March 5, 1963 A. L. LIND 3,080,067

DISPLAY DEVICE

Filed Sept. 2, 1958

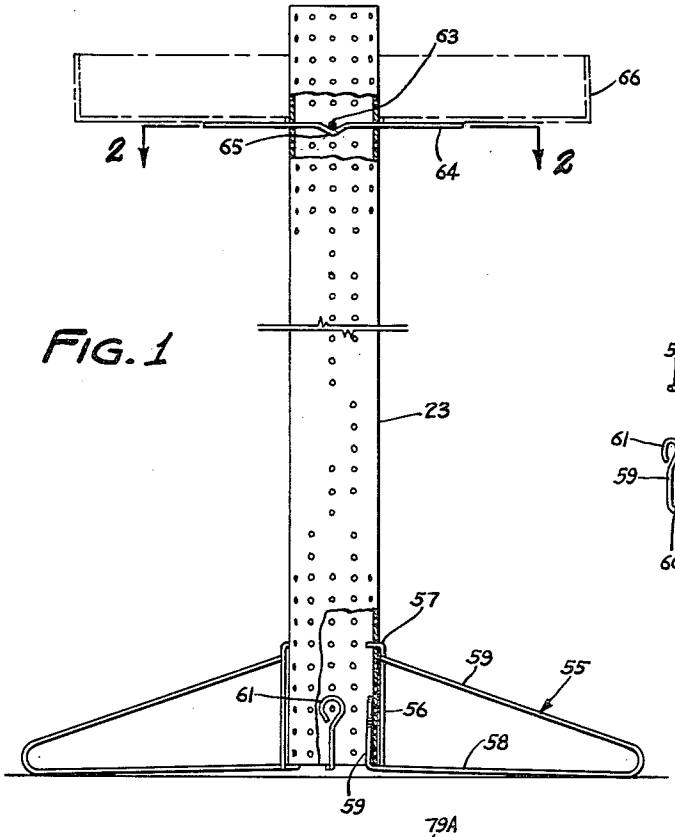


FIG. 1

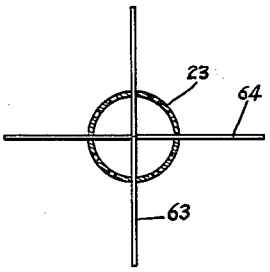


FIG. 2

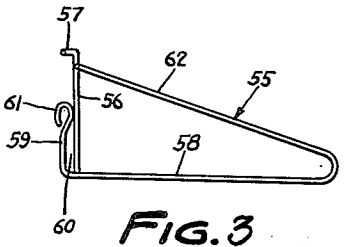


FIG. 3

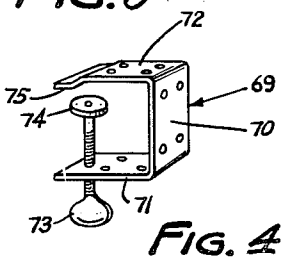


FIG. 4

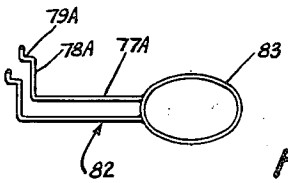


FIG. 6

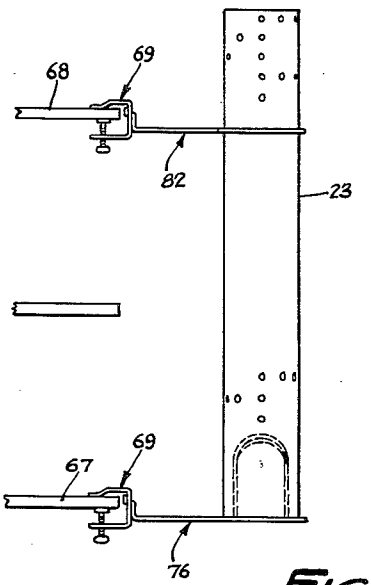


FIG. 5

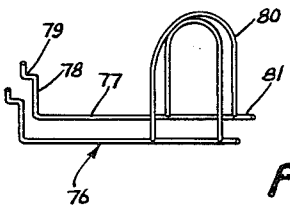


FIG. 7

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DISPLAY DEVICE

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This invention relates to an improved device for displaying merchandise of various kinds whereby it may readily be viewed by prospective purchasers passing by, and thus stimulate and promote sales.

An important object of the invention is to provide such a device comprising a tubular supporting member of cylindrical cross-section, having rows of uniformly spaced apertures in its wall, said apertures being arranged in uniformly spaced rows both circumferentially of said member and longitudinally thereof, whereby the holes of adjacent rows of holes are disposed in right angular relation to the length of the member.

These and other objects of the invention and the means for their attainment will be more apparent from the following description taken in connection with the accompanying drawings.

In the accompanying drawings there has been disclosed a structure designed to carry out the various objects of the invention, but it is to be understood that the invention is not confined to the exact features shown, as various changes may be made within the scope of the claims which follow.

FIGURE 1 is an elevation, partly in section, of a perforated tube display device according to this invention;

FIGURE 2 is a horizontal section taken on the line 2—2 of FIGURE 1 and in the direction of the arrows;

FIGURE 3 is an elevation in perspective of a supporting foot for the display device;

FIGURE 4 is a perspective view of a clamp hanger for supporting a modified form of display device;

FIGURE 5 is an elevation of a modified form of display device; and

FIGURES 6 and 7 are perspective views of modified supporting means for the alternative form of display device.

Exemplary perforated tube display devices constructed from perforated tubes formed according to the invention as described are shown in FIGURES 1 and 7. In FIGURE 1 there is shown a free standing perforated tube display supported on a plurality of three or more foot members indicated generally at 55. The foot member 55, as shown in FIGURE 3, is formed from relatively stiff wire. It includes generally a vertical member 56 adapted to be disposed longitudinally along the outer perimeter of the perforated tube 23 at its bottom end. The upper end of the vertical member 56 is bent inwardly to provide a horizontal projection or lug 57 forming a hook member adapted to be inserted into one of the perforations in the tube and extend through the tube wall. The foot member also includes a generally horizontal member 58 welded or otherwise secured to the bottom of the vertical member and extending beyond the vertical member in the same direction as projection 57 by about the thickness of the perforated tube. A second vertical member 59 extends upwardly from this extension of the horizontal base member generally parallel to the vertical member 56 to define a space 60 in which the tube wall is received. The vertical member 59 is preferably integral with the generally horizontal member 58 and provided with a loop member 61 or the like at its upper extremity which is resiliently urged against the inner wall of the tube 23. A diagonal member 62 extending between the vertical and horizontal members provides additional strength and rigidity. The vertical member 56 is preferably secured to

horizontal member 58 at just slightly more than a right angle so that the weight of the display device is borne by the outer extremities of the foot members, as shown in FIGURE 1. A plurality of the foot members 55 are disposed radially about the bottom end of a perforated tube to form a supporting base structure as shown in FIGURE 1.

A variety of standard "Peg Board" fixtures may be utilized with the standing perforated tube to display a wide variety of merchandise. In addition, rod supports may be utilized in a perforated tube display. Two rod supports disposed at right angles to each other are shown in FIGURES 1 and 2. Rod 63 is a straight rigid rod of length sufficient to extend through the perforated tube and for some distance on either side. Rod 64 is generally similar except that it is provided with a central offset portion 65 which passes around rod 63 at their point of intersection while permitting the extremities of both rods to lie in the same plane. The rod elements may optionally be disposed, for example, with a 60 degree angle between adjacent rods utilizing one straight rod element 63, one rod element 64 with the offset portion below, and a second rod element 64 with the offset portion above the straight rod. The rod elements may be used as such to support displayed merchandise from the extensions projecting from the tube wall. Optionally, the rods may be provided with caps, or with an upstanding projection at one end, to keep merchandise from slipping off rods. The rod elements may also be utilized to support a shelf or a bin, as indicated at 66 in broken lines in FIGURE 1.

The perforated tube display shown in FIGURE 5 is supported from each of two shelves 67 and 68. The tube is supported from the shelves by means of a screw clamp as shown in FIGURE 11 and support fixtures as shown in FIGURES 6 and 7. The clamp 69 is generally U-shaped with a flat generally rectangular central strap portion 70 with flat generally rectangular parallel strap side portions 71 and 72 projecting outwardly from opposite ends thereof to form the clamp jaws. A thumb screw 73 fitted with a washer 74 is threaded through the side jaw member 71 centrally disposed adjacent the free edge thereof. The free edge of the side jaw member 72 is offset inwardly slightly at 75 to permit the clamp to clear projecting molding, pricing channels, etc. Each of the wall members of the clamp 69 is provided with a plurality of uniformly spaced holes to receive peg board fixtures or the like. The clamp is adapted to be positioned either horizontally along the projecting edge of a shelf or vertically along the edge of a vertical divider or partition. The holes in the clamp walls are disposed to accommodate fixtures in either clamp position.

In FIGURE 5 the perforated tube display is supported by a fixture indicated generally at 76 and shown in FIGURE 7. The support fixture 76 comprises a pair of identical parallel wire members each having a horizontal portion 77 and a vertical portion 88 which is offset at its upper end to form a hook member 79 adapted to be inserted into one of the holes in the clamp 69, or in a similar hole in a "Peg Board" or perforated tube. At the free ends of the horizontal members 77, there is provided a pair of upstanding inverted U-shaped loop members 80 disposed at substantially right angles to one another with one leg of each of the loops being secured to each of the parallel horizontal supporting members. The diameters of the loops are such that they just fit the inside of a perforated tube and the loops are preferably set in slightly from the ends of the horizontal support members to provide a shoulder 81 for partially supporting the bottom of a perforated tube. The support fixture 76 is mounted by a clamp 69 to a shelf 67 or it may be mounted on a "Peg Board" or another perforated tube.

Where the perforated tube is of short height or light weight no further support may be necessary, although it is preferred to also provide a stabilizing ring support indicated generally at **82**, such as shown in FIGURE 6. The structure of the ring support **82** is substantially the same as that of the supporting member **76** with the exception that a ring **83** of diameter sufficient to fit around the outside perimeter of a perforated tube is provided at the free end of the horizontal members **77**. The ring support fixture **82** is likewise attached to a shelf **68** of appropriate height by means of a clamp support **69** or attached directly to a "Peg Board" or another perforated tube.

A wide variety of display devices may be produced from the perforated tubes formed according to this invention. These may be produced in a variety of heights and diameters, utilizing a variety of different fixtures, provided with shelves, bins, canopies, banners, etc. and either free standing or supported from some permanent structure. It should be noted that "Peg Board" fixtures which are usable in conjunction with the perforated tube displays of this invention have been standardized in design and construction on the basis of one inch centers between supporting hook members. One of the problems solved by this invention is the production of perforated tubes having holes or openings aligned in longitudinal rows on precisely one inch centers and disposed transversely around the perimeter of the tube on one inch centers. It will be apparent, however, that the invention is not limited to any specific spacing of the perforations.

It is apparent that many modifications and variations of this invention as hereinbefore set forth may be made without departing from the spirit and scope thereof. The specific embodiments described are given by way of example only and the invention is limited only by the terms of the appended claims.

I claim as my invention:

1. A foot support means for a perforated tube display device, said foot support being generally triangular in shape and comprised of relatively rigid wire adapted to be secured adjacent the bottom end of a perforated tube display device to radiate out therefrom, said foot support including a vertical member adapted to be disposed longitudinally along the outside surface of said tube and having an inwardly projecting lug at the upper end thereof adapted to engage a perforation of said tube, a substantially horizontal member at the opposite end thereof, one end of said horizontal member extending inwardly from said vertical member and upwardly adjacent to, but spaced from said vertical member by about the thickness of said tube wall to receive the wall of said tubular display device therein, and a diagonal brace member extending between said horizontal and vertical members.

2. A display device comprising a substantially rigid cylindrical hollow tube, said tube being provided with a plurality of longitudinal rows of uniformly spaced perforations, said rows being uniformly spaced about the periphery of said tube by the same distance that the perforations in the longitudinal rows are spaced, and means for supporting said display device, said support means comprising a plurality of at least three generally triangular foot members, each of said foot members being comprised of relatively rigid wire and adapted to be secured adjacent the bottom end of said display device to radiate out therefrom, said foot members including a vertical member adapted to be disposed longitudinally along the outside surface of said tube and having an inwardly projecting lug at the upper end thereof adapted to engage a perforation of said tube, a substantially horizontal member at the opposite end thereof, one end of said horizontal member extending inwardly from said vertical member and upwardly adjacent and parallel to but spaced from said vertical member to receive the wall of said tubular display device therein, and a diagonal brace member extending between said horizontal and vertical members.

3. A display device comprising a substantially rigid cylindrical hollow tube, said tube being provided with a plurality of longitudinal rows of uniformly spaced perforations, said rows being uniformly spaced about the periphery of said tube by the same distance that the perforations in the longitudinal rows are spaced, a plurality of rod members extending transversely through perforations in said tube device and radiating out therefrom, the portions of said rod elements extending out from the surface of said tube lying substantially in a single plane, said rods intersecting at a point lying on the longitudinal axis of said tube, one of said rod elements being straight throughout its length and the other of said rod elements being offset approximately midway between their ends to pass around said straight rod element at their point of intersection, and means for supporting said display device.

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