

tremendous heat generated within. We saw it stated a while ago that some person had patented a process by which gas of a superior quality, and at very much less than the present price, could be obtained from saw dust mixed with tar and some cheap chemicals; and if this discovery proves bona fide and genuine it will be a good thing not only for the owners of saw mills, but for the residents of places just big enough to have mills but not big enough to support ordinary gas works.—*Fenelon Falls Gazette.*

A Gigantic Mast.

A Naples correspondent writes:—A magnificent mast has been sent from Verona to the Agricultural Department of the Turin Exhibition. The tree grew in the woods of Cndoro, and five other majestic pines had to be hewn down and cut to pieces before the one destined for the mast could be removed. When the lower branches had been cut off, this fine tree-trunk was divided into two pieces, the bottom part measuring more than 120 ft., and the top part, still adorned with its green branches, 18 ft. The weight of the tree, after being thus prepared, was 41 cwt. On examining the base it was found that that part was 203 years old, while the summit was only 63 years old. The mast was dragged from the forest to the station on two waggons, drawn by eight horses, and the whole of it took up seven railway trucks. Three days were employed in the transport by rail, as the special train could only travel by daylight, proceeded very slowly on account of the curves, and had to stop continually, not being able to pass another train. The mast is slender in comparison to its height, being 65 centimetres at the base and 15 at the summit. The stem preserves an equal width up to the height of about 90 ft., after which it diminishes rapidly. Including the expenses of transport, the mast will cost more than £50 sterling.

Preserving Wood.

Crocodated wood has been found less destructible by fire than the unprepared wood. Recently a building constructed of pine and spruce in their natural state, was burnt, and nothing was left but the sills, which were made of crocodated pine. They were charred, but they retained their form and a certain amount of strength. Another striking case was that of a derrick forty feet high with a forty-foot boom made of crocodated pine standing on an untreated pine base; the latter was burned to ashes, but the mast and boom, although charred all over, had forty-five feet of their length still good for future use. Crocodated wood can be easily extinguished with water when on fire.

Wood can also be preserved from decay by exhausting the air from the pores and filling them with a gutta-percha solution. This process effectually preserves the wood from moisture, water and the action of the sun. The solution is made by mixing two-thirds of gutta-percha to one-third of paraffin. This mixture is then heated to liquify the gutta-percha, when it is readily introduced into the pores of the wood. The gutta-percha hardens in the pores when it becomes cool.

Building Inspectors.

Building inspectors are being appointed in every well regulated city in the United States, and Bay City has seen fit not to be dissimilar in this respect. A board of building inspectors was recently appointed by the city council, and hotels, business blocks and public buildings are being subjected to a rigid inspection. This is as it should be, because of the assurance it gives that the modes of egress in case of fire are sufficient, and that the building is safe in other respects.—*Lumberman's Gazette.*

To Make Wood Last.

A writer in a contemporary journal says: "I discovered, many years ago, that wood could be made to last longer than iron in the ground, but thought the process so simple that it was not well to make a stir about it. Posts of any wood can be prepared for less than two cents apiece. This is the recipe: Take boiled linseed oil and stir it in pulverised coal to the consistency of paint. Put a coat of this over the timber, and there is not a man that will live to see it rot."

Chips.

THREE years ago the lumber saw mills in Arkansas was 349, now it is asserted there are over \$1,200.

ONE thousand shingles will cover one hundred square feet of surface, laid four inches to the weather; for the above, about five pounds of nails will be required.

THERE are 13,000,000 feet of logs, the property of the Winnipeg Lumbering Company, lying at Crookston, ready to be floated down the Red River. They will reach Winnipeg about the end of May.

DURING the months of February and March the exports of lumber and timber from Charleston, S. C., were reported as follows: Foreign—Valencia, 500,000 feet; St. John, N. B., 101,000; Bremen, 20,000. Coastwise—New York, 3,020,394; Boston, 250,000; Philadelphia, 660,000; Baltimore, 610,000; total 4,967,394.

PORT ARTHUR, the present Lake Superior terminus of the Canadian Pacific railroad, now has eight substantial docks, ranging from 400 to 1,000 feet in length. Among them is that of Watt, Moore & Van Dusen, a lumber firm, 475 feet long. On this dock is a shelter shed for lumber, which is cut at Lyon's Head, Georgian Bay.

It has been decided to build the Hudson Bay Company's steam mills which were recently destroyed by fire, at Prince Albert. Men are already at work getting out the necessary timbers. New machinery will be ordered at once. It is the intention to have the mill, which will combine all modern improvements in running order by the 1st of September.

CALIFORNIA has a building boom in common with the other portions of the country. Never were indications for a grand building season more pronounced, says a San Francisco journal, than they are at the present time. Up to April 10 building and improvements to the value of \$2,000,000 had been begun. This is greater than the entire amount expended in 1890.

C. VAUGHN, surveyor, of Selkirk, Man., has made the discovery of a quarry of very excellent building stone at Sawyer's bay, on the north shore of Lake Superior. The rock is very hard and can be worked with ease, and there are vast quantities in the neighborhood. Eastern owners propose to work the ledges. The quarry stone industry of Lake Superior is growing to great proportions.

THE Caldwell mill, at Charlton Place, near Ottawa, Canada, will begin operations immediately. It would remain idle were it not for the late decision in the McLaren-Caldwell case. The Caldwell had over 60,000 logs above Peter McLaren's improvements, which had been detained for two or three years, pending the final decision of the courts. Now the logs will be allowed to come down.

In order to ascertain if logs could be floated or rafted from Pitt River, Shasta County, to the Bay City, says the San Francisco Chronicle of April 15th, a man named Dock Kennedy was sent out last Friday on a pine log to undertake the novel trip. The log was 24 feet in length and four feet in diameter. Kennedy was clad in water-proof clothing and supplied with plenty of food, which he carried in a knapsack. He made the trip, some 350 miles, on his roomy log in four days.

THE Winnipeg & Hudson's Bay Railway & Steamship Company has been formed, the object of which is set forth as follows: "The bill creating this corporation authorizes it to build a standard gauge railway from Winnipeg or some other point at or near Selkirk, on the Red river, or on the line of the Canadian Pacific railway, west of the town of Selkirk, and east of Portage la Prairie, Manitoba, to Port Nelson, or some other point on the shores of Hudson's Bay, in the Keewatin territory, either in a continuous line, or by utilizing the navigable waters along or near the said route for the purpose of transport, and to own steam or other vessels for the purpose of transport from the terminus of the said railway to Europe or elsewhere, and to construct a branch to a point on the Canadian Pacific Railway, west of Lake Winnipegosis, and also to build the railway in sections of 50 miles each.

How to Measure Trees.

Woods and Forests (English) says:—"Any person, however ill-informed, might easily get at the exact height of a tree when the sun shines, or during bright moonlight, by marking two lines on the ground, three feet apart, and then placing in the ground on the line nearest to the sun a stick that shall stand exactly three feet out of the soil. When the end of the shadow of the stick exactly touches the furthest line, then also the shadow of the tree will be exactly in length the same measurement as its height. Of course, in such a case, the sun will be at an exact angle of 45 degrees. Measurements of this character could be best effected in the summer, when the sun is powerful, has reached to a height in the heavens and when the trees are clothed with living green so as to cast a dense shadow. To many to whom this idea may not have occurred, it might be made annually a matter of interest thus on warm summer days to take the height of prominent trees, and so to compare growth from year to year."

Railway Ties.

An exchange says:—"Railway construction is bound to go on until it reaches a limit at which it ceases to be profitable. The consumption of ties will increase at a corresponding rate, while the question of future supply will become more serious and pressing as the cost increases and our native forests become thinned. It is pretty certain that wooden ties will not be discarded until our timber resources are far less abundant than they are now, or until some other material as cheap and as serviceable is substituted for wood. It is not likely, however, that any such material will be found, but it is more than probable that the durable properties of the wood, especially the soft and porous kind that is not now available for ties, will in time be very much increased by some of the preservative methods that have already proved very effective so far as they have been tried. But these methods are not likely to be used very extensively in this country until the cost of ordinary ties is considerably more than it is now.

The Angry Tree.

A specimen of the angry tree, indigenous to Australia, is growing upon a farm in Nevada, and is now eight feet high. When the sun sets its leaves fold together, and the ends of the tender twigs coil up like a pigtail. If the twigs are handled the leaves move uneasily for a minute or more. A singular thing concerning the tree was its apparent resentment on being removed from a pot in which it had matured into a much larger pot. Hardly had it been placed in its new quarters before the leaves began to stand up in all directions, like the hair on the tail of an angry cat, and soon the whole plant was in quiver. At the same time it gave out an odor most pungent and sickening, resembling the odor given off by rattlesnakes and other kinds of snakes when tasted. So strong and offensive was the smell that it had to be removed from the house for several days.

Alleged Destruction of a Plantation.

A large number of trees on the Mount Gabriel plantation, near Schull, in the county of Cork, have recently been discovered hewn to the ground. The plantation is owned by the Rev. Thomas Nash Hicks, of Torquay, who has also considerable other property in the district, the agent being Mr. Downes, solicitor, of Skibbereen. About three years ago, when Mr. Hicks brought ejectment processes against some of his tenants, the same plantation was set on fire and the underwood destroyed. A heavy claim for compensation has been lodged against the district.

The "Great Eastern."

Arrangements are in progress to begin work upon this vessel very shortly to fit her for her new career of usefulness in Gibraltar Bay as a coal hulk. Permission for her anchorage has been obtained from the Colonial office. The project is viewed also with favor by the admiralty, as the Great Eastern will effect a great improvement in the bay, by dispensing with the multitude of small coal hulks which now encumber the harbor.

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