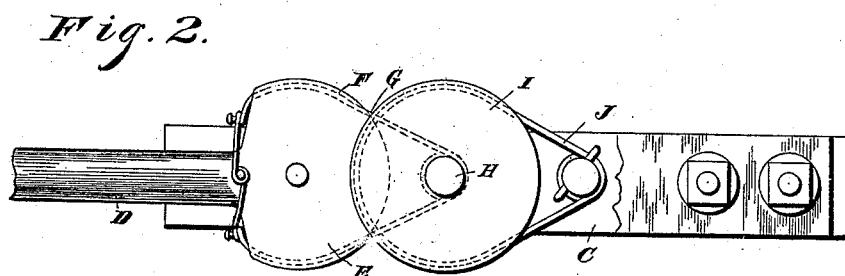
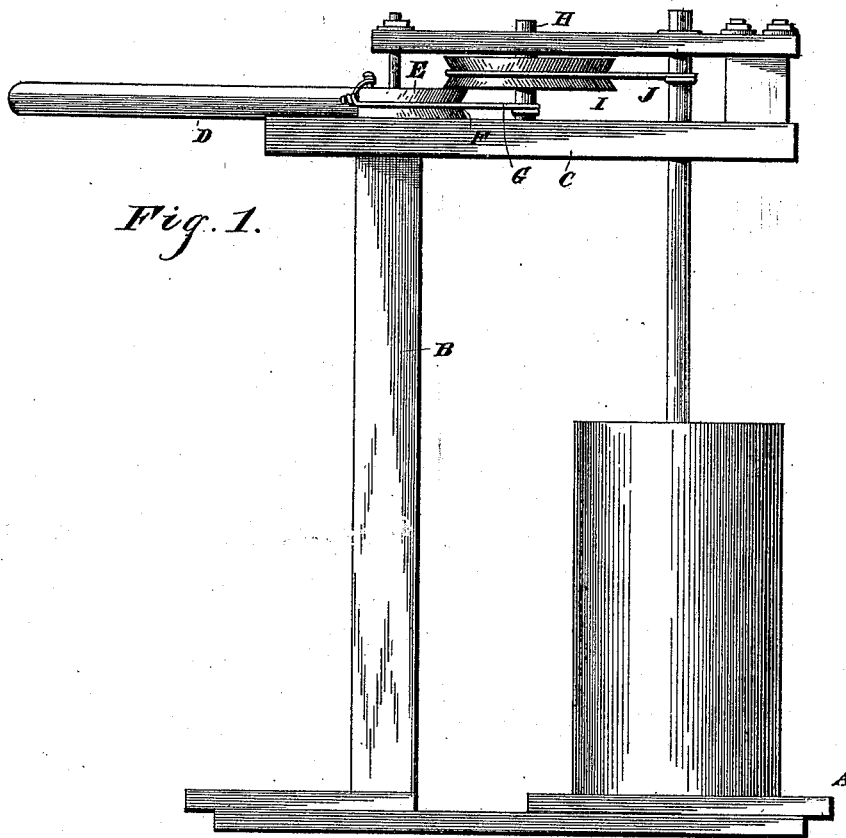


(No Model.)

J. W. HOPKINS.
MEANS FOR OPERATING CHURNS.

No. 422,217.

Patented Feb. 25, 1890.



Witnesses,

J. M. Withrow

R. H. Bishop,

Inventor
John W. Hopkins,

By *his* Attorneys

C. A. Snow & Co.

UNITED STATES PATENT OFFICE.

JOHN WALLACE HOPKINS, OF SEYMOUR, MISSOURI.

MEANS FOR OPERATING CHURNS.

SPECIFICATION forming part of Letters Patent No. 422,217, dated February 25, 1890.

Application filed November 1, 1889. Serial No. 329,078. (No model.)

To all whom it may concern:

Be it known that I, JOHN WALLACE HOPKINS, a citizen of the United States, residing at Seymour, in the county of Webster and State of Missouri, have invented a new and useful Means for Operating Churns, of which the following is a specification.

My invention relates to improvements in means for operating churns; and it consists in certain novel features hereinafter described and claimed.

In the accompanying drawings, Figure 1 is a side view. Fig. 2 is a plan view.

In carrying out my invention I employ a base A, on which the churn-body rests, and on this base I erect a standard B. To the upper end of the standard I secure a horizontal frame C, in which the dasher-staff is journaled, and the operating-lever D is also mounted in this frame. The operating-lever is provided at its inner end with a segment E, having a groove F in its periphery, and a cord G is secured to the lever and fits in the groove of the segment. Between the dasher-staff and the lever I journal in the frame C a vertical shaft H, on which is a pulley I, having a grooved periphery, and a cord J passes around the groove in the same and around the dasher-staff. The cord G, secured to the lever, is wrapped around the shaft H below the pulley I, as shown.

In practice the churn-body is placed on the base and is then filled, either entirely or partially, with cream, after which the operating-lever is vibrated horizontally, as will be readily understood. As the lever is vibrated the

cord secured thereto will transmit its motion to the pulley I, so as to rotate the dasher-staff, and the cream will be thoroughly agitated.

My improved means for operating churns is very simple in its construction, and its several parts are compactly arranged, so that it will be strong and durable. The segment and the operating-lever, it will be noticed, are integral, so that the churn will be positively operated and the cost of its manufacture reduced. The groove in the periphery of the segment prevents the cord slipping from the same, and the friction, and consequently the wear, on the cord is reduced to a minimum.

Having thus described my invention, what I claim is—

The combination, with the standard and the frame C, secured to the upper end of the same, of the dasher-staff journaled in said frame, the horizontally-disposed operating-lever mounted in said frame and provided at its inner end with an integral segment having a grooved periphery, the shaft H, mounted in the frame, the pulley on said shaft, having a grooved periphery, the cord passing around said groove and the dasher-staff, and the cord secured to the lever, fitting in the groove of the segment and passing around the shaft H, substantially as described.

In testimony that I claim the foregoing as my own I have hereto affixed my signature in presence of two witnesses.

JOHN WALLACE HOPKINS.

Witnesses:

J. W. FUSON,
J. W. GOOD.