

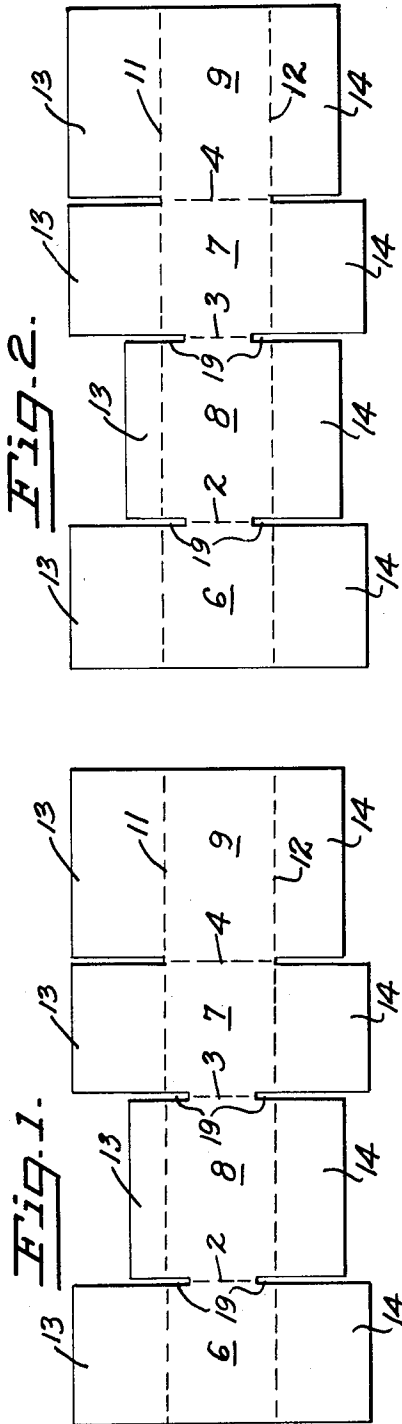
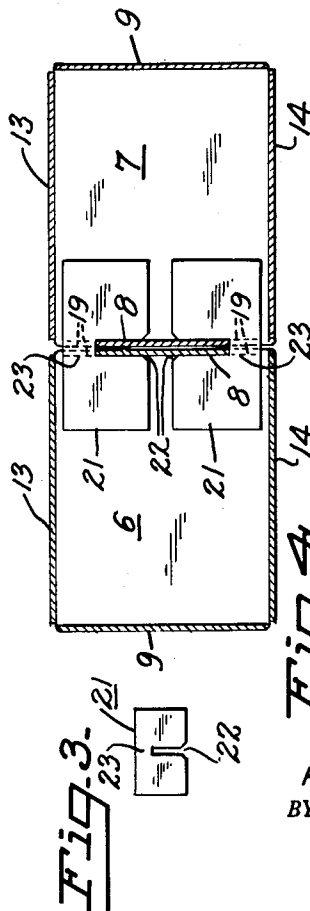
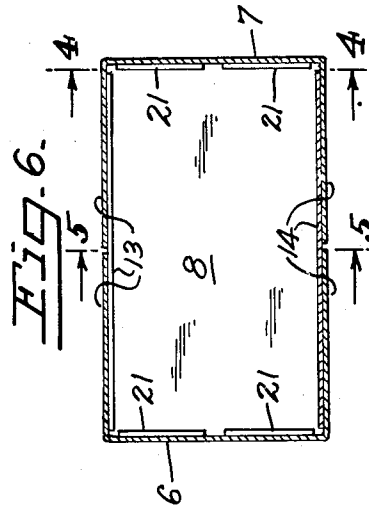
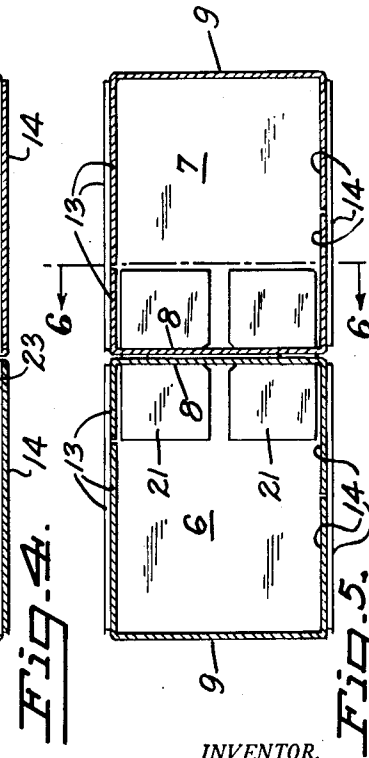
March 6, 1956

P. N. HALGREN
MULTIPLE UNIT CARTON

2,737,334

Filed Sept. 11, 1950

2 Sheets-Sheet 1



INVENTOR.
PETER N. HALGREN
BY *Charles M. Fryer*
ATTORNEY

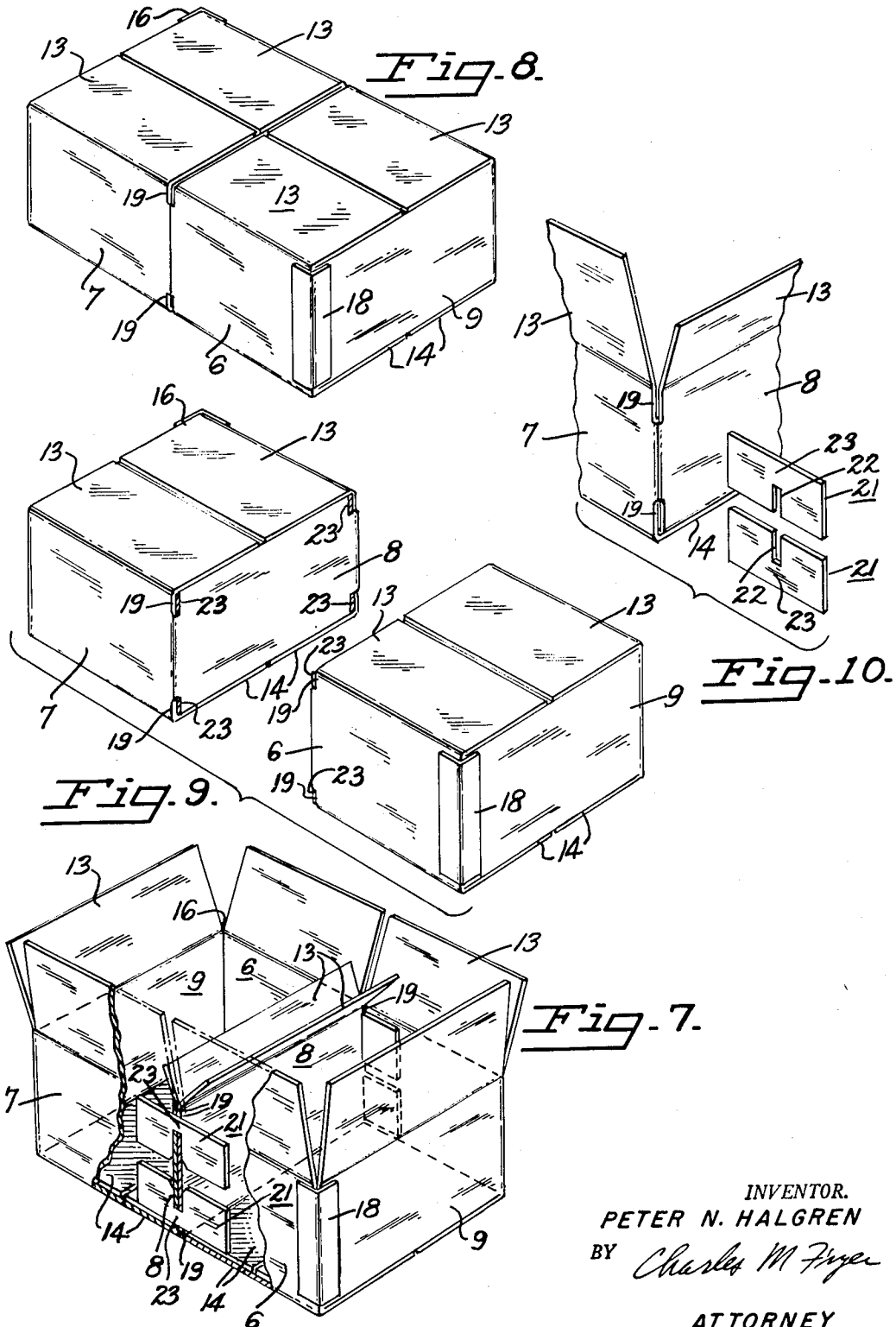
March 6, 1956

P. N. HALGREN
MULTIPLE UNIT CARTON

2,737,334

Filed Sept. 11, 1950

2 Sheets-Sheet 2



INVENTOR.
PETER N. HALGREN
BY *Charles M. Fryer*
ATTORNEY

1

2,737,334

MULTIPLE UNIT CARTON

Peter N. Halgren, Sumner, Wash., assignor to Fibreboard Products Inc., San Francisco, Calif., a corporation of Delaware

Application September 11, 1950, Serial No. 184,173

9 Claims. (Cl. 229—15)

This invention relates to cartons, and more particularly to a multiple unit carton adapted to be readily separated into individual carton units.

In the packaging of many types of merchandise, such as bottled beer and canned goods, it is convenient and desirable for the retailer to be supplied with a carton that is so constructed as to enable it to be separated quickly into smaller carton units should the purchaser not desire to purchase the full contents in the original multiple unit carton. The detachable units should be such that they can be readily handled and transported by the purchaser.

Summarizing this invention, it has, as its objects, among others, the provision of a carton of the character described which is of simple and economical construction, and which can be quickly and easily separated into individual carton units. Each unit comprises a complete carton section of more or less conventional closure flap and wall construction, in which the sections are positioned adjacent each other with certain of their walls in face to face relationship. Each of such facing walls is provided with upright slots along the upright corners thereof; and connecting strips extend into the slots and are secured to the inside faces of other walls of the carton sections for holding the adjacent carton sections together.

For added strength, the connecting strips are each slotted and the facing walls extend into these slots, thus providing an interlocked connection between the connecting strips and the adjacent carton sections. When the sections are to be detached into individual units, one need only to sever the strips in the space between the facing walls. Reference is now made to the drawings for a detailed description of a preferred embodiment of the invention.

In the drawings:

Fig. 1 is a plan view of a preferred blank for forming one of the carton sections or units; the view looking at the inside face of the blank.

Fig. 2 is a similar view of the preferred blank for forming another carton section or unit; the view also looking at the inside face of the blank. The blank of Fig. 2 is of the same construction as the blank of Fig. 1.

Fig. 3 is a plan view of one of the connecting strips for holding adjacent carton sections together.

Fig. 4 is a longitudinal vertical section, on an enlarged scale compared to Figs. 1 through 3, taken through two connected units of the carton and in the plane of the inside face of the connecting strips; the plane of the section being indicated by the line 4—4 in Fig. 6.

Fig. 5 is a similar section taken in a medial plane indicated by the line 5—5 in Fig. 6.

Fig. 6 is a transverse vertical section taken in a plane indicated by the line 6—6 in Fig. 5.

Fig. 7 is an isometric view of the multiple unit carton with its top wall closure flaps open, and with certain portions thereof shown broken away and other portions shown in section to illustrate more clearly the construction.

2

Fig. 8 is an isometric view of the multiple unit carton with its top and bottom wall closure flaps closed.

Fig. 9 is a view similar to Fig. 8 but showing the carton severed into its individual sections or units.

Fig. 10 is a fragmentary exploded view of a portion of one of the carton section corners and of the connecting strips adapted for connection at such corner.

The multiple unit carton of the invention is preferably made entirely of paperboard. Although for the purposes of illustration, only two carton sections are illustrated in the drawings, it is apparent that more than two of such sections can be secured together in the manner to be described.

Each carton section is of more or less conventional closure flap and wall construction. As is illustrated in Figs. 1 and 2, the multiple unit carton is formed of a plurality of similar blanks each of which is provided with parallel crease lines 2, 3 and 4 adapted to provide hingedly connected opposite side walls 6 and 7, and opposite end walls 8 and 9. A pair of parallel crease lines 11 and 12 extends transversely at a right angle with respect to crease lines 2, 3 and 4 to form hingedly connected closure flaps 13 which may be folded in a conventional manner to form the top wall of the section, and similar hingedly connected closure flaps 14 which may be folded in a like manner to form the bottom wall of the section. In the preceding description and also hereinafter, walls 6 and 7 are referred to as side walls and walls 8 and 9 are referred to as end walls. This is merely for purposes of convenient reference, as it is to be understood that the position of the walls is immaterial.

The blanks may be readily set up in a conventional manner to form the individual carton sections. In this connection, the free side edge of side wall 6 of the blank of Fig. 1 can be conveniently secured to the free side edge of end wall 9 by means of a strip of adhesively secured tape 16, or by any conventional hingedly connected securing flap (not shown). Similarly, the blank of Fig. 2 may be secured in set up position by another adhesively secured tape 18, or a securing flap (not shown). Preferably, for purposes of strength, the respective blanks are so folded inwardly with reference to their position of Figs. 1 and 2, that adhesive strips 16 and 18 are positioned at diagonally opposite corners of the multiple unit carton composed of the two sections illustrated, as can be seen more clearly from Fig. 8. When closure flaps 13 and 14 are closed and held down by any suitable means such as by adhesive, complete carton sections are provided, each of which is adapted to hold the desired goods.

Means is provided for securing the individual carton sections together in a manner enabling them to be readily separated into individual units. For this purpose, upright slots 19 are formed in each blank for each carton section. These slots extend inwardly from both the top and the bottom of the section along crease lines 2 and 3 which when the blank is set up form the upright corners of the section at end wall 8 which is adapted to abut the like end wall 8 of the adjacent section in face to face relationship. All of slots 19 are of substantially the same depth.

Four connecting strips 21 are provided for holding the carton sections together; and each of these strips is adapted to extend into the meeting adjacent slots 19 of adjacent sections, whereby each strip is positioned adjacent the inside faces of the side walls of the adjacent sections. In the case of relatively large size cartons adapted to hold heavy articles such as beer bottles, it is desirable for enhanced strength to secure the strips to such inside faces of the side walls by any suitable means such as stitching, but it is more economical and consequently preferred to effect such securing by any suitable

3

strong adhesive. In the case of cartons adapted to hold relatively light products or small cartons where the added strength of securing strips 21 to the side walls is not required, such securing of the strips may be omitted. The strips are positioned in slots 19 before the top and bottom wall closure flaps of the carton sections are closed.

Strips substantially the depth of slots 19 may be employed. However, for purposes of strength and rigidity, each strip 21 is of a depth greater than the slots 19, and is provided with a slot 22 into which both of the facing end walls 8 may extend to thereby provide for an interlocked connection between the connecting strips and the end walls. Slot 22 is preferably substantially as wide but slightly wider than the combined widths of the facing and abutting end walls 8 so that the opposite edges of the slot engage the inside faces of the end walls, which is a feature also making for increased strength, and which is particularly desirable if strips 21 are not secured to the inside faces of the side walls, to provide for an efficacious interlock of the strips with the carton sections.

When connecting strips 21 are applied to the carton sections adjacent the side walls thereof, the connected sections may be readily shipped flat. When the contents are to be placed into the respective sections, the entire carton can be readily unfolded, the contents placed in, and the closure flaps closed and sealed, thus providing a rigid multiple unit carton composed of a plurality of detachable units which can be readily handled and shipped.

To separate the units, it is only necessary to cut the portion 23 of each connecting strip 21 adjacent slot 22 in such strip. Such portion 23 spans the space between the facing end walls 8, and can be readily severed by any suitable implement, such as a knife, inserted between such walls. When severed, a plurality of complete carton sections will be formed as is indicated by Fig. 9. Each section is a complete carton and can be readily handled. In this connection, each of the opposite side walls of the respective sections may be formed with suitable hand holes (not shown) if it is desired to provide the same.

I claim:

1. A multiple unit carton adapted to be readily separated into its individual units comprising a plurality of adjacent carton sections, each section having opposite end walls, opposite side walls, a cover wall and a bottom wall; the sections being positioned with an end wall of one section in face to face relationship with an end wall of an adjacent section; each of said carton sections being provided with upright slots along the upright corners at its end wall which faces the end wall of the adjacent section; each of said slots being open at an end of a corner connecting strips independent of said carton sections extending into said slots and overlying each of the adjacent inside faces of the side walls of the adjacent sections; and means connecting said strips to said sections for holding said sections together.

2. A multiple unit carton adapted to be readily separated into its individual units comprising a plurality of adjacent carton sections, each section having opposite end walls, opposite side walls, a cover wall and a bottom wall; the sections being positioned with an end wall of one section in face to face relationship with an end wall of an adjacent section; each of said carton sections being provided with upright slots extending inwardly from both the top and the bottom of the section along the upright corners at its end wall which faces the end wall of the adjacent section; connecting strips independent of said carton sections at both the bottom and the top of said carton extending into said slots and overlying each of the adjacent inside faces of the side walls of the adjacent sections; and means connecting said strips to said sections for holding said sections together.

3. A multiple unit carton adapted to be readily sep-

4

arated into its individual units comprising a plurality of adjacent carton sections, each section having opposite end walls, opposite side walls, a cover wall and a bottom wall; the sections being positioned with an end wall of one section in face to face relationship with an end wall of an adjacent section; each of said carton sections being provided with upright slots extending inwardly from both the top and the bottom of the section along the upright corners at its end wall which faces the end wall of the adjacent section; and connecting strips at both the bottom and the top of said carton extending into said slots and secured to the inside faces of the side walls of the adjacent sections for holding said sections together, each of said strips being provided with a slot into which said facing end walls extend.

4. A multiple unit carton adapted to be readily separated into its individual units comprising a plurality of adjacent paperboard carton sections, each section having opposite end walls, opposite side walls, a cover wall composed of flaps hingedly connected to said end and said side walls, and a bottom wall composed of flaps hingedly connected to said end and said side walls; the sections being positioned with an end wall of one section in face to face relationship with an end wall of an adjacent section; each of said sections being provided with upright slots extending inwardly from both the top and the bottom of the section along the upright corners at its end wall which faces the end wall of the adjacent section; and paperboard connecting strips at both the bottom and the top of said carton extending into said slots and adhesively secured to the inside faces of the side walls of the adjacent sections for holding said sections together, each of said strips being provided with a slot into which said facing end walls extend.

5. A multiple unit carton adapted to be readily separated into its individual units comprising a plurality of adjacent paperboard carton sections, each section having opposite end walls, opposite side walls, a cover wall composed of flaps hingedly connected to said end and said side walls, and a bottom wall composed of flaps hingedly connected to said end and said side walls; the sections being positioned with an end wall of one section in face to face relationship with an end wall of an adjacent section; each of said sections being provided with upright slots extending inwardly from both the top and the bottom of the section along the upright corners at its end wall which faces the end wall of the adjacent section; and paperboard connecting strips at both the bottom and the top of said carton extending into said slots and secured to the inside faces of the side walls of the adjacent sections for holding said sections together, each of said strips being provided with a slot into which said facing end walls extend, each of said slots being substantially as wide as the combined widths of said facing end walls whereby the opposite edges of said slot substantially engage the inside faces of said end walls.

6. A multiple unit carton adapted to be readily separated into its individual units comprising a plurality of adjacent carton sections, each section being a complete and individual carton having opposite end walls, opposite side walls, a cover wall and a bottom wall; the sections being positioned with an end wall of one section in face to face substantially abutting relationship with an end wall of an adjacent section; each of said carton sections being provided with upright slots along the upright corners at its end wall which faces the end wall of the adjacent section; each of said slots being open at an end of a corner; a plurality of strips independent of said carton sections; each of said strips extending into a pair of adjacent slots at adjacent corners of said sections and overlying each of the adjacent inside faces of the side walls of said sections and extending across from one of said carton sections into the other; and means connecting said strips to said sections.

7. A multiple unit carton adapted to be readily sep-

5

arated into its individual units comprising a plurality of adjacent carton sections, each section having opposite end walls, opposite side walls, a cover wall and a bottom wall; the sections being positioned with an end wall of one section in face to face relationship with an end wall of an adjacent section; each of said carton sections being provided with an upright slot along an upright corner at its end wall which faces the end wall of the adjacent section; each of said slots being open at an end of a corner; the slots at adjacent corners of said adjacent sections meeting each other; a connecting strip independent of said carton sections extending into said meeting slots across from one of said carton sections into the other and overlying each of the adjacent inside faces of the side walls of the adjacent sections; and means connecting said strip to said sections for holding said sections together.

8. A multiple unit carton adapted to be readily separated into its individual units comprising a plurality of adjacent carton sections, each section having opposite end walls, opposite side walls, a cover wall and a bottom wall; the sections being positioned with an end wall of one section in face to face relationship with an end wall of an adjacent section; each of said carton sections being provided with an upright slot along an upright corner at its end wall which faces the end wall of the

6

adjacent section; each of said slots being open at an end of a corner; the slots at adjacent corners of said adjacent sections meeting each other; a connecting strip independent of said carton sections extending into said meeting slots across from one of said carton sections into the other and overlying each of the adjacent inside faces of the side walls of the adjacent sections; said connecting strip being provided with a slot into which said facing end walls extend in interlocked relationship with said strip.

9. The construction of claim 8 in which the slot in the connecting strip is open at one edge thereof and the opposite edge of said strip is adjacent the open ends of the slots in said adjacent upright corners.

References Cited in the file of this patent

UNITED STATES PATENTS

1,166,263	Sackett	Dec. 28, 1915
1,567,165	Noland	Dec. 19, 1925
1,890,965	Boeye	Dec. 13, 1932
2,046,751	Reichel	July 7, 1936
2,105,025	Curtis	Jan. 11, 1938
2,448,795	Grecco	Sept. 7, 1948
2,473,766	Richey	June 21, 1949
2,585,289	Wallace	Feb. 12, 1952
2,632,593	Minster et al.	Mar. 24, 1953