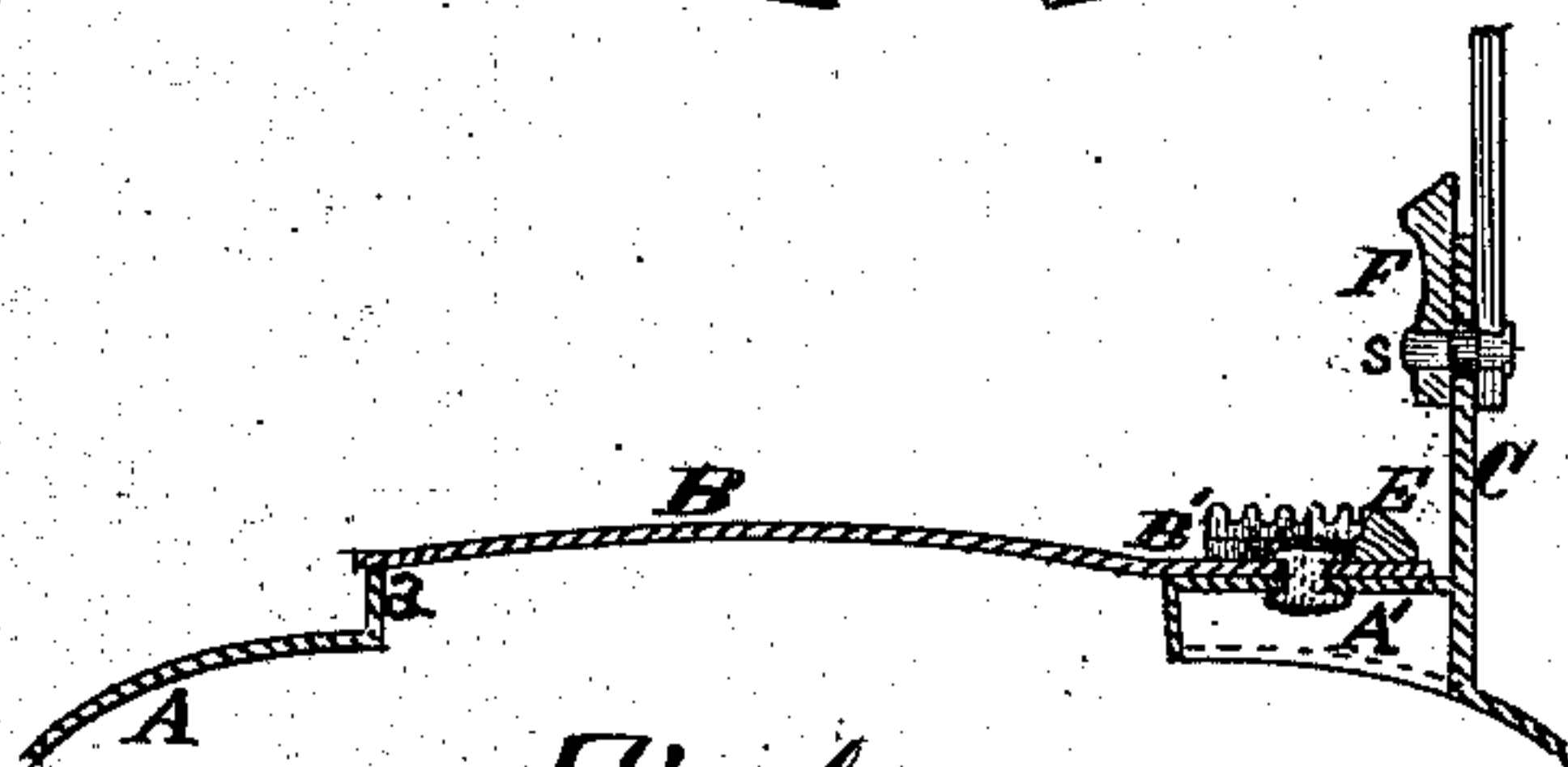
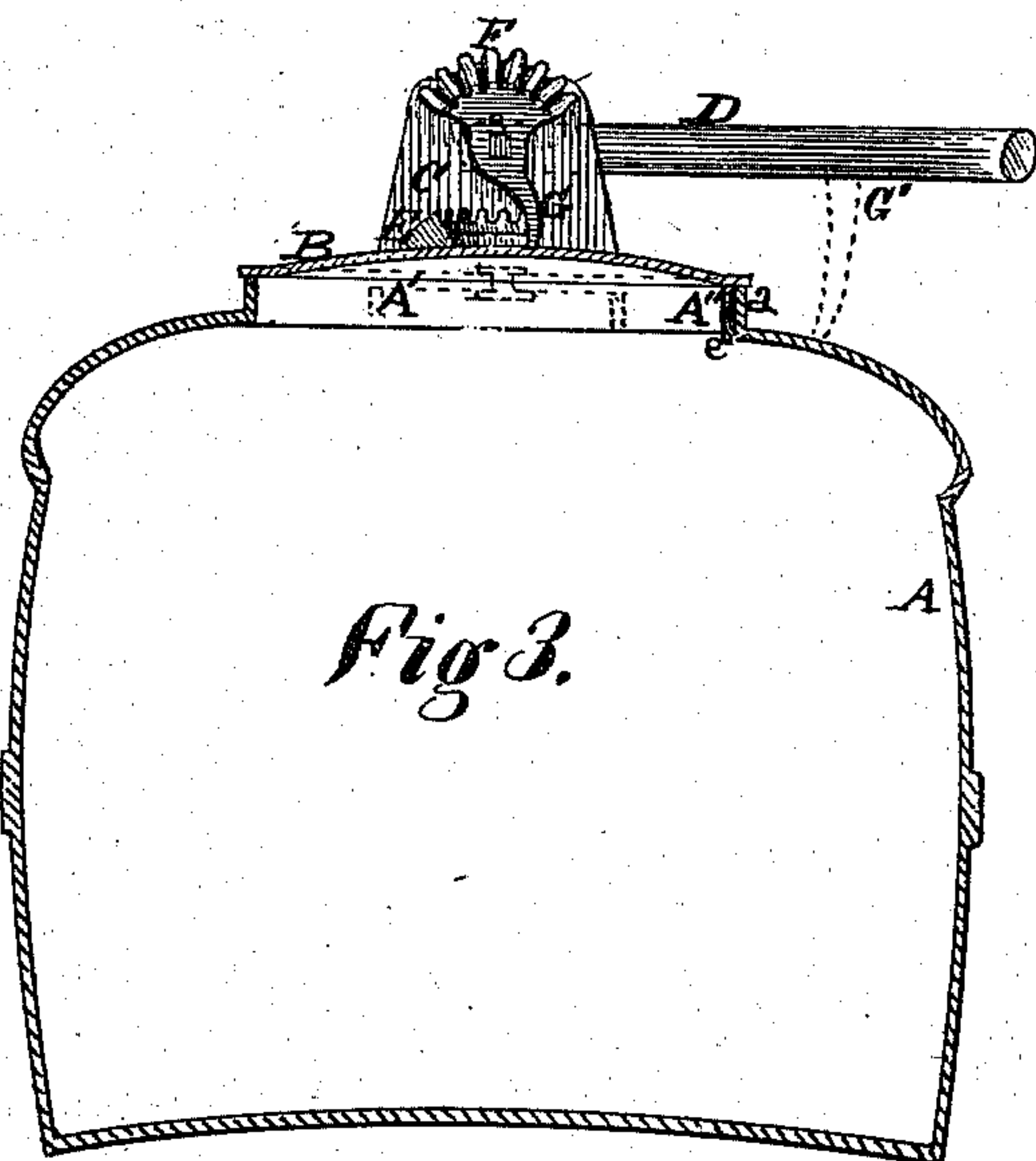
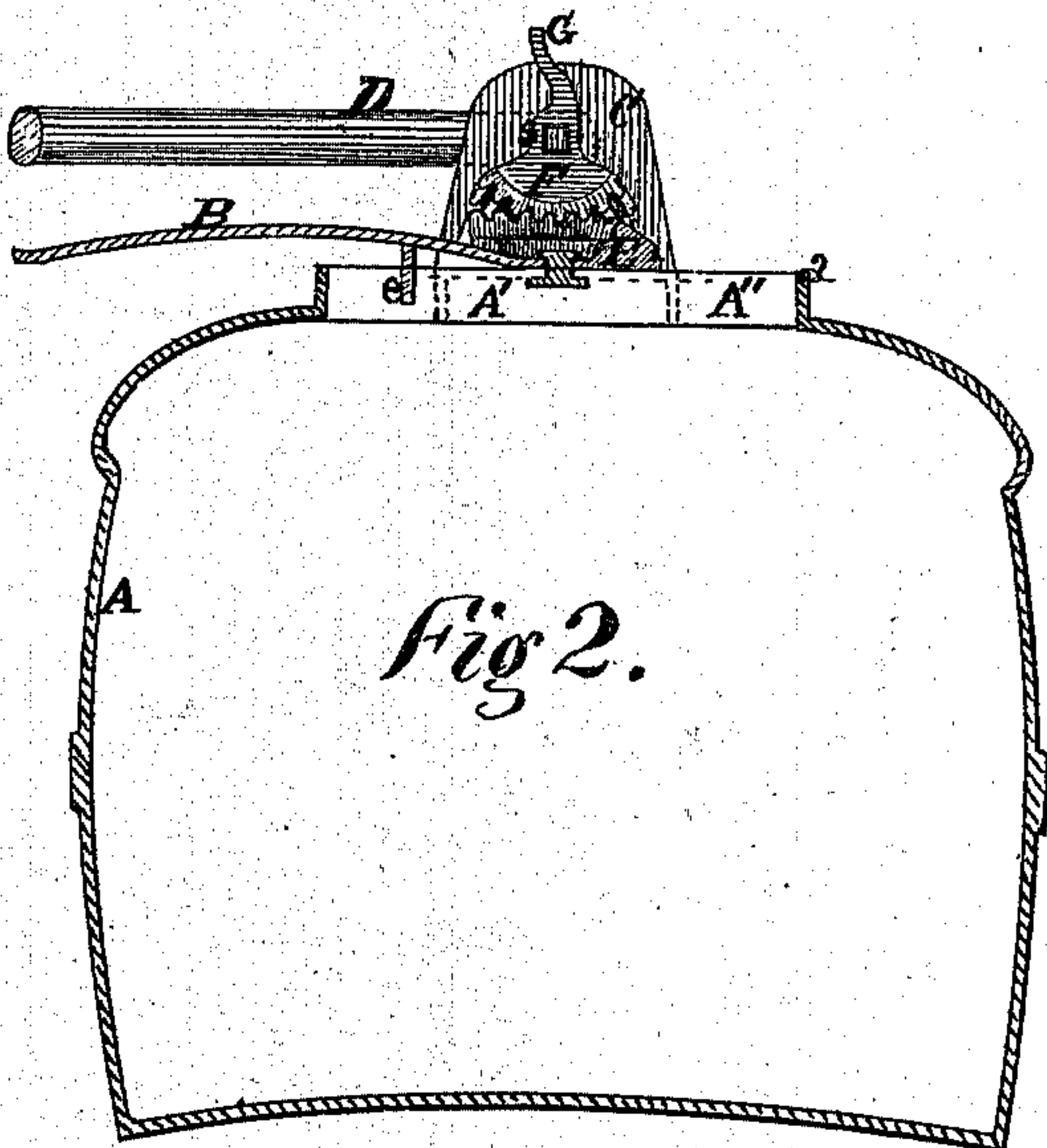
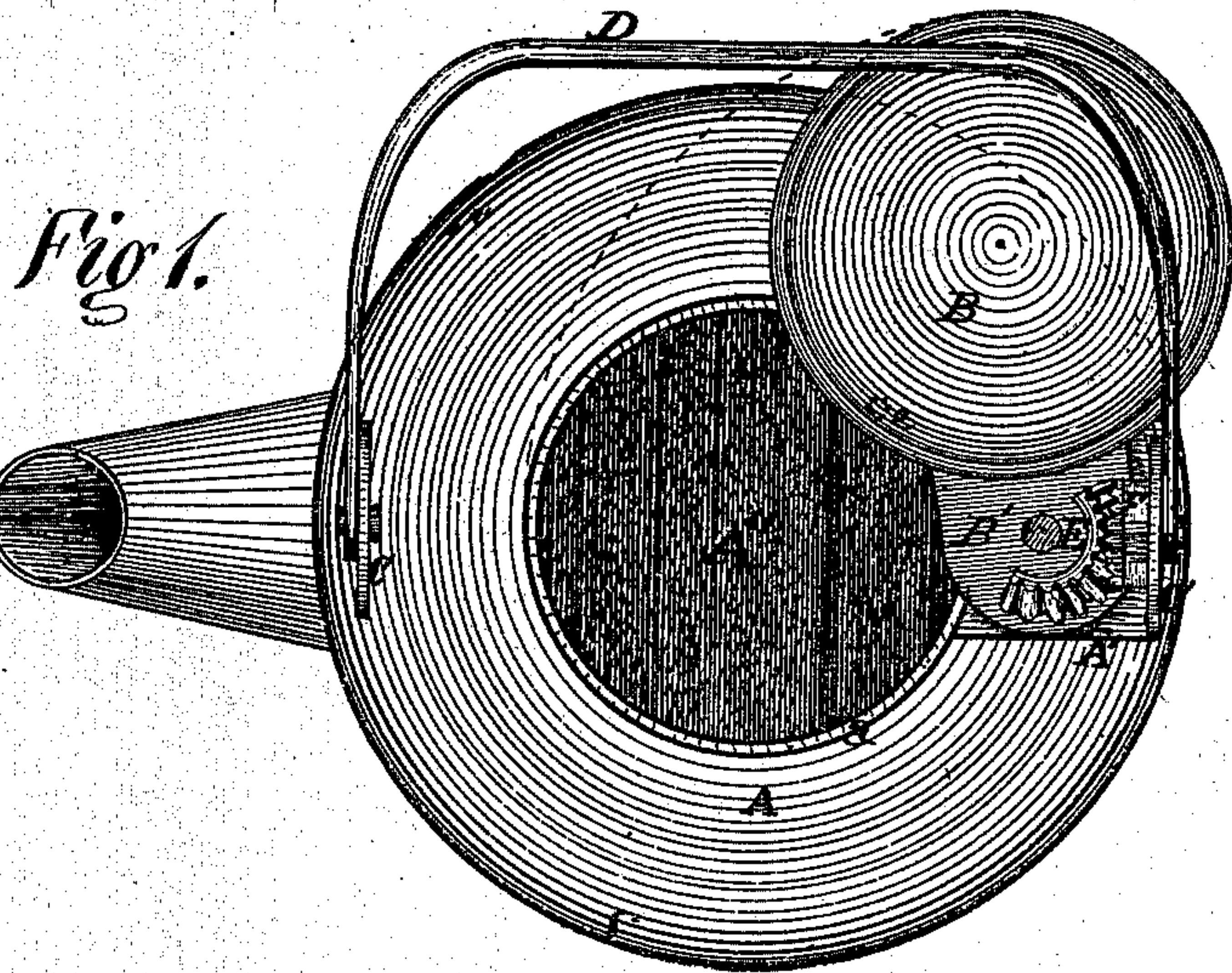


P. V. B. GANTZ.

Tea Kettle.

No. 112,581.

Patented Mar. 14, 1871.



Witnesses.

Fig 4.
Alex. Selkirk
John Selkirk

Peter, V. B. Gantz
Inventor.

United States Patent Office.

PETER V. B. GANTZ, OF ALBANY, NEW YORK, ASSIGNOR TO CHARLES E. GANTZ, OF SAME PLACE.

Letters Patent No. 112,581, dated March 14, 1871.

IMPROVEMENT IN TEA-KETTLES.

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, PETER V. B. GANTZ, of the city and county of Albany, State of New York, have invented certain new and useful Improvements in "Tea-Kettles;" and I do hereby declare that the following is a description thereof, reference being had to the accompanying drawing forming a part of this specification, in which—

Figure 1 represents a vertical view of a tea-kettle embodying the improvements in this invention.

Figure 2 represents a section of a tea-kettle, and illustrates one operation of the invention.

Figure 3 represents a section of a tea-kettle, and illustrates another operation of the invention.

Figure 4 is a side elevation of a section of a tea-kettle and the invention.

My invention relates to the combination of miter-gears or sections of the same, attached one to a wing of a lid and the other to the bail, by which the said lid is made to cover or uncover the opening in the tea-kettle; and consists, in the present case, of a section of a miter-gear attached to or made with a projecting wing starting out from one side of the lid or cover, which is pivoted to the kettle opposite one of the bail-ears in such a manner that the said cover will be capable of swinging on the said pivot to one side. The said gear thus attached is operated upon by a second gear or section of the same, attached in a proper manner to the bail, so that when the said bail is turned in one direction the gear attached to the same will operate the gear attached to one side, and when the bail is turned in an opposite direction the operation will be reversed.

My invention further relates to the combination of a pressing-finger with the bail, and consists in a metal piece attached directly with the bail, at right angles to the same, by which the handle of the bail will be supported from contact with the body of the kettle and thus prevent the said handle being heated, and at the same time, by contact with the gear on the cover, will keep the said cover closed over the opening in the kettle.

To enable others skilled in the art to make and use my invention, I will proceed to describe it in reference to the drawing and the letters of reference marked thereon, the same letters indicating like parts.

In the drawing—

A represents the body of a tea-kettle.

B is the lid or cover.

C C are the ears to receive the bail.

D is the bail-handle.

On one side of the body A of the kettle I build a platform or flat portion, A', opposite one of the bail-ears, C, as shown in figs. 1 and 4, the top surface of which is on the same plane with the top edge α of the opening A" of the kettle.

I make, with the lid or cover, B, a wing or projection, B', the lower surface of which is on the same plane as the lower edge of the cover B.

The cover B is, by its wing B', pivoted to the platform A', as shown in figs. 1, 2, and 4, from which the said cover can swing.

To the wing B' of the cover B is attached the section of a miter-gear, E, as shown, which miter-gear can, in cast-iron covers, be cast with the said covers.

To the bail-handle D, by means of the square rivet S, is attached the section of a miter-gear, F, in such a manner that, when the bail D is thrown from one side to the other, the said gear F is carried with it. And I do not confine myself to the particular manner of attaching the said gear F to the bail D, as the squared rivet S may be dispensed with, and the bail itself may be turned at an angle and passed through its ear C, and squared to receive the said gear F, which gear would then be riveted down.

I also attach to the bail D, at right angles with the same, the pressing-finger G. The said pressing-finger may be made with the gear F, or may be a separate piece, though I would prefer to make the said finger with the said gear, as being least expensive.

It is not necessary in all cases to make the pressure-finger fast to the bail at the ear, as shown, but it could be attached at other places, as at G', in fig. 3, shown by dotted lines.

The said pressing-finger G I prefer to place so as to strike against the side of the gear E, as shown in fig. 3, for when so placed a double use of the said pressing-finger G is obtained; that is, the said finger G is made not only to hold the bail up from contact with the body of the kettle, which will insure the handle of the bail against being heated by such contact, but will at the same time act with the weight of the bail to keep the cover B over the opening A", as shown in fig. 2.

The manner in which the several parts of my invention operate is as follows:

When the bail-handle D stands vertical, as in fig. 4, the cover B is free to turn on its pivot to be thrown off to one side or back over the opening by hand, without the aid of the gears, which is desirable for filling the kettle from a hydrant or pump or elsewhere where it is desirable to suspend the kettle by its bail while being filled.

When the handle D is thrown to one side, as in figs. 1 and 2, the gear F will be caused to turn and operate the gear E attached to the cover B, and turn it to one side to uncover the opening A". This is desirable, especially when it is necessary to refill the kettle while hot, and insures the operator from being scalded by the steam or being burned by the heat of the cover.

After being filled, if the handle D is thrown over to the opposite side, as in fig. 3, the gear will turn

with the said handle and operate the gear E in the reverse direction, and cause the cover B to swing over the opening to close the same.

When the bail is thrown over, as in fig. 3, the presser-finger G will strike against the edge of the gear E back of the pivot, and press the cover B toward the handle and fully over the opening A", when a stop, e, figs. 1 and 3, attached to the cover, striking against the side of the opening A", will prevent the cover turning too far toward that side.

The pressing-finger G, striking the said gear E or any other equivalent place, prevents the bail-handle from resting on the side of the kettle and from becoming hot.

The several parts of this invention are simple and not liable to get out of order, and its adoption would dispense with the necessity of using wooden-handled bails, which are somewhat expensive, for it is readily seen that, by preserving the handle from contact with the body of the kettle, the said handle will not become unduly heated, so as to burn the hands of the operator; and also that the cover, being capable of being removed from over the opening A", or closing over the same by the movement of the handle, will

insure the operator from being scalded by the steam from the kettle.

Having described my invention,

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

1. The combination of the gear E, or a section of the same, with the cover B, when the said cover is pivoted to the body of the kettle, substantially as and for the purpose set forth.

2. In combination with the bail-handle D, the gear E, or a section of the same, substantially as and for the purpose set forth.

3. In combination with the gear F and bail-handle D, the pressing-finger G, when all are arranged substantially as and for the purpose set forth.

4. Operating the cover B to uncover or cover over the opening A, by the movement of the handle or bail D, when the means used are the gears E and F, or sections of the same, combined with the cover B, arranged to swing on a pivot, the bail-handle to be operated substantially in the manner as set forth.

Witnesses: PETER V. B. GANTZ.

ALEX. SELKIRK,
CHAS. SELKIRK.