June 25, 1963 A. PELAK 3,095,093

TRAYS

Filed Aug. 16, 1961 2 Sheets-Sheet 1

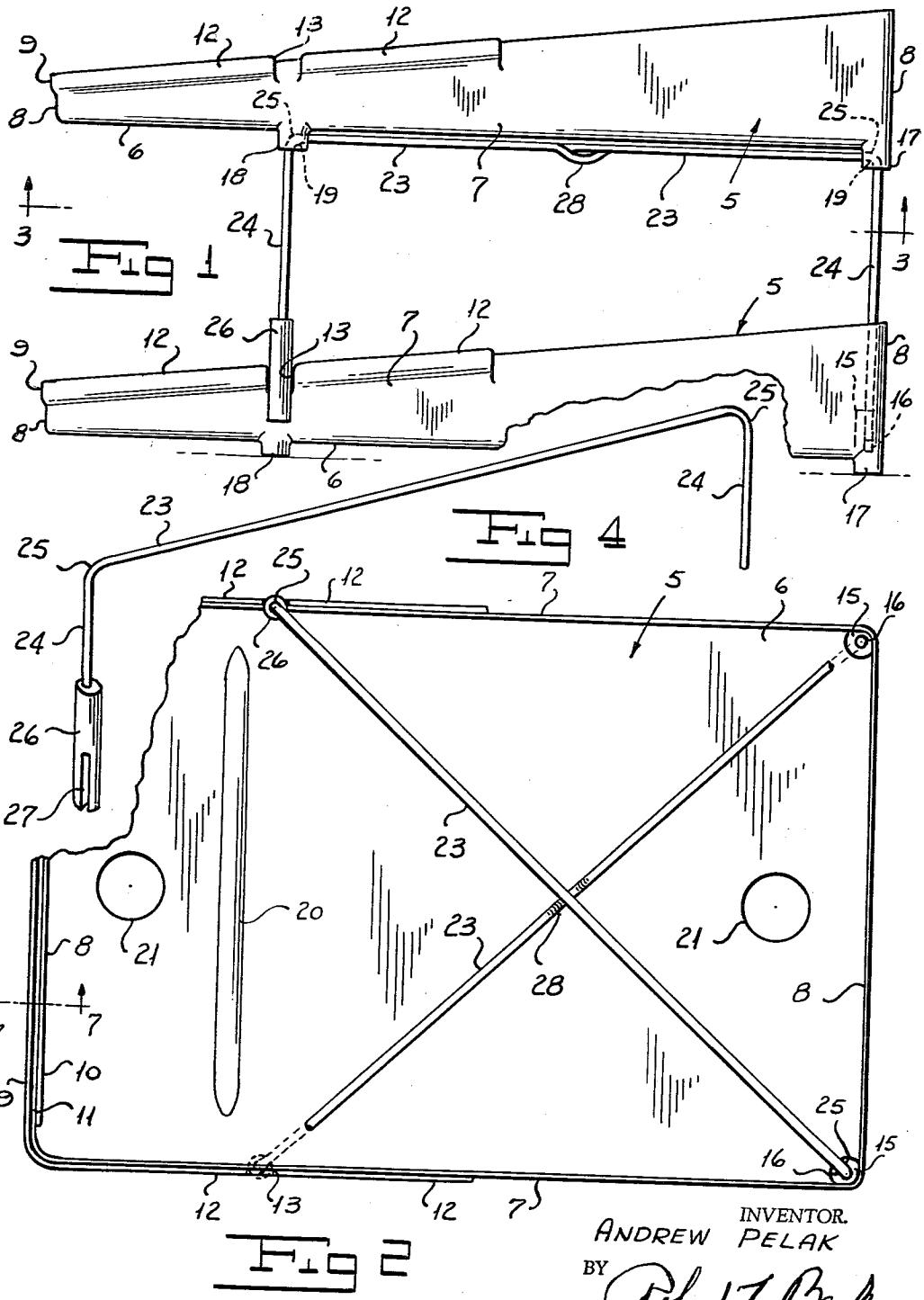


FIG 1

FIG 4

FIG 2

INVENTOR.
ANDREW PELAK
BY Robert F. Beck
ATTORNEY

June 25, 1963 A. PELAK 3,095,093

TRAYS

Filed Aug. 16, 1961 2 Sheets-Sheet 2

Fig 3

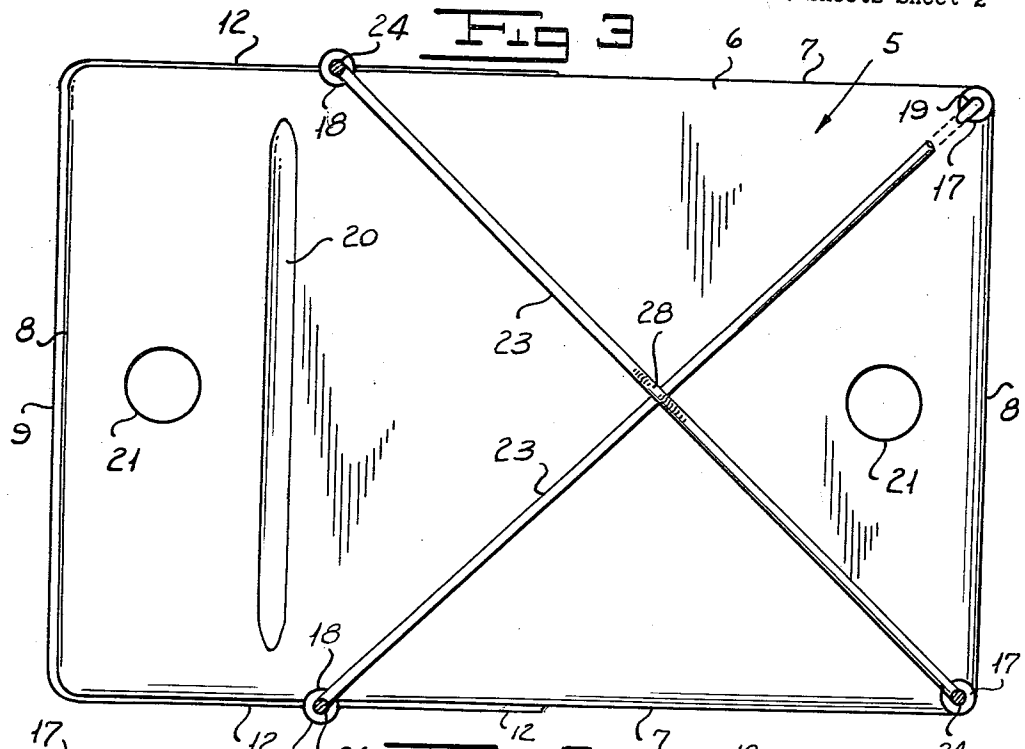


Fig 5

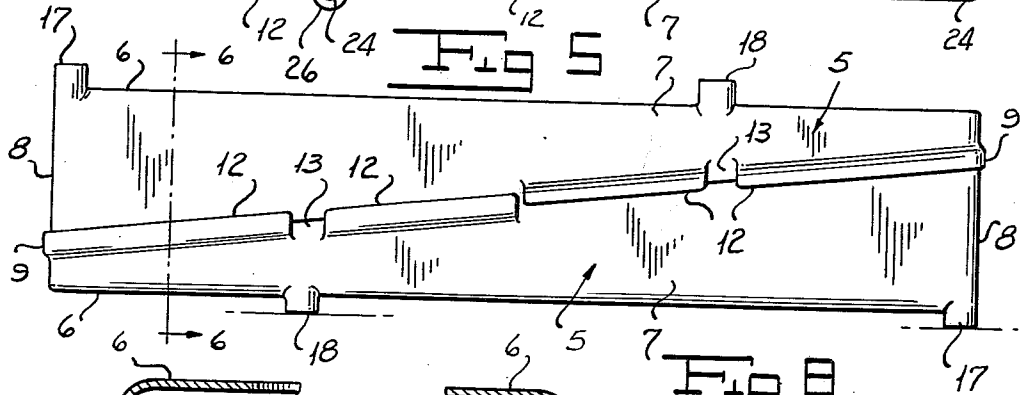


Fig 7

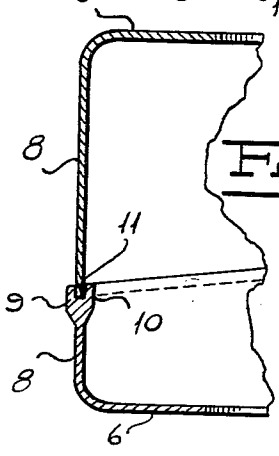


Fig 6

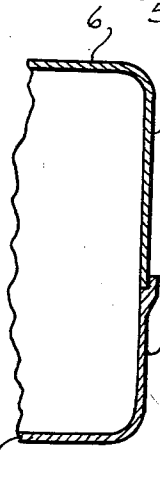
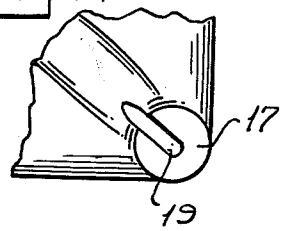


Fig 8



INVENTOR.
ANDREW PELAK
BY Robert F. Beck
ATTORNEY

United States Patent Office 3,095,093 Patented June 25, 1963

3,095,093

TRAYS

Andrew Pelak, 49 Columbus Ave., Garfield, N.J.

Filed Aug. 16, 1961, Ser. No. 131,871
4 Claims. (Cl. 211—126)

My invention relates to trays and more particularly to trays for use in the distribution and filing of papers and memoranda including the storing thereof.

One of the objects of my invention is to provide a tray which is so constructed that it may be readily arranged in conjunction with one or more other similar trays disposed one above the other for the accommodation of papers, memoranda, and the like.

Another object of my invention is to provide a tray of the foregoing described character capable of being disposed in connected relation with a similar tray and in a manner to form a closed receptacle or depository for the storing of papers and memoranda contained therein.

A further object of my invention is to provide a tray of the foregoing described character which is so constructed and arranged as to lend itself to use as a component of a depository or as a unit in a spaced tray assembly.

A still further object of my invention is to provide a tray of the foregoing described character which is equipped with means for supporting another tray in vertically spaced relation and with said means being operable to permit assembly of the trays to constitute a closed depository.

An important object of my invention is to provide a tray assembly wherein a pair of trays may be connected to each other to form a closed depository or to dispose one above the other in spaced relation and open condition for use in the distribution and filing of papers and memoranda.

Another important object of my invention is to provide a tray of the foregoing described character which is simple in construction, durable and efficient in use, and economical in manufacture.

With the above and other objects in view, as will hereinafter appear, the invention consists in the combination and arrangement of parts hereinafter set forth and illustrated in the accompanying drawings from which the several features of the invention and the advantages attained thereby will be readily understood by those skilled in the art.

Referring to the drawings wherein like reference characters designate like parts throughout the several views:

FIGURE 1 is a side elevation of a pair of trays arranged one above the other and having my invention incorporated therein;

FIGURE 2 is a top plan view of one of the trays and illustrating the tray supporting means in conjunction therewith;

FIGURE 3 is a sectional view taken on the line 3—3 of FIGURE 1;

FIGURE 4 is a perspective view of one of the components of the tray supporting means;

FIGURE 5 is a side elevation of a pair of trays disposed in connected relation to provide a closed depository;

FIGURE 6 is a detail sectional view taken on the line 6—6 of FIGURE 5;

FIGURE 7 is a detail sectional view taken through the end walls of a pair of connected trays and on the plane of the line 7—7 of FIGURE 2; and

FIGURE 8 is a bottom plan view of one of the corners of the tray disclosed in FIGURE 3.

In practicing my invention, as illustrated in the drawings, I provide a tray 5 having bottom, side, and end walls 6, 7, and 8, respectively, it being noted that the side walls taper downwardly from one end of the tray to the other. One of the end walls 8 is formed with upwardly extending outwardly and inwardly disposed flanges or lips 9 and 10, respectively, between its ends and which flanges serve to form a seat 11 for accommodating the outer margin of the opposite end wall of a similar tray for a purpose hereinafter more fully disclosed. Each of the side walls 7, for approximately one-half of its length and in proximal relation to the flanges 9 and 10, is formed with outwardly and upwardly disposed spaced flanges or lips 12 defining therebetween a gap 13, the flanges 12 serving to embrace the outer margin of the side wall of said similar tray. The flanges 12 adjacent the flanges 9 merge therewith to form a continuous flange or rib.

Interiorly, the tray 5 is formed, in the corners distally from the flange 9, with bosses 15 provided with openings 16. Exteriorly, the tray is fashioned with similar bosses 17 at the aforementioned corners and with other bosses 18 subjacent the slots 13. The bosses 17 and 18 are formed with diagonally extending grooves 19 and in some instances the bosses serve as feet for supporting the tray. The bottom 6 of the tray is formed with a reinforcing rib 20 and finger openings 21 as clearly illustrated in FIGURES 2 and 3.

Tray supporting means is provided comprising a pair of rods 23 each of which is fashioned with right angularly disposed end sections 24 forming curved shoulders 25 at their jointures and with one of the end sections equipped with a sleeve 26 having a bifurcated end defining a slot 27. One of the rods 23, between the shoulders 25, is formed with an incurvated portion 28 whereby said rods may be readily disposed crosswise with respect to each other and in substantially the same horizontal plane. When it is desired to support the trays one above the other as illustrated in FIGURE 1, the shoulders 25 are disposed in the grooves 19 while the sleeves 26 are inserted in the gaps 13 with the slots 27 thereof receiving therein the upper margin of the side walls of the lowermost tray. The opposite end sections of the rods are inserted in the openings 16 of the bosses 15 with the rods being disposed in crosswise relation. When the trays are thus connected to the rods and secured thereby in spaced relation, ready access may be had to the trays for use in the distribution and filing of papers and memoranda.

By disconnecting the rods 23 from the trays, and, if desired, arranging the rods within the lower tray, the upper tray may be reversed, end for end, to effect seating of the outer margin of the end wall 8 of each tray on the seat 11 between the flanges 9 and 10 of the other tray, thus, disposing the flanges 12 of both trays in embracing relation with the margins of the sidewalls of the adjacent tray to thereby constitute a closed receptacle or depository having side and end walls of uniform height, as illustrated in FIGURE 5 of the drawings. While the trays may be constructed of plastic material, it is understood that any other suitable material may be employed. It is to be noted that the finger openings 21 are so arranged that by inserting fingers of the user therethrough the trays may be readily separated or papers contained therein elevated for removal.

Without further elaboration, the foregoing will so fully explain the invention that others may, by applying current knowledge, readily adapt the same for use under various conditions of service. Moreover, it is not indispensable that all the features of the invention be used conjointly since they may be employed advantageously in various combinations and subcombinations.

It is obvious that the invention is not confined solely

to the use herein disclosed in connection therewith as it may be utilized for any purpose to which it is adaptable. It is therefore to be understood that the invention is not limited to the specific construction as illustrated and described, as the same is only illustrative of the principles involved which are capable of extended application in various forms, and the invention comprehends all construction within the scope of the appended claims.

What I claim is:

1. A tray having side and end walls and adapted to be disposed in vertically spaced relation with a similar tray, said first mentioned tray being provided at one end with interiorly disposed rod retaining means and with said side walls and one of the end walls being equipped with flanges, a pair of rods extending upwardly from said tray for supporting said similar tray thereabove and having pairs of coincident end sections, one pair of said end sections intersecting said flanges of said side walls and detachably connected to said side walls and the other pair of end sections being detachably connected to said retaining means for maintaining said rods in position for supporting the similar tray, said flanges adapted to embrace the side walls and an end wall, respectively, of the similar tray to constitute a closed receptacle when said end sections are detached from said side walls and said retaining means and said similar tray reversed end for end over said first mentioned tray.

2. In a tray assembly, a lower tray and an upper tray spaced above said lower tray and with each of said trays being provided with side and end walls, said upper tray being provided with legs formed with slots, said lower tray being interiorly provided with sockets adjacent an end wall thereof, a pair of removable crossed rods having one pair of ends detachably connected to the side walls of the lowermost tray and the other pair of ends retractably disposed within said sockets, said rods being provided with shoulders positioned within said slots for supporting and retaining said upper tray above said lower tray, said side and end walls of said trays equipped with flanges for embracing the side and end walls of each other to constitute a closed receptacle when said rods are removed from between said trays and said upper tray is reversed end for end over said lower tray.

3. In a tray assembly, a pair of trays spaced one above the other and constituting upper and lower trays, respectively, each of said trays having side and end walls, said upper tray being provided with legs formed with slots, said lower tray being interiorly formed with sockets adjacent an end wall thereof, a pair of removable rods interposed between said trays and having body sections crossing each other and extending diagonally beneath the bottom of said upper tray, said rods having end sections and shoulders connecting said body sections to said end sections, one pair of said end sections being detachably connected to the side walls of the lowermost tray distally with respect to the end walls thereof and the other pair of end sections retractably disposed within said sockets, said shoulders being disposed within said slots for supporting and retaining said upper tray above said lower tray, said side and end walls of said trays being equipped with flanges for embracing the side and end walls of each other to constitute a closed receptacle when said rods are removed from between said trays and said upper tray is reversed end for end over said lower tray.

4. In a tray assembly, a pair of one-piece trays spaced one above the other and constituting upper and lower trays, respectively, each of said trays having a solid bottom wall and closed side and end walls equipped with flanges with the flanges of said side walls of said lower tray being formed with gaps, said upper tray being provided with legs formed with slots, said lower tray being interiorly formed with sockets adjacent an end wall thereof, a pair of U-shaped removable rods interposed between said trays and having body sections crossing each other and extending diagonally beneath said bottom wall of said upper tray, said rods having leg sections and shoulders connecting said body sections to said leg sections, one pair of said leg sections provided with bifurcated sleeves extending into said gaps and detachably receiving portions of said side walls of said lower tray distally with respect to said end walls thereof, said other pair of said end sections being retractably disposed within said sockets, said shoulders being removably disposed within said slots for supporting and retaining said upper tray above said lower tray, said flanges adapted to embrace the side and end walls of said trays to constitute a closed receptacle when said rods are removed from between said trays and said upper tray is reversed end for end over said lower tray, said bottom walls being provided with finger openings to facilitate separation of said trays when the latter constitute a closed receptacle and to elevate the contents of said trays for ready removal.

References Cited in the file of this patent

UNITED STATES PATENTS

2,873,861	Jensen	Feb. 17, 1959
2,986,300	Parrish	May 30, 1961
2,999,611	Paulson	Sept. 12, 1961

FOREIGN PATENTS

864,942	Great Britain	Apr. 12, 1961