

(No Model.)

E. L. MUELLER.
PACKING BOX FOR BOTTLES.

No. 269,221.

Patented Dec. 19, 1882.

Fig. 1.

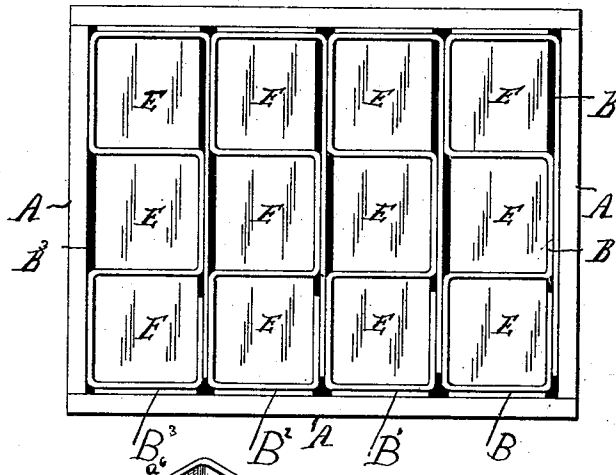


Fig. 2.

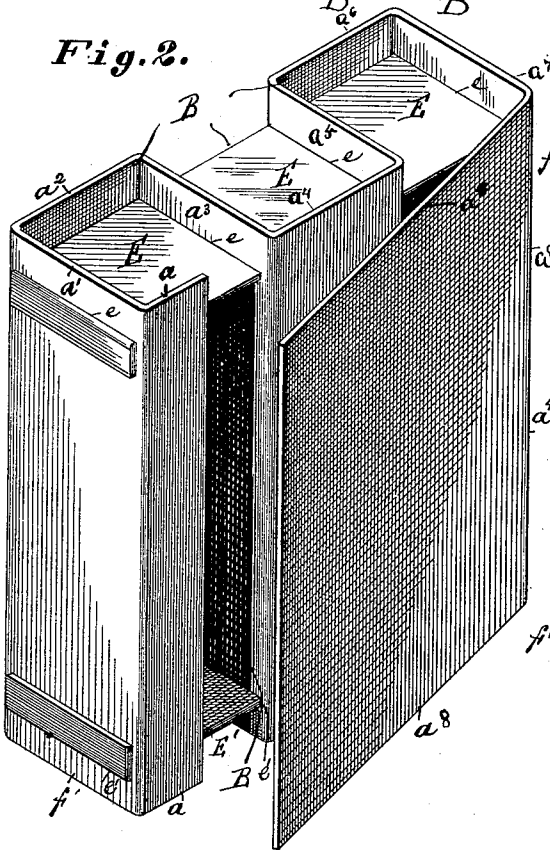
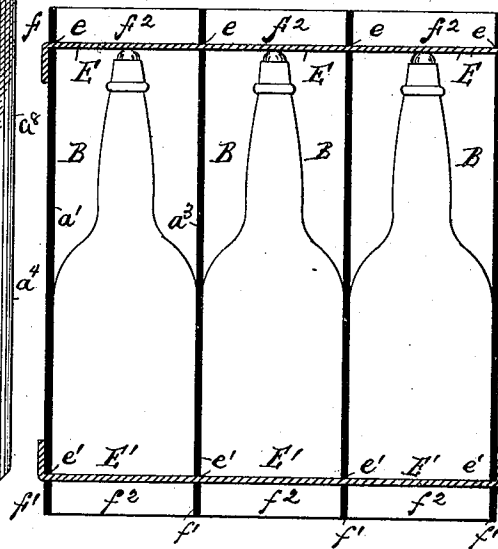


Fig. 3.



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UNITED STATES PATENT OFFICE.

EDWARD L. MUELLER, OF ST. LOUIS, MISSOURI.

PACKING-BOX FOR BOTTLES.

SPECIFICATION forming part of Letters Patent No. 269,221, dated December 19, 1882.

Application filed July 28, 1882. (No model.)

To all whom it may concern:

Be it known that I, EDWARD L. MUELLER, a citizen of the United States, residing at St. Louis and State of Missouri, have invented a new and useful Packing-Box for Bottles, &c., of which the following is a specification.

This invention is an improvement of the crate or carrier for which Letters Patent were granted me in the United States April 15, 1873, No. 137,791. The improvements here presented are more specially adapted for medicines, liquor, pickles, jelly, and other goods that require to be packed in bottles, glasses, or receptacles which are liable to breakage and need to be protected for storage, shipping, and similar purposes. According to my present improvements each bottle or receptacle has its own distinct compartment or walls surrounding it on all sides, and needs only to be placed in its said compartment without the use of any extraneous packing, such as straw, sawdust, paper, &c. Specially is it my object to support each bottle, &c., in the packing-case so that the bottom upon which the bottle rests shall be slightly raised on away from the packing-case walls or portion thereof liable to the greatest concussion, and otherwise my objects are to provide an improved packing case or carrier that shall be simple and cheap for manufacture and afford a saving in time, labor, and expense in the use thereof for packing purposes. I attain these objects by the mechanism illustrated in the accompanying drawings, in which—

Figure 1 shows in plan view the compartment structures as they appear placed inside of an ordinary packing-box. Fig. 2 is an enlarged perspective view of a single-compartment structure, showing the manner in which the material is folded to form its compartments, also showing the top and bottom longitudinal strips that pass through the slits of each compartment and compose the top and bottom walls of same. Fig. 3 is an enlarged sectional elevation of compartment structures housing bottles, and showing how the same are contained in each compartment.

Similar letters refer to similar parts throughout the several views.

A represents an ordinary box or casing, in which is placed the series of compartment

structures which form the compartments to contain the bottles or articles to be packed.

B B' B² represent each an entire compartment structure, and these are made according to the pattern shown in Fig. 2, which is similar to that shown and described in my former patent alluded to. More specifically stated, this pattern is a strip or sheet of pasteboard or other suitable material, and is bent to form the corner-edge *a*, then the sides or walls *a'* *a*² *a*³ *a*⁴ *a*⁵ *a*⁶ *a*⁷ *a*⁸, or as many of the like side walls to suit the number of compartments desired to constitute a compartment structure. The open side is closed by the same sheet, which is refolded, forming the outer wall, *a*⁸. (See Fig. 2.) Thus one section is formed with part of its compartments properly closed and part thereof remaining open and facing inside. To close the inner side of the remaining compartments, a further and duplicate section, B', is arranged alongside of the first, and another section, B², alongside of the second, and so on until one complete layer of sections fills the bottom of the box. Layers or tiers can be placed top of each other to fill the box to the top thereof. According to my former patent mentioned above, a diaphragm or partition-sheet was interposed between the several layers of compartments to close the entire bottom and top portions of the said layers, also separating the one layer from another. According to my present improvements, I close the top and bottom of each section of compartments by the top and bottom strips, E E', of the same material and in manner following: I first make a slit, *e*, (near the top,) also like slit, *e'*, (near the bottom,) through the opposite side walls, *a'* *a*² *a*⁵ *a*⁷, of each compartment in a section. Through the said slits I pass the respective strips E E', closing the top and bottom of all compartments in the section, and finally fold the extreme ends of the said strips against the two extreme outer walls. (See Figs. 2 and 3.)

The bottle or receptacle can be placed into a compartment from the side thereof by simply opening the flap-sheet or wall *a*⁴, or if the top strip, E, be drawn out of the slits, the bottle, &c., can be placed in each compartment from the top.

As indicated in Figs. 2, 3, the top and bottom strips, E E', are located slightly away

from the extreme bottom and top edges, ff' , of each compartment, forming a vacant, f^2 , to exist between the bottom and top of each compartment, or sections or layers, which said space f^2 serves to cushion the bottle or receptacle, and the bottom of same does not rest directly upon the bottom of the box, and is therefore the better protected from concussion or the effects of jars, &c., during the handling or shipment of the cases.

What I claim is—

1. The compartment structure B, consisting of pasteboard or the like material folded into the series of compartments composed of the respective side walls, as shown and described, and having the slits ee' , and the top and bottom sheets, E E', all constructed as and for the purposes set forth.

2. The combination of two or more compartment structures, B B', each consisting of pasteboard or the like material folded into the series of compartments composed of the respective side walls, as shown and described, said compartment structures placed alongside of each other, by means whereof the open-faced compartment of the one structure is closed by the neighboring compartment structure, as and for the purposes set forth.

In testimony of said invention I have hereunto set my hand in presence of witnesses.

EDWARD L. MUELLER.

Witnesses:

WILLIAM W. HERTHEL,
JOHN C. SCHOENTHALER.