

G. LAUTERBACK.
CAN CLOSURE.
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925,201.

Patented June 15, 1909.

Fig. 1.

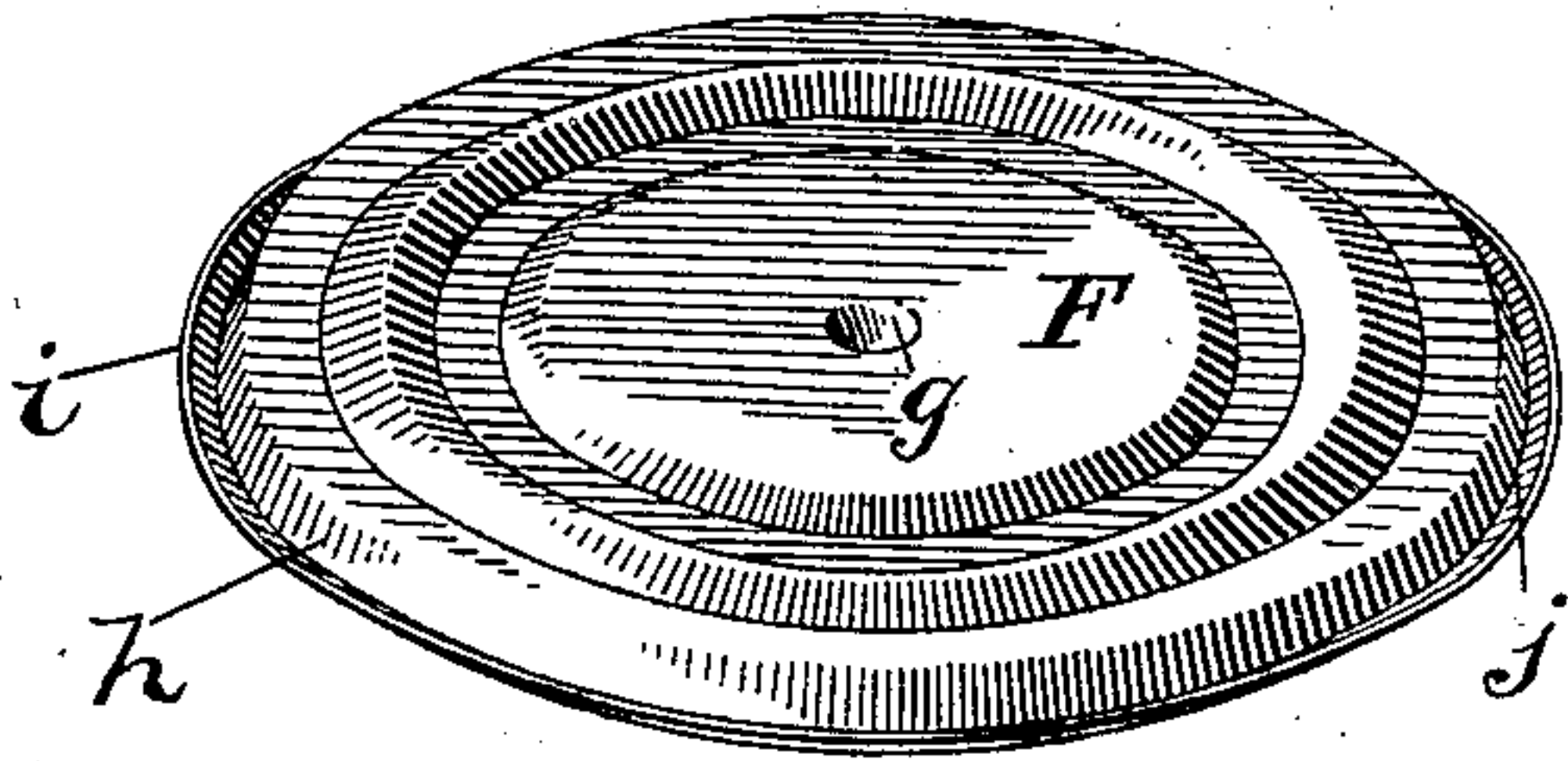


Fig. 2.

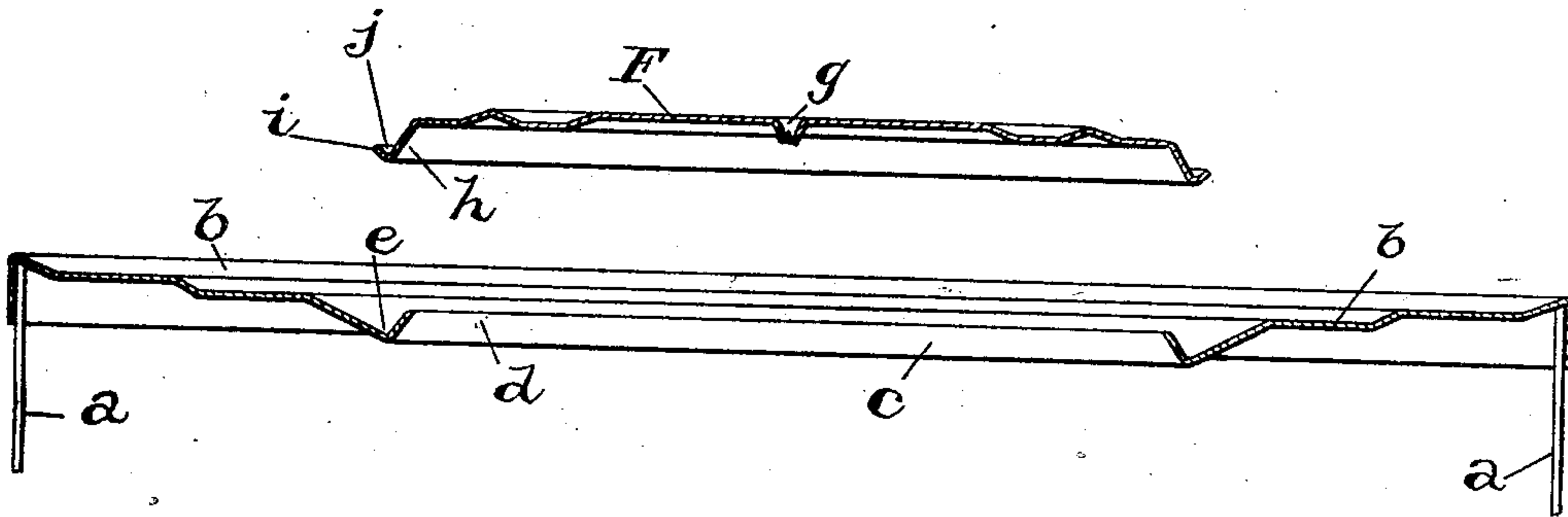


Fig. 3.

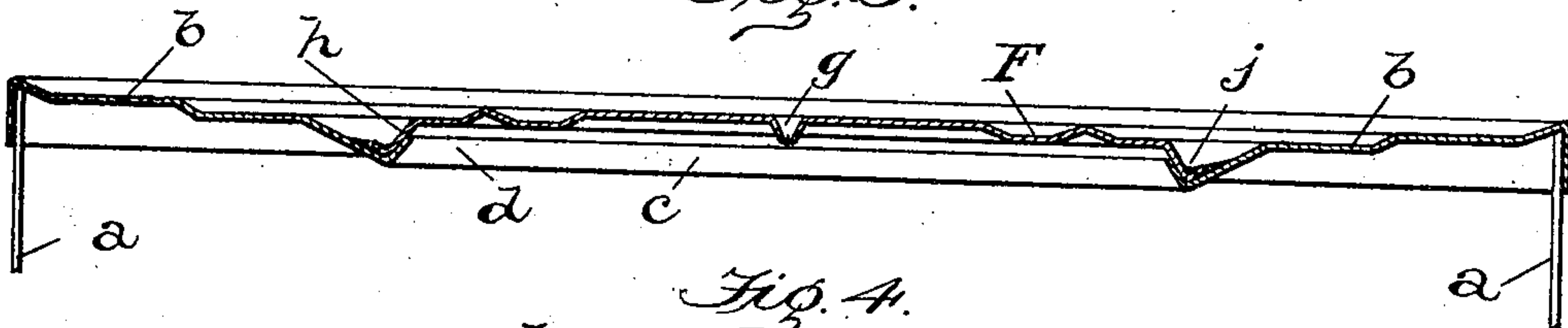
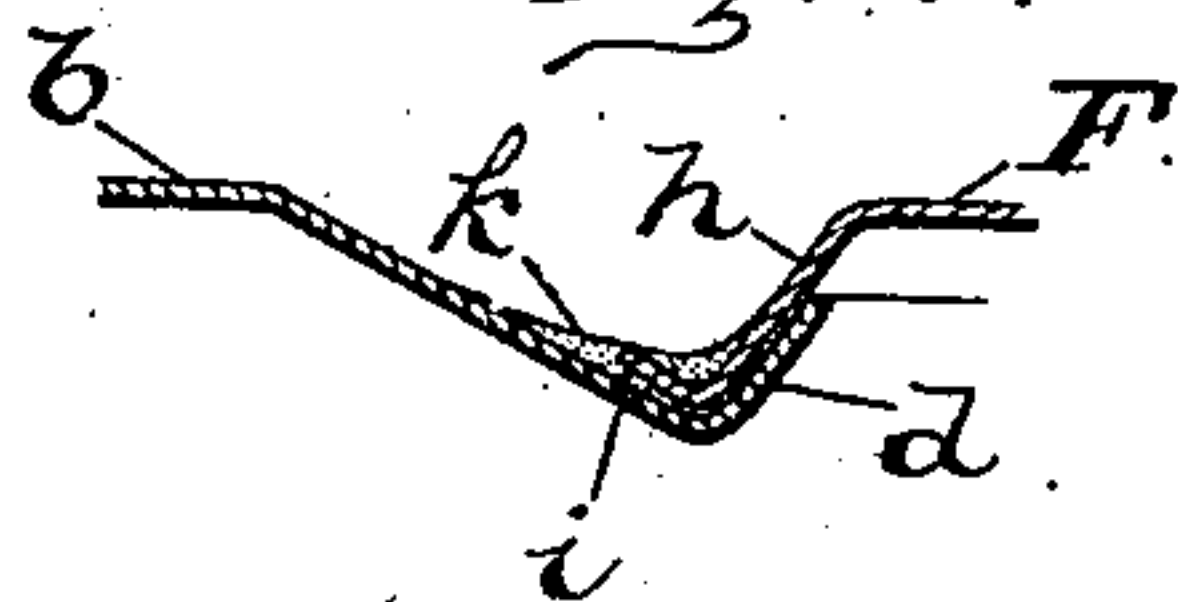


Fig. 4.



Witnesses

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CAN-CLOSURE.

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Specification of Letters Patent.

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To all whom it may concern:

Be it known that I, GEORGE LAUTERBACK, a citizen of the United States, residing at Baltimore, in the State of Maryland, have invented certain new and useful Improvements in Can-Closures, of which the following is a specification.

This invention relates to an improved construction of closure for the top-opening of tin-cans.

The ordinary tin-can used for hermetically sealing fruits and vegetables has a circular top-opening provided with an annular groove, and a cap which covers the opening has a down-turned rim flange which takes in the said annular groove and solder is applied around the rim-flange and groove. While a perfectly tight soldered joint is necessary, it is important in order to avoid discoloring the contents of the can, to effect the soldering of this cap joint by using the minimum amount of heat.

To enable this to be done, and to more certainly secure a tightly-soldered joint, especially in cans having top-openings of the larger size, is the object of the present invention.

Referring to the drawing, Figure 1 is a perspective view of the cap used for closing the top opening of a can. Fig. 2 is a diametrical section of both the can-top and the cap—the latter being elevated above the can-top. Fig. 3 is a diametrical section of the can-top and cap, the latter being in position closing the opening in the top. Fig. 4 is a sectional view on a larger scale, showing a portion of can-top and cap and the soldered joint uniting said parts.

The letter, *a*, designates a portion of the wall of a tin can; *b*, the top of the can; *c*, the opening in the top and, *d*, an upturned flange surrounding the edge of the opening. Adjoining and around this up-turned flange of the can-top is a depression, *e*, which constitutes the annular groove of the ordinary can. This groove in cross-section is usually V-shaped.

The cap, *F*, is provided with the usual central vent-hole, *g*, and the down-turned rim, *h*, has a pitch or angle position that corresponds with the up-turned position of

the flange, *d*, on the can-top, so that when the cap is placed over the can-top opening to close the latter, said down-turned rim, *h*, of the cap and up-turned flange, *d*, of the can-top will contact. The cap also has around the said rim an up-turned lip, *i*, whose pitch or inclination is the same as the corresponding side of the annular depression, *e*, in the can-top. The up-turned lip forms an annular imperforate gutter, *j*, adjacent the rim of the can-cap. The addition of this up-turned lip, *i*, on the cap-rim results in forming a V-shaped lower tinned surface on the cap which fits in and coacts with the V-shaped annular tinned surface of the depression on the can-top, and thus affords an increase in the area of the tinned surfaces of the cap to contact with the tinned surface of the top which surfaces will take solder and does not rely on the soldering of the raw edge of the cap to make a tight joint. Another advantage follows from the fact that the raw or cut-edge of the cap-rim, which edge is not coated with tin, is upward instead of downward as in the old style cap, and as this cut-edge is not necessarily included in the soldered joint the soldering operation can be effected by use of a minimum amount of heat and thereby avoid discoloring the contents of the can. The annular gutter, *j*, on the cap also serves to retain the flux and solder and when the heated soldering iron or steel is brought into operation it fits into said gutter and displaces the flux and solder and heats the tinned surfaces while the flux and solder sweats between them.

In Fig. 4 of the drawing the position of the parts forming the soldered joint is shown, and the solder, *k*, is also shown.

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

A can-closure comprising a can top having a central opening with an upturned flange around the same and forming a V-shaped channel, a top having a V-shaped circular channel extending around the same adjacent the marginal edge thereof and the outer wall of the top channel extending upwardly to elevate the marginal edge of the cap in a

plane above the said top channel whereby
the V-shaped channel portion of the top may
seat in the V-shaped channel of the cover
with their flat tinned surfaces in contact for
5 soldering and the cut raw edges of both top
and cover having position in a plane above
the flat contacting tinned surfaces.

In testimony whereof I affix my signature
in presence of two witnesses.

GEORGE LAUTERBACK.

Witnesses:

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