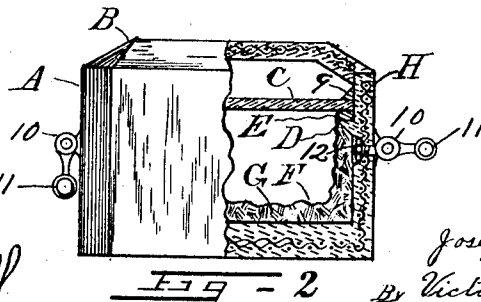
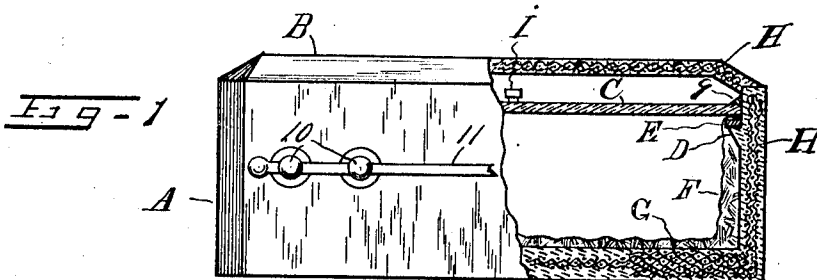
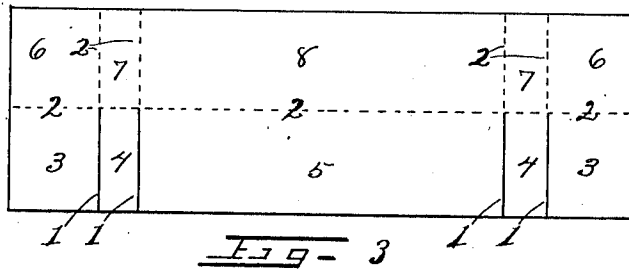
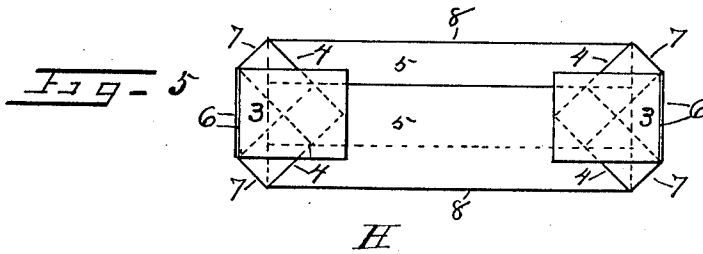
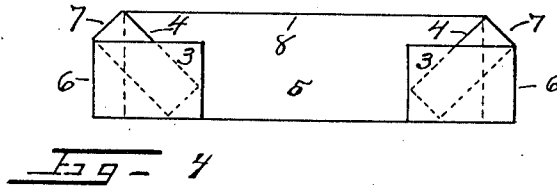


J. F. RUSSELL.
REINFORCING STRUCTURE.
APPLICATION FILED MAR. 14, 1906.

984,494.

Patented Feb. 14, 1911.



WITNESSES.

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REINFORCING STRUCTURE.

984,494.

Specification of Letters Patent.

Patented Feb. 14, 1911.

Application filed March 14, 1906. Serial No. 305,955.

To all whom it may concern:

Be it known that I, JOSEPH F. RUSSELL, a citizen of the United States, residing at Battle Creek, in the county of Calhoun and State of Michigan, have invented certain new and useful Improvements in Reinforcing Structures; and I do hereby declare the following to be a full, clear, and exact description thereof, such as will enable others skilled in the art to which it appertains to make and use the same.

My invention relates to reinforcing structures, and more particularly relates to boxes made from plastic composition within which a framework of stiffening material, such as wire screen, reticulated or expanded metal, is used to give stability to the body while in a plastic state.

In the drawings forming a part of this specification Figure 1 represents a longitudinal, side elevation partially in section, of my improved box. Fig. 2 is an end view partially in section. Fig. 3 is a plan view of a metallic blank illustrating the kerfs or slits and the lines of folding the same to form one half of the core or stiffening structure. Fig. 4 represents a plan view of the blank, folded, and Fig. 5 is a plan view of a completed framework.

In the drawings like marks of reference refer to corresponding parts throughout the several views.

A, represents the box; B, its cover; C, a transparent sub-cover capable of being hermetically closed; D, a ledge formed about the upper, inner edge of the box; E, a wooden or other gasket upon which the transparent sub-cover is seated; F, fabric lining to the box; G, excelsior or other stuffing or padding material; H, the metallic stiffening core or framework upon which the body of the box is formed, and I, a valve by which means the box may be supplied with disinfectants or be rendered a vacuum.

In carrying out my invention I prefer to employ wire screen in rectangular shape to form the body or core construction. These blanks may be of one continuous sheet or may be formed of two or more sections, a blank of the two sectioned style being shown in Fig. 3.

In the drawings I have shown a box having eight angular sides, although it will be apparent that the principle of my reinforcement can be used to advantage in a box having but four angles. In a box having eight

angles the heavy lines, 1, in Fig. 3 represent slits cut into the edges of the material, at which points the material is adapted to lap or lie over itself; as shown in Fig. 4, the dotted lines 2 representing the lines of angular projection; thus 3, 4 and 5 represent the lapped-over or reinforced material at the bottom, and 6, 7 and 8 the angular side and end portions.

Two blanks having been bent and formed, as shown in Fig. 4, they are thence telescoped longitudinally, as shown in Fig. 5, completing a framework to which the superstructure or body portion of plastic cement is applied, (by preference this body is formed of Portland cement), and a coating is applied to both sides of the framework and thoroughly troweled, a ledge, D, being formed about the inner upper edge of the box upon which a sub-transparent cover, C, may be seated.

By preference I bend the screen or lattice frame-work upon itself about the upper edge, as shown in Figs. 1 and 2, to reinforce the material about the edge.

In making a box as described I can use screen of medium weight and still have the requisite strength to stand great crushing strain, the side portions of the box not exceeding three eighths of an inch in thickness.

Upon the ledge, D, a gasket E, of wood or other material is fitted to form a cushion or seat for the glass sub-cover, C, (to this margin the upper edge of the lining, F, may be applied by glue, tacks or other means), a margin of cement, 9, being applied about the upper edge of the glass to render the same air tight. Somewhere below the cover and preferably in the sub-cover, C, a valve, I, is provided, the object of the valve being to introduce disinfectants or other gases into the box or to exhaust the air from the box, as may be deemed expedient.

Fitted to the box a secondary or outer cover, B, is applied when ready to be consigned to the vault or burial ground; this cover may also be sealed by means of thin cement when it is finally closed, thus rendering the box doubly sealed.

To the sides of the box handles of the usual construction may be attached, or a series of hinges, 10, carrying a common connecting bar, 11, may be applied; in either case the nuts, 12, preventing the withdrawal of the handles, should be counter sunk below the surface of the box and covered with

self-hardening enduring cement, to render the box air tight.

I am aware that wire screen has been used as a foundation for concrete and other foundations, but I am not aware that wire screen having its edges cut into at intervals and infolded to overlap and form reinforcements at such angles has been employed.

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

1. A reinforcing structure comprising a frame folded longitudinally forming the base and side, the base being slitted near the ends thereof transversely of the base for forming reinforcing strips, the ends of the base folded in upon the base portion, said reinforcing strips folded over the ends and extending diagonally across the base for holding the base and ends together, and the ends of the side portion bent around to form the ends of the structure.

2. A reinforcing structure comprising two oppositely disposed frames, said frames folded longitudinally forming side and base portions, the base portions being slitted near the ends thereof transversely of the bases for forming reinforcing strips, the ends of the base portion adapted to be folded over upon the base forming angular corners, said reinforcing strips folded over the ends and extending diagonally across the base for holding the base and ends together, and the ends of the side portions bent around to form the ends of the frames, said frames adapted to telescope, and a superstructure of plastic material incasing the frame in its telescopic position.

JOSEPH F. RUSSELL.

Witnesses:

H. F. WINGATE,
F. H. WINGATE.