USEFUL HINTS.

It is officially calculated in New York that the tall buildings erected in lower Broadway up to date, have added seventy-five acres to the business area of New York city above the sixth

Concrete sidewalks should be laid four inches thick, in two courses; first or bottom course three inches, second or finishing course one inch thick. The top should be laid before bottom is set. Prepare foundation on which to put course in good coarse gravel or chip stone, well rammed or levelled. Proportion for bottom, one part cement, four parts clean sharp gravel, mixing cement and gravel thoroughly in the dry state, and sufficient water from a sprinkler to make a dry mortar, place at once and thoroughly ram down. For top mix one part cement and one part clean sharp sand; mix well before adding water, add water as above to the consistency of plastic mortar.

A STOPPING for wood, sometimes called beaumantique, can be made as follows: Put one tablespoonful of shellac, one teaspoonful powdered resin, a piece of bees-wax the size of a walnut, into a cup or iron pot, and set on the stove or in the oven until melted. For mahogany, add to it a little Venetian red, to match up the wood; for oak, add yellow ochre; for ebony or rosewood, add lampblack; mix it well up. It can be used while liquid, or

it can be made into sticks like sealing wax, by pouring it on to a board, and rolling it with another board slightly warmed. If made up in sticks in this way, it is a good plan to have a variety of colors. When using, melt it over a lighted candle or gaslight, and run it into the place to be repaired; level off with chisel, and smooth down with glass-paper.

MICROSCOPICAL investigation has proved that the pores of wood invite the passage of moisture in the direction of the timber's growth, but repel it in the opposite direction. This account counts for a phenomenon which is often noticed, and which puzzles a good many zles a good many people, namely, why two pieces of timber sawn from the same section of a tree sometimes appear to possess very variable degrees of durability. If the wood, say of a gate post, is placed right end up, the moisture in the soil will affect it, but the rain falling on the top will do little harm; if, on the other hand, the butt end of the tree is uppermost, the top of the post will decay, because the moisture of the atmosphere will penetrate the pores of the wood more rapidly in this position. penetrate the pores of the wood more rapidly in this position. Many people have noticed that the staves of a wooden tub appear to absorb majeture in the staves of a wooden tub appear to absorb majeture in the staves of a wooden tub appear to absorb majeture in the staves of a wooden tub appear to absorb majeture in the staves of a wooden tub appear to absorb majeture in the staves of a wooden tub appear to absorb majeture in the staves of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to absorb majeture in the stave of a wooden tub appear to a woo pear to absorb moisture irregularly, some getting quite sodden while others remain comparatively dry, and apparently almost impervious to moisture. In this case the description in the posipervious to moisture. In this case the dry staves are in the position in which the tree grew, while the saturated ones are reversed.

From Carroll & Vick's No. 6 Quarry, Credit Forks, Ont.

SANDSTONE, fine grained, reddish brown. Contains quartz, and a little felspar and mica. The stone is in beds of four feet and under, and can be handled in pieces up to five tons. Quarry 300 yards from Railway.

Speci- men.	Section under Pressure		Crushing Load.	Crushing Stress per sq. in.	Average Crush- ing Stress per Square Inch
A B C D	Ins.	Ins.	Pds.	Pds.	Pds.
	$2\frac{7}{8} \times 3$ $2\frac{15}{16} \times 3$ 3×3	2 7/8 2 7/8 2 7/8	131,000 130,000 133,000		14,905

pounds is the average crushing strength per square inch of our Credit Valley Brown Stone.

The highest standard of test attained by any pure Sandstone in America.

IN confirmation of the facts above stated, we have pleasure in directing your attention to the accompanying table, showing the result of the test of our stone, in connection with the series of tests of building stones conducted in 1892 at the School of Practical Science, Toronto, under the direction of a committee of the Ontario Association of Architects.

By referring to the results of the tests above mentioned, it will be seen that the average crushing stress of the majority of Canadian and American sandstones is far below that of ours, the difference in our favor ranging from 75 to 50 per cent.

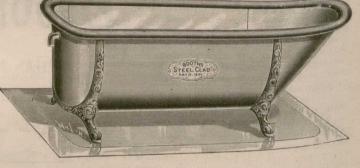
The Credit Valley Brown Stone, owing to its modest tone, harmonizes beautifully with red or cream colored brick.

It has been reported that there is difficulty in obtaining Credit Valley Brown Stone. To correct this mistaken notion, we wish to state to architects and the public that we have a large quantity of stone ready to ship on the shortest notice, which can be followed up with an unlimited supply. Last year we made extensive additions to our plant and opened up new quarries and mines, and will supply promptly all orders given to us or our agents.

CARROLL, VICK & CO. Office: 84 Adelaide St. West, TORONTO. Quarries: Credit Forks, Ont.

Montreal Agents: T. A. MORRISON & CO., 118 St. Peter Street.

Always on Top!!



STEEL-CLAD NO. 2

List Price \$23.00

PLEASE REMEMBER that the materials and workmanship of the No. 2 are identical with the more expensive lines. We are enabled to reduce the price by limiting the varieties. . .

·8 B.

Toronto Steel Glad Bath and Metal Go.

A. G. BOOTH, Secretary-Treasurer

. TORONTO, ONT.