

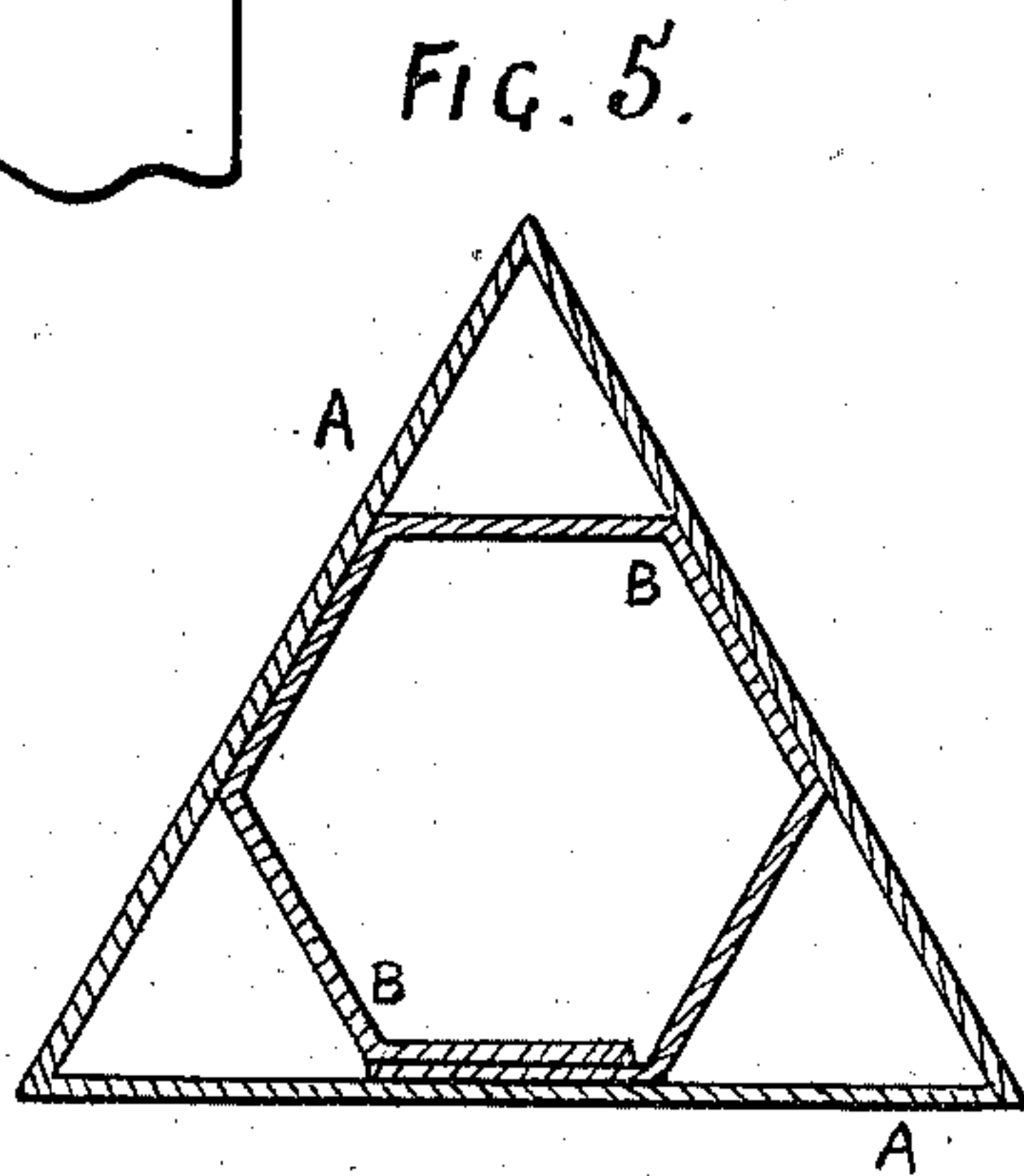
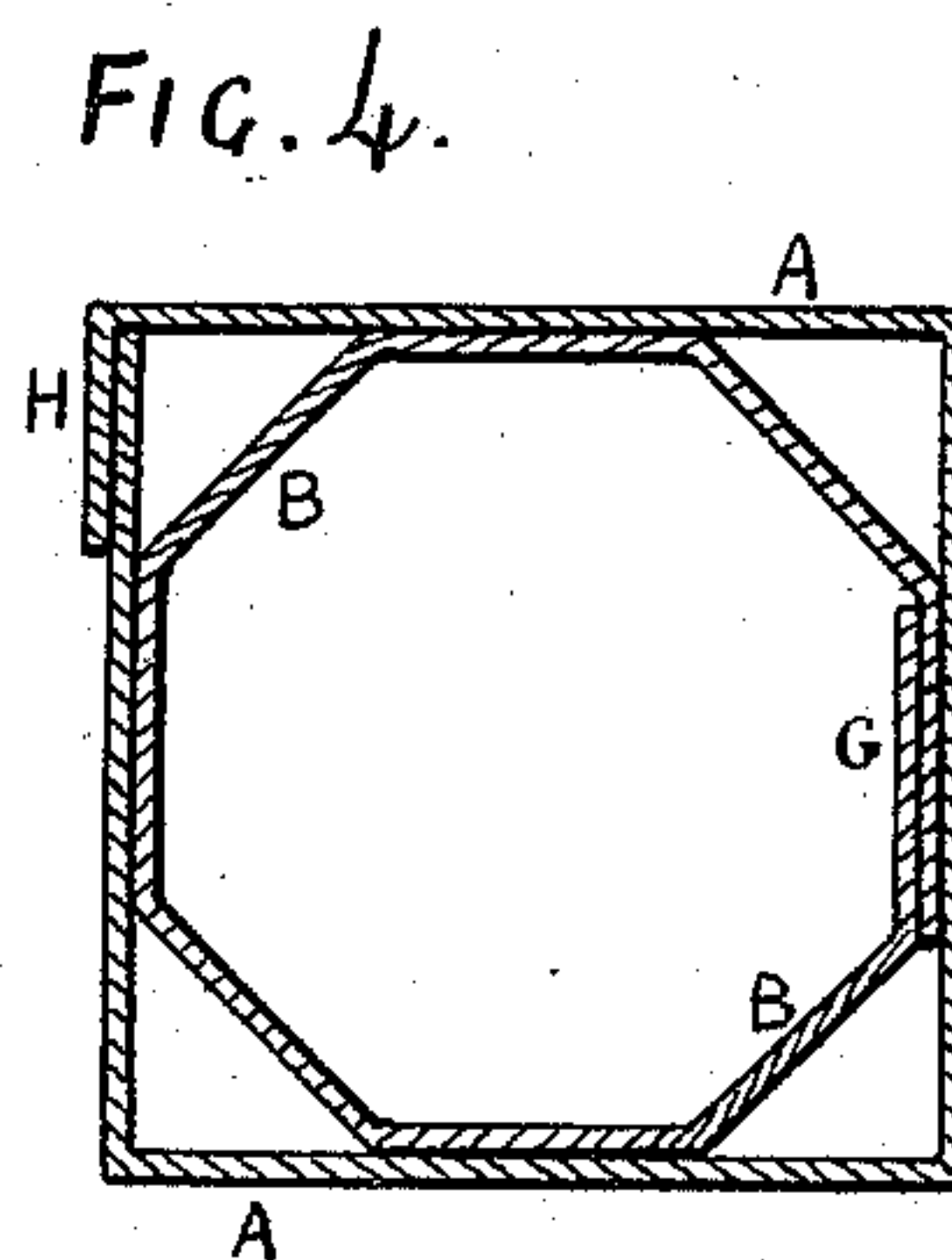
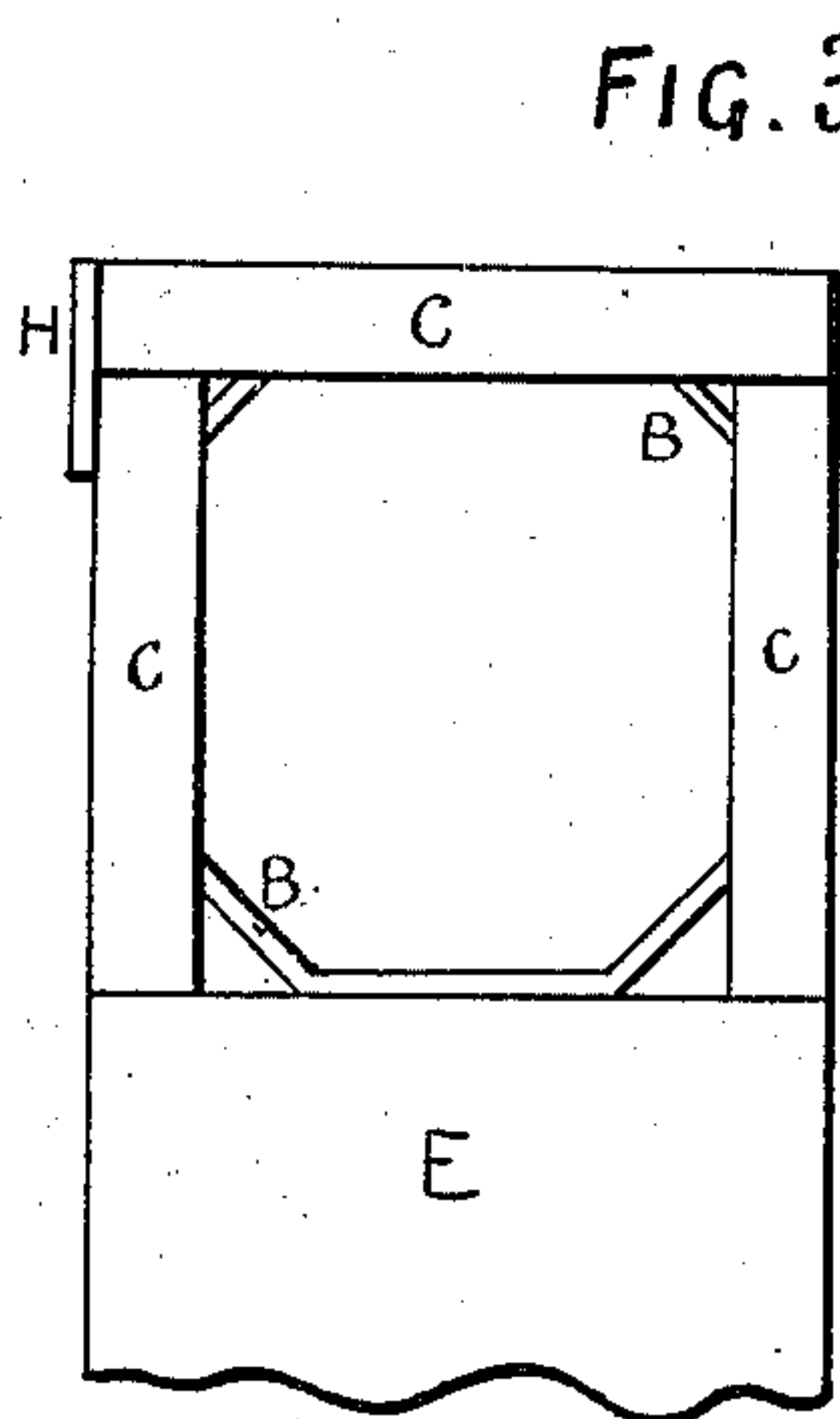
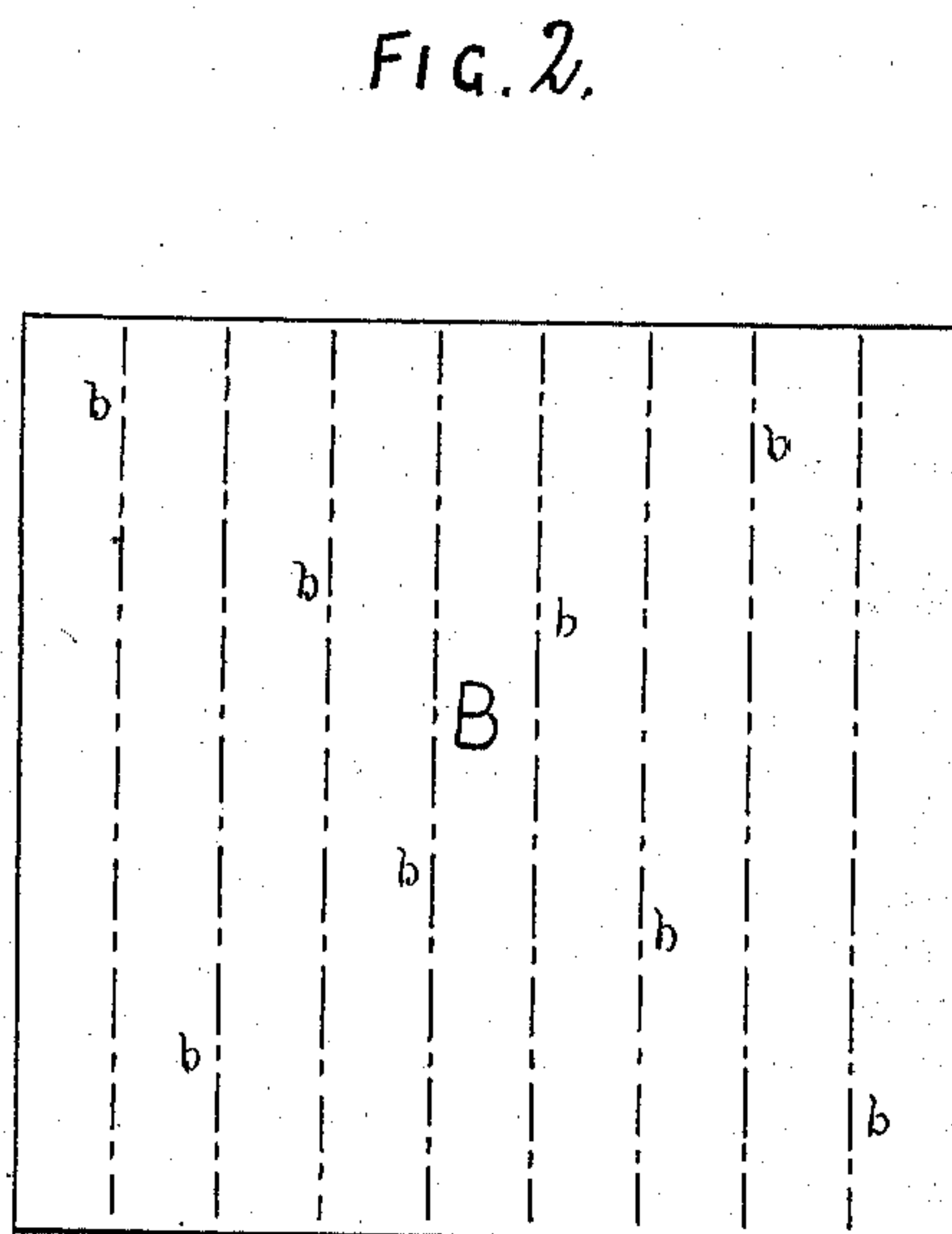
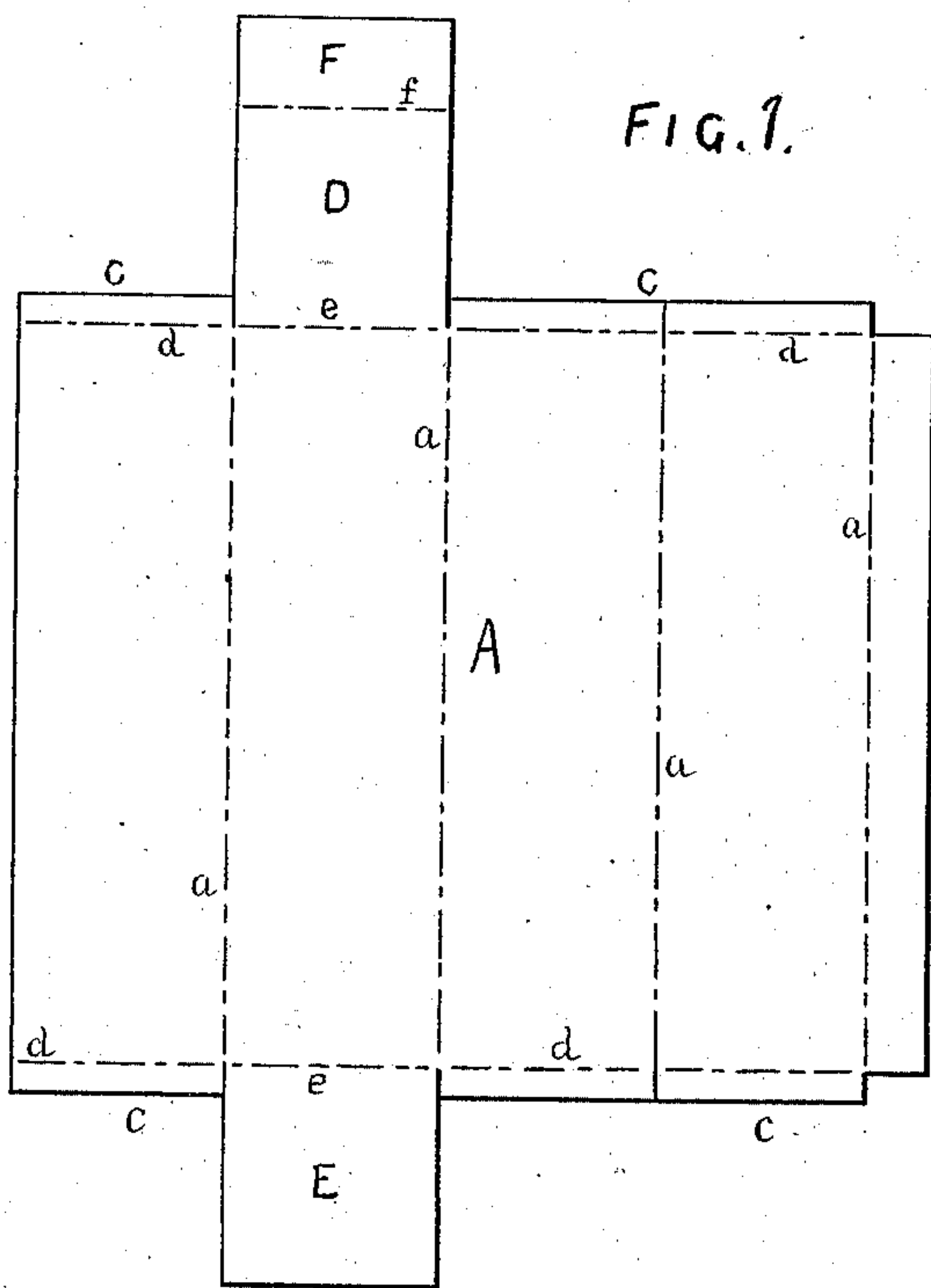
(No Model.)

A. H. STOREY.

BOX OR CASE.

No. 382,120.

Patented May 1, 1888.



Witnesses:
Alex. Barkoff
John E. Parker.

Inventor:
Albert Harley Storey.
by his Attorneys.
Houston & Sons.

UNITED STATES PATENT OFFICE.

ALBERT HARLEY STOREY, OF LONDON, ENGLAND, ASSIGNOR TO THE
STOREY PATENT CASE COMPANY, (LIMITED,) OF SAME PLACE.

BOX OR CASE.

SPECIFICATION forming part of Letters Patent No. 382,120, dated May 1, 1888.

Application filed August 30, 1887. Serial No. 248,296. (No model.) Patented in England September 18, 1883, No. 4,446.

To all whom it may concern:

Be it known that I, ALBERT HARLEY STOREY, a subject of the Queen of Great Britain and Ireland, and a resident of London, England, have invented certain Improvements in Boxes or Cases formed of Card-Board or other Similar Material, of which the following is a specification.

The object of my invention is to construct a box or case of card-board or other similar material, which, while it will be very light, shall at the same time be extremely stiff and strong, and therefore very suitable for the transmission of bottles or other fragile articles by parcel-post or otherwise. I carry out this object by forming the box or case with two shells, of which the outer shell may have three or four, or more, sides, while the inner shell has double the number of the sides of the outer shell, and these two shells are so placed in respect of each other that each alternate side of the inner shell is opposite one of the angles of the outer shell and supports and stiffens the same.

In the accompanying drawings, Figures 1, 2, 3, and 4 show one means of constructing a box according to this my invention. Fig. 1 is the outer shell of a box of a quadrilateral section before the formation thereof. Fig. 2 is the inner shell of the same in a like stage. Fig. 3 is an end view, on an enlarged scale, of the box when made. Fig. 4 is a cross-section of the same. Fig. 5 shows a modification.

I take a piece of card-board or other material, A, in Fig. 1, of a suitable size and shape for the outer shell of the box that is required, and in this piece of material, A, I make four longitudinal scores, *a*, (shown by broken dotted lines,) which scores *a* may, if required, be partially cut through the material, to enable me easily to bend the piece A into the required form of a quadrilateral section. I also make two transverse scores, *d*, also shown by broken dotted lines, in the same manner when I want to provide edges C to be turned over the ends of the box, as shown in Fig. 3. When the box is to be formed as shown, the ends D and E of the box are also made in this piece A, and scores *e* are made in the same manner to enable me easily to bend these ends D and E into their required places, and another score,

f, is made in the end D, which forms the lid of the box, so that the part F thereof can be turned over on the opposite side of the box when an article is placed therein and be there secured in any convenient manner to safely inclose the article. I then take another piece of card-board or other material, B, in Fig. 2, of a suitable size and shape for the inner shell of the required box, and in this piece of material B, I make eight longitudinal scores, *b*, (shown by broken dotted lines,) in the same manner, to enable me easily to bend the piece B into the required form of an octagonal section. To this piece B ends may also be fitted, if required, as before described. This piece B is then bent into the required form, and the lateral edges thereof overlap, as shown at G in Fig. 4, and can be secured together by glue or otherwise. Round this inner shell, B, of octagonal section is then placed the outer shell, A, of quadrilateral section, and the lateral edges of the piece A overlap, as shown at H in Figs. 3 and 4, and can be secured together by glue or otherwise. These shells A and B are so placed in respect to each other that every alternate side of the inner shell, B, is in contact with one of the sides of the outer shell, A, and can be secured thereto by glue or otherwise. The other alternate sides of the inner shell, B, are therefore opposite the angles of the outer shell, A, and support and stiffen the same. The edges C, if any, are then turned over one end of the box, as shown in Fig. 3, and may similarly be secured thereto, and the end piece, E, is bent over all and secured in position by glue or otherwise, and the box is ready for use. The bottle or other article can then be inserted through the open end of the box, and the lid D is bent over and the part F thereof secured on the opposite side of the box in any convenient manner, the edges C, if any, having previously been turned over, as aforesaid. The parcel is then ready for transmission.

This method of construction, as described, and shown in the drawings, is very convenient; but obviously I do not limit myself thereto. For example, the lateral edges of the shell may butt against each other, which butt may be lined, if desired, with a strip of any material, in which case only the proper number of scores *a* and *b* would be made. Again, each of the

shells may be made of two or more pieces, if desired, these pieces being joined together in any usual manner.

When the material of which the box is to be made is stout and stiff, the scores aforesaid are preferably cut thereinto; but when the material is thin and light the pieces can be bent into the required forms without cutting the scores.

10 In Fig. 5 I show a cross section of another form of box, in which the outer shell, A, is of a trilateral section, while the inner shell, B, is of an hexagonal section. In this case, also, these shells are so placed in respect to each other that every alternate side of the inner
15 shell, B, is in contact with and can be secured to one of the sides of the outer shell, A, while the other alternate sides of the inner shell, B, are opposite to and support and stiffen the angles of the outer shell, A. In like manner
20 these boxes can be made of any other form, as may be desired.

It may sometimes be desirable to combine two or more receptacles in one box. This can
25 obviously be very easily effected, especially in boxes of trilateral or quadrilateral section. This is done preferably by placing the two or more inner shells together and surrounding these inner shells by one outer shell made

properly therefor, in manner as hereinbefore 30 described, or, according to another method, by placing two or more of the complete boxes together and surrounding these boxes by another outer shell. I can also cover and ornament the boxes when made as I may desire.

I claim as my invention and desire to secure 35 by Letters Patent—

1. A box or case of card-board or other material, having an inner and an outer shell, the inner one having twice as many sides as the 40 outer shell and the alternate sides of the inner shell being opposite the angles of the outer shell, as and for the purpose set forth.

2. A box or case of card-board or other material, having an inner and an outer shell, the 45 inner one having twice as many sides as the outer shell and having its alternate sides in contact with the sides of the outer shell, while the intermediate sides of the inner shell are opposite the angles of the outer shell. 50

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

ALBERT HARLEY STOREY.

Witnesses:

J. HALL DAVIES,
THOS. SMITH.