

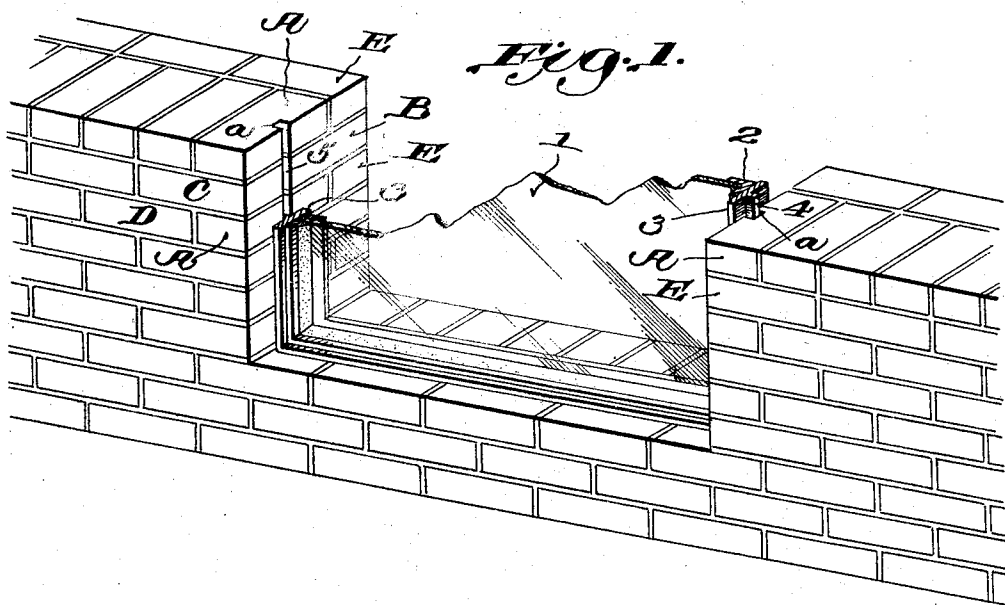
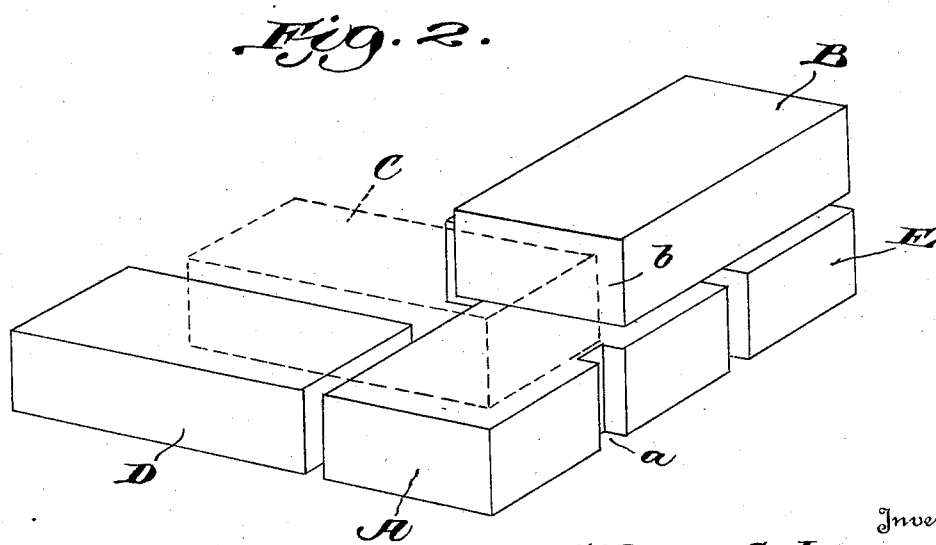
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BRICK

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BRICK

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This invention relates to building construction and more particularly to the construction of brick walls.

In the erection of large brick buildings, such as factories, warehouses and apartment houses, it is customary to employ window frames and sash fabricated from steel. These frames are, of course, set into openings in the brick work as the wall is constructed.

In order to hold these steel frames in position, they are usually provided with an external flange, and the bricks at the face of the window opening are so laid that the joints register in such manner as to form a vertical groove into which such flange fits.

In employing common brick for constructing a wall with window openings of this character, it is obvious that in order to provide a groove as above described, the face bricks must be so laid that the joints register with each other throughout the height of the window opening. Owing to this fact, it is impossible to bond or tie these bricks to the main portion of the wall in the usual manner, with the result that the bricks constituting the face of the window opening are insecurely held and frequently become loose.

The object of the present invention is to provide a novel brick especially designed for use in forming the above described grooves for the reception of the flange on steel window frames, and by means of which it may be possible to bond or tie the face bricks to the other bricks in the wall, so that all will be firmly united.

In order that the invention may be readily understood, reference is had to the accompanying drawings, forming part of this specification, and in which:—

Figure 1 is a perspective view of a portion of a brick wall showing a fragment of a steel sash and frame in position in a window opening, and illustrating the groove for receiving such frame; and

Figure 2 is a perspective view on an enlarged scale, illustrating more in detail one of my improved bricks and showing its relation to the neighboring bricks of the wall.

Referring to the drawings in detail, the reference numeral 1 indicates, by way of il-

lustration, a window which is mounted in a steel sash 2, this in turn being fitted into a steel frame 3. This frame is shown as provided with an external central flange 4, adapted to fit into a corresponding groove 5 formed in the face of the window opening, so as to securely anchor the frame in position. It will be understood that while I have shown a particular form of sash and frame by way of illustration, any other or desired type of frame may be employed, and of course any desired construction of window and sash. The only feature which I desire to emphasize is the provision of some kind of external flange such as 4 on the frame.

In order to provide a groove such as 5, and at the same time permit of the face bricks being tied or bonded to the other bricks in the wall, I proceed as follows. I construct a brick such as illustrated at A, such brick having a rectangular notch *a* extending transversely across its working face at a point midway between its ends. The dimensions of the brick are so chosen that the face of the brick is divided by this notch into two sections or areas, each of which is substantially equal to that of the end face of the brick. In other words, the length of the face on each side of the notch is about equal to the width of the brick. For example, the brick may be made three and three-fourths inches wide and eight inches long and provided with a notch having a width of one-half inch. Thus the length of the section of the face at each side of the notch is three and three-fourths inches. Or if the brick is made four inches wide, it will be eight and one-half inches long, thus again permitting a notch one-half inch wide. These figures are given by way of illustration and the invention is not, of course, limited to bricks of the exact dimensions stated. In building up the wall adjacent the window opening, I lay courses of brick terminating alternately in one of my special bricks having a notched face and in ordinary or plain faced bricks. Thus, I lay one of my improved bricks A having the notch *a* at the end of one course. The next course terminates in two plain bricks B and C, which are so laid that the joint *b* between them is of approximately

the same width as the notch a and registers therewith. Above the bricks B and C, I lay another course again terminating in one of the notched bricks A, the notch of which registers with the joint between the bricks B and C below. It is therefore obvious that by building up the wall in this manner, I provide a continuous groove from top to bottom of the window opening. Referring again to the drawing and more particularly to Figure 2, it will be seen that bricks such as C and D at one side of the groove extend longitudinally of the wall, while some of the bricks, such as the brick B, on the other side of the groove, extend transversely of the wall. Each course preferably has a brick such as E also extending longitudinally of the wall, or in some cases the place of the brick E may be taken by a half brick or bat.

In any event, it will be observed that on the one hand the bricks such as C serve to bridge the joint between the bricks A and D, while the bricks such as B serve to bridge the joint between the bricks A and E. Thus, the bricks A are bonded to the wall in both directions. Similarly the bricks B and C are themselves bonded by superposed bricks, so that the entire wall is thoroughly tied together and is as strong adjacent the window opening as at any other point. It will, of course, be understood that the plain bricks such as B, C and D are of the same dimensions as the notched bricks A, and indeed it is quite possible, and in fact preferable, in some cases, to construct the entire wall of notched bricks all of which are exactly alike but the notched faces of which may be turned inwardly when not required for forming the groove.

What I claim is:—

1. A brick wall having a window opening, or the like, the face of said opening being formed in part of special bricks having a notch extending transversely across their exposed surface approximately midway between the ends, and in part of other bricks superposed upon or underlying said special bricks and having the joint between them equal in width to that of said notch and registering therewith, whereby said notches and joints together form a continuous vertical groove in said face.

2. A brick wall having a window opening or the like, and composed of courses terminating at said opening alternately with a special brick having a vertical notch across its working face approximately midway between the ends, and with plain faced brick, the joint between the latter registering with the notches in the former, whereby a continuous vertical groove is formed in the face of the window opening, some of the plain faced brick adjacent said groove extending longitudinally of said wall, and others extending transversely thereof.

3. In building construction, the combination with a window frame or the like having an exterior flange, of a brick wall having an opening to accommodate such frame, the face of said opening having a continuous vertical groove to receive said flange, the bricks at such face, adjacent said groove, being bonded in both directions with the main body of the wall.

In testimony whereof I affix my signature.

SIDNEY S. LANE.

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