



No. 685,977.

Patented Nov. 5, 1901.

G. A. DICKER.  
FOLDING BOX.

(Application filed May 29, 1901.)

(No Model.)

2 Sheets—Sheet 2.

FIG 3

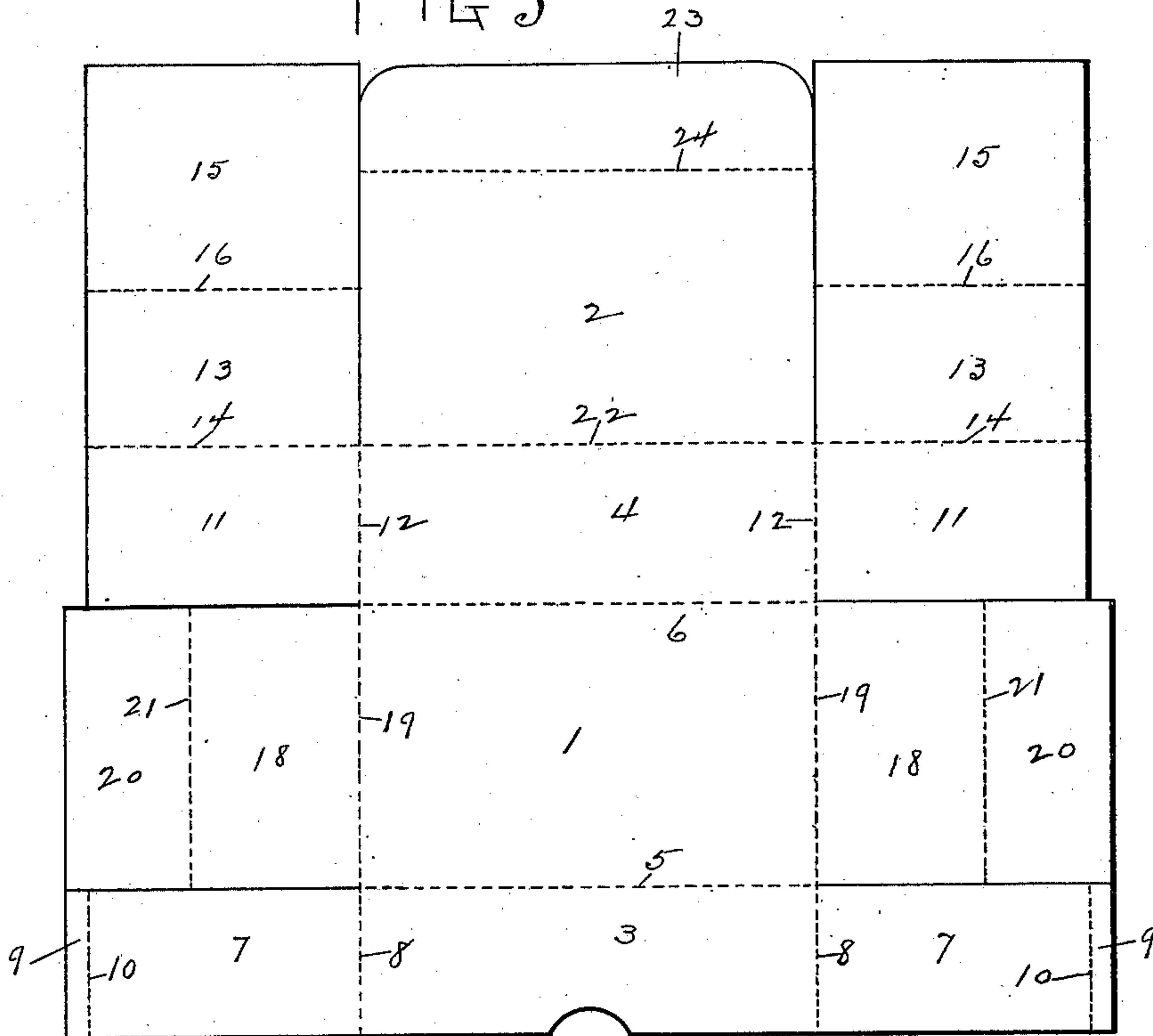


FIG 4

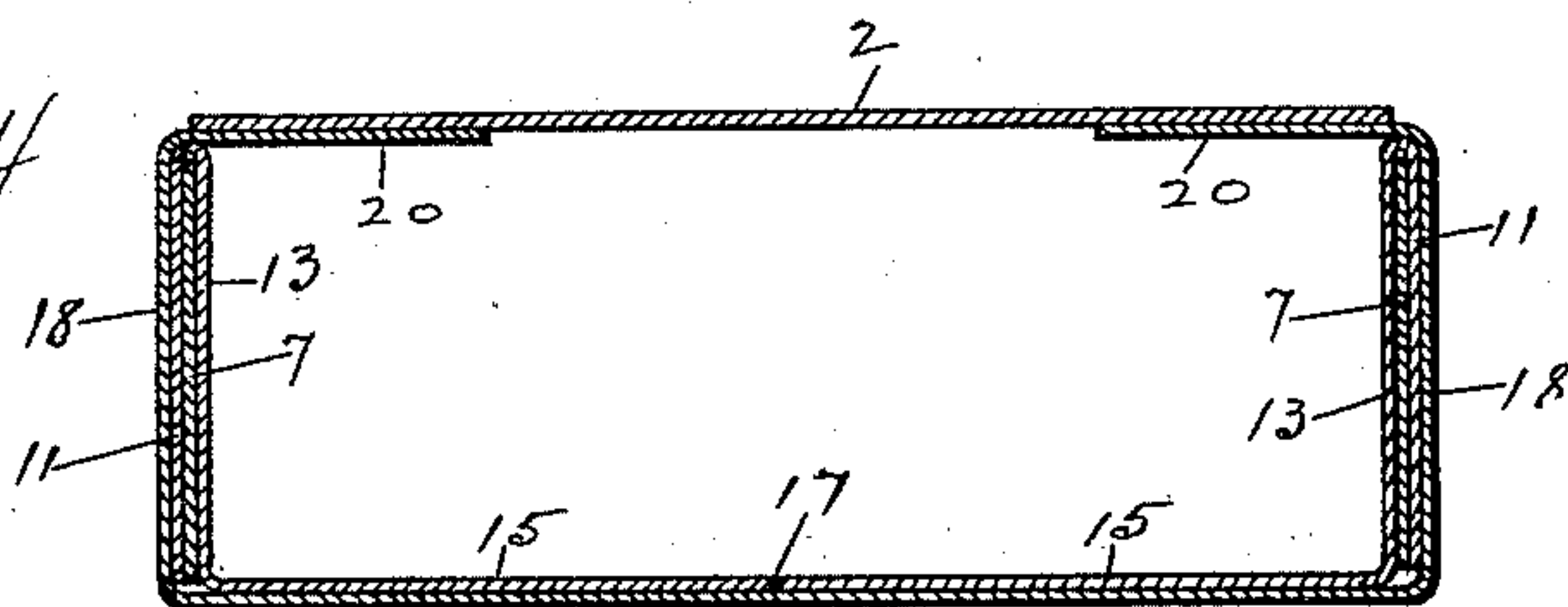
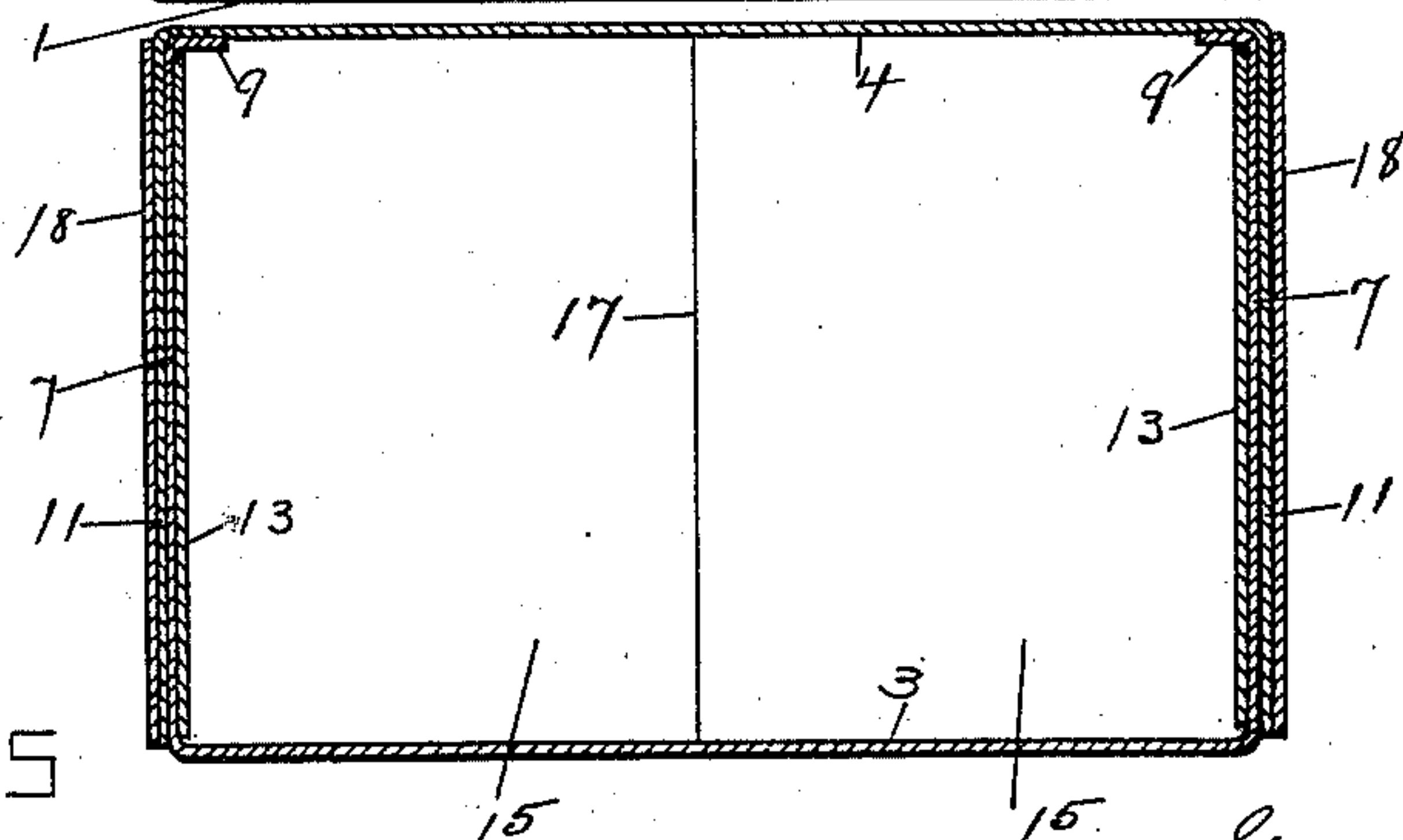


FIG 5



WITNESSES

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# UNITED STATES PATENT OFFICE.

GEORGE A. DICKER, OF TROY, NEW YORK.

## FOLDING BOX.

SPECIFICATION forming part of Letters Patent No. 685,977, dated November 5, 1901.

Application filed May 29, 1901. Serial No. 62,345. (No model.)

*To all whom it may concern:*

Be it known that I, GEORGE A. DICKER, a citizen of the United States, residing at Troy, county of Rensselaer, and State of New York, have invented certain new and useful Improvements in Folding Boxes, of which the following is a specification.

The invention relates to such improvements; and it consists of the novel construction and combination of parts hereinafter described and subsequently claimed.

Reference may be had to the accompanying drawings and the reference characters marked thereon, which form a part of this specification.

Similar characters refer to similar parts in the several figures.

Figures 1 and 2 of the drawings are views in perspective of my improved box open and with certain of the flaps partly opened out to better illustrate the construction. Fig. 3 is a plan view of the slitted and creased blank of flexible material adapted to be folded up to form my improved box. Fig. 4 is a central vertical longitudinal section of the box. Fig. 5 is a horizontal cross-section of the box.

The object of my invention is to provide a simple and strong paper box by merely cutting, creasing, and folding a sheet of paper or paper-board or like material and without the use of paste or retaining devices other than portions of the blank itself.

As shown in Fig. 3, the blank from which my improved box is made is in the form of an almost perfect rectangle, permitting the same to be cut from a large sheet or roll of stock with practically no waste. The solid lines in said figure represent lines of severance of the material, while the dotted lines indicate creases or fold-lines, the blank being divided by said solid and dotted lines into various walls and flaps adapted when properly folded together to form the box shown in the other figures of the drawings.

1 represents the bottom, 2 the top, 3 the front wall, and 4 the back wall, of the box.

In forming the box the front and back walls 3 and 4 are folded upwardly to vertical positions upon the fold-lines 5 and 6, which constitute hinges whereby the lower edges of said front and back walls are respectively connected with the bottom. The flaps 7,

hinged to the opposite ends of the front wall 3, along the lines 8, having thus been brought into a vertical plane are folded inwardly at right angles to said front wall, so that their ends abut upon the back wall 4, said abutting ends being provided severally with an introverted flange 9, formed by folding the end of said flap inwardly upon the dotted line 10, as shown at the left-hand end of Fig. 1. The flaps 11, hinged to the opposite ends of the back wall 4, along the lines 12, are then folded inwardly in the manner illustrated at the left-hand end of Fig. 1 against the outer sides of the respective introverted flaps 7, forming with said flaps 7 double or lapping end walls for the box. The flap 13, hinged to the upper edge of each flap 11, is then folded along its hinge-line 14 over the upper edge of the flap 7 and against the inner surface thereof between the flange 9 and the front wall 3, as shown at the right-hand end of Fig. 1, thus securely locking the front and back walls together. The lower end of the introverted flap 13 abuts upon the bottom of the box and is provided with a projection 15, hinged thereto along the line 16, which projection extends half-way across the box and abuts along the line 17 upon the similar projection from the opposite end of the box, as shown in Fig. 4, thereby preventing displacement of said projections 15 and their connected flaps. The flaps 18, hinged along the line 19 to the opposite ends of the bottom of the box, are then folded upwardly against the outer side of the end wall 11, and the flaps 20, hinged along the line 21 to the upper edge of the respective flaps 18, are folded inwardly, as shown in Figs. 2 and 4, said flaps 20 occupying a position beneath the cover of the box, which cover 2 is folded over thereupon along the line 22.

The cover may have an end flap 23, adapted to fold over upon the line 24 and be inserted within the box in contact with the inner side of the front wall.

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

1. A rectangular box formed from a single piece of flexible material suitably slitted and creased, comprising a bottom, front and back walls hinged along their lower edges respectively to said bottom; a top hinged to the back



wall along its upper edge; and ends each comprising lapping walls one hinged at the front corner of the box to said front wall and provided with an introverted end flange located  
 5 wholly within the box and abutting upon the inner surface of the back wall, and the other hinged at the back corner of the box to said back wall and provided with a flap hinged to its upper edge and folded over said flanged  
 10 wall interiorly of the box between the front wall and said introverted flange and in engagement with said flange to prevent the displacement of the flanged wall, substantially as described.

15 2. A rectangular box formed from a single piece of flexible material suitably slitted and creased, comprising a bottom, front and back walls hinged along their lower edges respectively to said bottom; a top hinged to the back  
 20 wall along its upper edge; and ends each comprising lapping walls one hinged at the front corner of the box to said front wall and provided with an introverted end flange located wholly within the box and abutting upon the  
 25 inner surface of the back wall, and the other hinged at the back corner of the box to said back wall and provided with a flap hinged to its upper edge and folded over said flanged wall interiorly of the box between the front  
 30 wall and said introverted flange and in engagement with said flange to prevent the displacement of the flanged wall, and a wall hinged to the end of said bottom, folded up against the outer side of said lapping end  
 35 walls and provided with a flap hinged to its upper edge and introverted beneath the cover, substantially as described.

3. A rectangular box formed from a single piece of flexible material suitably slitted and  
 40 creased, comprising a bottom, front and back walls hinged along their lower edges respectively to the bottom; a top hinged to the back wall along its upper edge; and ends each comprising lapping walls one hinged at the front

corner of the box to said front wall and provided with an introverted end flange abutting upon the back wall, and the other hinged at the back corner of the box to said back wall and provided with a flap hinged to its upper edge and folded over said flanged wall  
 50 interiorly of the box between the front wall and said introverted flange, the lower end of said flap abutting upon the box-bottom, and being provided with a hinged projection extending half-way across the box and abutting  
 55 upon the like projection from the opposite end of the box, substantially as described.

4. A rectangular box formed from a single piece of flexible material suitably slitted and creased, comprising a bottom, front and back  
 60 walls hinged along their lower edges respectively to the bottom; a top hinged to the back wall along its upper edge; and ends each comprising lapping walls one hinged at the front corner of the box to said front wall and provided with an introverted end flange abutting upon the back wall, and the other hinged at the back corner of the box to said back wall and provided with a flap hinged to its upper edge and folded over said flanged wall  
 70 interiorly of the box between the front wall and said introverted flange, the lower end of said flap abutting upon the box-bottom, and being provided with a hinged projection extending half-way across the box and abutting  
 75 upon the like projection from the opposite end of the box, and a wall hinged to the end of said bottom, folded up against the outer side of said lapping end walls and provided with a flap hinged to its upper edge and introverted beneath the cover, substantially as described.  
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In testimony whereof I have hereunto set my hand this 18th day of May, 1901.

GEORGE A. DICKER.

Witnesses:

E. M. O'REILLY,  
 FRANK C. CURTIS.