

June 11, 1946.

J. C. CALHOUN ET AL
MERCHANDISING DEVICE

2,401,908

Filed June 25, 1942

4 Sheets-Sheet 1

Fig. 2

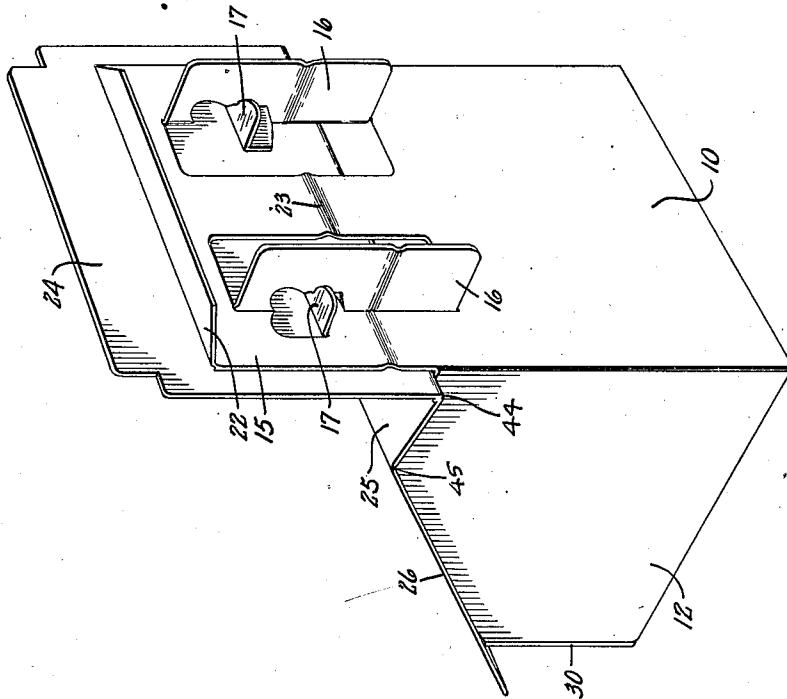
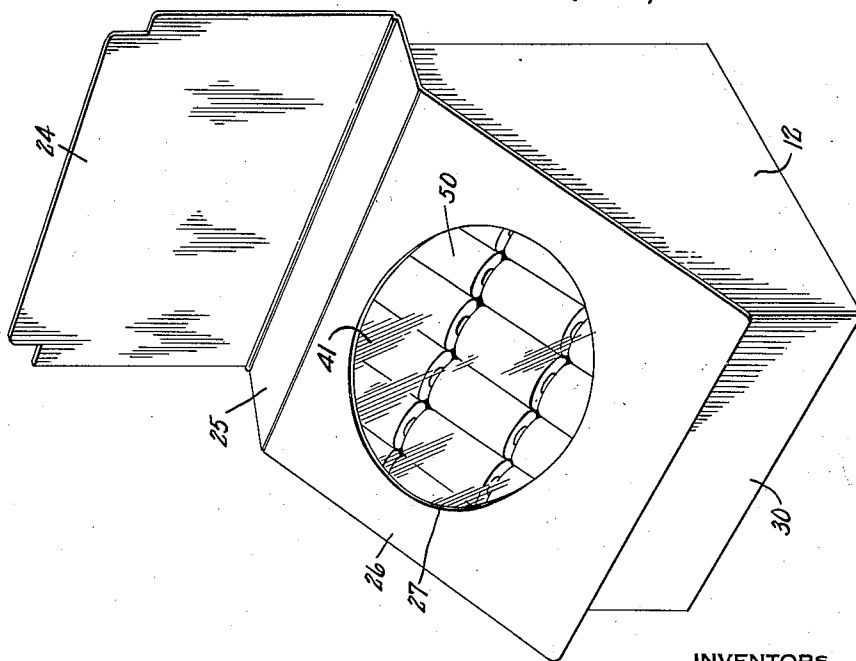


Fig. 1



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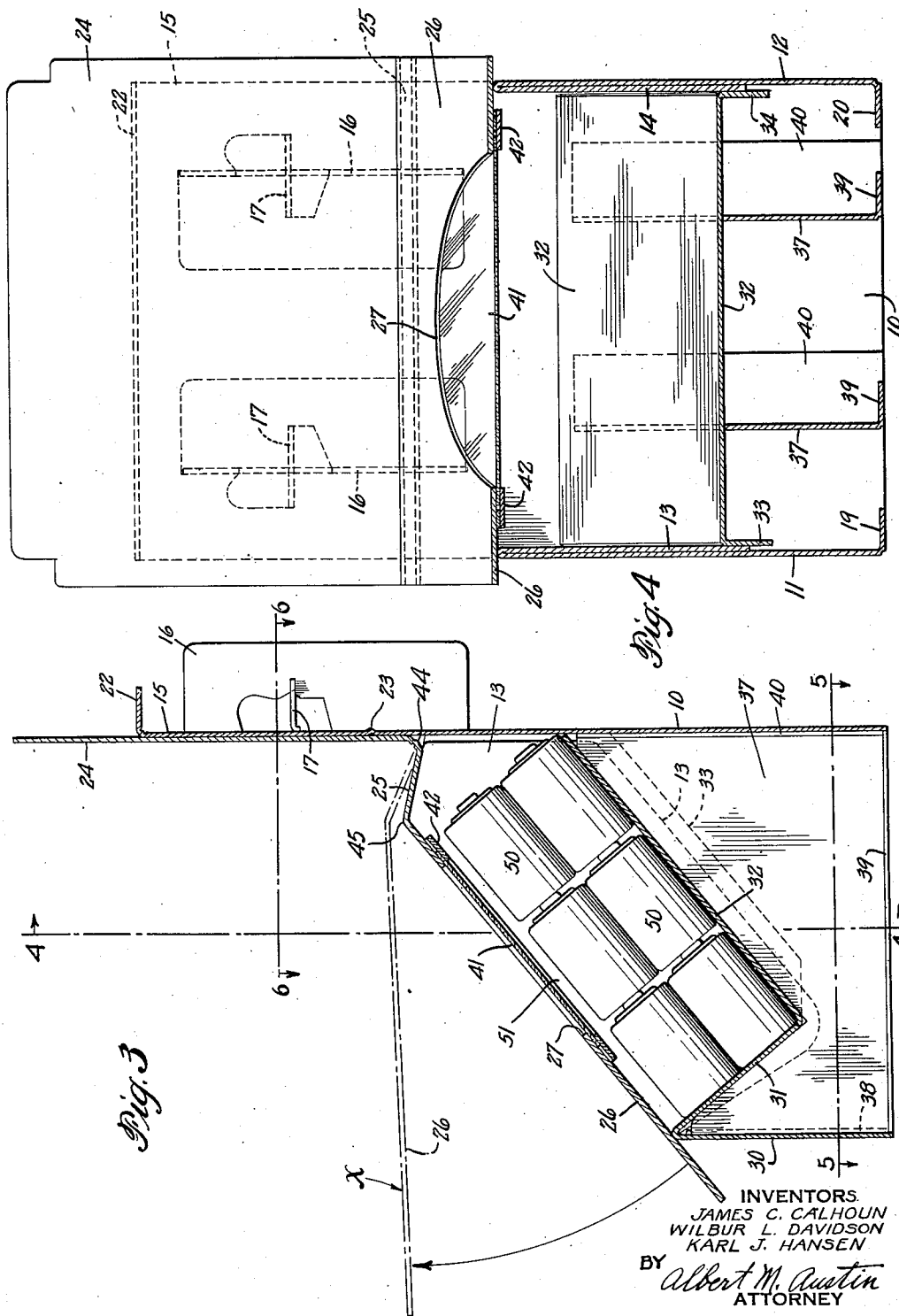
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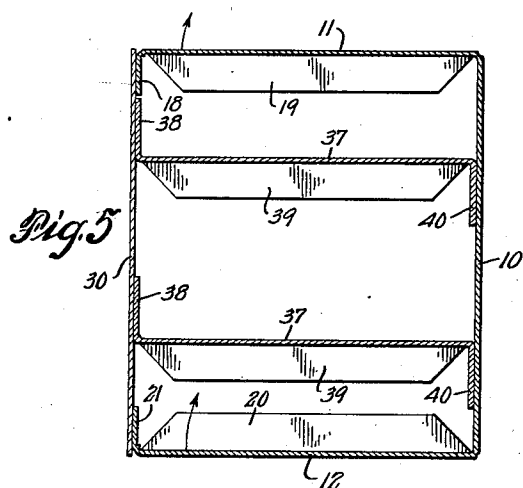
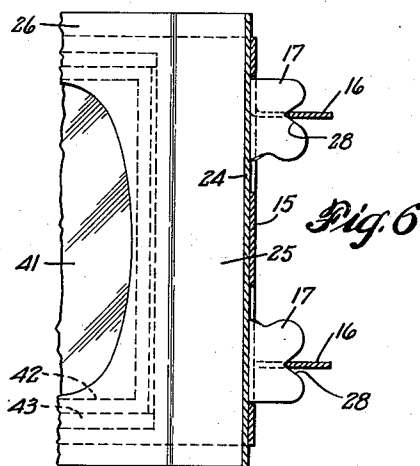
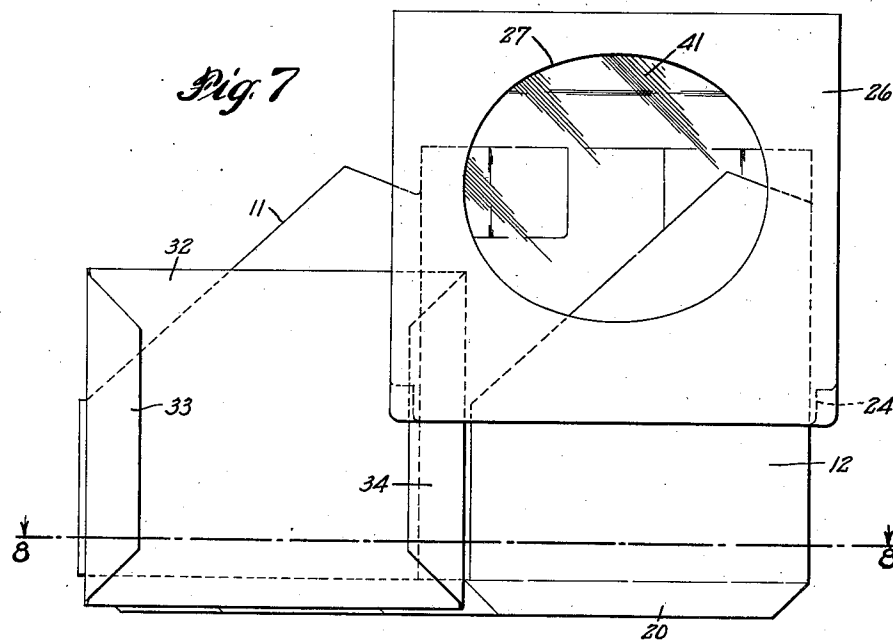
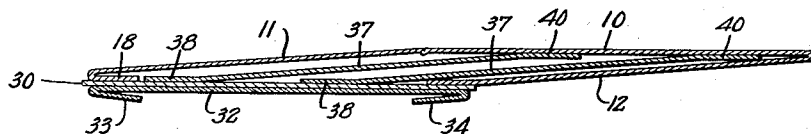
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Fig. 9

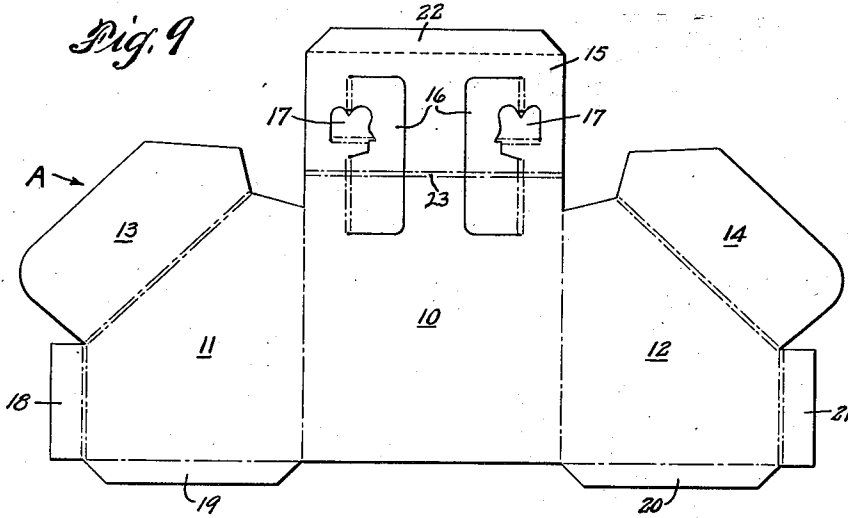


Fig. 10

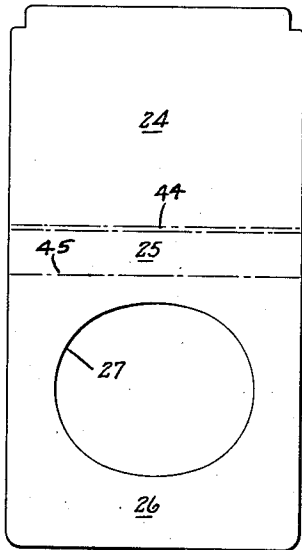


Fig. 11

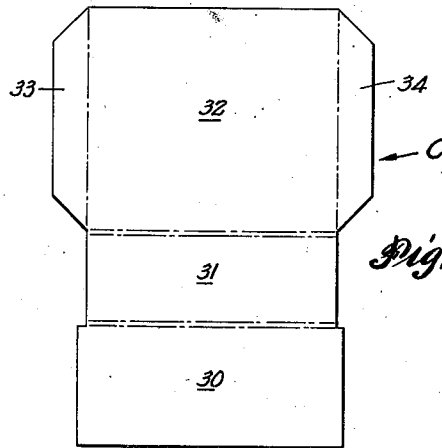


Fig. 15

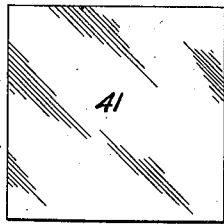


Fig. 12

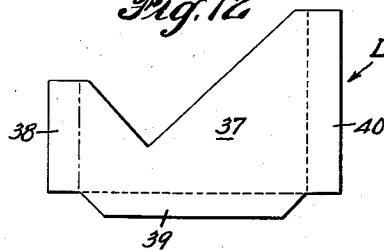


Fig. 13

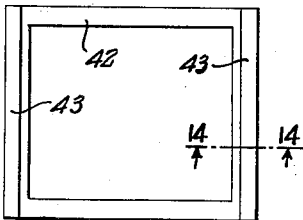
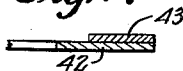


Fig. 14



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2,401,908

MERCHANDISING DEVICE

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Application June 25, 1942, Serial No. 448,384

9 Claims. (Cl. 206-44)

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The invention relates to merchandising devices and more particularly to a pilfer-proof cabinet for displaying flashlights and the like.

According to a preferred form of the invention, the cabinet comprises a body member of cardboard or the like having front, back and side walls, hingedly connected. Brace members also hingedly connect the front and back walls. Formed within the top of the body is an inclined display space having inclined forward and rear bottom walls resting upon said brace members. The inclined bottom walls and the side walls form a display space in which a suitable number of flashlight batteries or other merchandise may be held. The back wall has a hinged back support to which is secured a display wall. The display wall has a top wall connected thereto and the top wall has a hinged cover with a transparent window adapted to close the merchandise space. Suitable wings and ears are provided for holding the display panel upright. The various parts are so connected together so that the cabinet may be fully assembled at the box plant and then collapsed flat for shipment to the flashlight battery merchant.

The invention also consists in certain new and original features of construction and combinations of parts hereinafter set forth and claimed.

Although the novel features which are believed to be characteristic of this invention will be particularly pointed out in the claims appended hereto, the invention itself, as to its objects and advantages, and the manner in which it may be carried out, may be better understood by referring to the following description taken in connection with the accompanying drawings forming a part thereof, in which

Fig. 1 is a perspective taken from the front showing the battery merchandising cabinet set up with the batteries in place;

Fig. 2 is a perspective taken from the rear of the set-up cabinet;

Fig. 3 is a vertical section through the cabinet;

Fig. 4 is a vertical section taken on the line 4-4 of Fig. 3.

Fig. 5 is a plan section taken on the line 5-5 of Fig. 3.

Fig. 6 is a plan section taken on the line 6-6 of Fig. 3.

Fig. 7 is a plan view of the cabinet showing a preferred manner of collapsing;

Fig. 8 is a section on the line 8-8 of Fig. 7;

Figs. 9 to 12 show blanks from which the cabinet is made;

Fig. 13 is a view of the frame member;

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Fig. 14 is a section on the line 14-14 of the frame member shown in Fig. 13; and

Fig. 15 illustrates a sheet of transparent material.

In the following description and in the claims, various details will be identified by specific names for convenience, but they are intended to be as generic in their application as the art will permit.

Like reference characters denote like parts in the several figures of the drawings.

In the drawings accompanying and forming part of this specification, certain specific disclosure of the invention is made for purposes of explanation, but it will be understood that the details may be modified in various respects without departure from the broad aspect of the invention.

Referring now to the drawings and more particularly to Figs. 9 to 15, the several blanks of cardboard or other suitable material are denoted by the reference characters A to D. Cuts are shown by solid lines and scores by dot-and-dash lines. Two types of scores are shown, those indicated by double dot-and-dash lines, and those indicated by single dot-and-dash lines. Those indicated by the double score lines are scores in which the paperboard is bent and weakened to form a hinge but is not cut. The single score lines represent scores in which the paperboard is partially cut through to form sharp corners. The manner of making these scores is well known to those skilled in the art.

The several blanks may be made of suitable paperboard or cardboard having suitable advertising or printed matter thereon. The advertising and printed matter may be placed directly on the surface of the paperboard or cardboard, or the paperboard or cardboard may be provided with a layer of paper on which the printing and advertising is placed.

The blank A, which might be called a back panel, comprises a back wall 10, side walls 11 and 12, side liners 13 and 14 and a back support 15 having wings 16 and ears 17. Flaps 18 to 22 are also provided. This blank is provided with the scores as indicated one of which, 23, is discussed below.

The blank B, which may be called the cover panel, comprises a display wall 24, a top wall 25, and a hinged cover 26 having an oval opening 27 to form a window. This blank also has scores 44 and 45 whose functions are discussed below.

The blank C, which may be called the shelf

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blank, comprises a front wall 30, inclined bottom walls 31 and 32 and flaps 33 and 34.

The blank D constitutes a brace 37 having a V-shaped upper edge and provided with flaps 38-40.

In addition to the blanks above described, there is provided a transparent plastic sheet window pane 41 (Fig. 15) and a hollow frame member 42 having reinforced members 43 glued along opposite sides (Figs. 13 and 14).

The entire cabinet will be assembled at the factory where the cabinet is made, preferably by glue, metal fasteners, or both. The assembled cabinet is then collapsed and shipped flat, to reduce its shipping size, to the battery merchant. The battery merchant merely opens up the cabinet, bends certain parts, and places the batteries in the battery recess and he has an attractive pilfer-proof merchandising cabinet. The method of assembling the cabinet, collapsing it and setting it up, will be described hereinafter.

The method of assembling the cabinet at the factory where the cabinet is made is as follows:

The blanks A and C are connected (see Fig. 5) by bending the side walls 11 and 12 with respect to back wall 10 and gluing the flaps 18 and 21 to the front wall 30. Blank B is then put in place by gluing display wall 24 to back support 15, care being taken not to glue the wings 16 and ears 17 (see Fig. 3). Care should also be taken not to have any glue below the score line 23. The two blanks D are then put in place by gluing the flaps 38 to the front wall 30 and the flaps 40 to the back wall 10, as illustrated particularly in Fig. 5.

The transparent plastic window pane 41 is then glued to frame 42 within the reinforcing strips 43 and then the frame is glued to the inside of the cover 26 as illustrated particularly in Fig. 3.

This assembly produces a display cabinet which, when fully set up, is illustrated in Figs. 1 to 6. Here it will be noted that the side liners 13 and 14 are folded inside the battery space indicated by 51. The bottom walls 31 and 32 of shelf blank C are also folded inwardly and rest upon the braces 37 to form inclined forward and rear bottom walls for the battery compartment 51. The display wall 24 is kept in upright position by swinging back support 15 upwardly about the score 23 and folding outwardly the wings 16 and then downwardly the ears 17. The ears 17 have notches 28 which position the wings 16, as illustrated particularly in Fig. 6. Thus, with the wings 16 held out as shown in Fig. 2, the display wall 24 is prevented from bending back and is held in upright position above the battery compartment presenting an attractive advertising display.

It will be seen that, when set up, the flap 22 on the back support 15 is bent downwardly to a position perpendicular to back support 15, as shown in Fig. 3 for bracing purposes. The flaps 19, 20 on side walls 11, 12 and the flaps 39 on the braces 37 are also bent horizontally to provide improved support on the counter or other flat surface on which the cabinet rests. The flaps 33 and 34 of the bottom wall 32 are also tucked down inside of the box as shown particularly in Fig. 4.

To collapse the cabinet after assembling in the box factory, it is only necessary to swing the display wall 24 about the score 23 backwardly and downwardly. It will be understood that the flaps 16 and ears 17 will not be opened in the factory. Neither will upper flap 22 nor bottom flaps 19, 20

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and 39 be bent in the factory. The side liners 13 and 14 will be folded inwardly into parallelism with their side walls 11 and 12 and the front wall 30 and side walls 11 and 12 will be swung into substantial parallelism with the back wall 10. Bottom wall 32 will be folded down in front of the front wall 30 and, if desired, the flaps 33 and 34 will be folded inwardly. The back support 15 and display wall 22 will be folded back along score line 23 and cover 26 will be folded down in front. The fully collapsed cabinet is illustrated in Figs. 7 and 8.

Upon receiving the collapsed fully assembled cabinet, the battery merchant sets it up very quickly and expeditiously. It is only necessary to square up the front wall 30, back wall 10 and side walls 11 and 12, fold in the bottom walls 31 and 32 to the position shown in Fig. 3, fold up the display wall 24 into alignment with the back wall 10 and swing out the wings 16 and swing down the ears 17 as illustrated in Figs. 3 and 6. The top wall 25 and the cover 26 then rest upon and overhang the top edges of the side walls 11 and 12 and front wall 30. The flap 22 is then folded horizontally and the flaps 19, 20 and 39 on the bottom of the side walls 11 and 12 and brace 37 are also folded horizontally as illustrated in Fig. 4.

The cabinet is now ready to receive the flashlight batteries 50.

Thus, a merchandising cabinet is provided which is relatively inexpensive and yet which is rigid and strong in use. The cabinet is made from heavy cardboard or paperboard suitably colored and printed to make attractive display. The entire device is assembled in the box factory and collapsed for shipping flat. Setting up the stand for display purposes as well as collapsing it for storage is a simple matter for the battery merchant.

The inclined position of the forward and rear bottom walls of the battery compartment places the batteries at an oblique angle, which is more likely to catch the eye of the shopper. The transparent window pane permits full view of the displayed wares from different angles and yet discourages pilfering since it is necessary to raise the cover before a battery may be removed. At the same time it is an easy matter to lift the cover to the position X in Fig. 3 and remove the batteries for legitimate purposes.

The cabinet has sufficient structural strength to support a heavy weight of battery cells. The inclined bottom walls 31 and 32 provide a sagging bottom for the battery compartment which imparts added strength. The braces located under the bottom walls also reinforce the structure. The turn-down flaps 33 and 34 on the bottom wall reinforce the outer edges of the bottom wall. The folding down of the forward bottom wall 31 of the battery compartment and the folding down of the side panels 13 and 14 provide finished and reinforced rolled edges for the top of the battery compartment.

The frame 42 not only holds the transparent window pane in place but also reinforces the cover 26. The lifting of the cover 26 causes hinge action partly at the score line 44 and partly at the score line 45 thus reducing the bending at any one score and increasing the life of the cabinet.

While certain novel features of the invention have been disclosed herein, and are pointed out in the annexed claims, it will be understood that various omissions, substitutions and changes may be made by those skilled in the art without departing from the spirit of the invention.

What we claim is:

1. A pilfer-proof cabinet for flashlight batteries and the like comprising, a box-like member having vertical front, back and side walls, vertical brace members connecting said front and back walls, said brace members having V-shaped notches in the upper edges thereof, a bottom member resting in said notches and having an inclined forward bottom wall connected to the top of said front wall and an inclined rear bottom wall extending to said back wall, a top wall connected to said back wall and a top cover hingedly connected to said top wall, said cover having a transparent window pane therein and adapted to close the merchandise space defined by said bottom, front, back and side walls.

2. A collapsible merchandise display cabinet, particularly for heavy merchandise comprising, substantially vertical front, back and side walls hingedly connected to form a collapsible sleeve structure, brace members hingedly connected to the inside surfaces of said front and back walls to extend substantially parallel to said side walls, a bottom wall hingedly connected to said front wall and adapted to be folded down inside the sleeve structure to rest on top of said brace members, a back support hingedly connected to said back wall, a display wall secured to said back support, a top wall hingedly connected to said display wall, and a cover hingedly connected to said top wall.

3. A collapsible merchandise display cabinet, particularly for heavy merchandise comprising, substantially vertical front, back and side walls hingedly connected to form a collapsible sleeve structure, brace members hingedly connected to the inside surfaces of said front and back walls to extend substantially parallel to said side walls, a bottom wall hingedly connected to said front wall and adapted to be folded down inside the sleeve structure to rest on top of said brace members, a back support hingedly connected to said back wall along a substantially horizontal score line, said back wall and back support having wings and ears cut out of the stock thereof, said wings being adapted to be swung out of the body of the stock about substantially vertical score lines to hold said back support erect above said back wall, said ears being adapted to be swung out of the body of the stock about substantially horizontal score lines to position said wings, a display wall secured to said back support, a top wall hingedly connected to said display wall, and a cover hingedly connected to said top wall.

4. A collapsible merchandise display cabinet particularly for heavy merchandise comprising, substantially vertical front, back, and side walls hingedly connected to form a collapsible sleeve structure, brace members hingedly connected to the inside surfaces of said front and back walls to extend substantially parallel to said side walls, a bottom wall hingedly connected to said front wall and adapted to be folded down inside the sleeve structure to rest on top of said brace members, a back support hingedly connected to said back wall, a display wall secured to said back support, a top wall hingedly connected to said display wall and a cover hingedly connected to said top wall, said cabinet being adapted to be collapsed by bringing said front, back, side walls and brace members into substantial parallelism, folding down said bottom wall on said front wall, folding said back support and display wall to the rear of said back wall and folding said cover down over the front of a side wall.

5. In a display device particularly for heavy merchandise, four upstanding substantially vertical side walls hingedly connected at the corners to form a collapsible sleeve structure, a bottom wall enclosed therein, a brace member under said bottom wall and hingedly connected to two opposite upstanding walls to extend substantially parallel to the other two upstanding walls, said bottom wall being hingedly connected to the top edge of one of said upstanding walls, the entire device being collapsible substantially flat.

6. In a display device particularly for heavy merchandise, upstanding substantially vertical side walls hingedly connected at the corners to form a collapsible sleeve structure, a bottom wall, a substantially vertical brace member under said bottom wall and hingedly connected to one of said upstanding walls, said bottom wall being hingedly connected to the top edge of one of said upstanding walls and tucked inside said sleeve structure to rest on the top edge of said brace member, the entire device being collapsible substantially flat after removal of said bottom member from the inside of said sleeve structure.

7. In a display cabinet particularly for heavy merchandise, a vertical back wall and vertical side walls connected thereto, said side walls having inclined upper edges, a front panel having a vertical front wall secured to said side walls and a downwardly inclined forward bottom wall secured to the upper edge of said front wall, an upwardly inclined rear bottom wall secured to said forward wall, vertical brace members hingedly connected to said front and back walls and having V-shaped upper edges adapted to support said forward and rear bottom walls, and a cover member hinged to said back wall and adapted to overlie said side and front walls.

8. In a display cabinet particularly for heavy merchandise, a back panel having a vertical back wall and vertical side walls connected thereto, said side walls having inclined upper edges with inwardly folded flaps connected thereto, a front panel having a vertical front wall secured to said side walls and a downwardly inclined forward bottom wall secured to the upper edge of said front wall, an upwardly inclined rear bottom wall secured to said forward wall and extending to said back wall, vertical brace members hingedly connected to said front and back walls and having V-shaped upper edges adapted to support said forward and rear bottom walls, a cover panel having a display portion secured to said back wall, a top wall hingedly connected to said display portion, and a cover member hingedly connected to said top wall, said top wall and cover member adapted to overlie and overlap said side and front walls.

9. In a collapsible display device, a cabinet, upper and lower panels whose bodies are foldable upon each other along a first score line, said lower panel forming a wall of said cabinet, said bodies being erectable to coplanar relationship wherein said upper panel is supported by said lower panel, a wing cut out of stock of both panels and foldable into a position substantially normal to the bodies of the erected panels about a second score line extending at right angles to, and crossing, said first score line to brace said panels and maintain them in erected coplanar relation, said wing and the cut out portion resulting therefrom lying before folding wholly within the plane and confines of said panels, and an ear cut partially out of the stock of the body of a said panel and par-

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tially out of the stock of said wing, said wing having an opening resulting from the formation of said ear, said ear being foldable into interlocking relationship with the edge of said last-mentioned opening about a third score line extending substantially parallel to said first score line and traversing the direction of said second score line, 5

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a display panel secured to said upper panel but not to said lower panel, and a cover for said cabinet secured to said display panel and foldable with respect to said display panel.

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