

point of vitrification and then slowly and gradually cooled. The size of each brick is about 2½ x 8½ inches. The durability is not equal to that of asphalt or stone blocks, but they are less noisy than stone blocks. They are manufactured at Toronto, in the State of Ohio, New York, Pennsylvania and elsewhere. There is room for much variation in the quality of brick. The process of manufacture is one which requires an expensive plant and much skill in burning. In laying a vitrified brick pavement, the natural earth is first prepared by draining, grading and rolling with a steam roller. On this a layer of concrete is laid, 6 inches in thickness, and in this the bricks are embedded. They are laid on edge in courses at right angles to the street line, and with broken joints, the joints being cemented or "grouted."

### STONE SETTS.

Stone setts, or blocks, form one of the oldest paving materials, is extensively used in cities, and is the strongest and most durable that can be had. It is well adapted to steep grades up to 10 per cent. (which fortunately do not exist in Winnipeg), requires little repairs, and suits all classes of traffic. It is, however, very noisy and is rough. It is, therefore, not suited to residence streets, or business streets where there are retail stores. It is best adapted to streets occupied by wholesale houses, in which there is much slow and heavy traffic. Stone blocks are also suitable for paving between street railway tracks. The stone generally used is granite or trap, which few cities can find in their own locality, and in this respect the cost of bringing it from Northern Ontario would be no greater for Winnipeg than for Toronto. The stone should be cut into rectangular blocks about 7 inches deep, 3 inches wide, and 9 inches long. The price paid for quarrying and making these blocks will average \$30 per thousand. In constructing the pavement, they are laid on concrete base in much the same manner as vitrified bricks.

### BROKEN STONE (MACADAM).

The crushing plant which you have, properly prepares and grades the stone for this class of pavement, but instead of the present practice of applying it to the street, the following will indicate proper methods.

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