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THE
NEW STORY
OF THE
STATE OF MAINE,
WITH AN APPENDIX,

BY
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LECTURE.

THERE is a fine old saying, that you cannot tell by a single wave whether the tide be ebbing or flowing; but if you look steadily at the land you will soon determine whether it is being submerged or is enlarging its area. So that we may judge of the consequence and the promise of the Pine Tree State to-night I am to ask you to look over its domain, larger than all the rest of New England, its twenty millions of acres, and its three hundred miles of sea-coast, comprising beach, marsh, and headland, storm-beaten or "kissed by the sunshine or the mist."

But I shall be obliged to leave out the pretty story I might tell you, and come at once to the solid and enduring matters that, after all, make up the better part of individual and community life. I might summarize the wonderfully romantic early history of this province of ours, and weave into this essay the charm of adventure and the boast of antiquity; but I confess that the more I know of men and the more of history, the less I count upon what is merely or mainly sentimental. Human civilizing comes not alone of mere pride of birth, or place, and the absolute improvement and the permanent purposes and power of any people will generally date from that time when began a genuine and intelligent interest in material prosperity. To show how true this is, one has only to remember the generally miserable state of any people living in the tribal, patriarchal or polygamous relation, with promiscuous intercourse and ownership; and how, at last,

the conviction of the needs of a better development of family forces and acquisitions brought about the social condition which we shall always maintain so long as we exist as a people; for love lays its strong hand all the more tenderly and helpfully upon those to whom all the rich gifts of the earth may become household-gods, to whom home is sanctified by the matchless grace of ownership and government, and children

—"The loveliest plants that ever grew beside a human door"—

are blessed with the consciousness of legitimacy and inheritance; while over all Romance sings the same dear old refrain.

I would rob sentiment of no part of its sweet mission in the earth, but as the most practical ministrations to the people are through the sense of a reasonable hope, I take it to be a pleasant task to talk to the men and women of Maine about this business and this promise of life.

And so I put away every allurements of fancy and every landmark of historical fact, and only ask that we do not forget of what stock we came—the hardy Northmen, chastened and tempered by the conservatism of English culture in its best estate, the only blood that ever bore up to this test of strength. Says Emerson, "If Eric be thirty years old, and has slept well, and is at the top of his condition, he will sail from Greenland and his ship will reach Newfoundland. But take out Eric and put in a stronger, bolder man, Biorn or Thorfin, and *his* ship will just as surely reach Labrador and New England." How striking is this suggestion, and how true it is, in all the world's history, that there must be something of vigor to develop a strong race. A recent writer declares that the richest regions of South America will never have a permanent civilization, for the very luxury of spontaneous growth kills all efforts. Often, if not always, where man has least to do to live he is not able to live worthily.

But hardy as was the quest of the early explorers and the later Pilgrims, this is by no means the harsh clime it has been set down in the calendar of the world's estimate. We have but thirty snowy days in all the year, and but sixty rainy ones, while the average temperature for twenty years has been 44°; and we

can challenge the world to show a climate more favorable to the health and long life of any people who work. This claim is not only founded upon general statistics, but is established by the universal statement of our best industrial producers, who declare that no other operatives can do so good work so many hours in the day with so little loss of physical force.

We never had a tempest such as occasionally sweeps along the Gulf. We never had a dangerous epidemic, such as comes of fitful changes; for the cold of winter is softened by the dash of warmth from the sea, and winds such as sweep around and freeze the journeyer in the West are checked by forests and hills that break their force, and the wayfarer makes his way with safety in a temperature that would freeze him in an hour with a remorseless prairie wind to embitter it. We never had an earthquake; nor plagues of poisonous vapors; nor clouds of destroying insects; nor floods that set at naught the provisions of men; nor droughts that burn up fields and forests; for the thousands of hills and mountains pierce through and break the clouds, equalizing the currents and the distillation, while from the South and the great Gulf Stream are borne the vapors that insure equable rainfall from mountain height to low shore slope, keeping a thousand lake reservoirs forever full, and feeding more than five thousand miles of beautiful streams that tumble, and thunder, and leap, and laugh, till they sing together at last in the great, glad chorus of the sea.

Thus, so far from this being a particularly rigorous climate, as so many have declared, it has a most fortunate medium and balance, making it possible to engage in vast and varied pursuits, to none of which is there any especial element of danger or uncertainty. Indeed, Nature is most bounteous to us, and never visits or threatens us with disasters such as are constantly occurring away from the mountain-coast line. And I am to attempt the most difficult work of setting forth the sources, and means, and results of our more recent appreciation and uses of Nature's provisions for us, and to show how she is playing, upon new instruments, the same old notes of her power—difficult, because

it is hard to interest anybody in what Buckle calls the "philosophy of statistics."

I mark well a certain date, up to which time our people had never dreamed that they had any considerable resources except ship-building and kindred "timber business," and when it was their blind purpose to tear away, with greedy clutch, the nearest surface products, regardless of waste and the cost of transportation, and to bear them away to the distant, doubtful market in rude, rough shape. Even the farmer "skimmed over" the cleared surface of his hundred acre lot, raising successive crops of a few of the staples of his needs, and tearing away the trunks of his few remaining pines, leaving the tops to invite the almost inevitable disaster of the forest fire which, in its turn, would generally lay waste the rest of his forest growth, despoiling the earth of what could never be restored, regardless of that only sound policy that brings markets to productions and gives new values by giving new shapes, that plants villages amongst the hills, that develops all resources with cunning skill and patient care, and does not exhaust any with barbaric haste and greed. The ancients had a saying that he who can use tools can double the years of his life, but no people were ever slower to learn this truth than our own. Up to a little more than thirty years ago, though foreign capital was offering on every hand, not a beginning was made in industrial productions, so ignorant were our people of their resources, and so relentless was the opposition to corporation power; and it was not till 1843 that legislation was accomplished, limiting individual liability to the amount of stock subscribed. Up to that time he who ventured to assist in establishing a local enterprise by purchase of stock, in the event of its failure perilled every dollar of his private fortune.

On the lower Saco to-day, as the first and direct result of the new spirit, stand mills that produce not far from thirty millions yards of cloth per year, with a monthly pay-roll of about one hundred thousand dollars; while Lewiston has in a much shorter period put up fifteen mills, of all kinds, turning out thirty to forty millions yards of cloth in each "good" year—"enough,"

as a local chronicler says, "to put a girdle round the earth if it were in one continuous web." The aggregate manufactures of that city in 1873 were declared to be nearly \$12,000,000. And all this because the power of a rough wilderness stream was harnessed by the genius of the new time. I wish there were means to group in symmetrical shape the whole of the manufactured products of the State, which are known to have grown from \$23,000,000 in 1850 to \$80,000,000 in 1870. But suffice it to say, that in the great markets of the world we have forced a recognition and gained a permanent place. Our cotton mills now number eighteen, our woolen ones thirty-one, and their products are being sold in all the British Provinces in successful competition with home manufacture. Not only is this statement true of the more common products, but even in fine woollens we have attained an unquestioned excellence, no industrial pursuit in the whole working North ever having reaped better results, on the whole; and even when the panic swept across the land, our mills were run on fuller time and with larger force than those of any other State.

All the while, too, we have found the old-time resources benefited by this and other departures, a fact that will be more and more apparent throughout the whole presentation of this subject. Indeed, however great may be the success of the manufacturing class, greater consequence and advantage result to the community in the labor and living afforded to the employés, while still wider results spread themselves out throughout the community, by putting a new power into the possession of every citizen, bringing a market to the door of every producer. Give us great working centers in place of the old droning towns, and there shall be no more of that barbaric destruction of material and time that made our state in earlier years both hard-working and poor—no more robbing the earth of its natural wealth and sacrificing it at the distant, costly market, in its rude shape, without an attempt to make it a type of riches and power. Two-thirds of the "farmers" of thirty years ago were mere despoilers of natural wealth. They stripped the land first of its pines, then of its oak, and finally of its shingle-stuff and hoop-poles, hauling them dreary distances

to ruinous markets, and, when all was gone, the despoiled "place" became too poor to sell or to keep; for real farming and real saving and cherishing had become no part of our plan. Compare the old facts with the new. I cannot count the wood-products of our skill to-day; for, while we sell no less lumber, proper, than in former years (other things being equal), we make all things that any people make from American woods. Nor do we build any the less ships because we do these other things, having averaged over 90,000 tons yearly the last five years, building better and cheaper each year. Within fifteen years we have placed little industries all up and down the streams that float our lumber and turn our mills, industries that are the proper adjuncts of all our creations and growths, and we manufacture in them every product known to modern commerce and home use. We make more plain, common furniture for shipment in the shoo than any other State. We make every kind of box known, from sugar to salt; from those that bring back tropical fruits to those used for the tiniest packages from the laboratory; and, indeed, every article needed at home or abroad, from anchor stocks and tent-poles to skewers and toothpicks. We built, in 1873, \$1,500,000 worth of cars, an entirely new business, now depressed only because all business is depressed.

But perhaps the most striking new industry pertinent to this branch of the thème is the production of wood-pulp, begun within the last five years. One new mill, just beginning to run (at South Windham), swells the number of those producing box-boards to ten, yielding twenty-one tons of pulp a day, and whose daily sales average over \$1,600. To this amount, produced under the process of grinding the wood, is to be added the Yarmouth mill, whose product is the result of a chemical process, a new and most valuable discovery. This pulp, from ordinary poplar wood, leaves the wood fibre unimpaired, so that the finest and toughest of all paper is made from it, without the use of rags or any other material. The product is four tons a day, worth five hundred and sixty dollars. Thus we have, from an absolutely new enterprise, whose patents and processes are all owned within

our borders, a business that brings us over \$600,000 a year, having doubled since 1873, and is only just in its infancy.

Other most significant steps have been taken in the new march, and on every hand there is encouragement to believe that we at last realize the importance of our forests, and no longer look upon them as so much rude spoils, to be riotously stripped and torn away as of old. They are our great resource as a purchasing power, as well as the sources of pride and pleasure for camping days. They are vast estates for future generations as well as the means of a winter's work, and it is our business and duty to save and care for them as the basis of enduring natural wealth which no other Northern State can show, and as the type and token of a sure immediate resource that no other people can offer to manufactures and commerce. By such just appreciation shall we add sound policy to sentiment and save this vast domain from careless and wanton destruction, and hold it for health and wealth, and warmth and rain-fall, with a jealous care, till every citizen shall learn to cherish it as a part of his inheritance, even as the Roman citizen was accustomed to regard the walls of the Eternal City.

And now as to our agricultural developments. Every help and hope of which I have been speaking can be claimed as having advanced the promise here. Virgil's swain deplored the growth of the city with its hundreds of smokes, and altars that were to be imbued by the blood of his flocks. But in these latter times there is no such promise, as when the town is built that brings a market to the door of the country producer, adding almost immeasurably to the value of every product of the farm and the household. Let us see what every working-center built up by our newer policy is doing for the farmer. In the West, the average acre produces 20 bushels of wheat, worth, say, \$15.00, at 75 cents. If corn be planted instead of wheat, the result would be about 40 bushels, at say 25 cents—at the farmer's door. Now there is not a well tilled acre in Maine, near any local market, that does not yield, aside from extra cost of preparing and cultivating, a better return than this. What is the average equivalent here of a bushel of corn in the West? One-half bushel of

potatoes, two bunches of celery, three heads of cabbage, or a quart of strawberries! Or, if we cannot make our farms into sources of market-garden growths and rewards, let us reckon upon the basis of the more remote farming regions. We are not an agricultural State, and never can be in any such sense as the best regions of the West are. That is, we do not and cannot produce, for export, the great cereal staples. But we can raise very many general crops that are surer and pay better. If we cannot raise corn and wheat on a great scale, we can get good returns so far as we do it at all, while we have many staple crops that give richer returns than any Western or Southern State allows. Thus we can raise potatoes that will not only sustain more people than the same amount of land turned into any other crops can do, as is proved by the whole history of Ireland, but will bring more money to the producer, making every allowance for cost, than any other farming lands of this country. Of course, I mean our best lands, and not our rockiest and meanest. Not an acre of our land, fit to cultivate with hoed crops at all, but will produce 100 bushels of potatoes as surely as the Western acre produces 40 bushels of corn; and, on an average, our potatoes are worth more than the corn, per bushel, even in the remotest portions of the State. All our best new lands yield 150 bushels to the acre, very often much more, and, near any thriving local market, railway or river, the price ranges from 40 to 60 cents; while even some of the starch factories in the impenetrable down-east have been obliged, this very year, to pay 30 cents or run short.

The fact is, farming was bad business here years ago, when it meant "skinning" a lot of land of all its available growth and selling the proceeds at the distant grocery store, and keeping this up till the last hoop-pole was cut; but farming that is an adjunct of the vast business we are developing on every hand, in these later days, is another matter. "Salt is awful bad for roasted potatoes," said the wise little boy—"when *you don't put any on*!" So farming is very poor business when one never raises anything to sell; but he who does this, in the wisdom of his experience in the world, whether that something be the

staples such as I have hinted at above, any or all of our vast variety of market-garden products, cranberries from the little patch of bog, or golden pippins from the hillside, his work will bring him as rich return in the State of Maine as anywhere else in this land. And when our people learn this plain truth, they will no more "swell the rivers of the West with homesick tears," but settle down into a quiet faith in their own homes—always richer in comforts than any others can ever be.

I have avoided everything that could be called extravagance of speech, for I am so much in earnest in producing these facts that I do not propose to leave them open to controversy. I assert that much stronger claims in behalf of our agriculture can be truthfully made than any of its friends have ever insisted upon. For instance, consider the single item of hay. In 1850 we only produced 700,000 tons, while in no year since 1870 has the crop been less than 1,250,000, and once is estimated to have reached 1,700,000 tons. And the value per ton is fully 20 per cent. more than it was twenty years ago. When we remember how small is the hay-producing area of this country, what an article of export it is becoming, and how vastly Maine can enlarge her capacity, surely there is an abundant promise here.

Think, too, of some of the specialties of our farming. Three years ago we had seventeen cheese factories running. This year sixty, whose products aggregate 1,270,000 lbs., and whose market value anybody can reckon. I do not know how important and remunerative this may ever become, but the conditions for dairying, even to the very geological formation of the best regions, are not unlike those of New York and Vermont. Perhaps it may be new to most of you, that, in addition to our very large and prosperous stock-breeding interests, there has just been added a new feature of sheep-husbandry. Several flocks of sheep have been put to live upon the capes and islands of our eastern coast, and for three years their increase has been as great as in climes where snow and ice do not come, no more losses having occurred than in the ordinary summer grazing and barn feeding; and in no case has there been fed to them a morsel of grain or

spear of hay, the kelp of the shore supplementing the land pasturage.

Three years ago I made complete canvass of the sweet corn culture and packing business, and I confessed to astonishment at its proportions. There were put up that year 5,000,000 cans, that sold for \$1,175,000 in the markets of the world. And do you ask me if this business will grow? I think so, for the lead we have in the production and the market is a legitimate one. There is a crispness and delicacy in the grain of our swift-growing short season that is not common to the South and West. Everybody knows that the tree which is easy of rift here is tough and "stringy" in the South. This difference is generally observable in all our growths—the shorter and swifter the season, the daintier the growth. And so this business will not only prove a credit and gain to the promoters, but is of large benefit; for, outside of the farmer interest, merely, it employs not far from eight thousand people through its season.

But I cannot, and need not, make further comparisons or mentions, but content myself with expressing the fullest faith that there is a singular harmony of interest in all of our products, whether material or industrial, each one not only developing but sustaining and enhancing every other, and making a powerful and enduring aggregation of resources. And I think it will ever be found that a State of varied interests is safer from all the dangers that beset life and business than the one that depends upon a few resources. A State like this suffers no panic from the prostration of one industry or the failure of one crop; and thus we are as safe from fatal failure of business as we are from the plague of the locust or the freak of climate that almost every year makes some portion of the country into a community of suffering. We are living within ourselves and our capabilities more completely than any people I know. Even the wholesale trade, which has so long exacted from us a tribute, is gradually yielding to our own merchants and our own capital its profits, giving us a commercial recognition and consequence of our own.

There are scores and hundreds of productions and employments, like our machine works, our immense tanneries, &c., which

I cannot enumerate here, and, indeed, need not; for it is my purpose to speak of the enterprises not generally understood outside of their immediate localities. A few more of this latter class I may dispose of in this place as well as elsewhere. We made in the "panic" year more than 15,000 tons of paper in the State, that sold for nearly three and a half millions dollars. The records of the same year show, that while we built six millions dollars worth of ships, we made *seven* millions worth of shoes. [Pretty good for a State that all men said could never do anything *but* build ships.] And the next average manufacturing year we shall do the same thing, although, outside of one locality, the business is not ten years old in the State. In fact, there is scarcely an industry of the whole North we do not represent with successful experiment.

Our fisheries are the source of vast and constantly increasing wealth. The last and best estimate of the lobster-packing business fixed the number of cans packed that year at 2,225,000, the gross weight of the catch being 6,250 tons, and worth \$500,000. This does not include the local and coastwise trade, but the export branch only. The clams and other fish used in this packing business were set down at \$200,000. Every branch of the fisheries is being made of the utmost account, even to the shipping of whole cargoes of frozen herring, and the making of the juices of fish into a new food-extract.*

And the porgy, too, that great source of half the Legislative fun in the last twenty years, and the theme of endless forensic controversy, has at last taken its place, in the most serious way, among our great staple resources! This industry represents a united capital of \$954,000, employs, in all, over 1,400 men, forty steamers, and thirty-eight other vessels. Last year there were taken 649,000 barrels of fish at the works, and more than 10,000 barrels were sold for bait. The yield of guano was 19,495 tons, and the yield of oil was 1,931,000 gallons. I am told that the production has been much greater this year than last, but there are no fig-

* The Hon. S. L. Goodale, of Saco, formerly Secretary of the Board of Agriculture, is making some interesting and successful experiments in this line.

ures yet attainable. Five years ago this business had no place in our commerce, and, even to-day, not one man in a hundred, forty miles away from our coast, knows of its existence—much less of its consequence.*

But perhaps the greatest promise of all these industries and pursuits is in the new hope and faith of the people in them. It has not long been the rule that home capital has been ready to supplement individual effort for local development. Our moneyed men have not always been quite content with the margins that home business has been supposed to offer, and have been often overcome by the exaggerated promises of distant schemes. Money has tended to a few centers, and from thence found its way into stocks that promised larger interest than permanent, honest business ever paid. Even the country Savings Banks became, at one time, drains upon the community for the benefit of stranger enterprises, instead of remaining the depositories of the small earnings and savings of the people; and the farmer who wanted a little money to pay for extra labor, and the promoter of a local industry who needed help to keep him going, has often been obliged to go into the feverish and disordered market and pay a rate of interest equal to what the gambling broker would offer—he to whom the benches of the Bankruptcy Court wore no frown. Even the farmers themselves who had saved something in the war times, instead of loaning their savings to help build up the local market, to make valuable their heavy and perishable products (unlike the cotton of the South and the grain of the West, which can be transported long distances or stored any length of time), forgot that he who buys a 12 per cent. security usually buys 6 per cent. of insecurity, and they, too, bought "bonds." It mattered little what the basis was, so long as they were "bonds guaranteeing 12 per cent." More than \$400,000 went out of Portland into Northern Pacific, and it is quite safe to say that the whole State furnished at least \$2,000,000 to this "great

* One item in the "canning" business, which cannot be put with any class, is the blueberry crop. This is one of the most profitable and best selling products, whose aggregated weight when ready for the market this year, was 244,800 lbs., or over 122 tons.

national highway," managed by several well-known national highwaymen. How much went into other worthless railway securities it is neither profitable nor pleasant to enquire, but it is safe to say that very many people in our midst preferred to buy a bond based on "a right of way and two streaks of rust" rather than put their money into something "slow." The end of this, however, has come, and though we shall never get our millions back, we shall save ourselves in the future; for the experience of the last five years has taught us the difference between our own real wealth and the things we have called wealth; and we have been spared in spite of ourselves. The race of croakers is fast dying out, and the men who have bemoaned our poor prospects, who have snivelled at the east wind, and despaired of the State, are becoming convinced and converted. I met one of these a few days after the collapse of 1873. He was a good man, and he had money, though he talked less freely about the latter possession than the former. He was a staunch defender of the few people he believed in, sturdy and confident in—the past of all things. His heart beat warmly for his native land, and he sold ships in 1862 to carry troops. He took a Brooklyn weekly journal, whose editor had a pleasant way of associating worldly hints with spiritual exhortations, and in it he read this closing paragraph of a well-known advertisement:

"The land grant to this Great National Highway is 20,000 acres to the mile, which is being disposed of to actual settlers for \$6 per acre."

And so he took \$25,000 in bonds!

I overtook him one October day in the year above written, and observing that he had something on his mind, I said to him, "Deacon, what do you think is the best stock in the market to-day?" And he put up his hands devoutly, rolled his eyes reverently, and, with the meekness and simplicity of a little child, he piously ejaculated, "State of Maine 6's, d—n it!"

I come now to a class of resources, concerning which there is even less known than of the industrial matters I have referred to. I mean our material wealth, indestructible and inexhaustible. While I have no doubt we have many valuable ores and

precious stones* that will one day be made of importance, I propose to deal only with a few types of our peculiar wealth.†

And first our ice, which has become so much of a regular business that it is largely ordered in advance of the season, as a supply that can not only be counted upon in amount, but whose quality gives it a sure preference the country over. The smallest yearly export sales were \$300,000. In 1874 they reached \$800,000, and this year will exceed \$2,000,000. In this estimate, account only is made of the shipments—nothing of the value of what is used at home. What crop can equal this one for profit!

We have, probably, the largest and finest deposit of Feldspar (in Sagadahoc County) to be found on the continent, that is being well developed and sure of making large returns to the many people interested in it.

* There are several rich and beautiful collections of minerals and precious stones gathered within our limits, the finest of which is that of Dr. A. C. Hamlin, of Bangor—said to be a finer private collection than was exhibited at Philadelphia this year.

† I append below a valuable and entirely safe and reliable article prepared by Mr. F. L. Bartlett, State Assayer.

VALUABLE METALS OF MAINE.

As a preface to this heading, it may be well to state that not more than *one* gold or silver mine in one hundred ever proves profitable to work in the United States. Gold mining, especially, is very seductive and alluring, but at the same time one of the most precarious and uncertain methods of money-making that exists. It is a fact, however, that can no longer be concealed, that large quantities of gold exist in this State in the form of "Pyrites," that abound all along the eastern and western border of the State. These gold-bearing pyrites occur in slate and quartz, and are generally about 90 per cent. sulphur, iron and copper, assaying in gold from \$3.00 to \$200.00 per ton. With the complete and perfected machinery now in use for reducing gold-bearing ores, they can be worked profitably in an assay value of \$10.00 or \$15.00 per ton, but no one, unless with plenty of capital and skill in the business, should attempt to work these ores. Farmers, especially, should avoid excitement in this direction, and let some experienced capitalist work their mines for them on a percentage. In this way they lose neither time nor money, and if the mine proves profitable they realize a good percentage; and, on the other hand, if it is a failure, they lose nothing by the operation. The probability is, that at some future time reduction mills will be erected at some convenient place on the coast, and ores can then be reduced for gold from any part of the State, where they happen to be found plenty, thus making a legitimate and profitable business.

As regards lead and silver ores, very few localities exist in this State that promise well enough to warrant operating. A silver lead and zinc mine is being, and has been, worked for some time in the town of Newfield, and the parties in charge claim that it pays. Companies have recently been formed in Milton Plantation, also in St. Albans, for the purpose of working silver

The extent of lime rock is something wonderful. It spans the whole county of Aroostook, and is already being somewhat used there for local purposes, while at various other points there are valuable deposits and considerable productions. The great center of this business, however, is Rockland. The last figures made as to the volume of work there are as follows: Number of men employed 3,175, horses 600, vessels of all kinds 300. The casks to hold the yearly product of lime cost \$412,000, the wood for the kilns \$375,000, and the product for the year was 1,500,000 casks.

The slate deposits and productions are tolerably well understood by some writers upon Maine's resources, but the great public will have to be very much more fully instructed in order to see what vast possibilities lie in this direction. There are some twenty developed quarries, and no question is made as to the extent of these veins. They are simply beyond calculation, and the facilities for operating are all favorable. Two of the oldest and largest have shown their capacity almost limit-

lead mines. The Lubec mines are also being re-opened by New York parties, with the intention of again working the ores.

Copper undoubtedly exists in large quantities in this State and may be worked at a good profit, since it is an ore that is easily mined, and commands a fair price and ready sale in all markets. Large veins of fine copper ore have been opened in Blue Hill, and at the present writing 50 tons of the ore awaits shipment. The ore is sold in Boston, New York and Baltimore, at prices ranging from \$30.00 to \$70.00 per ton. Ores assaying less than five per cent. will not be purchased. At Blue Hill six veins are being worked by a force of 18 men; during the winter the company propose to work a force of 25 men.

Iron and manganese ores are found in this State in immense beds, and of the finest quality. Bog-iron ore is especially abundant. It is worked at Mt. Katahdin, and makes pig iron of the very best quality.

A large vein of magnetic iron has recently been discovered on the farm of M. L. Robertson, in Munroe, that assays 62 per cent. pure iron.

That iron occurs in quantity in this State there can be no doubt, but none but men with capital and proper understanding of the working of iron ought to embark in iron mining. Arsenic, sulphur, lime and antimony, also occur in quite large quantities, but these metals, at the present low price, hardly pay for mining.

Tripoli, ochres and mineral paints occur in this State in great abundance.

MINERAL SPRINGS.—Poland Mineral Springs, Poland; Rockland Mineral Springs, Rockland; Vienna Mineral Springs, Vienna; Old Orchard Mineral Springs, Saco; Summit Mineral Springs, Harrison; Chase's Mineral Springs, New Gloucester; "Mount Tire'm" Mineral Springs, Milton Plantation; Eastport Mineral Springs, Eastport.

All the above springs are profitable, and the water is sold regularly.

The Mineral Springs of Maine are noted for purity, and are mostly alkaline carbonated springs.

less as to roofing-slate, and every quarry that has been worked has produced, unquestionably, an article of great toughness of fiber, and excellence of rift. Indeed—speaking more especially of the Brownville slate, as having been longer in the market and more thoroughly tested in all ways, perhaps, than any other—from the Welchman who first began to work it, up to the experts and the great builders, the testimony is that it is the best article this country ever produced. It is not only worked, handled and nailed with less loss by breakage than any other slate, but it acquires toughness by exposure, while time deepens its color. I suppose, in these depressed times, the yearly product is not far from a quarter of a million dollars. But it will not be long before the other qualities, besides roofing-slate, will be brought into general and profitable use. Unless it proved to be of the toughest quality, many an owner of slate property has felt discouraged even to the abandonment of it. I am sure the opinions of these owners will change soon, for in all that has given Vermont and Pennsylvania their great returns in this business of slate-production, we excel them. We have quarries whose products are more available for sawing and planing than any of those abroad, and it will not be long before they will be sought as having a value quite as well defined, and as remunerative to the operator, as roofing slate. There is hardly a limit that can be placed to the use of soft slate, when it can be cheaply quarried, sawed and planed, and easily transported. Marbleizing is a swift and inexpensive process, and it outlasts, many times, all the cheaper grades of marble. In fact, marble is everywhere going out of favor and beautiful marbleized slate is coming in. It is even prettier, and can be made to suit more needs and tastes than marble, and it is safe to say that its use is destined to become general. It is stronger than marble, has no stains that constantly disfigure the latter, and it is so inexpensive that I look to see it not only manufactured in this State into mantles and table-tops, on a vast scale, but even used in house-finishing in a score of ways. There is no end to the beauty and variety of effect that might be produced by liberal adoption of this most valuable of our building material, in cornice, casings, panel-work,

tiles, &c., and it will, ere long, take its proper place as one of our great staple-products, like roofing-slate; and I am not sure it will not bring more money, for the cost of working.

Let us now pass to the granite, a vast and mighty wealth, measureless and matchless in variety and extent; a wealth that costs only the laying on of hands to gather, that lies along our rivers and the great highway of the sea in such abundance that it cannot be estimated, and much of which can be put upon a vessel's deck with one swing of the derrick. There are seventeen large and well-ordered concerns working this great resource, and more than thirty excellent quarries yet practically untouched. And these embrace every shade and quality, the pure white of Hallowell, the light and dark grey and the mottled of the outlying islands, and the red of that recently discovered deposit on the St. Croix, richer and finer in every characteristic than any Scotch granite that was ever quarried.*

A glance at the structures throughout the country (outside of the State) built of our granite shows how well its beauty and durability are understood. Already built and being constructed may be mentioned the Treasury Department at Washington, New York Post Office, Post Office and Court House at Cincinnati, St. Louis Bridge piers, East River Bridge piers, State House at Albany, the Post Office and Masonic Temple at Philadelphia, the largest public buildings at Fall River, &c. What I said in another place about marble going out, may be emphatically said of it as compared with the fine qualities of granite—the latter is preferred on all hands in these later days. And it is very safe to say no State can compete with us in richness of variety or in cheapness of production. During one twelvemonth there were contracts made that aggregated nearly five million dollars, and there were actually delivered within the year over \$3,000,000 worth. And the permanence of this wealth, spreading itself out along the coast! wealth that not even Western Railway Bonds can buy and despoil us of! Its power makes for itself vast communities, planted in the order of the best civilization, with acres

* The Maine Red Granite Company, Red Beach, Me.

of working buildings, fine, clean dwellings, and school houses, and chapels, and hospitals!*

I refrain from making here any especial mention of the iron manufactures in the State, having spoken, in a general way, heretofore of all our industrial products: nor yet of the various analyses and the looser descriptions of the many signs of iron and the tracings of ore-beds, contenting myself to leave these within the domain of the scientific and practical workers. The testimony of Prof. Hitchcock, State Assayer Bartlett, and several practical miners, settles the whole scientific and expert inquiry.

But there are developments already that very few people know about, and I have saved the best part of this story of our vast natural wealth for the last. I refer to the very large and successful operations at the Katahdin Iron Works. The deposits there are so very large that nobody has even calculated the duration of supply. Indeed, it is a constant as well as vast accumulation, and is so easy to mine—being a surface deposit—that it costs only one dollar per ton to deliver it at the furnace. The charcoal to smelt it costs about seven cents a bushel, and it yields 60 per cent. of pure iron. The great value of charcoal-iron, compared with the anthracite productions of Pennsylvania, for instance, is well understood, and hence the importance of this great resource in the midst of an inexhaustible wood-supply. And to compare this enterprise with any other in this entire eastern part of the country is most gratifying. Thus in Connecticut, where charcoal-iron is obtained, it costs not far from six dollars a ton to mine it. The charcoal to smelt it is near twenty cents a bushel, while it yields only 40 per cent. pure iron. And when the railway shall be extended from Milo to Brownville, as is promised, this wonderful ore-bed will be only twelve miles from a point of rail-shipment. Now, while I am neither called upon nor authorized to give details of any of the great business I have been

* I cannot help referring with peculiar pride to Maine's show of granite at the Centennial. The monumental work of the Hallowell and Bodwell and Red Beach companies, the beautiful contribution of Gen. Tillson, and the plain specimens from all the quarries of the State, were something to be remembered.

treating of, I may justly, because truthfully, say that no concern in this country is making so fine quality of iron with so handsome results. In all the known tests it has been accorded the highest commendation, from the car works of Portland to the cutlery establishments of England; and, considering this already developed region in connection with the other equally sure sources of production, there can be no doubt that our State will one day become as well known for her iron as she has been for her lumber and her ships, even in the days when we were accustomed to speak of these as her only claim to commercial consequence.

* * * * *

I have thus tried to tell you a new story of the State of Maine, tried to do it with sober, chastened speech as becomes one who truly believes—tried to string dull facts upon a thread of discourse, and thus compel their just consideration. I need not tell you this has cost much time and patient comparison; but if it shall be the beginning, however small, of an appreciation of the worth of our State, and a pride to speak well of it and do well for it, I shall be more glad than any one can guess who has never become interested in such a theme. I verily believe that there is no State in the whole country where work is better paid for, where capital is any safer, or homes thriftier; and I know not one has so many positive sources of power within itself, and is, therefore, so safe from disasters. We are a conservative people, but such are always strong and sound in the main, and capable of great growths and efforts. The best type of strength is strength in repose, reserve power, consciousness of capacity, combined with youthfulness and health, such as shines in the faces of the heroes in the old Greek battle paintings—not the over-trained and distorted development of the weary and worn athlete. We have never made swift gains and fortunes here, but in prosperous times we have grown steadily; and in the days of the recent panic we suffered all the less for our conservatism. For, despite the drains upon our money from abroad, there was no financial crash here, and no regular customer of any of our larger banks was ever refused help.

But men have told us "Maine is too far East ever to be great."

"Where is the center of the world?" asked an Arab Chief of an old Monk. The Monk struck his staff into the earth where he stood. "Here it is," said he. "I know you say so," said the Chief. "Well, but measure and see for yourself," wittily retorted the Monk. There is no real center but the center of human purpose, where faith is, where love is, where pride and growth and contentment are. They tell this good story of a Down Easter: He was swinging his axe at the foot of a pine in the woods of Northern Maine, one day, when a dapper little man in hunting garb came upon him and asked, "Can you tell me what region is this?" "This, sir," said the woodsman, "is Ashland Plantation. Where are *you* from?" "I," said the dapper little gentleman, "*I* am from New York, sir." "From New York!" said the other, half incredulously and half pityingly, "*What'n thunder makes yer live so fur off!*"

Distance and direction are relative, and not arbitrary, in determining the centers or sources of business, and a State which has our means of growth and wealth makes itself a center of inevitable prosperity, even without the plain advantages of position we hold. We have, however, no isolated place in the world. Our coast is full of the safest winter harbors and the most varied and inviting to summer sojourners of any between the St. Lawrence and the Jersey shore, and we have, I believe, more natural capacity, with our already disclosed material and industrial wealth, to live in and of ourselves than any community in this broad and beautiful country. And when all our people shall learn and live this lesson of our new and better hopes; shall truly and loyally love and cherish home and its interests; and shall bring good gifts to the shrine of a common faith and destiny, then shall Maine lead by the sign of her power as well as by her legend.

APPENDIX.

The following is the list of entries at the Centennial from this State. The failure to make an early appropriation to provide for a befitting show from Maine cut down the expected list very materially. Many persons were unable, without help, to bear the expense, and many were left in doubt as to whether there would be any general move among our people, which, together with the fact that we had never held or aided in holding an exposition of our resources, made the task of getting up a creditable exhibition at Philadelphia very hard. Still, in point of applications for space, Maine stood eighth on the list of States, and even in actual entries made no mean show. It is to be hoped that the lessons of the year will be sufficient to arouse us to a full sense of our duty to ourselves and our important relation to the whole world of productions.

Many exhibitions were made by Maine residents that did not pass through the local Board, swelling the number to nearly one hundred, but which cannot be correctly given in this place; nor is it yet possible to publish all the awards, which in point of numbers and character are very flattering.

TEXTILE FABRICS.

Lewiston Falls Manufacturing Co.,			Lewiston.
Bates	"	"	"
Hill	"	"	"

Androscoggin Mills,	Lewiston.
Barker Mill,	"
Continental Mill,	"
Farwell's Mills,	Lisbon.
Laconia Company,	Biddeford.
Pepperell "	"
York Manufacturing Company,	Saco.
Newichawanick Mills,	So. Berwick.
Worumbo Manufacturing Company,	Lisbon.
Knox Woolen Company,	Camden.
Sanford Mills,	Sanford.
Westbrook Manufacturing Company,	Saccarappa.

MACHINERY.

Hardy Machine Co., Biddeford.
 Saco Water Power Co., "
 Lewiston Machine Co., Lewiston.
 G. S. Follansbee, Steam Pump, Lewiston.
 John C. Getchell, Capstan, Machias.
 E. W. Barker, Car-coupler, Portland.
 S. N. McGilvery, Ship Model, Belfast.
 L. R. Palmer, Stave Jointer, Belfast.
 Howard Manufacturing Company, Mitering Machine, Belfast.
 Burgess Proof-press Company, Belfast.
 Andrew Morse, several Models of Machinery, Skowhegan.
 F. Lyford, Clothes Dryer, Augusta.
 A. W. Decrow, Smoke Conductor, Bangor.
 William Flowers, Boat Lowering Apparatus, Bangor.
 J. P. Bass, Photographic Burnisher, Bangor.
 Elisha Newcomb, Car Replacer, Portland.
 C. B. Harrington, Miniature Yacht, Bath.
 W. Thompson, Road Scraper, Gardiner.
 J. W. Stockwell & Co., Cement Pipe Machinery, Portland.
 J. H. Snow, Ship's Model, Bucksport.

AGRICULTURAL.

Ansel Stevens, Centennial Mower, Gorham.
 A. J. Mosher, Bag Holder, Portland.
 Dunn Edge Tool Company, Waterville.
 Hiram Holt & Co., Hay Knives, &c., East Wilton.
 Portland Packing Co., Hermetically Sealed Goods, Portland.
 Burnham & Morrill, " " " "
 John Winslow Jones, " " " "
 Wm. Sharp, Preserved Haddies, Cape Elizabeth.
 S. L. Goodale, Food Extract (from fish), Saco.
 Collective Exhibit of Orchard Fruits by the Maine Pomological Society.
 Hall C. Burleigh, Herd of Hereford Cattle, Fairfield.

IN GENERAL.

(Main Building and Annexes.)

Collective Educational Exhibit, by Hon. Warren Johnson, State Superintendent.
 T. J. Whitehead, Furnaces, South Paris.
 Paris Hill Manufacturing Co., Children's Carriages and Sleds, Paris.
 Joseph Russell, Sleighs, Portland.
 Hugh Smith, Sleighs, Gray.
 A. B. Morrison, Manufacturing Jeweler, Portland.
 Ara Cushman & Co., Boots and Shoes, Auburn.
 Evans Rifle Company, Case of Rifles, Mechanic Falls.
 J. W. Munger, Detergent, Portland.
 A. G. Schlotterbeck, Thermometer, Portland.
 L. F. Pingree, Artificial Limbs, Portland.
 Androscoggin Pulp Co., Wood Pulp and Products, Portland.
 Joseph Wood, Specimen of Newspaper Printing, Bath.
 Adams H. Merrill, Slate, Brownville.
 T. H. Dinsmore, Slate, Skowhegan.
 C. H. Chandler, Slate, Brownville.

Knight and Whidden, Ground and Calcined Plaster, Portland.

Davis Tillson, Specimen of Wrought Granite, Rockland.

Red Beach Granite Co., Specimens of Red Granite, Red Beach.

Bodwell Granite Co., Granite Display, Rockland.

Hallowell Granite Co., Ornamental Display, Hallowell.

W. K. Chase, Granite Pedestal, Blue Hill.

F. O. Martin, Granite Block, St. George.

Specimens were also exhibited from nearly all the quarries in the State, including Gouldsboro', Jonesport, Spruce Head, Fox Island, &c.

Katahdin Iron Works (O. W. Davis, Jr., Lessee), Specimens of Iron Ore and Products, Bangor.

Fred. H. Patten, Feldspar and Quartz Varieties, Bath.

The Giant's Causeway, Oil Painting, by Harry Brown, Portland.

New England Autumn Scene, by P. C. Holmes, Gardiner.

BERRY, PRINTER, PORTLAND.