

(Model.)

D. J. REX.
FOLDING PAPER BOX.

No. 385,478.

Patented July 3, 1888.

Fig. 1.

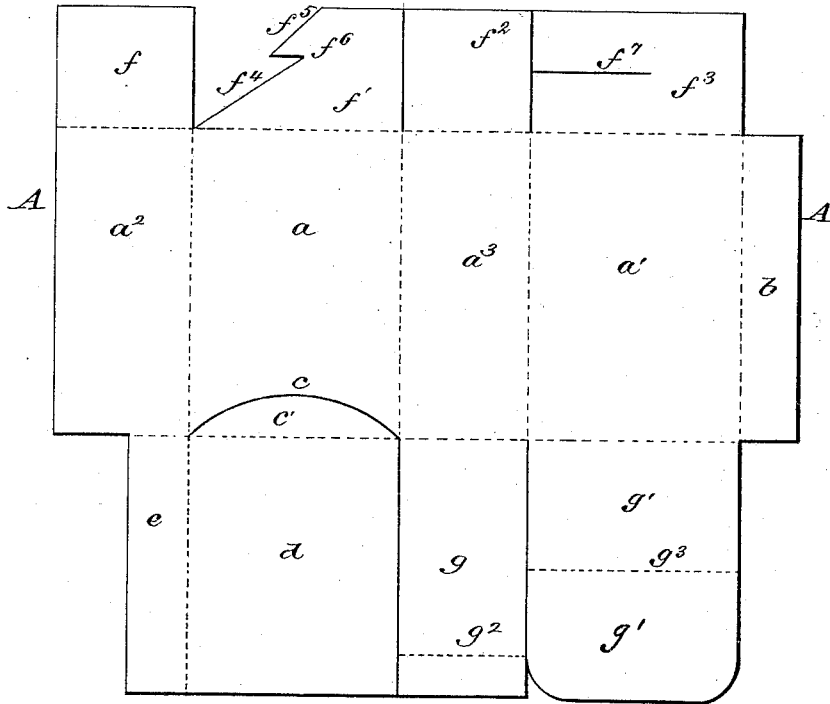


Fig. 2.

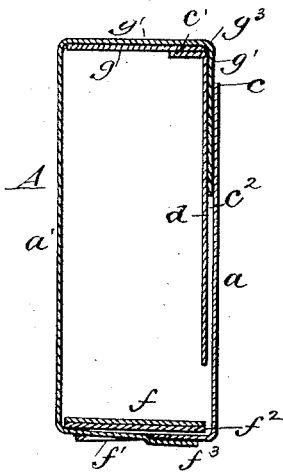
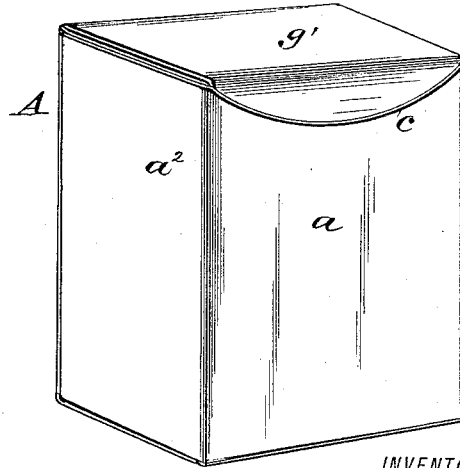


Fig. 3.



WITNESSES:

Fred G. Dieterich
J. W. Wister

INVENTOR,

D. J. Rex

BY *Munn & Co*

ATTORNEY.

UNITED STATES PATENT OFFICE.

DAVID J. REX, OF PITTSBURG, PENNSYLVANIA.

FOLDING PAPER BOX.

SPECIFICATION forming part of Letters Patent No. 385,478, dated July 3, 1888.

Application filed April 10, 1888. Serial No. 270,212. (Model.)

To all whom it may concern:

Be it known that I, DAVID J. REX, a citizen of the United States, residing at Pittsburg, in the county of Allegheny and State of Pennsylvania, have invented certain new and useful Improvements in Folding Paper Boxes, of which the following is a specification.

In this class of paper boxes, especially for the purposes to which this invention is particularly appropriated, being disposed of or sold by weight, it is a desideratum to reduce the waste experienced in cutting the material to a minimum. This is accomplished in the production of my box, which consists of forming the same from and in a single piece, substantially as hereinafter more fully set forth, and pointed out in the claims.

In the accompanying drawings, Figure 1 is a view of the blank from which my box is made. Figs. 2 and 3 are a sectional and a perspective view, respectively, of my box.

In carrying out my invention I take a single piece of paper, A, of the requisite thickness or stiffness, and proceed to outline it with a pencil or other means to lay out the prospective box. In doing this, placing the paper upon a table or other suitable support with its inner surface upward, I mark or pencil off the sides $a a'$ and $a'' a'''$ in the usual manner. The paper is then penciled or marked off so as to form the rear side, a' , with a narrow longitudinal flange or flap, b . The front side, a , is further penciled or marked off inside of the previous penciling, as at c , in the arc of a circle or other suitable manner, the pencil-line c extending from the extremities of the upper edge line of the said front side, which forms a flap, c' . By now penciling or marking off the paper in alignment with the length of the front side, the latter is formed with an extension, d , while at one side of said extension the paper is marked off to form a narrow extension, e , of the side a' , which is also integral with the extension d . The paper is next marked off so as to form extensions $f f' f'' f'''$ of the several sides at one end, while it is marked off so as to form extensions $g g'$ of the sides a' and a'' at the opposite ends. The extension f' is obliquely cut away, as at f^4 and f^5 , and then notched, as at f^6 , intermediately of said oblique cuts $f^4 f^5$, while the extension f^3 is slit, as at f^7 , in a line at right angles to

the length of the adjoining side, a' . The extension g is marked off as at g^2 , while the extension g' is marked off as at g^3 .

In assembling the various parts of the box the paper is cut at points between the extensions f, f', f'', f''', g , and g' , and creased at the sundry outlines between the several sides and between the extensions and the sides, as also between the rear side and the flange or flap b , while the extensions $g g'$ are creased at $g^2 g^3$, respectively. The front side, a , is now slit along the curved line or arc c , while the extension d and the extension e are folded inward upon the front side, a , and the side a'' , respectively, forming a pocket, c^2 , paste or glue next being applied to the outside of the flap b . The side a' , including the flap b and extensions f^3 and g' , is now folded, as is also the side a'' , the side a'' being laid upon the glued or pasted surface of the flap b , and thus united thereto. The box thus far completed is now held in the hand, and by slightly compressing the same the box is opened up, so as to cause the sides to assume their normal relation. The extensions f and f'' are now folded inward, one upon the other, while the extension f^3 is folded inward upon the already-folded extensions f and f'' . The extension f' is then folded upon extension f^3 , the free end of extension f' being inserted into the slit f^7 of extension f^3 and its notch f^6 caused to interlock with the inner edge or extremity of the said slit. The flap c' of extension d is now turned down inward to stand at right angles to said extension, the extension g being folded down upon flap c' , its portion beyond g^2 being inserted or tucked into the open end of the box. The next or final step is to fold the extension g' upon the folded extension g , its portion beyond the crease g^3 being inserted or tucked into the pocket c^2 , thus completing the formation of the box.

It will be seen from the foregoing that in making the boxes in quantities the entire sheet of paper can almost wholly be utilized, reducing the waste to a minimum, which is a desideratum in this class of boxes especially appropriated for the purposes of this invention—*i. e.*, to hold tacks—the said boxes being sold or disposed of by the weight.

The box, although more especially designed to hold tacks, may be used for holding other

articles of hardware—such as nuts, washers, &c.—or for holding buttons and the like.

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

1. The folding paper box consisting of the blank of which the top end extension of the front side is formed integrally with an extension of an adjoining side, which top end extension and adjoining side extension are folded inwardly upon said front and adjoining sides, respectively, the top end extensions of the rear side and an adjoining side folding, one upon an inwardly-folding flap of the front side, while the other folds upon the first named of the latter extensions, and is inserted through a slit in the front side and tucks into a pocket between the front side and its inwardly-folding extension, substantially as specified.

2. The folding paper box made from a blank of which the portions forming the sides are provided with end extensions, the extensions of the front and rear sides having one a slit and the other a diagonally cut and notched edge, while at the opposite end the front side

is provided with a semicircular cut or slit, providing the same with a flap, the top end extension of said front side being formed integrally with an extension of an adjoining side, and adapted to fold inwardly upon said front side, substantially as set forth.

3. As a new article of manufacture, the folding paper box made from the blank of which the portions forming the sides are provided with end extensions and one with a side flap, the extensions of the front and rear sides having one a slit and the other a diagonally cut and notched edge, while at the opposite end the front side is provided with a semicircular cut or slit and the extension at its top end formed integrally with an extension of an adjoining side and adapted to fold inwardly, the top end extensions of the rear and an adjoining side being provided with flaps, substantially as set forth.

DAVID J. REX.

Witnesses:

J. WM. MISTER,
CHAS. R. WRIGHT.