T. G. F. DOLBY.
Sheet-Metal Can.

No. 221,539. Patented Nov. 11, 1879.

Fig. 1.

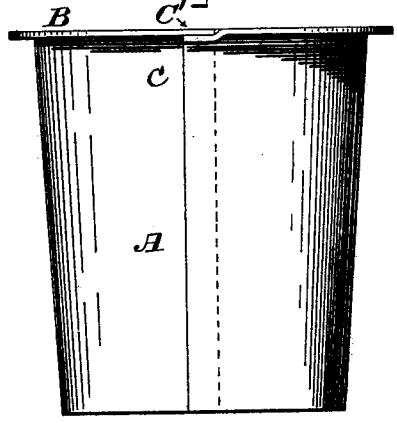


Fig. 2.

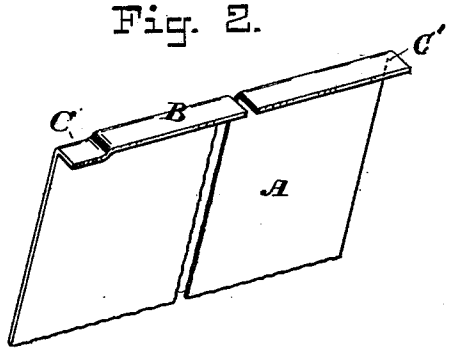


Fig. 4.

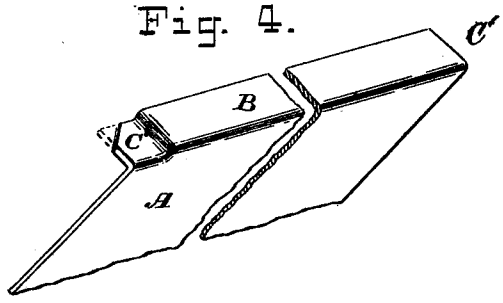
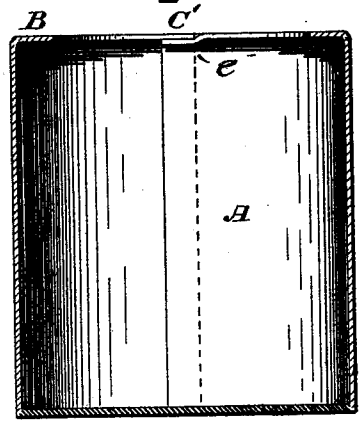


Fig. 3.



WITNESSES:

Henry Cunningham

John G. Chapman

INVENTOR:

Thomas G. F. Dolby.

By his Attorneys:

Wm. L. Stewart

N. PETERS, PHOTO-LITHOGRAPHER, WASHINGTON, D. C.

UNITED STATES PATENT OFFICE.

THOMAS G. F. DOLBY, OF LONDON, ENGLAND.

IMPROVEMENT IN SHEET-METAL CANS.

Specification forming part of Letters Patent No. **221,539**, dated November 11, 1879; application filed September 30, 1879.

To all whom it may concern:

Be it known that I, THOMAS G. F. DOLBY, of London, England, have invented or discovered certain new and useful Improvements in Seamed Tinware, of which the following is a specification.

My invention has special reference to tin cans or vessels to be employed for the preservation of food or provisions, and which are to be hermetically closed by a lid or cover kept down by atmospheric pressure only.

In constructing these vessels it is essential, in order to obtain the required hermetic closing, that the flange upon which the cover and the interposed packing-ring is to rest shall be perfectly level, smooth, and flush all around, whether the flange be turned in or out; but in the manufacture of flanged tin vessels in the ordinary way the overlapping edges of the flange at the joint produces an unevenness which is fatal to success in attaining a hermetic joint.

To obviate this defect is the purpose of my present invention, which I will now describe.

My object is to produce a perfectly level-surfaced flange to receive the packing and cover.

To this end I form the body of the can in the usual way and solder in the bottom. I then either throw the edge over by means of a "jenny" in the usual way, and then make the top surface of the flange smooth by means of dies, or I may perform the whole operation by means of specially-constructed dies.

When the flange is first turned by a jenny, I employ a flat-surfaced die for the face of the flange, and for the under surface of the flange a die having a recess cut in its face corresponding in width to the width of the flange, in length to the length of the lap at the joint, and in depth to the thickness of the metal of which the flange is formed, or, perhaps, a trifle more. When these dies are forced together with the flange between them and the lap arranged to coincide with the recess in the die, the extra thickness of metal on the under side of the flange at the lap is depressed into the recess in the die and the upper surface of the flange is made true and level. The seam at the flange may be then resoldered, if necessary, and the solder smoothed down.

In the drawings which serve to illustrate my invention, Figure 1 is a side elevation of a finished vessel with an outwardly-turned flange constructed according to my invention. Fig. 2 is a perspective view, showing the appearance of the flange if the vessel were unrolled or flattened out. Fig. 3 is a section of a vessel having an inturned flange constructed according to my invention, and Fig. 4 shows the flange and body of the vessel flattened out.

A is the body of the can, and B the flange. At C is shown the underlapped, and C′ is the overlapped, portion of the flange as depressed by the dies.

A portion of the underlap at the seam may be clipped away, if found desirable, for the better working of the dies, and the remainder be depressed by the dies; but some portion of the flange should overlap, as it makes a stronger and firmer joint.

A joint might, however, be formed by cutting away the entire overlap and bringing the edges together, so as to form a butt-joint, which could be soldered, and the flange then be made true by plain dies, as before described.

The dies herein generally described I propose to make the subject of a separate application for a patent.

What I claim as new is—

As an article of manufacture, a seamed tin vessel having a flange turned at the top, the underlapping portion of the flange at the seam being depressed, and the overlap lying in the depression, as shown, whereby the upper surface of the flange is made true and level, for the purposes specified.

In witness whereof I, the said THOMAS GEORGE FONNEREAU DOLBY, have hereunto set my hand this 12th day of September, 1879.

Witnesses: T. G. F. DOLBY.

E. H. FOULKE,

THOMAS BAIRD.