July 6, 1943. C. D. PAULI, JR 2,323,417

WALL TILE

Filed Feb. 3, 1941

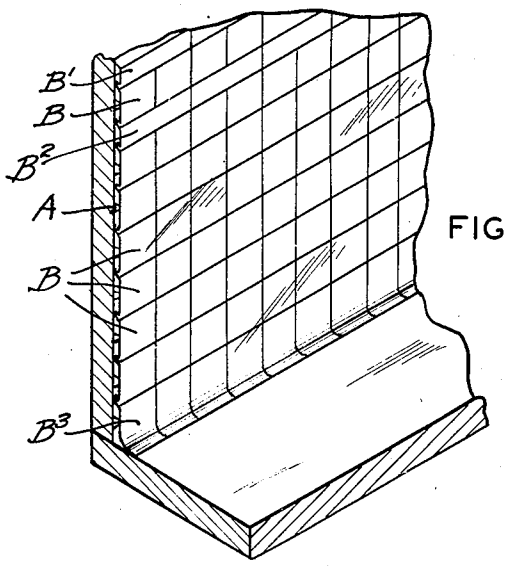

FIG. 1.

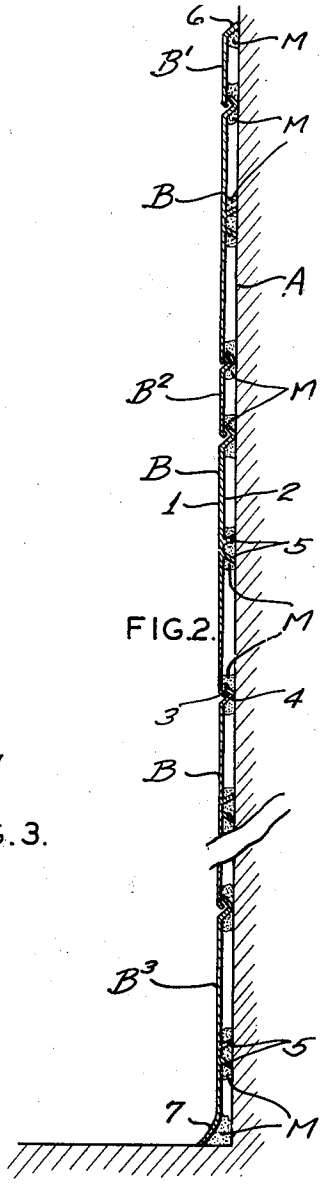

FIG. 2.

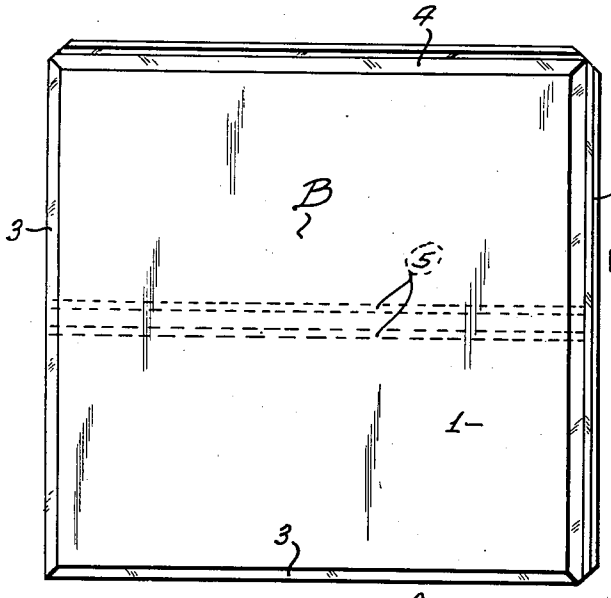

FIG. 3.

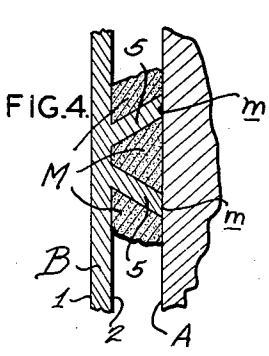

FIG. 4.

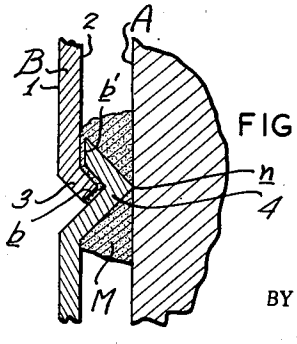

FIG. 5.

INVENTOR.
CHARLES D. PAULI JR.

BY

ATTORNEY.

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WALL TILE

Charles D. Pauli, Jr., St. Louis, Mo.

Application February 3, 1941, Serial No. 377,091

1 Claim. (Cl. 72—25)

This invention relates to a certain new and useful improvement in wall tiles.

My invention has for its primary object the provision, as a new article of manufacture, of a compact, light-weight, durable tile of homogeneous synthetic plastic, which may be conveniently applied to and upon a wall, which is uniquely provided with interlocking members for enabling rigid, water-proof securement of the tiles together and in place on a wall, which may be efficiently and economically fabricated by high-production molding methods and to substantially any desired shape without distortion and strain, and which is highly satisfactory in the performance of its intended functions.

And with the above and other objects in view, my invention resides in the novel features of form, construction, arrangement, and combination of parts presently described and pointed out in the claim.

In the accompanying drawing,

Figure 1 is a fragmentary perspective view of a wall-section surfaced with tile constructed in accordance with and embodying my present invention;

Figure 2 is a vertical sectional view of the tile-surfaced wall of Figure 1;

Figure 3 is an enlarged plan view of a wall tile of my invention; and

Figures 4 and 5 are enlarged fragmental sectional views of the wall-interlock and joint-overlap sections, respectively, of the tile of my invention.

Referring now in more detail and by reference characters to the drawing, which illustrates a preferred embodiment of my invention, A designates a vertically disposed wall surfaced with a plurality of tiles B of my invention.

Each tile B is formed or constructed preferably by pressure molding from a synthetic resin or so-called homogeneous "plastic," such as cellulose-acetate, cellulose-acetate-butyrate, commonly referred to as Tenite-2, polystyrene, and the like.

Each tile B is preferably of oblong-rectangular or square shape, as desired, has a smooth outer or front face 1, a preferabbly smooth rear face 2, is provided along each of two adjoining margins with an obliquely rearwardly and outwardly presented relatively short or reduced lip 3 terminating in an end-face *b* at right angles to its front and rear faces, and is provided longitudinally along each of its remaining adjoining margins with an obliquely rearwardly and outwardly offset bead 4 of V-shape in cross-sectional contour and terminating in an end-face *b'* disposed in a plane parallel to the plane of the tile-face 2 for interlocking engagement with the lip 3 of a contiguous tile B, as best seen in Figure 5.

Formed preferably integrally with, and projecting obliquely outwardly from, the rear face 2 of each tile B, is a pair of diverging ribs 5 respectively parallel to opposite parallel margins of the tile B, the angular distance from the rear face 2 to the longitudinal rib-margin *m* being somewhat less than the angular distance between the plane of the rear face 2 and the apex line *n* of the channeled bead 4, as best seen by comparing Figures 4 and 5.

Complementing the rectangularly shaped tiles B, are border or cap tiles B', stripe-tiles B^2, and bottom or footing tiles B^3.

The tiles B' are structurally substantially similar to the tiles B, except that each tile B is formed along its upper longitudinal margin with a deeper or elongated bevel-flange 6 for neat-fitting engagement with the wall A.

The stripe-tiles B^2 are likewise structurally similar to the tiles B, except that each tile B^2 may be of a different color from, and is of reduced or narrow dimensions relatively to, the tiles B.

And each bottom or footing tile B^3 structurally differs from the tiles B only in that each tile B^3 is provided or formed along its lower longitudinal margin with an outwardly curving arcuate floor-engaging flange 7.

In practice, the tiles are disposed as shown in marginally interlocked flatwise arrangement on the wall A, a firm, positive, water-proof bond of the several tiles to the wall or surface A being readily effected by means of the application and disposition preferably of one of the oil-type mastics M to and between the wall A and the respective tiles at and about the ribs 5 and at and about the interlocking lips 3 and beads 4, substantially as shown in Figures 2, 4, and 5.

The several tiles are normally rigid and yet may, through the application of heat and pressure, be shaped conformably to a concave or convex wall, and through the use of any sharp tool, corners, both in and out, may be easily cut to fit. Preferably, though not necessarily, by reason of their narrow dimension, mastic-engaging ribs 5 may be, and generally are, omitted from the tiles B^2 and B^3.

The present tiles may be employed both for inside and outside walls, may be easily and inexpensively installed both in new and remodeled structures, and may be applied substantially to

all present-day wall types, such as, for instance, plasterboard, panelboard, plyboard, press-wood, or plastered or concrete walls. The tiles will not rust, warp, or change color over a long period of time, are readily cleaned, and are exceedingly attractive when installed. As clearly shown in Figure 5, the lip or tongue 3 has the same angle of obliquity as that of the opposed walls of the V-shaped channel or bead 4, and when the lip or tongue 3 is engaged, as shown in Figure 5, with the channel or bead 4, the outer face of the tongue 3 and the exposed portion of the outer face of the opposed wall of the channel or bead 4 present a unique decorative V-shaped groove on the face of the wall.

It should be understood that changes and modifications in the form and structure of the several tiles and in their wall-covering association may be made and substituted for those herein shown and described without departing from the nature and principle of my invention.

Having thus described my invention, what I claim and desire to secure by Letters Patent is,

A pair of co-operable wall tiles one having a V-shaped channel along a portion of its margin and the other having a channel-fitting tongue presented obliquely along another portion of its margin, the tongue of the one tile having the same angle of obliquity, as, and being engageable on its under face with, one wall of the channel of the other tile for attaching the tiles together with their outer faces in flushwise relation, said tongue on its outer face and the exposed portion of the outer face of the other wall of the channel presenting a decorative V-shaped groove when the tiles are attached together.

CHARLES D. PAULI, JR.