A. Belleley, Nood Pavement. Palented Sep. 6. 1870.

Witnesses: \W. J. brosh R. H. Kitch. Albert Betteley

United States Patent Office.

ALBERT BETTELEY, OF BOSTON, MASSACHUSETTS.

Letters Patent No. 107,152, dated September 6, 1870.

IMPROVEMENT IN WOOD-PAVEMENT.

The Schedule referred to in these Letters Patent and making part of the same.

To all whom it may concern:

Be it known that I, Albert Betteley, of Boston, in the county of Suffolk and State of Massachusetts, have invented certain new and useful Improvements in Wood-Pavements; and I do hereby declare that the following, taken in connection with the drawings which accompany and form part of this specification, is a description of my invention sufficient to enable those skilled in the art to practice it.

This invention relates to a peculiar construction of pavement which is formed or made up of blocks, which are grooved conic frustums, so placed, with respect to each other, that the large ends of some of the frustums are placed on the road bed with their small ends uppermost, while between the frustums so located and in the interspaces left between them, are driven other conic frustums with their small ends down and their large ends uppermost, so as to key the whole pavement firmly between the edge and crossing stones.

The smaller interspaces, then left, are filled preferably with semi-fluid cement grouting, which finds its way into the grooves made in the blocks, and hardening in said grooves and small interstices left in the pavement, keeps the frustums, which are placed small end down, from rising above the generally level or convex surface of the pavement.

Instead of the cement grouting said grooves and interspaces may be filled with other suitable material made fluid by heat, which will harden upon cooling, or will set on absorption or evaporation of the fluid with which it is mixed, or sand, or fine gravel, or other suitable granular material may be worked or puddled into the said grooves for the same purpose for which I prefer to employ the cement grouting.

The drawings show in perspective a group of blocks placed together as in my improved pavement.

a a a a represent the conic frustums which have their large ends resting on the road hed, and

b b b b b represent those which are driven between a a a, with their small ends down.

The grooves in said pavement-blocks are marked c, and may be as many in number as may be deemed requisite, and the form of the grooves may be varied

The angle or taper of all the blocks in the pavement should be similar, so that all along the lengths of the oppositely-arranged blocks there shall be lines of supporting contact, broken only where the blocks are grooved.

In practice I make the pavement-blocks of young wood, preferably of locust or chestnut, and about eight inches in length, forming one set of blocks, a a, which are to have their large ends resting on the road bed of a diameter at the lower and upper ends, respectively, about six and five inches, and the other set of blocks b b, with diameters of three and two inches, though of course these dimensions may be departed from.

I claim-

A pavement made up of blocks, which are conic frustums, grooved and grouped together, and locked by filling occupying the grooves in the blocks and the interspaces between the blocks, substantially as described.

ALBERT BETTELEY.

Witnesses:

J. B. CROSBY, R. H. FITCH.