

MUNICIPAL ENGINEERS, CONTRACTORS, AND MATERIALS.

the wheels in the shape of mud, when dry, it blows away, and is lasting and wears well only when there is one or two feet of snow upon it. Wood is not lasting and is a great absorbent, consequently unhealthy. Vitrified brick however has taken a great load from the engineer's mind. It is durable, comparatively noiseless, inexpensive, and easily repaired.

In the vitrified brick treated as before spoken of, we have the combined silica, aluminium, and iron, the resultant product gives us a material that will not be affected by the iron or steel tires of wagons nor the calk and toes of the horseshoes. Thetwelve chisels on the shoes of each horse is undoubtedly the greatest enemy paved streets have to contend with. The ingenious blacksmith may change from iron shoes to steel and keep these chisels in excellent repair, yet this steel must give away to the vitrified brick. This is the first paving material yet found, that would resist the horse's shoe. When the brick is manufactured as heretofore described, there is no way of calculating the life of a brick pavement, as there seems to be nothing that can wear it. The brick are hard, and yet do not become slippery, the draft horses always securing a good foot hold.

In vitrified brick, the civil engineer will find just what he has been looking for, in permanent structures, such as arches, tunnels, sub-structures of all kinds, conduits, and especially in sewers. If he is constructing a sewer, where there is much grade, he will find a material that will withstand the rasping filing of all the sand and gravel that will pass through it; being vitrified, it is non-absorbent. Acids and noxious gases will not affect them, and find no place there. In a sanitary point of view, this fact the engineer dares not overlook.

Vitrified bricks have come to stay and have been staying on the face of the earth for a long time. By the rivers of Babylon and Nineveh we find there have been unearthed glazed brick, and brick enamel. In the great brick City of Babylon, Babylon the city of brick, occupying in extent five times more than the present site of London, environed by a wall of brick, three hundred feet in height and eighty-five feet in width, we find that the hanging gardens were sustained with brick arches, brick laid in bitumen the equivalent of our combined coal tar and asphalt; the bed of the river paved with brick, and in their temples brick vitrified to an azure hue, after being placed in position in the structure. Stamped in the brick their first system of writing is given us, viz., the cuneiform. On what were once the banks of the Euphrates and Tigris Rivers we find handed down to us the history of thousands of years ago. It tells us of the deluge, when the face of the earth was covered with the waters. It informs us of the first great kingdom after the subsidence of the waters. We have stamped upon brick the name of one of their first great rulers, viz., Nimrod, the mighty hunter before the Lord. This history was not handed down written upon columns of stone, nor monuments of brass—such material seems to have succumbed to the action of the ages—but it is given us upon clay tablets—simply brick, and nothing more.

PERSONAL.

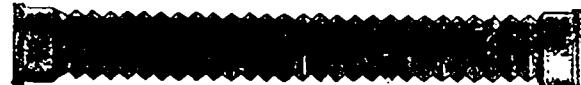
Philip Embury, for 15 years town clerk of Napance, has resigned.

Mr. James Hutcheon has been appointed City Engineer of Guelph, Ont.

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