Sept. 20, 1966 F. C. SHINA 3,273,518

PALLET

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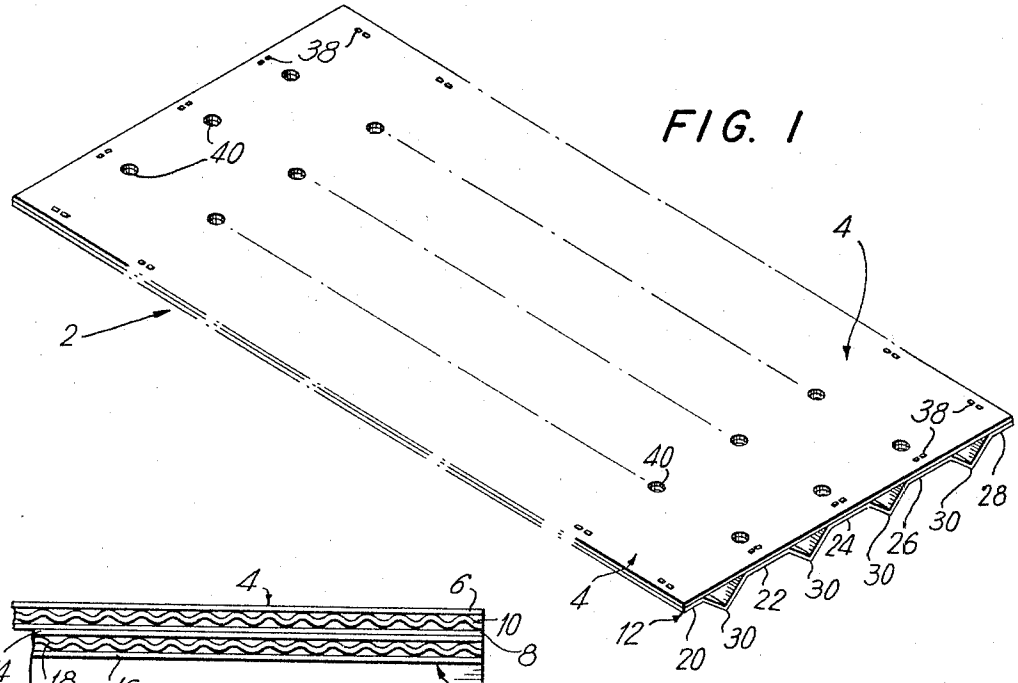


FIG. 1

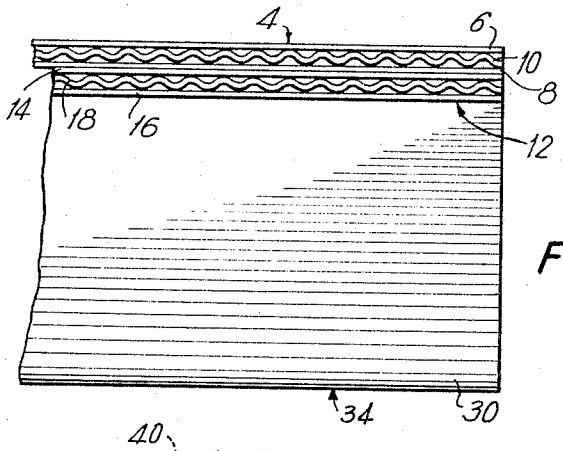


FIG. 2

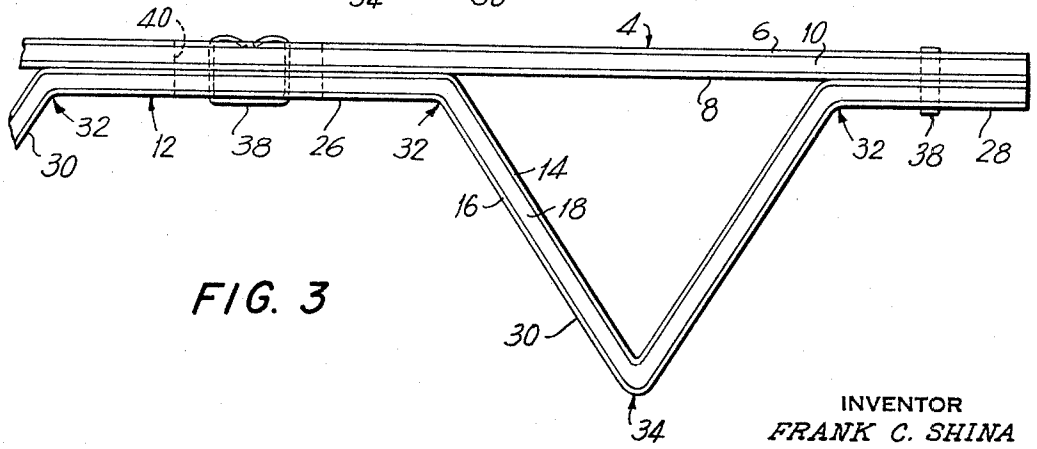


FIG. 3

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PALLET

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This invention relates to pallets of the type which may be used for supporting materials above the floor or other supporting surfaces. More in particular, this invention relates to pallets for use in supporting materials so that they may be moved with materials thereon by a fork type of truck and wherein the materials may be meat or other similar products.

An object of this invention is to provide an improved pallet construction of the above type. A further object is to provide a light-weight, sturdy pallet which has wide scope of use and is adjustable to meet the conditions which are encountered in use. These and other objects will be in part obvious and in part pointed out below.

In the drawings:

FIGURE 1 is a perspective view of one embodiment of the invention;

FIGURE 2 is a side elevation of the right-hand end of the pallet of FIGURE 1; and,

FIGURE 3 is an end elevation of the right-hand corner of the pallet in FIGURE 1.

Referring to FIGURE 1 of the drawings, pallet 2 has a rectangular flat top sheet 4 of corrugated paper board which (see FIGURES 2 and 3) has top and bottom layers 6 and 8, respectively, and a corrugated center layer 10, with the corrugations extending transversely of the pallet. Positioned beneath sheet 4 is an under sheet 12 which is also of corrugated paper board with top and bottom sheets 14 and 16, respectively, and a center corrugated sheet 18, the corrugations of which also extend transversely of the pallet. Sheet 12 is formed by five spaced flat strip portions 20, 22, 24, 26, and 28, and four leg portions 30 positioned respectively between the strip portions.

Referring to FIGURE 3, leg portions 30 are formed by folding or bending the under sheet along break or bend lines to form bends 32 and ridges 34 which extend longitudinally of the pallet and, therefore, transversely of the corrugations. The bends 32 separate the leg portions from the flat strip portions and provide interconnections therebetween. Ridges 34 provide parallel supporting feet which support the pallet upon the floor or other surface. Sheets 4 and 12 are connected together by a plurality of metal clips 38 in rows around the edges of the pallet and between the leg portions 30. Hence, each strip portion is held flat against the bottom of sheet 4, and each of the leg portions diverges upwardly and is supported at its edges by the adjacent strip portions. The transverse corrugations of each leg portion act as load-supporting columns so that equal forces are exerted on the two sides of the leg and the support is distributed along the pallet.

In this embodiment the pallet is provided with circular openings or holes 40 through sheets 4 and 12 which permit air and any liquid present to pass. Among other advantages, these holes reduce the tendency for the pallet to be lifted when the materials are removed from it. An additional feature is that the entire pallet is coated with a thin transparent layer of polyethylene which renders it

substantially waterproof. Hence, the pallet may be maintained in sanitary condition and used for products such as meats. During use, the fork of a lift truck may be projected longitudinally of the pallet between the leg portions so as to lift the pallet and the materials thereon.

In this embodiment the sides of each of the leg portions diverge at an angle of the order of 60° from each other. The specific dimensions are not critical although the specific embodiment constitutes a very satisfactory construction. The term "longitudinal" as used herein means the direction of the supporting legs regardless of the relative overall dimensions of the pallet.

I claim:

1. A pallet of the type which may be used to support materials above the level of the supporting surface whereby the pallet may be lifted with the material thereon, the combination of, a flat sheet of corrugated paper board which presents a material-supporting surface, an undersheet of corrugated paper board having substantially the overall longitudinal and transverse dimensions of said flat sheet with a plurality of parallel flat strip portions positioned along the underside of said flat sheet and equally spaced from each other, said flat strip portions including a pair of edge strips positioned respectively along the longitudinal side edges of said flat sheet, said undersheet including a plurality of integral leg portions corresponding in number with the number of spaces between said flat strip portions and positioned respectively in said spaces with edges coextensive with the respective edges of said flat strip portions and integral therewith whereby each of said flat strip portions is separated from the next adjacent flat strip portion by an integral leg portion, each of said leg portions comprising two flat portions which are at an angle to each other and which are interconnected by a supporting ridge which is adapted to rest upon the supporting surface whereby said pallet is supported by a plurality of parallel supporting ridges, and attaching means attaching said flat strip portions to said flat sheet, said undersheet having its corrugations extending substantially transversely of said flat strip portions and said flat portion of said leg portions whereby said flat portions of each of said leg portions are rigid between the supporting ridge of the leg portion and the adjacent flat strip portion.

2. A pallet as described in claim 1 wherein said attaching means comprises a plurality of metal clips, and wherein said supporting surface of said flat sheet includes a continuous layer of plastic film.

3. A pallet as described in claim 2 which is provided with a plurality of openings through said flat sheet and said flat strip portions.

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