

(No Model.)

J. WILHELM, Jr.

MILK COOLER.

No. 248,903.

Patented Nov. 1, 1881.

Fig. 1

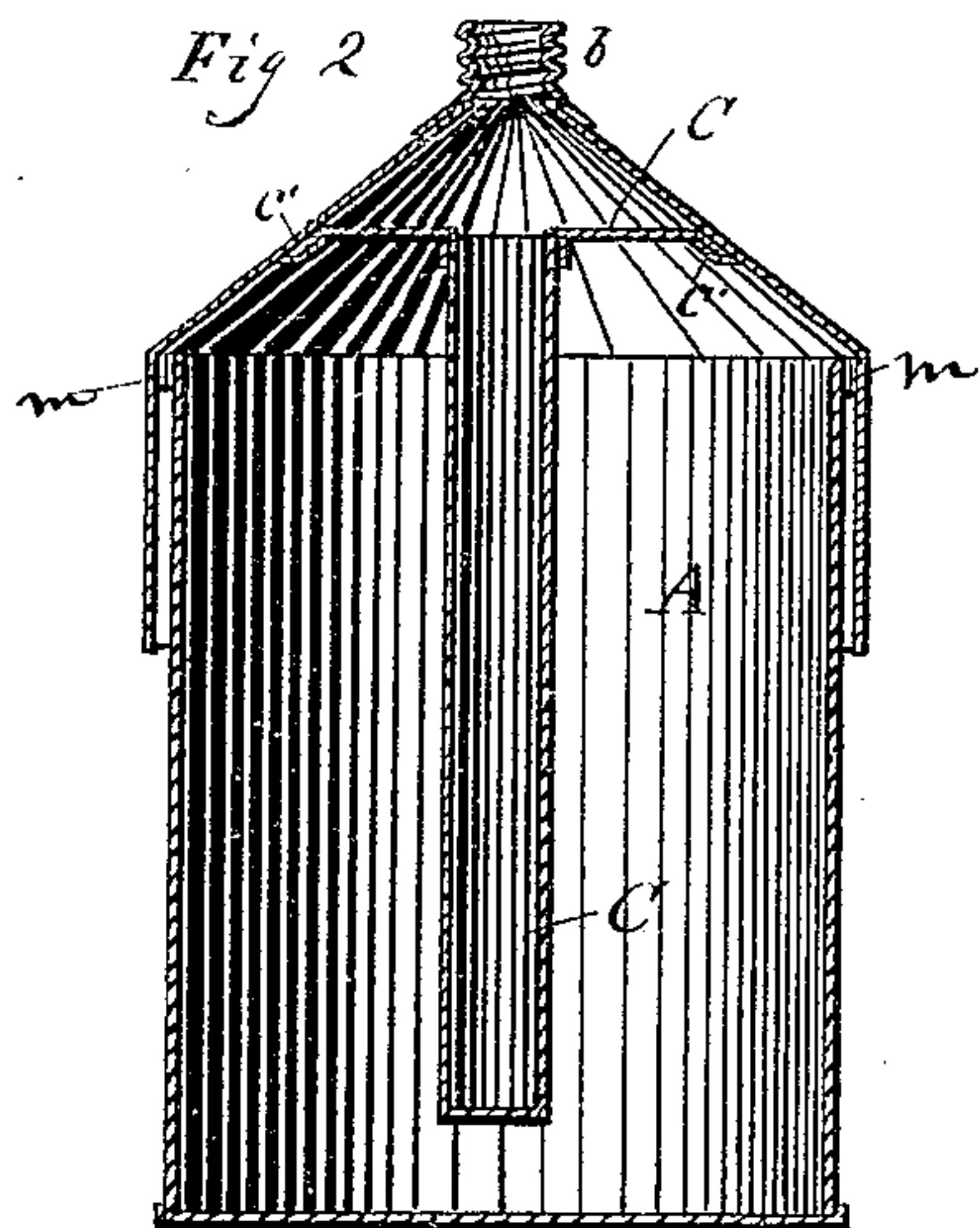
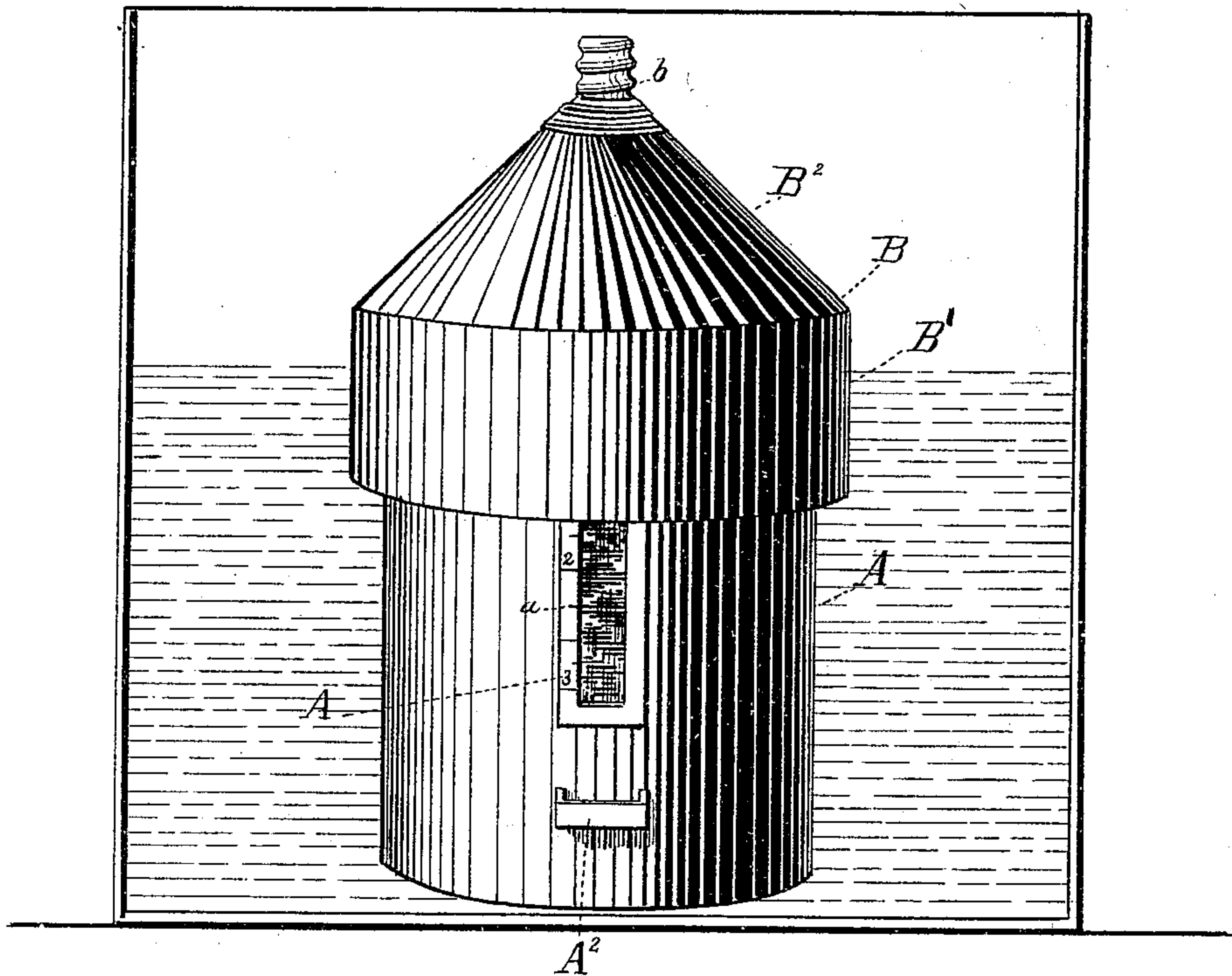
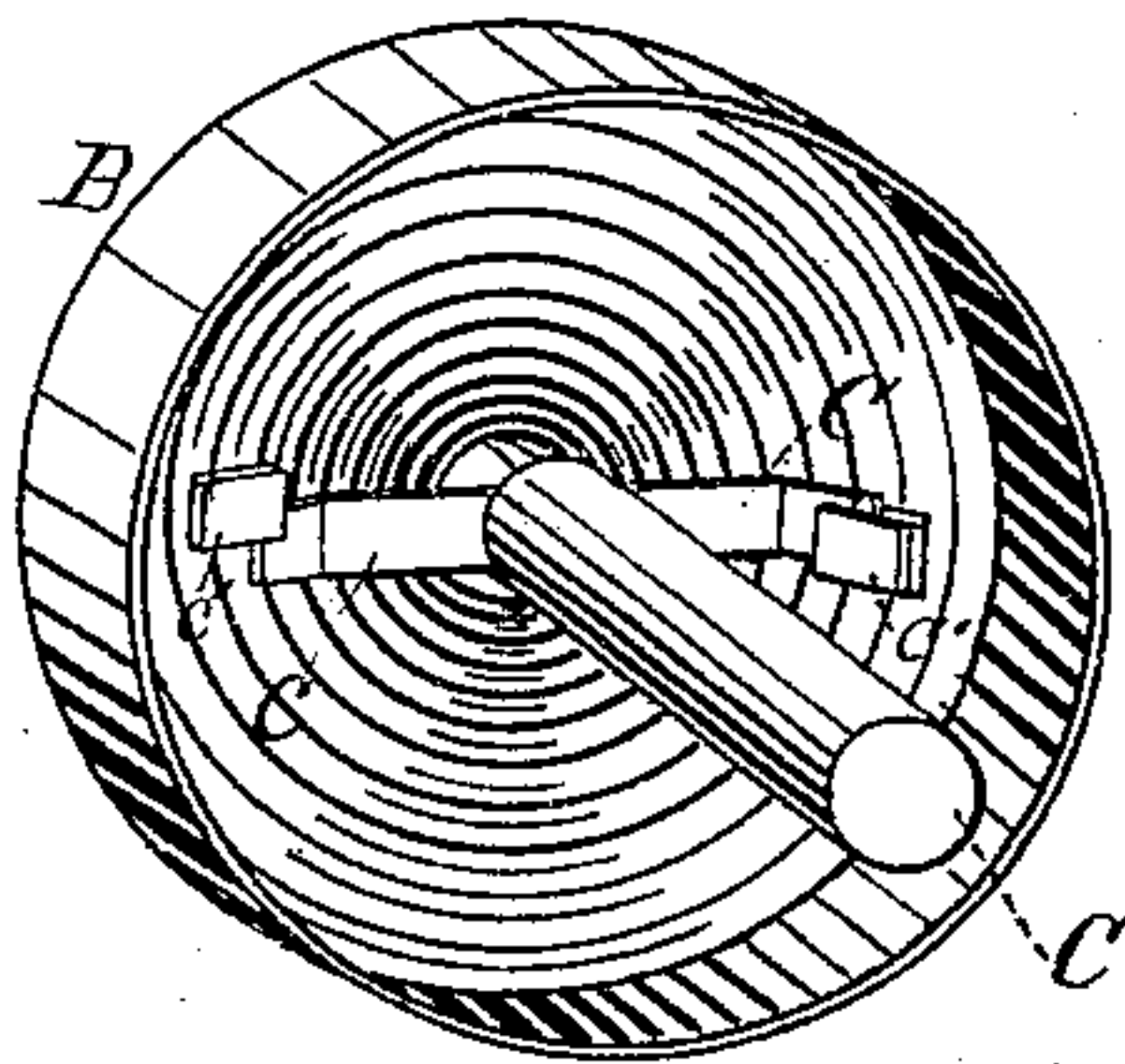


Fig. 3.



WITNESSES

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JOHN WILHELM, JR., OF WOOSTER, OHIO.

MILK-COOLER.

SPECIFICATION forming part of Letters Patent No. 248,903, dated November 1, 1881.

Application filed May 17, 1881. (No model.)

To all whom it may concern:

Be it known that I, JOHN WILHELM, Jr., of Wooster, in the county of Wayne and State of Ohio, have invented certain new and useful
5 Improvements in Milk-Coolers; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it pertains to make and use it, reference being had
10 to the accompanying drawings, which form part of this specification.

My invention relates to milk-coolers; and it consists in parts and combination of parts more fully hereinafter described and claimed.

15 In the drawings, Figure 1 is a view, in perspective, of my device, showing its position in a suitable reservoir adapted to contain water. Fig. 2 is a vertical sectional view of my cooler. Fig. 3 is an isometric view of the interior of
20 the cap or cover of the cooler, showing the central tube and the mechanism by which it is removably attached to the cover.

In the said drawings, A represents any suitable container, preferably constructed of metal and adapted to hold milk. This may be of any
25 desired shape; but in my description and drawings I have illustrated a cylindrical form. This container is preferably provided with a window, A', upon the sides of which may be placed
30 any suitable scale to indicate the amount of milk and cream or the amount of either that is contained in the can, as shown at a.

A² is any suitable handle, attached to the side of the container, by means of which it can be
35 more readily emptied of its contents.

B represents the cap or cover of my container, having one portion, B', of substantially the same shape as the container A, but of slightly-increased size, so as to adapt it to fit
40 readily over the container A. The other portion, B², of this top is preferably pyramidal or conoidal in form, having at its apex a removable cap or vent, b. The object of this vent is to permit the air to escape when the cap B is
45 being placed in position upon the container A, the latter being already submerged in the water. The cap is supported on the container by lugs or pieces m, attached either to the cap or upper edge of the container. After it is in
50 place this cap should be screwed down tightly to prevent the entrance of any air from the outside. The office of the conoidal or pyramidal

portion of my cap or cover B is to permit the vapor which is condensed upon the interior surface of this cap to be conducted by gravity 55 to the vertical portion of the cap B', from whence it is delivered outside of the can A, whereas if this portion of the cap or cover were flat, or substantially so, the vapor arising from the warm milk in the container A would be 60 condensed upon the interior of the cover and dropped back into the milk, whereas by my construction it is safely and readily conducted to the outside. To the interior of this cap I removably attach a central tube, C. This tube 65 is provided with any number of arms, which are adapted to engage with catches permanently attached to the interior of the conoidal portion B² of the cap, as shown at c'. The office of this tube C is to assist materially in cooling 70 the contents of the can. This may be readily accomplished by filling this container or tube with ice or cold water, as may be more convenient, its object being to introduce into the center of the can cooling material that will aid 75 in hastening the cooling of the mass of milk contained in the container A, thereby lessening the time required for the cream to rise. The object of making this removably attached to the cover is to permit of its being more read- 80 ily cleaned and filled.

Having thus described the construction of my device, its operation is as follows: The container A may be filled to any point with milk. I prefer to make these cans of varying sizes 85 to accommodate the amount of milk taken at each milking, which varies indefinitely, as it is equally useful for small or large dairies. This container is inserted in a bath of preferably cold spring-water or ice-water, as shown 90 in Fig. 1, to a depth something less than the height of the container. The tube C may now be filled with ice or cold spring-water and attached to the cover B, the cap b loosened, and the cover, with its tube C, then placed in position, 95 the former covering the container A, and the latter entering the center, or substantially the center, of the body of milk contained therein. The cap b is now closed tightly. The amount of milk and also the amount of cream can be 100 readily read through the window A', and measured by the gage a.

I do not in any degree limit myself to the locking mechanism shown in the drawings, by

means of which the central tube, C, is attached to the cover B, as any mechanism by means of which the tube C can be readily attached to or detached from the cap B will answer the purpose.

I am aware that the cover of a milk-can has been provided with a removable pendent ice-chamber, and hence I make no broad claim to such combination of parts. In my improvement I employ a conical cover having a vent at its upper end; and in order to allow a free escape of the vapors or gases arising from the milk, I secure the ice-receptacle within the upper portion of the conical cover by means of radial arms, thereby insuring a free space for the escape of vapors through the outlet in the upper portion of the cover.

What I claim is—

The combination, with the container A and conical cover B, provided with a vent, *b*, of the tube C, provided with radial arms *c c* at its upper end, said arms being adapted to engage in slips attached to the cover, substantially as set forth.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

JOHN WILHELM, JR.

Witnesses:

MAHLON C. ROUCH,
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