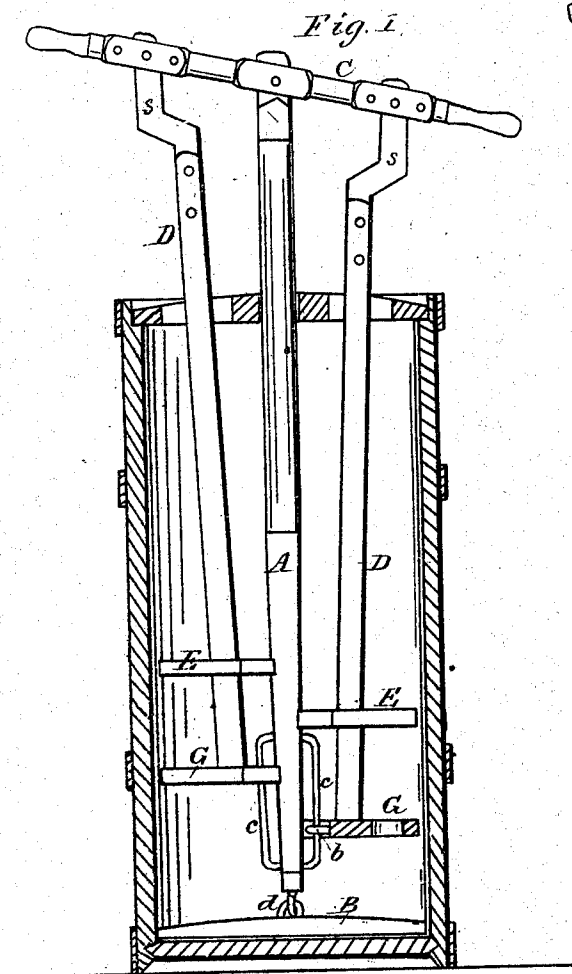


J. W. Barton, Churn-Dasher.

Nº 74,485

Patented Feb. 18, 1868.



Witnesses

*Chas. H. Spencer
J. T. Davis*

Inventor

*John Barton.
By J. Fraser & Co.
Attys*

United States Patent Office.

JOHN W. BARTON, OF CLIFTON SPRINGS, NEW YORK.

Letters Patent No. 74,485, dated February 18, 1868.

IMPROVEMENT IN CHURN-DASHERS.

The Schedule referred to in these Letters Patent and making part of the same.

TO ALL WHOM IT MAY CONCERN:

Be it known that I, JOHN W. BARTON, of Clifton Springs, in the county of Ontario, and State of New York, have invented a certain new and useful Improvement in Churn-Dashers; and I do hereby declare that the following is a full and exact description thereof, reference being had to the accompanying drawings, making part of this specification.

Figure 1 is a vertical section of a churn and an elevation of my improved dasher-arrangement applied thereto.

Figure 2 a perspective view of the dasher-arrangement detached from the churn.

Like letters of reference indicate corresponding parts in both figures.

My invention consists of an arrangement of double-acting dashers, connected with a lever at the top, and a jointed cross-piece at the bottom, for holding the dasher centred, the whole forming a separate and detached apparatus capable of being applied to any ordinary cylinder-churn.

In the drawings, A is a central standard, having jointed at its lower end a cross-piece, B, which is intended to rest in the bottom of the churn, and keep the dasher centred properly. At the top of the standard is pivoted a double-acting lever, C. To this lever are jointed dasher-rods D D, each rod having at its lower end two dasher-wings E G, of segmental form, and situated at some distance apart. The upper wings E are made solid or closed, but the lower wings G have holes *a a* made through them vertically, as shown. Eyes, *b b*, attached to the inner edges of the lower wings, slide up and down upon wire ways *c c*, secured to the sides of the standards. Thus arranged, it will be perceived that the operating parts are combined as a whole, ready to be applied to any churn. The cross-piece B resting in the bottom, and the standard resting in the cover, the dasher is properly centred, and not only this, but the wings running upon the ways *c c*, insure a steady and uniform action. In washing, the whole arrangement is removed from the churn at one motion. The ways *c c* not only hold the dashers in position, but also lessen the friction by keeping said wings from contact with the churn at any time. The wings, therefore, act only upon the cream, producing the greatest effect with the smallest expenditure of power. The cross-piece being jointed at *d*, adapts itself always to the bottom of the churn at whatever position the dasher is placed inside, and therefore it is steady in its hold, and obviates irregularity that might otherwise occur. The holes *a a* of the lower wings allow a passage of the cream up through in streams, and these streams, striking the closed upper wings, are deflected and broken, and tumbling inward toward the centre of the churn, they come in contact with the opposing wings of the other side of the churn, which completes the agitation. This arrangement of the wings is very effective in breaking the globules.

I am aware that various arrangements of double-acting dashers have before been known; I do not claim broadly the principle. The novelty in my invention lies only in the arrangement of the several parts combined as a whole, and the improved arrangement of the open and closed double dasher-wings, whereby the agitation is increased. It will be noticed that the slots *p p*, in the lever, in which the upper ends of the dasher-rods rest, are made of considerable length, to allow the said rods to be changed from one to the other of the holes *r r*, by which means both the leverage and the extent of stroke may be changed at pleasure, to adapt to the quantity of cream being churned, or to different-sized churns, as may be desired. I prefer also to make elbows *s s*, to the dasher-rods, to adapt them to the right position in the churn.

What I claim as my invention, and desire to secure by Letters Patent, is—

The arrangement, as a whole, of the jointed cross-piece B, standard A, ways *c c*, open and closed dasher-wings E G, rods D D, and lever C, the several parts being so combined as to form one connected working apparatus, as and for the purpose herein set forth.

In witness whereof, I have hereunto signed my name in the presence of two subscribing witnesses.

JOHN W. BARTON.

Witnesses:

CHAS. A. ROBISON,
G. N. POWELL.