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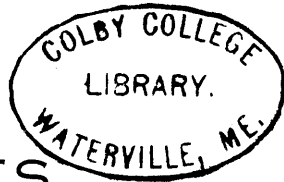
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OF THE

STATE OF MAINE

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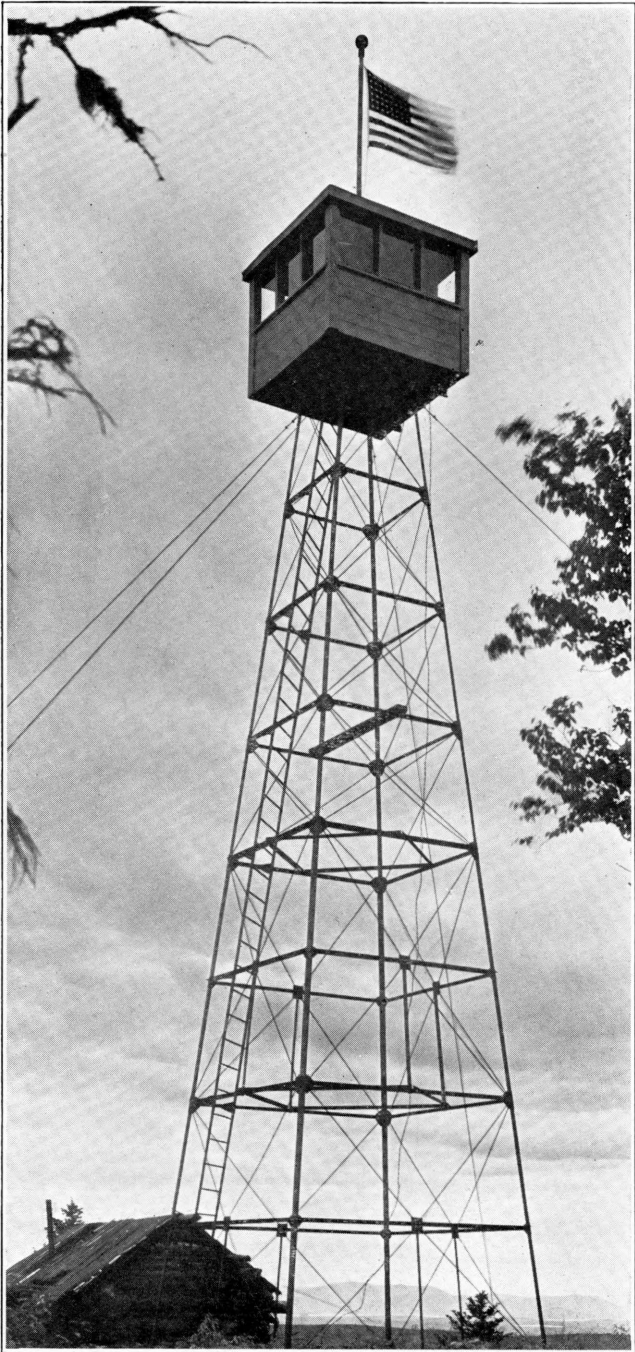
REPORTS

OF THE VARIOUS

PUBLIC OFFICERS, DEPARTMENTS
AND INSTITUTIONS

FOR THE YEAR 1914

VOLUME II.



Williams Mountain, Twp. 2, R. 7, B. K. P., W. K. R.

TENTH REPORT
OF THE
FOREST COMMISSIONER

OF THE
STATE OF MAINE

1914

WATERVILLE
SENTINEL PUBLISHING COMPANY
1914

STATE OF MAINE.

To His Excellency, William T. Haines, Governor of Maine:

I herewith submit my report as Forest Commissioner for the years 1913 and 1914.

BLAINE S. VILES,
Forest Commissioner.

DEPARTMENT OF STATE LANDS AND FORESTRY.

Land Agent and Forest Commissioner,

BLAINE S. VILES, Augusta, Me.

Deputy Forest Commissioner,

NEIL L. VIOLETTE, Van Buren, Me.

Clerk,

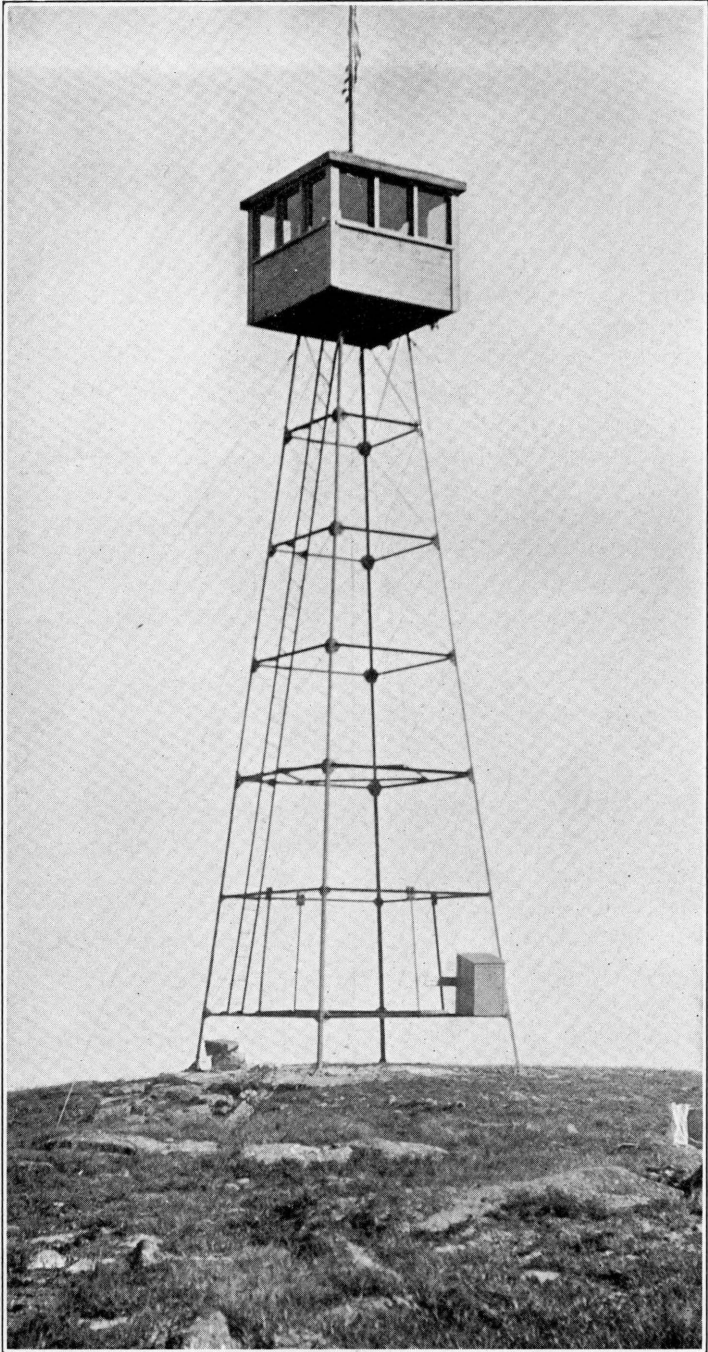
CLARENCE L. PHILBRICK, Augusta, Me.

Director of Public Instruction in Forestry,

PROF. JOHN M. BRISCOE, Orono, Me.

Instructor in Forestry,

CARLETON W. EATON, Calais, Me.



Saddleback Mountain, Twp. 1, R. 1, Franklin County.

REPORT OF THE FOREST COMMISSIONER.

The State of Maine is rich in natural resources. At the present time nearly three-quarters of our area, or more than fourteen million acres, is classified as forest land. These forests are composed of trees well suited to the needs of our people.

The utilization of forest products has been carried on in Maine since the early settlement of the country, and today the industry is of first importance in the State. Maine ranks first among the states in the annual cut of spruce and balsam fir, and third in that of white pine and birch. Towns and communities depend upon the lumbering industry for support. The annual cut of all kinds of timber in the State approximates one billion feet. The value of the logs at the mills is probably twelve million dollars, while the value of the manufactured product probably exceeds twenty million dollars.

Among the states Maine ranks third in developed water-powers. These wonderful powers have an estimated value of one hundred and fifty million dollars and are the very backbone of the present industrial life of the State, and the foundation on which future development will be built. They are protected and regulated by the forests on the water-sheds of the rivers. The function of the forest in regulating flow is easily illustrated if we examine the run-off on a barren hillside, where water is discharged as soon as it falls, causing floods and erosion of the soil. If the water-shed of a stream is forested the discharge of water is gradual and the flow of the stream consequently well regulated and of pure water.

But it is not alone for the lumber that they yield, or the water-powers that they protect, that the forests of Maine are of value. for they have a further and perhaps greater value as the greatest recreation ground of this nation. Our twenty-two hundred inland lakes are dotted with camps, hotels and cottages, where two hundred thousand people from beyond our borders spend their annual vacation. It is estimated that the fish and game

interests bring to the people of the State twenty million dollars annually.

The forests of Maine being so valuable in every way must be protected and conserved. It is the great conservation problem with which we have to deal and concerns not only the interests of the present day but also the welfare of future generations.

The greatest destructive agent in the forest is fire. It is undoubtedly a fact that more timber has been destroyed and wasted in the forests of the State than has been utilized, and it is to do away with this destruction and waste that the people of the State should be interested.

The first great step toward conservation is adequate protection from fire, and only with this guarantee, can owners of forest property practice conservative management. Ideal management maintains the producing capacity of the forest at a maximum. It necessitates the leaving of trees in lumbering for future growth, preserving the young growth at increased operating expense, and in many instances the planting of areas that are not producing timber.

The forests of Maine are divided into two classes as forest protection is now carried out, namely, the great wild land section, or that embraced in the Maine Forestry District of 9,467,773 acres, and the forested area of cities, towns, and plantations of 4,824,125 acres.

Forest fire protection in the wild land section is under the direct supervision of the Forest Commissioner. The owners of this property are assessed a special tax of one and one-half mills for the support of the protective system. This assessment for the year 1914 amounts to \$71,166.31 less abatements for 1913 and 1914 amounting to \$1,009.94. This territory is divided into districts, each under the direction of a Chief Forest Fire Warden, and this officer has supervision of all work carried out in his particular territory. The lookout watchman, patrolmen and deputy wardens are his subordinates.

An important part of the protective system is the chain of mountain lookout stations. These now number fifty-five. Twenty-eight were added during the past two years. The first lookout was established on Squaw Mountain in the Moosehead Lake Country and as far as I am able to learn this was the first station maintained for the purpose of locating fires in this coun-

try. The system has since spread not only over Maine, but it has been adopted by practically every state having a Forest Fire Protective System.

Supplementing the lookouts are patrolmen, who patrol territory where fires are the most likely to occur.

Our laws in force in the Maine Forestry District require efficient spark arresters on locomotives; prohibit the dumping of coals along the railroads in the forest area, require the screening or fastening down of windows of smoking cars and compartments, and the railroad patrol act allows the Forest Commissioner to maintain an efficient patrol on all railroads in the district, the expense of which is paid by the railroad companies. This system is not complete, but it is being improved each year as the finances of the District allow, and it will soon undoubtedly furnish reasonably adequate protection to the great wild land area of the State.

Protection of the forests in the towns and plantations is now in the hands of the Selectmen. These officials are charged with the important duty of extinguishing forest fires, but they are supported by no fund to prevent them. It is the opinion of the Forest Commissioner that the protective system now in operation in the Maine Forestry District should be extended to the forests outside the District.

The towns and plantations need lookout stations and patrols and equipment for fighting forest fires, and the suppression of forest fires is so important to all the people of Maine that the State should assist materially in the work. The legislature should appropriate twenty-five thousand dollars annually for State wide aid. A part of this appropriation should be expended in the Maine Forestry District, as the owners of forest lands situated in the District now maintain the protective system by direct assessment, and the remainder should be expended for the protection of forests outside the District. The towns and plantations would be willing to expend money for protection purposes undoubtedly providing they could receive State aid.

Further legislation should be enacted requiring the disposition of slash within a certain distance of railroads, carriage and travelled wood roads.

I can not say too much in favor of the results obtained by the protective system in the Maine Forestry District. The men

engaged in the work are capable and enthusiastic and the equipment is extensive and modern. Our people in general are wide awake to the importance of forest protection and are glad to coöperate in every way possible.

The railroads of the State are now thoroughly alive to the fact that the forest must be preserved, and are adding improved equipment and coöperating with this department to this end.

PUBLIC LANDS.

The Land Agent has the custody of Indian Township in Washington County and the public or school lots held in trust by the State for organized plantations, or such as have at some-time been organized.

The Legislature of 1913 appropriated \$500 for the purpose of retracing and defining the lines of public lots, and this money has been expended to good advantage. A similar appropriation should be made by the Legislature of 1915.

According to Section 11, Chapter 7 of the Revised Statutes, the land reserved for public uses in Township 5, Range 20, W. E. L. S., was selected and located. In this survey the proprietor of the Township, the Great Northern Paper Company, was represented by J. F. Philippi, and the State was represented by Forrest H. Colby.

An estimate of the timber now standing on the lot of 918 acres so selected was made as follows:

Spruce ten inches and over breast high.....	2,250,000 ft.
Fir eight inches and over breast high.....	1,490,000 "
Spruce pulp between six and ten inches breast high	500,000 "

A resurvey of the lines of the Public Lots in Long Pond Plantation was made, estimates of growth were made as follows:

Spruce eight inches and over breast high.....	1,700,000 ft.
Fir eight inches and over breast high.....	300,000 "

and a small amount of very good white birch, which ought to grow twelve or fifteen years. The spruce and fir are thrifty and growing nicely, and while a good percentage of fairly good saw logs could be cut at the present time, the lot ought not to be cut over for ten or fifteen years. The ground is even and very easy to operate.

It appears on the plan books in this office that the Public Lots in West Middlesex, which is Township 3, Range 1, W. B. K. P., had once been located, but no field notes of same could be found. For that reason we thought wise to run the lines according to the plan on file in this office.

In the above mentioned surveys the State was represented by Hon. Forrest H. Colby.

The Assessors of Seboeis Plantation informed this department in the spring of 1914, that the lines of the Public Lots needed to be renewed, and according to said recommendation Mr. James W. Sewall of Old Town, was appointed and made the necessary survey.

In the fall of 1913, while the owners of the South half of Township 1, Range 5, Aroostook County were making a division of said Township the land reserved for public uses was selected and located.

The field notes and plans of all the above mentioned surveys are on file in this office. In my judgment there are a few more public lands that should be looked after, but there was no more money available for this purpose.

Under acts of incorporation by the Legislature of 1913, two Plantations, viz: Connor and Wade in Aroostook County became Towns on the 12th day of July, 1913, and the title to the reserved lands in these two Plantations passes direct to the Towns. All money in the treasury to the credit of the new Towns, which has been collected from stumpage in the previous years has or will be paid over to the Town Treasurer and will become a permanent school fund.

Cases of trespasses during the two years were few, but those reported were carefully looked into, and money thus collected has been turned over to the State Treasurer, to be placed to the credit of the school fund of the plantation in which such cases occurred.

In the lumbering season of 1912 and 1913, this department has turned over to the State Treasurer \$25,652.98, collected for stumpage and rentals from reserved lands of the different plantations.

In the season of 1913 and 1914 with fewer permits, it is expected that a little over \$20,000 will be realized from the same source.

MAINE FORESTRY DISTRICT.

An Act creating the Maine Forestry District, and providing for protection against forest fires therein. Chap. 193, Laws of 1909, as amended by Chap. 68, Laws of 1913.

Section 1. An administrative district shall be and is hereby established and incorporated, to be known as the Maine Forestry District, and to include the following territory:

Township A, R. 2, W. E. L. S.; Hammond Plantation; C, R. 2, W. E. L. S.; D, R. 2, W. E. L. S.; E. Plantation; 3, R. 2, W. E. L. S.; Cox Patent; Glenwood Plantation; 3, R. 3, W. E. L. S.; 4, R. 3, W. E. L. S.; 7, R. 3, W. E. L. S.; 8, R. 3, W. E. L. S.; 9, R. 3, W. E. L. S.; 10, R. 3, W. E. L. S.; 17, R. 3, W. E. L. S.; 1, R. 4, W. E. L. S.; 2, R. 4, W. E. L. S.; 3, R. 4, W. E. L. S.; 7, R. 4, W. E. L. S.; 8, R. 4, W. E. L. S.; 9, R. 4, W. E. L. S.; 10, R. 4, W. E. L. S.; 11, R. 4, W. E. L. S.; Westmanland Plantation; 16, R. 4, W. E. L. S.; 17, R. 4, W. E. L. S.; A, R. 5, W. E. L. S.; 1, R. 5, W. E. L. S.; 7, R. 5, W. E. L. S.; 8, R. 5, W. E. L. S.; 9, R. 5, W. E. L. S.; 13, R. 5, W. E. L. S.; 14, R. 5, W. E. L. S.; 15, R. 5, W. E. L. S.; 16, R. 5, W. E. L. S.; 17, R. 5, W. E. L. S.; Oxbow Plantation; 10, R. 6, W. E. L. S.; Garfield Plantation; Nashville Plantation; 14, R. 6, W. E. L. S.; 15, R. 6, W. E. L. S.; 16, R. 6, W. E. L. S.; 9, R. 7, W. E. L. S.; 10, R. 7, W. E. L. S.; 11, R. 7, W. E. L. S.; 12, R. 7, W. E. L. S.; 13, R. 7, W. E. L. S.; 14, R. 7, W. E. L. S.; Winter-ville Plantation; 9, R. 8, W. E. L. S.; 10, R. 8, W. E. L. S.; 11, R. 8, W. E. L. S.; 12, R. 8, W. E. L. S.; 13, R. 8, W. E. L. S.; 14, R. 8, W. E. L. S.; 15, R. 8, W. E. L. S.; 16, R. 8, W. E. L. S.; 11, R. 9, W. E. L. S.; 12, R. 9, W. E. L. S.; 13, R. 9, W. E. L. S.; 14, R. 9, W. E. L. S.; 15, R. 9, W. E. L. S.; 16, R. 9, W. E. L. S.; 11, R. 10, W. E. L. S.; 12, R. 10, W. E. L. S.; 13, R. 10, W. E. L. S.; 14, R. 10, W. E. L. S.; 15, R. 10, W. E. L. S.; Allagash Plantation; 18, R. 10, W. E. L. S.; 11, R. 11, W. E. L. S.; 12, R. 11, W. E. L. S.; 13, R. 11, W. E. L. S.; 14, R. 11, W. E. L. S.; 15, R. 11, W. E. L. S.; 18, R. 11, W. E. L. S.; 19, R. 11, W. E. L. S.; 11, R. 12, W. E. L. S.; 12, R. 12, W. E. L. S.; 13, R. 12, W. E. L. S.; 14, R. 12, W. E. L. S.; 15, R. 12, W. E. L. S.; 16, R. 12, W. E. L. S.; 17, R. 12, W. E. L. S.; 18, R. 12, W. E. L. S.; 19, R. 12, W. E. L. S.; 20, R. 11 & 12, W. E. L. S.; 11, R. 13, W. E. L. S.; 12, R. 13, W. E. L. S.; 13, R. 13, W. E. L. S.; 14, R. 13, W. E. L. S.; 15, R. 13, W. E. L. S.; 16, R. 13, W. E. L. S.; 17, R. 13, W. E. L. S.; 18, R. 13, W. E. L. S.; 11, R. 14, W. E. L. S.; 12, R. 14, W. E. L. S.; 13, R. 14, W. E. L. S.; 14, R. 14, W. E. L. S.; 15, R. 14, W. E. L. S.; 16, R.

14, W. E. L. S.; 17, R. 14, W. E. L. S.; 11, R. 15, W. E. L. S.; 12, R. 15, W. E. L. S.; 13, R. 15, W. E. L. S.; 14, R. 15, W. E. L. S.; 15, R. 15, W. E. L. S.; 11, R. 16, W. E. L. S.; 12, R. 16, W. E. L. S.; 13, R. 16, W. E. L. S.; 14, R. 16, W. E. L. S.; 11, R. 17, W. E. L. S.; 12, R. 17, W. E. L. S.; in Aroostook County.

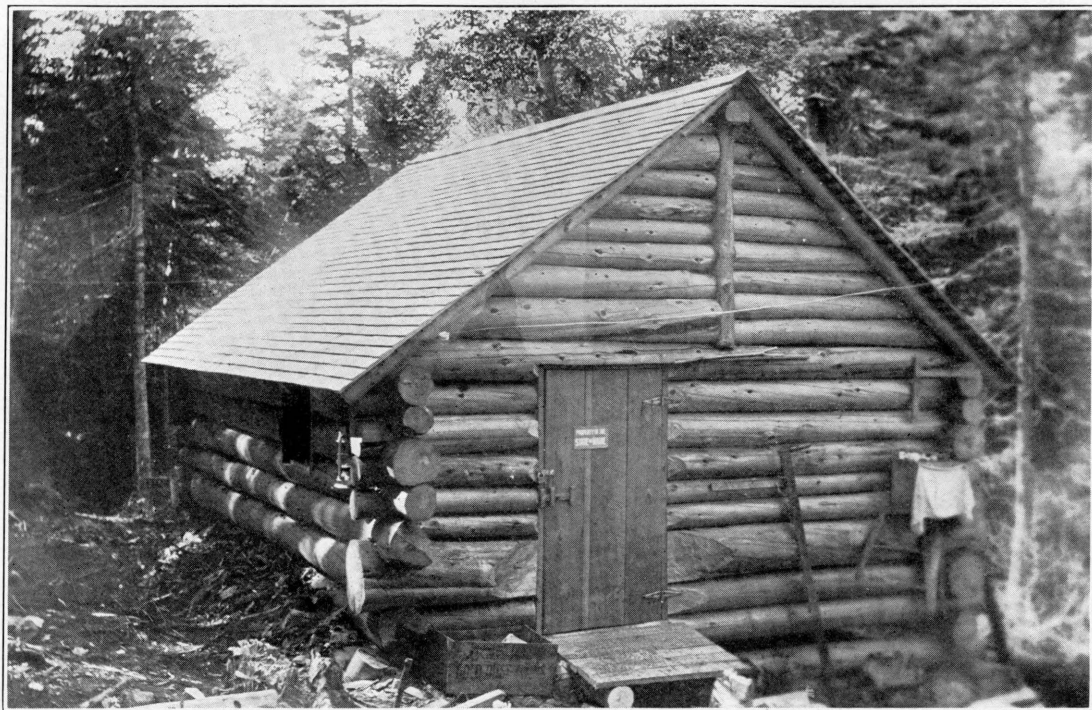
Township No. 4, Washington Plantation; Sandy River Plantation; Rangeley Plantation; 4, R. 1, B. K. P., W. K. R.; 4, R. 2, B. K. P., W. K. R.; 4, R. 3, B. K. P., W. K. R.; D, R. 1; 1, R. 2, W. B. K. P.; Dallas Plantation; Coplin Plantation; Lang Plantation; 3, R. 3; W. B. K. P.; 3, R. 2, B. K. P., W. K. R.; 2, R. 4, W. B. K. P.; 3, R. 4, W. B. K. P.; 1, R. 5, W. B. K. P.; 2, R. 5, W. B. K. P.; 3, R. 5, W. B. K. P.; 1, R. 6, W. B. K. P.; 2, R. 6, W. B. K. P.; 3, R. 6, W. B. K. P.; 1, R. 7, W. B. K. P.; 2, R. 7, W. B. K. P.; 1, R. 8, W. B. K. P.; 2, R. 8, W. B. K. P.; Gore North of T. No. 2 and 3, R. 6, W. B. K. P.; No. 6 North of Weld; Gore North of T. 1, R. 8, W. B. K. P.; Township E; Perkins; in Franklin County.

Township No. 3, North Division; No. 4, North Division; Two Mile Strip North of No. 3, North Division; Strip North of No. 4, North Division; No. 7, South Division; No. 8, South Division; No. 9, South Division; No. 10, South Division; No. 16, Middle Division; No. 21 Plantation; No. 22, Middle Division; No. 28, Middle Division; No. 32, Middle Division; No. 33 Plantation; No. 34, Middle Division; No. 35, Middle Division; No. 39, Middle Division; No. 40, Middle Division; No. 41, Middle Division; Butter Island; Eagle Island; Spruce Head Island; Bear Island; Beach Island; Hog Island; Bradbury's Island; Pond Island; Western Island; Little Spruce Island; Marshall's Island; Pickering's Island; in Hancock County.

T. A. No. 1; Andover North Surplus; Andover West Surplus; T. C.; C Surplus; 4, R. 1, W. B. K. P.; Magalloway Plantation; 4, R. 2, W. B. K. P.; Lincoln Plantation; 4, R. 3, W. B. K. P.; 5, R. 3, W. B. K. P.; 4, R. 4, W. B. K. P.; 5, R. 4, W. B. K. P.; 4, R. 5, W. B. K. P.; 4, R. 6, W. B. K. P.; 5, R. 6, W. B. K. P.; Batchelder's Grant; in Oxford County.

Township 3, R. 1, N. B. P. P.; Lakeville Plantation; 5, R. 1, N. B. P. P.; Webster Plantation; Drew Plantation; 1, R. 7, N. W. P.; 2, R. 8, N. W. P.; Seboeis Plantation; 2, R. 9, N. W. P.; 3, R. 9, N. W. P.; 1, R. 6, W. E. L. S.; 2, R. 6, W. E. L. S.; Stacyville Plantation; 6, R. 6, W. E. L. S.; 7, R. 6, W. E. L. S.; 8, R. 6, W. E. L. S.; A, R. 7, W. E. L. S.; 1, R. 7, W. E. L. S.; 2, R. 7, W. E. L. S.; 3, R. 7, W. E. L. S.; 4, R. 7, W. E. L. S.; 5, R. 7, W. E. L. S.; 6, R. 7, W. E. L. S.; 7, R. 7, W. E. L. S.; 8, R. 7, W. E. L. S.; Hopkins Academy Grant; 8, R. 8, W. E. L. S.; A, R. 8 & 9, W. E. L. S.; Veazie Gore; No. 3, Indian Purchase; No. 4, Indian Purchase; 1, R. 8, W. E. L. S.; 2, R. 8, W. E. L. S.; 3, R. 8, W. E. L. S.; 4, R. 8, W. E. L. S.; 5, R. 8, W. E. L. S.; 6, R. 8, W. E. L. S.; 7, R. 8, W. E. L. S.; No. 1, North Division; Grand Falls Plantation; in Penobscot County.

Lakeview Plantation; Barnard Plantation; 4, R. 9, N. W. P.; 5, R. 9, N. W. P.; 6, R. 9, N. W. P.; 7, R. 9, N. W. P.; Elliottsville Plantation;



Watchman's Camp, Saddleback Mountain.

3, R. 5, B. K. P., E. K. R.; 2, R. 6, B. K. P., E. K. R.; 1, R. 9, W. E. L. S.; 2, R. 9, W. E. L. S.; 3, R. 9, W. E. L. S.; 4, R. 9, W. E. L. S.; 5, R. 9, W. E. L. S.; 6, R. 9, W. E. L. S.; 7, R. 9, W. E. L. S.; 8, R. 9, W. E. L. S.; 9, R. 9, W. E. L. S.; 10, R. 9, W. E. L. S.; A, R. 10, W. E. L. S.; B, R. 10, W. E. L. S.; 1, R. 10, W. E. L. S.; 2, R. 10, W. E. L. S.; 3, R. 10, W. E. L. S.; 4, R. 10, W. E. L. S.; 5, R. 10, W. E. L. S.; 6, R. 10, W. E. L. S.; 7, R. 10, W. E. L. S.; 8, R. 10, W. E. L. S.; 9, R. 10, W. E. L. S.; 10, R. 10, W. E. L. S.; A, R. 11, W. E. L. S.; B, R. 11, W. E. L. S.; 1, R. 11, W. E. L. S.; 2, R. 11, W. E. L. S.; 3, R. 11, W. E. L. S.; 4, R. 11, W. E. L. S.; 5, R. 11, W. E. L. S.; 6, R. 11, W. E. L. S.; 7, R. 11, W. E. L. S.; 8, R. 11, W. E. L. S.; 9, R. 11, W. E. L. S.; 10, R. 11, W. E. L. S.; 7, R. 10, N. W. P.; 8, R. 10, N. W. P.; A, R. 12, W. E. L. S.; 1, R. 12, W. E. L. S.; 2, R. 12, W. E. L. S.; 3, R. 12, W. E. L. S.; 4, R. 12, W. E. L. S.; 5, R. 12, W. E. L. S.; 6, R. 12, W. E. L. S.; 7, R. 12, W. E. L. S.; 8, R. 12, W. E. L. S.; 9, R. 12, W. E. L. S.; 10, R. 12, W. E. L. S.; A, R. 13, W. E. L. S.; A, 2, R. 13 & 14, W. E. L. S.; 1, R. 13, W. E. L. S.; 2, R. 13, W. E. L. S.; 3, R. 13, W. E. L. S.; 4, R. 13, W. E. L. S.; 5, R. 13, W. E. L. S.; 6, R. 13, W. E. L. S.; 7, R. 13, W. E. L. S.; 8, R. 13, W. E. L. S.; 9, R. 13, W. E. L. S.; 10, R. 13, W. E. L. S.; A, R. 14, W. E. L. S.; X, R. 14, W. E. L. S.; 1, R. 14, 3, R. 14 & 15, W. E. L. S.; 4, R. 14, W. E. L. S.; 5, R. 14, W. E. L. S.; 6, R. 14, W. E. L. S.; 7, R. 14, W. E. L. S.; 8, R. 14, W. E. L. S.; 9, R. 14, W. E. L. S.; 10, R. 14, W. E. L. S.; Sugar Island; Deer Island; Middlesex Canal; Day's Academy; 4, R. 15, W. E. L. S.; 5, R. 15, W. E. L. S.; 6, R. 15, W. E. L. S.; 7, R. 15, W. E. L. S.; 8, R. 15, W. E. L. S.; 9, R. 15, W. E. L. S.; 10, R. 15, W. E. L. S.; Moose Island; Farm Island; Kingsbury Plantation; in Piscataquis County.

Lexington Plantation; Pleasant Ridge Plantation; Highland Plantation; 1, R. 3, B. K. P., W. K. R.; 2, R. 3, B. K. P., W. K. R.; Dead River Plantation; Bigelow Plantation; 1, R. 4, B. K. P., W. K. R.; 2, R. 4, B. K. P., W. K. R.; 3, R. 4, B. K. P., W. K. R.; Flagstaff Plantation; West Forks Plantation; 2, R. 5, B. K. P., W. K. R.; 3, R. 5, B. K. P., W. K. R.; 4, R. 5, B. K. P., W. K. R.; 1, R. 6, B. K. P., W. K. R.; 2, R. 6, B. K. P., W. K. R.; 3, R. 6, B. K. P., W. K. R.; 4, R. 6, B. K. P., W. K. R.; 5, R. 6, B. K. P., W. K. R.; 1, R. 7, B. K. P., W. K. R.; 2, R. 7, B. K. P., W. K. R.; 3, R. 7, B. K. P., W. K. R.; 4, R. 7, B. K. P., W. K. R.; 5, R. 7, B. K. P., W. K. R.; 6, R. 7, B. K. P., W. K. R.; Gore North of Nos. 1, 2 & 3, R. 7, B. K. P., W. K. P.; Mayfield Plantation; 2, R. 3, B. K. P., E. K. R.; The Forks Plantation; 2, R. 4, B. K. P., E. K. R.; 1, R. 5, B. K. P., E. K. R.; 2, R. 5, B. K. P., E. K. R.; 1, R. 6, B. K. P., E. K. R.; 1, R. 1, N. B. K. P.; 2, R. 1, N. B. K. P.; 3, R. 1, N. B. K. P.; Jackman Plantation; 5, R. 1, N. B. K. P.; 6, R. 1, N. B. K. P.; 1, R. 2, N. B. K. P.; 2, R. 2, N. B. K. P.; 3, R. 2, N. B. K. P.; Moose River Plantation; Dennistown Plantation; 6, R. 2, N. B. K. P.; Big W, N. B. K. P.; Little W, N. B. K. P.; 1, R. 3, N. B. K. P.; 2, R. 3, N. B. K. P.; 3, R. 3, N. B. K. P.; 4, R. 3, N. B. K. P.; 5, R. 3, N. B. K. P.; Se-

boomook; 1, R. 4, N. B. K. P.; 2, R. 4, N. B. K. P.; 3, R. 4, N. B. K. P.; 4, R. 4, N. B. K. P.; 5, R. 4, N. B. K. P.; 3, R. 5, N. B. K. P.; 4, R. 5, N. B. K. P.; 4, R. 16, W. E. L. S.; 5, R. 16, W. E. L. S.; 6, R. 16, W. E. L. S.; 7, R. 16, W. E. L. S.; 8, R. 16, W. E. L. S.; 9, R. 16, W. E. L. S.; 10, R. 16, W. E. L. S.; 4, R. 17, W. E. L. S.; 5, R. 17, W. E. L. S.; 6, R. 17, W. E. L. S.; 7, R. 17, W. E. L. S.; 8, R. 17, W. E. L. S.; 9, R. 17, W. E. L. S.; 10, R. 17, W. E. L. S.; 4, R. 18, W. E. L. S.; 5, R. 18, W. E. L. S.; 6, R. 18, W. E. L. S.; 7, R. 18, W. E. L. S.; 8, R. 18, W. E. L. S.; 9, R. 18, W. E. L. S.; 5, R. 19, W. E. L. S.; 6, R. 19, W. E. L. S.; 7, R. 19, W. E. L. S.; 8, R. 19, W. E. L. S.; 5, R. 20, W. E. L. S.; in Somerset County.

Township No. 18, East Division; No. 19, East Division; No. 26, East Division; No. 27, East Division; No. 18, Middle Division; No. 19, Middle Division; No. 24, Middle Division; No. 25, Middle Division; No. 29, Middle Division; No. 30, Middle Division; No. 31, Middle Division; No. 36, Middle Division; No. 37, Middle Division; No. 42, Middle Division; No. 43, Middle Division; No. 5, North Division; Strip North of No. 5, North Division; No. 6, North Division; Strip North of No. 6, North Division; No. 1, R. 1, Titcomb's Survey; Grand Lake Stream Plantation; 1, R. 2, Titcomb's Survey; 1, R. 3, Titcomb's Survey; 6, R. 1, N. B. P. P.; 7, R. 2, N. B. P. P.; 8, R. 3, N. B. P. P.; 10, R. 3, N. B. P. P.; 11, R. 3, N. B. P. P.; 8, R. 4, N. B. P. P.; Indian Township; Codyville Plantation; No. 14 Plantation; No. 21 Plantation; in Washington County.

Sect. 2. An annual tax is hereby assessed upon all the property in said district, including rights in public lots, to be used for the protection thereof. Said tax shall be due and payable at the date of the assessment of the State tax, in the years when the legislature is in session, and for other years it shall be due and payable in one year after the date of such assessment.

The rate of such tax is hereby fixed at one and one-half mills on the dollar. The valuation as determined by the board of State assessors, and set forth in the statement filed by them as provided by the Revised Statutes, chapter eight, section eleven, as amended, shall be the basis for the computation and apportionment of the tax hereby assessed until the next biennial equalization.

The tax hereby assessed shall be valid, and all remedies herein provided shall be in full force if said property is described with reasonable accuracy, whether the ownership thereof is correctly stated or not.

Sect. 3. The board of State assessors shall within thirty days after such tax is due, prepare and file with the treasurer of the State, a certificate setting forth the description of each lot, parcel or right subject to the tax hereby assessed, together with the tax computed at the rate hereby established.

Sect. 4. The treasurer of the State shall cause lists of the assessments made hereby to be advertised for three weeks successively in the State paper, and in some newspaper, if any, in the county where the land lies, within three months after such tax is due. Such advertisement may be

consolidated with the advertisement required by Revised Statutes, Chapter 9, Section 42, as amended.

The said land shall be held to the State for the payment of the tax hereby assessed, with interest at twenty per cent. per annum, to commence six months after such tax is due as herein provided.

Sect. 5. Owners of lands so assessed and advertised may redeem them by paying to the treasurer of the State the tax with interest thereon, within one year from the time when such interest commences. Each owner may pay for his interest in any tract, whether in common or not, and upon filing with the State treasurer a certificate showing the number of acres, and describing the property on which he desires to pay the tax, and where the same is located, and paying the amount due, shall receive a certificate from the treasurer of the State, discharging the tax on the number of acres or interest upon which such payment is made.

Each part or interest of every such township or tract upon which the tax hereby imposed so advertised is not paid, with interest within the time limited in this section for such redemption, shall be wholly forfeited to the State and vest therein free of any claim by any former owner.

Section 6. The tax assessed by authority of this act shall be held by the state treasurer as a fund to be used to protect from fire the forest situated upon and within the district hereby created, and to pay expenses incidental thereto and for no other purpose.'

'The governor and council shall from time to time, as the forest commissioner may request, issue their warrant to the state treasurer to pay to said commissioner such sums of money as said commissioner may deem necessary for the purpose of this act.'

'If the tax assessed by authority of this act has not been collected or for any reason is not available for the purpose of this act or if said tax proves insufficient in any year to properly carry out the purposes of said act, the governor and council may issue their warrant to the state treasurer to advance and pay to the forest commissioner for the purposes of this act, such sum or sums of money as they may deem necessary for such purposes, the same to be paid from any moneys then in the treasury not otherwise appropriated.'

'The accounts of said commissioner of the disbursements of all funds under this act shall be examined by the state auditor for the purpose of determining if said accounts are correctly kept and all payments properly vouched for.'

'Said forest commissioner is hereby authorized to employ from time to time such clerks in his office as will enable him to pay promptly all bills contracted in carrying out the provisions of this act, the compensation of such clerks to be paid from the funds provided by this act.'

Sect. 7. The forest commissioner shall take measures for the prevention, control and extinguishment of forest fires in said forestry districts, and to this end he shall establish such sub-forestry districts as he may deem necessary for effective protection against loss or damage by fire. He shall have authority to establish lookout stations connected

by telephone, and to equip and maintain depots for necessary tools for the extinguishment of forest fires.

Sect. 8. The said commissioner shall appoint in and for each of said districts so established, a chief forest fire warden, and he shall also appoint within such districts such number of deputy forest fire wardens as in his judgment may be required to carry out the provisions of this act, assigning to each of the latter the territory over and within which he shall have jurisdiction. All chief and deputy forest fire wardens, so appointed, shall hold office during the pleasure of said commissioner, be sworn to the faithful discharge of their duties by any officer authorized to administer oaths, and a certificate thereof shall be returned to the office of such commissioner.

'Section 9. The said chief fire wardens, under the direction of said commissioner, shall have general supervision of their respective districts and of the deputy forest fire wardens therein. Each chief forest fire warden, when directed by said commissioner, shall patrol the forests of his district for the purpose of searching out, extinguishing and guarding against forest fires. He shall investigate and gather evidence regarding the causes of forest fires, enforce all laws relating to forests and forest preservation, arrest all violators thereof, prosecute all offenses against the same, and in this connection shall have the same power to serve criminal processes against such offenders and shall be allowed the same fee as a sheriff, or his deputy, for like services, and shall have and enjoy the same right as a sheriff to require aid in executing the duties of his office. Said chief forest fire wardens shall perform such other duties, at such times, and under such rules and regulations, as the said commissioner may prescribe, and each shall receive as compensation three dollars for each and every day of actual service, with an allowance for actual necessary expenses of travel and subsistence. The said commissioner may authorize the employment of suitable persons to assist said chief forest fire wardens in patrolling their respective districts and every person so employed shall be paid twenty cents for each hour of service so rendered by him and be provided with subsistence during such period. Deputy forest fire wardens shall perform such duties, at such times and under such rules and regulations, as the said commissioner, or the chief fire warden of the district, with the approval of said commissioner, may prescribe and they shall receive as compensation two dollars and actual necessary expenses for each and every day of actual service.'

'Section 10. Whenever a fire occurs on, or is likely to do damage to forest lands within the district of any chief forest fire warden, he shall take immediate action to control and extinguish the same. If such fire occurs upon or is likely to do damage to forest lands within the territory of a deputy forest fire warden and the chief fire warden of the district is not present, then and in such case the deputy forest fire warden having jurisdiction of the territory shall forthwith proceed to control and extinguish the same, and he shall meanwhile, with all consistent dispatch, cause the said chief fire warden of the district to be

notified of the occurrence of such fire. Until the arrival of the chief warden at the place of fire, the deputy warden shall be in charge of the control and extinguishment of the same. For the purpose of controlling and extinguishing fires as aforesaid, chief forest fire wardens, and deputy forest fire wardens, when in charge of the control and extinguishment of forest fires or when so directed by the chief warden, may summon to their assistance any person found within the state and each person so summoned and assisting shall be paid twenty cents for each hour of service rendered by him and be provided with subsistence during such service. Immediately after the extinguishment of a fire, the deputy forest fire warden who for any time may have been in charge of the same, shall make return to the chief warden of the district of the expense thereof during the period of his being in charge, including the names of the persons so summoned and assisting, with their postoffice addresses and the hours of labor actually performed by each under his direction. The return shall be made upon oath and the said chief warden is hereby authorized and empowered to administer such oath. Upon receipt of such return, the said chief fire warden shall carefully examine and audit the same and he may direct the deputy to amend and correct any return found to be incomplete, incorrect, or insufficient in form. If upon examination and auditing of said return, and investigation of the subject matter thereof, said chief warden believes said return to be just and correct, he shall endorse his written approval thereon and forward the same so approved to said forest commissioner. The chief fire warden of every district burned by a forest fire shall, upon the extinguishment of such fire, promptly forward an extract and detailed statement of the expense, if any, which said chief fire warden may have incurred in connection with the extinguishment of such fire, to the said forest commissioner, who may confirm, reject or recommit either or both said approved return of said deputy or said detailed statement of said chief fire warden if justice so requires.'

Sect. 11. All expenses incurred under the provisions of this act shall be paid from the funds raised and created by the tax hereby assessed.

Sect. 12. For the purpose of the better carrying out of the provisions of this act it is hereby provided that the chief clerk to the land agent shall be a deputy forest commissioner. The said deputy shall hold office during the pleasure of the forest commissioner and perform such duties as the latter may prescribe. For such services the said deputy forest commissioner shall receive annually the sum of five hundred dollars, to be paid from the funds provided under this act, in addition to the salary now provided for the clerk to the land agent. It is also hereby further provided that the forest commissioner shall receive from the funds provided under this act, the sum of five hundred dollars, in addition to the salary as now provided by law.

Sect. 13. So much of the funds raised by the tax hereby imposed and paid into the treasury as may be necessary to pay the claims, accounts and demands arising under the provisions of this act is hereby appropriated to pay the same, and the governor and council are hereby author-

ized to draw their warrants therefor at any time. Any balance remaining unpaid shall continue from year to year as a fund available for the purpose of this act.

'Section 14. Any incorporated town or organized plantation adjoining any part of the Maine forestry district may by vote at any meeting of its inhabitants duly called and held, become a part of said forestry district and subject to all the provisions of this act. A copy of such vote certified by the town clerk or plantation assessors, shall be forwarded forthwith to the state treasurer and also to the state forest commissioner, and from the time of the filing of such certified copy of said vote in the office of the state treasurer, the town or plantation so voting shall be and continue a part of said forestry district. All incorporated towns or organized plantations which by and under the provisions of this act or any act hereafter to be passed shall be and become a part of said Maine forestry district and all officers of such town or plantation shall be and are exempt from the duties and obligations imposed by sections fifty-two and fifty-six of chapter seven of the revised statutes of Maine.'

Sect. 15. All acts and parts of acts which are inconsistent with this act are hereby repealed.

Sect. 16. This act shall take effect when approved.

According to Section 14 the following incorporated towns and organized plantations have become a part of the Maine Forestry District: Beddington, Brookton, Cooper, Edmunds, Wesley in Washington County; Macwahoc Plantation in Aroostook County and Caratunk Plantation in Somerset County.

MAINE FORESTRY DISTRICT
1913
FINANCIAL CONDITION.

CR.	
Balance January 1.....	\$15,507 59
Assessment, 1913	70,408 31
Reimbursement from Railroads for railroad patrols, etc.....	612 27
	\$86,528 17

DR.	
Paid bills due January 1, 1913.....	\$22,846 22
Expended during 1913.....	55,552 86
	78,399 08

Balance January 1, 1914..... \$8,129 09

At the beginning of the year 1913 there were bills outstanding amounting to \$22,846.22 and \$15,507.59 available for the payment of same. These old bills have been paid, the expenses of the department paid for the year 1913, and a balance brought over of \$8,129.09. From this must be deducted a small amount for abatement and uncollected taxes.

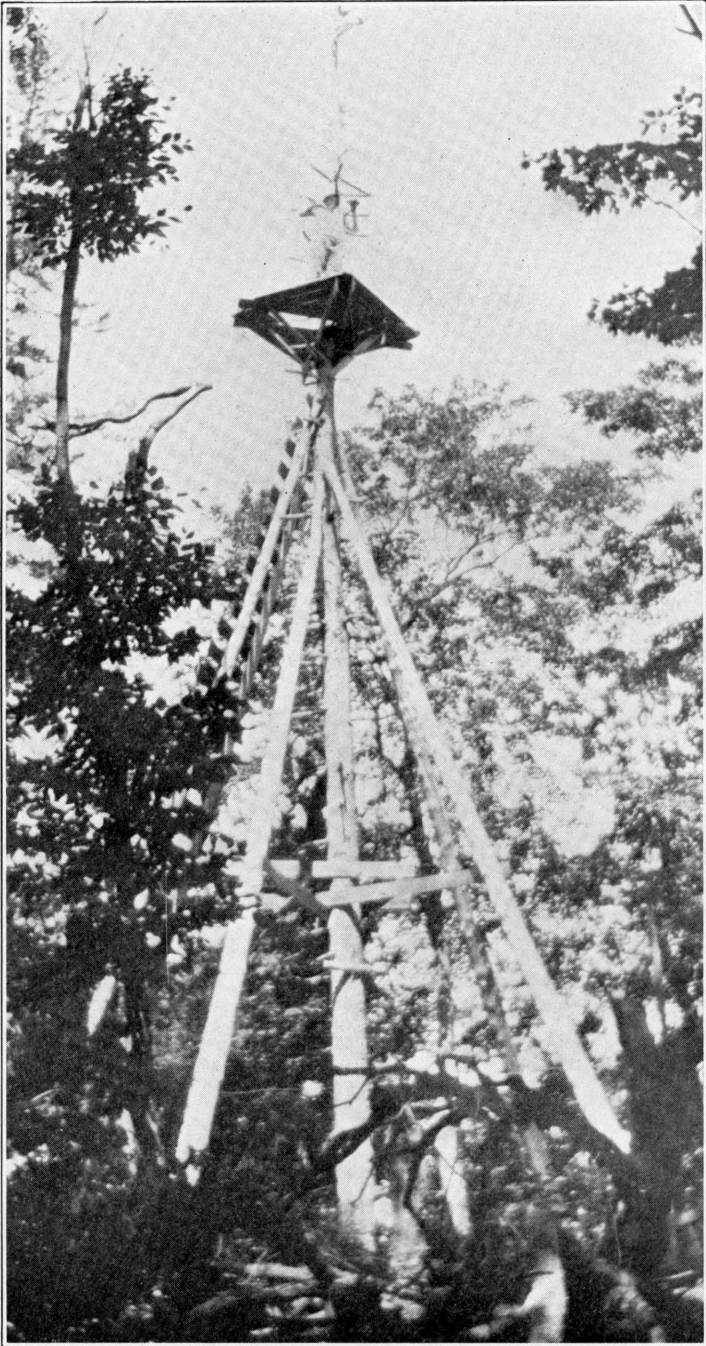
FIRE SEASON OF 1913.

The rainfall up to the last of September was below normal, Local showers prevented protracted droughts generally over the State, but absence of continued rains necessitated a full field force up to September 22, when most of the work was discontinued.

Lookout Stations Operated	Fires reported by same.
No. 1. Lead Mt. Twp. 28, Hancock County.....	9
No. 2. Pleasant Pond Mt., Caratunk Pl.....	9
No. 3. Attean Mt., Attean Twp. Somerset County.....	5

Lookout Stations Operated		Fires reported by same.
No. 4.	Tumbledown Mt., Twp. 5, R. 6, W. K. R.....	5
No. 5.	Squaw Mt., Twp. 2, R. 6, B. W. P., Piscataquis County	7
No. 6.	Snow Mt. Twp. 2, R. 5, Franklin County.....	3
No. 7.	Mt. Bigelow, Bigelow Twp., Somerset County..	6
No. 8.	White Cap Mt., 7 R. 10, N. E., East Bowdoin College Twp.	26
No. 9.	Spencer Mt., Middlesex Grant, Piscataquis County	5
No. 10.	Rocky Mt., So. part Twp. 18, R. 12, W. E. L. S.	
No. 11.	Trout Brook Mt., Twp. 5, R. 10, Piscataquis County	4
No. 12.	Otter Lake Mt., Twp. 3, R. 4, W. E. L. S.....	14
No. 13.	Mt. Chase, Twp. 5, R. 6, W. E. L. S.....	17
No. 14.	Ragged Mt. Twp. A, R. 9, W. E. L. S.....	19
No. 15.	Mt. Kineo, Moosehead Lake.....	6
No. 16.	Mt. Coburn, Twp. 3, R. 6, B. K. P., W. K. R....	6
No. 17.	Wesley Mt., Wesley, Washington Co.....	13
No. 18.	Depot Mt., Twp. 14, R. 16, W. E. L. S.....	3
No. 19.	Soper Mt., Twp. 8, R. 12, W. E. L. S.....	
No. 20.	Round Mt., Twp. 11, R. 8, W. E. L. S.....	3
No. 21.	Aziscoos Mt., Lincoln Pl., Oxford County.....	12
No. *22.	Mt. Katahdin, Twp. 3, R. 9, W. E. L. S.....	4
No. 23.	Bald Mt., Twp. 2, R. 3, E. K. R.....	1
No. 24.	Kibbie Mt., Twp. 1, R. 6, W. B. K. P.....	1
No. 25.	Priestly Mt., Twp. 10, R. 13, W. E. L. S.....	2
No. 26.	Boundary Bald Mt., Twp. 4, R. 3, N. B. K. P...	6
No. 27.	Williams Mt., Twp. 2, R. 7, B. K. P., W. K. R.	
No. 28.	West Kennebago Mt., Twp. 4, R. 4, W. B. K. P.	7
No. *29.	No. 4 Mt., A, R. 14, W. E. L. S., Piscataquis County	3
No. *30.	Cobb Mt., Lee, Penobscot County.....	
No. *31.	Taylor Hill, Princeton, Washington County....	6
No. *32.	Tug Mt., Twp. XXX, M. D.....	4
No. *33.	Beetle Mt., Twp. 7, R. 10, W. E. L. S.....	3

* Stations established in 1913.



Old Wooden Tower, Depot Mountain.

	Fires reported by same.
Lookout stations operated	
No. *34. Grand Lake Sta., Mattagamont Mt., T. 6, R. 8, W. E. L. S.....	2
No. *35. Boarstone Mt., Twp. 8, R. 9, N. W. P., Elliotts- ville	18
No. *36. Joe Mary Mt., A, R. 10, W. E. L. S.....	10
No. *37. Cooper Mt. Station, Cooper, Washington County	21
No. *38. Musquash Mt., Topsfield, Washington County..	6
No. *39. Green Mt., Twp. 4, R. 18, W. E. L. S.....	13
No. *40. Mucalsea Mt., Twp. 5, R. 16, W. E. L. S.....	20
No. *41. Saddleback Mt., Twp. 2, R. 1, Franklin County	5
No. *42. Double Top Mt., Twp. 4, R. 10, W. E. L. S.....	2
	303

* Stations established in 1913.

PATROLS.

One hundred seventy-three patrolmen were employed during the season, and 71 fires were reported by them. When the weather conditions would permit, these men were engaged in the construction of telephone lines, lookout stations, trails, camps, etc.

Fires which could not be extinguished by the regular force and on which it was necessary to employ extra help were as follows:

Location	Area Burned.	Damage.	Cost of Fighting.
Twp. 33, Hancock	200	\$100	\$21 25
Twp. 7, Hancock	300		117 89
B, R. 2, Aroostook	25		6 35
Twp. 10, Hancock	50		42 55
Twp. 21, Hancock	118		5 25
Glenwood, Aroostook	10	1	10 00
Twp. 32, Hancock	100	200	24 30
Twp. 10, Hancock	25	100	14 60
Westmanland, Aroostook	1	5	5 50
Letter D, Franklin	50	10	176 31
16, R. 4, Aroostook	25	25	21 00
D, R. 2, Aroostook	1	50	8 90
Twp. 42 & 43, Washington			29 00

Location.	Area Burned.	Damage.	Cost of Fighting.
4, R. 9, Piscataquis	1,500	1,000	462 20
Pittston, Somerset	3	20	9 60
3, R. 1, Franklin	700	1,000	965 75
A, R. 7, Penobscot	3 $\frac{1}{2}$		119 88
A, R. 7, Penobscot	4		103 00
B, R. 2, Aroostook	125	300	98 31
Indian 3, Penobscot	10		45 20
8, R. 4, Aroostook	600	4,000	215 22
5, R. 6, Somerset	4	25	70 95
A, R. 10, Piscataquis	100	200	149 32
A, R. 7, Penobscot			62 21
4, R. 9, Piscataquis	35	100	7 00
2, R. 4, Aroostook	2,500	10,000	2,098 11
2, R. 5, Aroostook	2	10	7 20
1, R. 1, Washington	200		89 81
Cold Stream, Somerset	6	50	174 35
Twp. 27, Washington	2	10	8 15
4, R. 3, Aroostook	40	10	46 95
16, R. 11, Aroostook	1	5	8 50
3, R. 1, Franklin	1		6 70
Indian Twp., Washington	100	800	133 19
3, R. 1, Franklin	2	10	114 61
4, R. 3, Oxford	2		27 20
Kingsbury, Piscataquis	5	3,500	271 50
4, R. 9, Penobscot	600	500	625 50
Mayfield, Somerset	1,200	3,000	1,415 29
Indian 3, Penobscot	100		272 15
Twp. No. 7, Hancock	10	25	49 95
Twp. No. 7, Hancock	2	25	20 60
Seboeis, Penobscot	4		4 05
Kossuth, Washington	50	250	165 62
Twp. 33, Hancock	50	50	20 75
Twp. 24, M. D., Washington, 3 Sq. Rds..			49 85
15, R. 4, Aroostook	1	15	79 00
Indian 3, Penobscot	10		110 70
B, R. 11, Piscataquis	15		114 85
5, R. 4, Oxford	3 $\frac{1}{2}$		22 00
5, R. 2, Oxford	3	100	89 30
Twp. 40, Hancock, 4 Sq. Rds.....		10	11 00
Twp. 10, Hancock	1 $\frac{1}{2}$	15	12 35
9, R. 5, Aroostook	10	100	70 00
Elliottsville, Piscataquis, Old Mill		400	36 95
East Moxie, Somerset	1 $\frac{1}{2}$	5	48 26
Twp. 24, M. D., Washington	1 $\frac{1}{2}$		25 40
2, R. 13, Piscataquis	2		633 70
Pittston Town, Somerset	2		170 47

Location.	Area Burned.	Damage.	Cost of Fighting.
Twp. 7, Hancock	15	75	20 05
Alder Stream, Somerset			21 44
10 and 11, R. 7, Aroostook		225	57 95
Taunton and Raynham	1		10 80
	8,928	\$26,326	\$9,935 79

The area of the Maine Forestry District is about 9,467,773 acres and area of forests outside the district is about 4,824,125 acres. Outside the district incomplete returns give an estimated area burned of 20,857 acres and loss of \$148,265. These figures show a comparison of the efficiency of the two systems.

IMPROVEMENTS.

Fifteen new stations were established as shown on list of lookout stations operated during the season.

Other improvements made as mentioned in reports of chief wardens were as follows:

Chief Warden A. K. Ames, Machias—During the season a watch tower has been constructed on Tug Mt., which covers the heart of the Machias river; about three miles of telephone line has been constructed from the Bacon place to this tower.

Chief Warden Frank N. McElroy Patten—Three tool boxes built and a good lot of tools furnished.

Chief Warden Forrest H. Colby, Bingham—The telephone lines have been greatly improved and in many instances reconstructed. There has been a new camp built on Attean Mt., new tool boxes placed in several sections, and all the old boxes properly filled with tools.

Chief Warden George G. Nichols, Jackman—A new telephone line installed from Heald pond to the County road, a distance of about three miles, and one new box at Boundary Bald Mt. Lookout station. A new lookout station was built on Attean Mt. and one and one-fourth miles of telephone to connect same, a new box for same; and five new tool boxes distributed as follows: Two at Soldiertown, one at Brassua, one at Churchill, one at Spencer; also a canoe has been added to the service.

Chief Warden Geo. E. Hathaway, Jacksonville—A lookout station built at Cooper and one-half mile telephone to connect it with New England Telephone Company. A good trail has been cleared along the line; new and sufficient tools have been added.

Chief Warden L. P. Barney, Skinner—New line of telephone from Hollingsworth & Whitney Company's camps on Twp. 6, R. 7, to top of Tumbledown Mt.

Chief Warden A. B. Haynes, Norcross—Thirty miles of telephone built; 12 new telephone boxes; three lookout stations built, Doubletop, Katahdin, and Joe Mary.

Chief Warden George G. Hathorne, Chesuncook—A telephone line from Grant Farm to the top of Spencer Mt., a distance of seven and one-half miles; and some tools added.

Chief Warden Guy Ordway, Patten—Supplies of tools and equipment added helped as much as anything to keep fires out of this section; Matagamon Mt. station built; a good camp at the foot of the mountain and a new telephone line to Trout Brook Farm.

Chief Warden T. O. Hill, Topsfield—A new lookout station built in Alexander and one on Bailey Mt. There has been five miles of telephone built to connect the last named station. These stations have been properly equipped with glasses, maps and all necessary implements for the use of watchmen.

Chief Warden S. F. Peaslee, Upton—Telephone extension at Kennebago station; telephone line and equipment for lookout station at Saddleback Mt. in Franklin county; fire tools sent for Twp. Letter D. etc.

Chief Warden Albert F. Webster, Bingham—There has been quite a lot of tools added in my territory and we are well supplied.

Chief Warden Geo. W. Coffin, Lee—A new lookout station with telephone installed, has been built on Cobb hill.

Chief Warden J. L. Chapman, Milo—A station built upon Boarstone Mt., Elliottsville; about two miles of wire was used upon this line constructing a metallic circuit or using a two-wire line. We built a small camp on top of mountain.

Chief Warden H. B. Buck, Bangor—Soper Mt. repaired; a new camp built at Depot Mt. A fire warden's camp at Castonia

Settlement 16 R. 12. A new telephone line from St. Francis to the mouth of the Little Black river, 16, R. 11; repaired telephone line in Eagle Lake section.

These different reports show about 77 miles of telephone lines constructed during the season. All lookout stations erected were equipped with maps, glasses, alidade, compasses, etc.

RAILROAD PATROL.

Chief wardens were appointed for the territory along the right of way of the railroads. These men were paid by the department and the State was reimbursed by the roads. Under the direction of these chief wardens, patrols, fire trains, etc., were maintained and expense paid by the railroads.

Expenditures for the year were as follows:

Chief wardens.....	\$8,460 24
Deputy wardens	873 95
*Expense extinguishing fires.....	32,452 62
**Lookout stations	8,673 94
Patrolling	22,733 70
Tools and supplies.....	2,604 08
Other expenses	1,989 78
	<hr/>
	\$77,788 31
Expenditures on the different watersheds for the year 1913:	
St. John river	\$15,130 41
Penobscot river	26,944 27
Kennebec river	11,916 59
Androscoggin river	3,004 94
St. Croix, Union river, Machias river, Narragagus river	6,058 52
	<hr/>
	†63,054 73

*Includes 1911 bills, \$22,846.22.

**Does not include federal appropriation \$8,113.67.

†This total includes \$8,113.67 federal appropriation, which was confined to the salaries of lookout watchmen on the coöperative watersheds, but does not include \$22,846.22, bills of 1911 which were paid during the year.

Forest Fires 1913 on Unincorporated Townships.

AROOSTOOK COUNTY.

TOWNSHIP.	Date.	Acres.	CAUSE.	Damage.
Glenwood Pl.	May 2	10	Unknown	\$1
Twp. B. R. 2	May 9	25	Clearing land	5
Twp. 16, R. 4	May 16	25	Burning grass	25
Twp. 16 R, 11	June 3	1	Clearing land	5
Twp. 4 R. 3	June 9	40	Fishermen	10
Twp. 8 R. 4	June 11	600	Engine	4,000
Westmanland	June 11	1	Old choppings	5
Twp. D. R. 2	June 13	1	Fishermen	50
Twp. 2 R. 4	June 14	2,500	Cigarettes	10,000
Twp. B. R. 2	June 14	125	Unknown	300
Twp. 2 R. 5	June 24	2	Unknown	10
Twp. 9, R. 5	June 28	10	Camp fire	100
Twps. 10 & 11, R. 7	June 28	1	Fishermen	225
Twp. 15, R 4	Aug. 27	1	Unknown	15
		3,341		\$14,746

FRANKLIN COUNTY.

Letter D.	May 15	50	Careless Smoker	10
Twp. 3 R. 1	June 10	700	Engine	1,000
Twp. 3 R. 1	June 22	2	Lunch fire	10
Twp. 3 R. 1	June 22	3	Unknown	
Twp. 3 R. 1	June 23	1	Engine	
		756		1,020

HANCOCK COUNTY.

Twp. No. 7	April 26	2	Engine	25
Twp. No. 10	May 3	50	Blueberry pickers	
Twp. No. 32	May 4	100	Unknown	200
Twp. No. 10	May 4	25	Unknown	100
Twp. No. 7	May 15	300	Engine	
Twp. No. 33	May 17	200	Unknown	100
Twp. No. 21	May 26	118	Unknown	
Twp. No. 7	June 15	15	Engine	75
Twp. No. 7	June 15	20	Engine	
Twp. No. 7	June 15	10	Engine	25
Twp. No. 7	June 18	1	Fire of bark crew	
Twp. No. 33	Aug. 17	50	Unknown	50
Twp. No. 40	Aug. 28	2	Lightning	10
Twp. No. 10	Sept. 16	2	Unknown	15
		895		660

OXFORD COUNTY.

Twp. 5 R. 4 W. B. K. P.	June 13	1	Unknown	
Twp. 4 R. 3	June 19	2	Camp fire	
Lincoln Pl.	June 22	3	Gum pickers	100
		6		100

PENOBSCOT COUNTY.

TOWNSHIP.	Date.	Acres.	CAUSE.	Damage.
Seboeis	April 11	4	Engine	
Indian Twp. No. 3	June 12	300	Burning brush	2,000
Long A.	June 14	15	Engine	10
Twp. A. R. 7	June 22	4	R. R. burning ties	
Twp. A. R. 7	June 22		Unknown	
Twp. A. R. 7	June 27	3	Engine	
Indian Twp. No. 3	June 27	10	Unknown	
Indian Twp. No. 3	June 28	100	Unknown	
Twp. 7 R. 7	July 7	1	River Drivers	
Seboeis	Aug. 18	10	Matches	
		447		2,010

PISCATAQUIS COUNTY.

Big Squaw Mt. Twp	May 15	1	Engine	1
Kingsbury	June 19	5	Unknown	3,500
Twp. 2, R. 10	June 22	100	River Driver	200
Twp. 4, R. 9	June 22	1,500	Unknown	1,000
Twp. 4, R. 9	June 22	600	Unknown	500
Twp. 4 R. 9	June 28	35	Unknown	100
Twp. 4 R. 9 N. W. P.	June 28	50	Engine	100
Twp. 4 R. 8 N. W. P.	June 28	1	Engine	
Twp. B. R. 11	Aug. 18	15	Lunch fire	
Twp. 2 R. 13	Aug. 19	2	Fishermen	
Elliottsville	Sept. 1		Cigarette	400
		2,309		5,801

SOMERSET COUNTY.

Twp. 5, R. 6	May 5	4	Camp fire	25
Holeb	May 9	2	Engine	
Dennistown	June 8	1	River Drivers	
Pittston	June 23	3	Wood tramps	20
Alder Stream	June 19		Not mentioned	
Bald Mt. Town	June 23	2	Unknown	
Cold Stream	June 25	6	Unknown	50
Mayfield	June 28	1,200	Unknown	3,000
Taunton and Raynham	Sept. 9	1	Careless smoker	
East Moxie	Sept. 10		Fishermen	5
		1,219		3,100

WASHINGTON COUNTY.

Twp. No. 42 and 43	June 15		Lightning	
Twp. No. 24	June 18		Blueberry pickers	
Twp. No. 27	June 16	2	Unknown	50
Twp. 1 R. 1	June 22	200	Unknown	
Twp. No. 24	June 28	2	Set by unknown person	
Indian Twp	June 29	100	Set by unknown person	800
Kossuth	Aug. 19	50	Camp fire	250
		354		1,100

Unincorporated Townships

SUMMARY OF 1913 FIRES.

County.	Acreage.	Damage.
Aroostook.....	3,341.....	14,746
Franklin.....	756.....	1,020
Hancock.....	895.....	600
Oxford.....	6.....	100
Penobscot.....	447.....	2,010
Piscataquis.....	2,309.....	5,801
Somerset.....	1,219.....	3,100
Washington.....	354.....	1,100
	9,327	\$28,477

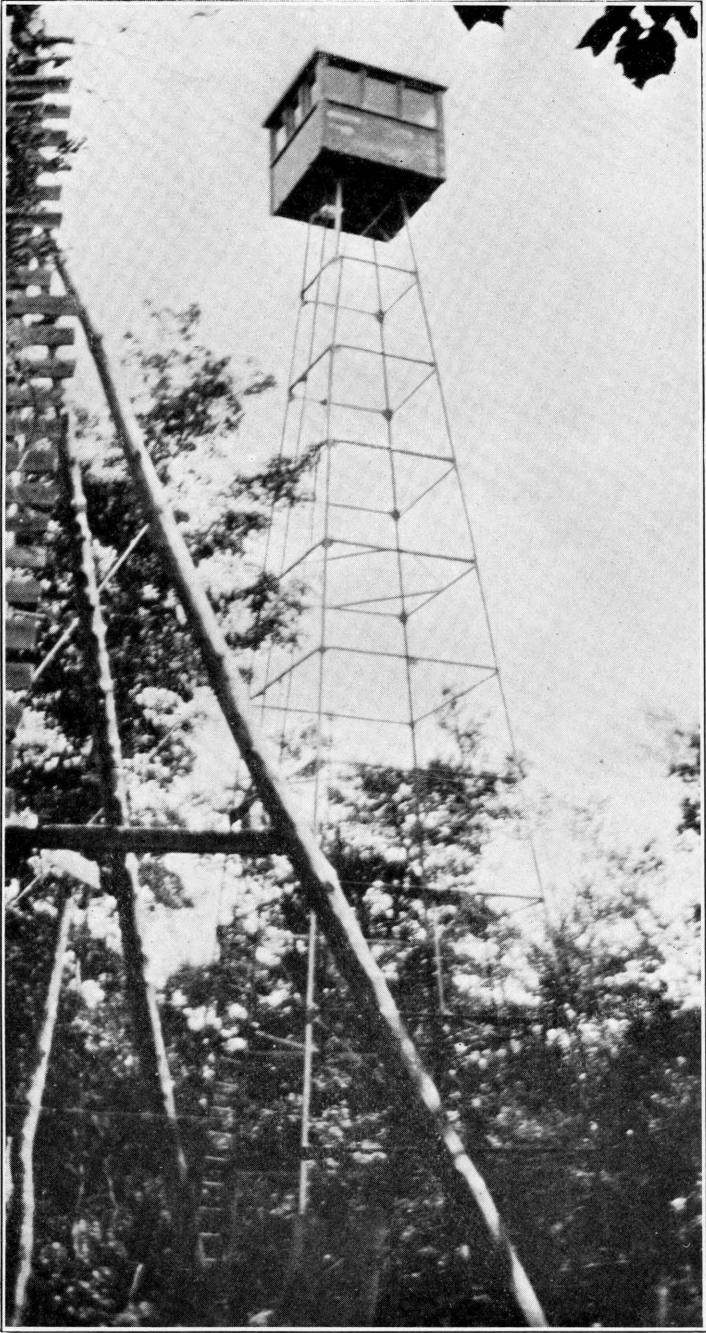
Forest Fires 1913 on Incorporated Towns

ANDROSCOGGIN COUNTY.

TOWNSHIP.	Date.	Acres.	Cause.	Damage.
Greene.....	May 3.....	50	Unknown.....	100
Greene.....	Aug. 9.....	15	Set by owner.....	75
Greene.....	Aug. 21.....	75	Unknown.....	200
		140		375

CUMBERLAND COUNTY.

Pownal.....	April 22.....	10	Rubbish fire.....	50
Brunswick.....	April 25.....	15	Locomotives.....	200
Brunswick.....	April 26.....	15	Brush fire.....	
Brunswick.....	April 26.....	10	Brush fire.....	
Brunswick.....	April 26.....	3	Locomotive.....	
Standish.....	April 26.....	75	Locomotive.....	
Brunswick.....	April 27.....	5	Mayflower pickers.....	
No. Yarmouth.....	May 1.....	5	Not mentioned.....	40
Pownal.....	May 1.....	25	Brush fire.....	100
Brunswick.....	May 4.....	12	Unknown.....	
Windham.....	May 4.....	20	Cigar stub.....	100
Brunswick.....	May 8.....	35	Burning grass.....	
Standish.....	May 11.....	400	Fishermen.....	3,000
Brunswick.....	May 15.....	35	Burning building.....	
Standish.....	May 20.....	300	Locomotive.....	
Windham.....	June 2.....	30	Brush fire.....	150
Standish.....	June 13.....	50	Locomotive.....	
Casco.....	June 14.....	12	Sparks from boat.....	100
Brunswick.....	June 15.....	10	Unknown.....	
Gray.....	June 15.....	15	Unknown.....	150
Standish.....	June 23.....	450	Locomotive.....	10,000
Scarboro.....	July 4.....	1,000	Unknown.....	12,000
Scarboro.....	July 19.....	1,800	Unknown.....	10,000
Gray.....	July 25.....	8	Unknown.....	25
Standish.....	July 28.....	200	Unknown.....	1,000
Brunswick.....	Aug. 16.....	100	Berry Pickers.....	
Brunswick.....	Aug. 16.....	200	Berry Pickers.....	



Steel Tower, Depot Mountain, Twp. 14, R. 16, W. E. L. S.

CUMBERLAND COUNTY—CONCLUDED.

TOWNSHIP.	Date.	Acres.	CAUSE.	Damage.
Standish	Aug. 16	200	Locomotive	4,000
Standish	Aug. 16	80	Locomotive	1,600
Scarborough	Aug. 16	40	Unknown	3,000
Scarborough	Aug. 18	75	Unknown	300
Westbrook	Aug. 18	8	Burning brush	100
Westbrook	Aug. 19	25	Unknown	
Standish	Aug. 19	600	Locomotive	12,000
Standish	Aug. 21	5	Burning building	
Freeport	Aug. 21	9	Locomotive	150
Standish	Aug. 22	50	Locomotive	2,500
		5,932		60,565

FRANKLIN COUNTY.

Kingfield	April 25	10	Unknown	50
Chesterville	April 28	10	Brush fire	
Chesterville	June 6	200	Unknown	
Chesterville	July 25	10	Saw dust pile	
Chesterville	June 28	3	Unknown	200
		233		250

HANCOCK COUNTY.

Eastbrooke	May 18	40	Unknown	80
Brookbrooke	June 12	125	Clearing land	200
Orland	Aug. 20	40	Not mentioned	
		205		280

KENNEBEC COUNTY.

Monmouth	April 4	10	Unknown	200
Monmouth	April 26	8	Burning brush	
Manchester	Aug. 3	7	Berry pickers	
Vassalboro	Aug. 9	5	Berry pickers	
Pittston	Aug. 16	30	Unknown	100
Winslow	Aug. 21	600	Unknown	5,000
		660		5,300

KNOX COUNTY.

So. Thomaston	April 10	75	Unknown	1,000
Warren	April 28	500	Unknown	
So. Thomaston	May 15	5	Sparks from saw mill	125
Friendship	June 14	50	Burning brush	150
Vinalhaven	Aug. 18	300	Unknown	1,000
		930		2,275

LINCOLN COUNTY.

Boothbay	May 14	10	Burning brush	15
Whitefield	May 19	200	Set by boy	300
Jefferson	Aug. 3	10	Unknown	
		220		315

OXFORD COUNTY.

TOWNSHIP.	Date.	Acres.	CAUSE.	Damage.
Brownfield	May 2	40	Locomotive	200
Madrid	May 15	50	Locomotive	800
Norway	May 17	3	Unknown	75
Brownfield	May 20	30	Locomotive	200
Brownfield	June 3	6	Locomotive	50
Hiram	July 30	4	Locomotive	300
Hiram	Aug. 20	800	Not mentioned	700
Byron	Aug. 21	100	Camp fire	500
Brownfield	Aug. 24	143	Burning brush	600
		1,176		3,425

PENOBSCOT COUNTY.

Veazie	May 3	15	Mayflower pickers	100
Eddington	May 4	20	Unknown	10
Passadumkeag	May 20	2	Locomotive	500
Millinocket	June 10	50	Clearing land	5
Drew	June . 19	2	Locomotive	100
Bangor	June 28	4	Brush fire	40
Greenbush	June 28	10	Locomotive	50
Millinocket	June 28	300	Unknown	
		403		805

PISCATAQUIS COUNTY.

Brownville	June 18	3	Unknown	10
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SAGADAHOC COUNTY.

Phippsburg	May 13	600	Unknown	9,000
Phippsburg	May 15	700	Unknown	4,800
West Bath	May 21	300	Unknown	2,500
Phippsburg	July 13	600	Unknown	2,000
Phippsburg	Aug. 1	100	Unknown	
Phippsburg	Aug. 12	700	Unknown	
Phippsburg	Aug. 17	600	Unknown	
		3,600		18,300

SOMERSET COUNTY.

Concord	June 22	100	Unknown	1,000
Mercer	Aug. 20	2	Unknown	
		102		1,000

WALDO COUNTY.

Brooks	April 24	15	Locomotive	
Swanville	May 9	25	Unknown	15
		40		15

WASHINGTON COUNTY.

TOWNSHIP.	Date.	Acres.	CAUSE.	Damage.
Cherryfield.....	April 22.	1C	Set by owner.	50
Marshfield.....	April 26.	640	Rubbish fire.	500
Charlotte.....	April 30.	160	Burning for blueberries.	500
Marshfield.....	May 6.	5	Burning for blueberries.	75
Marshfield.....	May 3.	40	Burning for blueberries.	75
Pembroke.....	June 14.	10	Unknown.	75
Dennysville.....	June 22.	3	Locomotive.	50
Perry.....	Aug. 15.	25	Unknown. . . . .	.....
		893		1,250

YORK COUNTY.

TOWNSHIP.	Date.	Acres.	CAUSE.	Damage.
Wells.....	May 1.	100	Locomotive.	500
Shapleigh.....	May 3.	2,000	Unknown.	5,000
Berwick.....	May 12.	40	Unknown.	400
Berwick.....	May 10&11.	80	Locomotive.	150
Kittery.....	May 19.	75	Locomotive.	1,275
Kittery.....	May 19.	70	Locomotive.	3,000
Wells.....	May 20.	300	Portable saw mill.	6,000
Parsonsfield.....	May 25.	40	Unknown.	700
Lebanon.....	June 5.	20	Burning House. . . . .	.....
Lebanon.....	June 17.	2	Unknown. . . . .	.....
Waterboro.....	June 23.	3	Matches.	25
York.....	June 26.	100	Unknown. . . . .	.....
Shapleigh.....	June 28.	75	Saw dust pile.	300
Shapleigh.....	June 29.	10	Unknown. . . . .	.....
York.....	July 1.	2,000	Fishermen.	25,000
Kittery.....	July 3.	60	Cigarette.	350
Shapleigh.....	July 4.	40	Unknown.	100
Eliot.....	July 7.	40	Unknown.	1,200
Saco.....	July 14.	10	Unknown.	200
Saco.....	Aug. 3.	5	Unknown. . . . .	.....
Acton.....	July 24.	1,280	Set accidentally.	10,000
		6,350		54,200

Incorporated Towns

SUMMARY FOREST FIRES 1913.

County.	Acreage.	Damage.
Androscoggin.....	140	\$375
Cumberland.....	5,932	60,565
Franklin.....	233	250
Hancock.....	205	280
Kennebec.....	660	5,300
Knox.....	930	2,275
Lincoln.....	220	315
Oxford.....	1,176	3,425
Penobscot.....	403	805
Piscataquis.....	3	10
Sagadahoc.....	3,600	18,300
Somerset.....	102	1,000
Waldo.....	40	15
Washington.....	893	1,250
York.....	6,350	54,200
	20,887	\$148,365

FEDERAL COOPERATION.

Maine, together with other States having approved forest protective systems, receives aid from the Federal Government under the terms of an Act of Congress, known as the Weeks Law, for the protection from fire of the forested watersheds of navigable streams.

The coöperative area approved by the Secretary of Agriculture includes that part of the forested watersheds of the Androscoggin, Kennebec, Penobscot, St. Croix, Union, Machias and Narraguagus Rivers which are included in the Maine Forestry District.

As the State has as yet provided no direct fund for forest fire protection for the forests outside the Maine Forestry District it has been impossible to obtain federal aid for this area.

The text of the agreement between the State and Federal Government is as follows:

AGREEMENT

FOR THE PROTECTION FROM FIRE OF THE FORESTED WATERSHEDS
OF NAVIGABLE STREAMS.

Under Section 2, Act of March 1, 1911, (36 Stat., 691).

This agreement, made by and between the Secretary of Agriculture of the United States, under authority of section 2 of the act of Congress approved March 1, 1911 (36 Stat., 691), and the State of Maine by and through its State Land Agent and Forest Commissioner, witnesseth:

That Whereas the said State has requested the coöperation of the said Secretary in the protection from fire of the forested watersheds of navigable streams; and

Whereas the said State has provided by law for a system of forest-fire protection ;

Now Therefore, the said parties do mutually promise and agree with each other as follows :

1. To establish and maintain a coöperative fire-protective system covering any or all private or State forest lands within the State of Maine and situated upon the watersheds of navigable rivers ; and to furnish for this purpose Federal and State patrolment or to take such other protective measures as may be deemed advisable, under the conditions hereinafter provided.

2. The State land agent shall furnish maps showing the watersheds and areas which are proposed to be protected under this agreement. The coöperation shall be limited to such watersheds and areas in so far as they shall be approved by the said Secretary. The said land agent shall indicate the periods during which protection from forest fires is proposed under this agreement ; the number of patrolmen, with their stations, which will be employed by the State ; the character and extent of other protective measures which it is proposed to put into effect at the expense of the State ; and the localities in which it is desired to place Federal patrolmen furnished by the Forest Service.

3. The State land agent shall be appointed collaborator in the Forest Service of the United States Department of Agriculture at a salary of one dollar (\$1) a month, and acting in such capacity shall have direct charge of the force of Federal patrolmen employed under this agreement. The said land agent shall select the Federal patrolmen, subject to approval by the said Secretary, instruct them *in writing* as to their duties, supervise their work, and certify to their services on pay rolls of the Forest Service.

4. The Federal patrolmen so selected shall be appointed as temporary laborers in the Forest Service at a per diem rate not exceeding two and one-half dollars (\$2.50) ; provided that they shall be employed exclusively in the protection of areas on the watersheds of navigable rivers which shall have been approved by the said Secretary.

5 This agreement contemplates the employment in the territory within the Maine Forestry District of not to exceed *twenty-four (24)* Federal patrolmen under ordinary conditions

of fire hazard, or in the discretion of the collaborator of not to exceed *twenty-nine (29)* Federal patrolmen in case of emergency; and in the territory outside of said fire district of not to exceed *six (6)* Federal patrolmen under ordinary conditions of fire hazard, or in the discretion of the collaborator not to exceed *eleven (11)* Federal patrolmen in case of emergency; provided that in case of serious emergency the maximum number in each territory may be increased with the approval of the Forester.

6. The State land agent shall secure for the Federal patrolmen furnished under this agreement, by appointment as deputy State fire wardens or otherwise, without additional compensation, such police powers for the prevention and control of forest fires as may be granted under the laws of the State of Maine, and shall equip such Federal patrolmen with such fire-fighting tools or devices and shall authorize them to employ such assistance in fighting fires as its funds and the State fire laws and regulations will permit.

7. The total sum to be expended by the Federal Government during any calendar year for the purposes of this agreement may equal but shall not exceed *Ten Thousand Dollars (\$10,000)*, but in no case shall the amount expended by the Federal Government in any Federal fiscal year exceed the amount appropriated by the said State for and expended by it during the same period for the purpose of protecting from fire forested watersheds of navigable streams in said State; *provided, however*, that not to exceed *Eight Thousand Dollars (\$8,000)* of said sum shall be expended for protection of lands which are within the Maine Forestry District, and that not to exceed *Two Thousand Dollars (\$2,000)* of said sum shall be expended for the protection of lands which are outside of said fire district.

This agreement contemplates an expenditure of State funds of at least *Forty Thousand Dollars (\$40,000)* for the protection of lands which are *within* the said fire district and are situated on the watersheds approved by the said Secretary in accordance with Section 2 of this agreement; and in the event of the said expenditure falling below said amount the Federal expenditure will be decreased proportionately.

8. Payment for the services of Federal patrolmen employed under this agreement shall be made at the end of each calendar

or fractional month on vouchers certified by the said land agent as collaborator, and forwarded to the Forester, Forest Service, Washington, D. C., provided that no patrolman will be employed except during the real danger season from forest fires on the watersheds and areas approved by the said Secretary under this agreement.

9. The said Secretary and his authorized representative shall have full authority to inspect the protective areas and the force herein authorized, and at his option, by giving the said land agent written notice, may withdraw his approval of any such area or portion thereof, or terminate the employment of any Federal patrolman or patrolmen or of the said land agent as collaborator in the Forest Service.

10. The said land agent shall be responsible for seeing that each patrolman keeps a vigilant lookout for forest fires in or threatening his district, and that he makes every possible effort to extinguish such fires as occur whether they are on lands belonging to the State, the Federal Government, or a private owner, provided that during the patrol period when in the judgment of the State land agent patrol is unnecessary the patrolmen may be used on other fire-protection work. The said land agent or his representative shall from time to time make such personal inspection of coöperative fire protection work done under this agreement as may be necessary to promote the effectiveness of said work.

11. The said land agent shall, with respect to all private forest land afforded protection against fire under this agreement, use every proper means to bring about the active coöperation of the owner in such protection, including aid from him in the form of hire of one or more patrolmen, construction of permanent improvements, and the like.

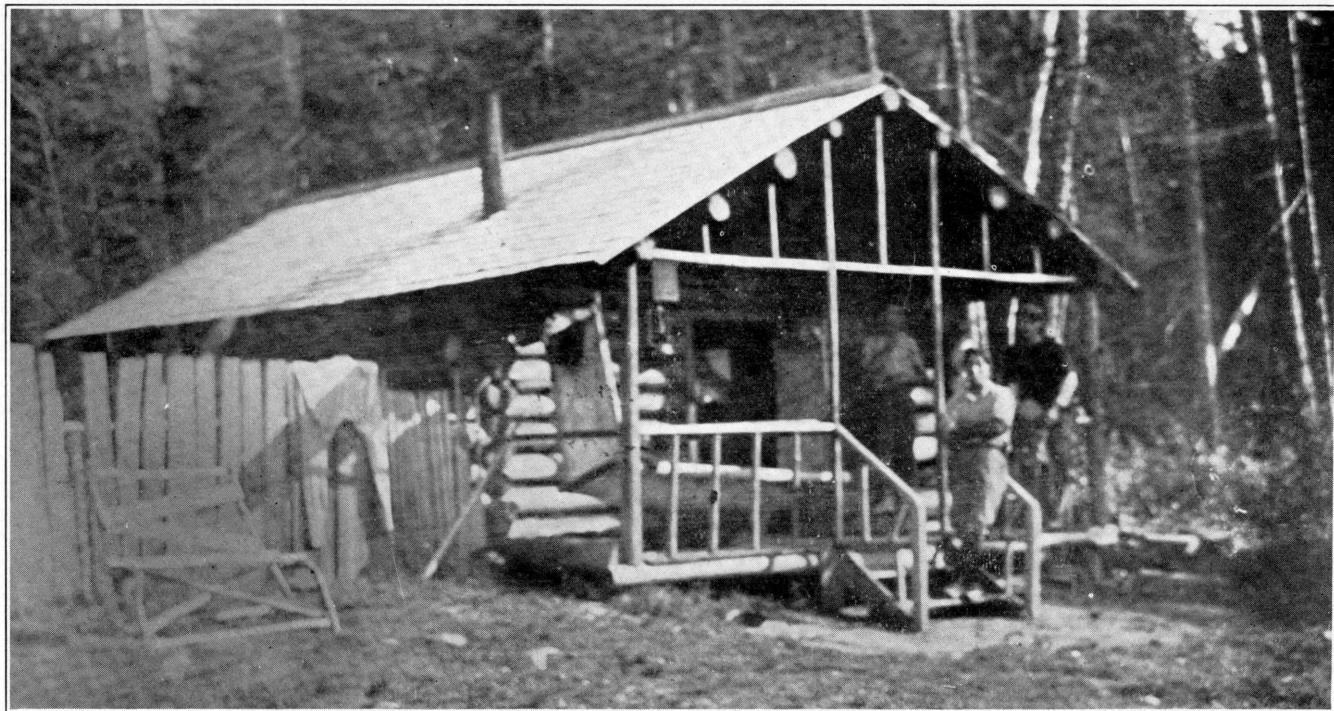
12. Both the State land agent and the Forest Service of the United States Department of Agriculture shall have equal right to publish the results of the coöperation under this agreement: *Provided*, That any results intended for publication, except press notices of momentary or local interest, be approved by the said land agent and by the said Secretary. In all such publications it shall be plainly stated that the results were secured through coöperation between the said land agent and the said Secretary.

13. This agreement shall become effective on the first day of January, 1913, and shall continue in force thereafter, subject, nevertheless, to the availability of funds appropriated by Congress by the Act of March 1, 1911, and to any amendments thereto or extension thereof, for the purposes herein mentioned, and to any amendments which may be made hereof by mutual agreement of the parties; and it is expressly understood that this agreement or any modification hereof may be terminated by either party upon thirty (30) days' written notice to the other.

The following extracts are taken from the report made to the federal government at the close of the season of 1913 of protection on the coöperative area:

Number and Causes of Fires. Two hundred and ninety-five fires were reported by lookout watchmen and fifty-two by patrolmen on coöperative territory in the Maine Forestry District. About nine thousand six hundred acres were burned over with an estimated damage of twenty-five thousand one hundred and two dollars. The cost of fighting fire was nine thousand five hundred sixty-four dollars; also 1911 bills for fighting fire amounting to twenty thousand three hundred sixty-nine and 92-100 dollars were paid. Of the total of three hundred and forty-seven fires reported, it was necessary to hire extra help on fifty; the balance were extinguished by our regular force or by other means. The causes of the fires where extra help was needed are as follows: unknown, 19; clearing land, 1; fishermen, 3; cigarettes, 2; careless smoker, 1; engine, 7; lunch fire, 2; blueberry pickers, 2; lightning, 2; camp fires, 3; origin uncertain, 1; burning ties, 1; river drivers, 2; gum pickers, 1; matches, 1; set intentionally, 2. Fortunately the larger fires were confined to land recently burned over.

Patrol or Lookout Work. The number of Federal Patrolmen employed was twenty-eight. The State employed one hundred forty-three men for patrol work. A few additional patrolmen were employed by private owners but the number of these were very small. A few were employed jointly by the State and private owners, the expense being divided. When the weather conditions would permit, employees were engaged in the construction of telephone lines, lookout stations, trails, camps, etc. The Maine Forestry District has an area of about nine and a



Watchman's Camp, Depot Mountain.

half million acres; the area of ten thousand two hundred forty-eight acres burned during the season speaks for the efficiency of the protective system.

Protective Improvements. Fifteen new lookout stations were established, and about seventy-seven miles of telephone line constructed in 1913. Camps were built at nearly all of the new stations and towers where necessary.

Two thousand six hundred forty-three dollars and forty-nine cents was expended for fire fighting tools and supplies. These tools are placed in covered boxes in convenient locations. A considerable amount of work was done on trails and new trails were built to the stations constructed. The total cost of protective improvements not itemized was four thousand two hundred forty-three and 79-100 dollars. This amount included lookout stations, telephone lines, camps, etc. Private owners were not called on to aid the department during the season. Owners of timberland in the Forestry District pay a special tax of one and one-half mills for fire protection. The railroads contributed six hundred ten and 77-100 dollars for salaries of chief wardens along the right of way. The railroads also maintained patrols, fire trains, etc., under direction of these chief wardens and cost of such work was paid by the railroads direct to the force employed.

Summary of Cost of Federal and State Work. Federal Aid was confined to the salaries of lookout watchmen on coöperative watersheds and the sum of eight thousand one hundred thirteen and 67-100 dollars was thus expended.

On this same territory the State expended the sum of sixty-seven thousand three hundred thirty-two and 40-100 dollars, including bills for fighting fire in 1911, as follows:

Lookout watchmen	\$3,409 66
Fire Wardens, rangers, etc.....	24,667 09
Fire fighting	29,933 92
Construction work	4,243 79
Administration charges	1,665 65
Miscellaneous charges	3,412 29
	<hr/>
	\$67,332 40

MAINE FORESTRY DISTRICT

1914

FINANCIAL CONDITION TO NOVEMBER 1, 1914.

CR.		
Balance Jan. 1, 1914.....	\$8,129	09
Assessment for the year.....	71,166	31
Reimbursement from R. R., etc.....	800	11
From Treasury under Sec. 6, Chapter 85, Laws of 1913.....	10,000	00
	\$90,095	51
DR.		
Abatements for 1913-14.....	\$1,009	94
Expended to Nov. 1.....	84,560	37
	85,570	31
Balance Nov. 1st.....		\$4,525 20

FIRE SEASON OF 1914.

The season of 1914 was very dry. There was very little rainfall from early spring until the last of October. There were no general continued rains over the State during this period. Full force was placed on duty the last week in April and continued until the twenty-second day of October.

Lookout Stations Operated.	Fires reported by same.
No. 1. Lead Mt. Twp. 28, Hancock County.....	26
No. 2. Pleasant Pond Mt., Caratunk Pl.....	9
No. 3. Attean Mt., Attean Twp., Somerset County.....	4
No. 4. Tumbledown Mt., Twp. 5, R. 6, W. K. R.....	6
No. 5. Squaw Mt. Twp. 2, R. 6, B. W. P., Piscataquis County	22

No. 6.	Snow Mt. Twp. 2, R. 5, Franklin County.....	3
No. 7.	Mt. Bigelow, Bigelow Twp., Somerset County..	10
No. 8.	White Cap Mt., 7, R. 10, N. E., East Bowdoin College Twp.	18
No. 9.	Spencer Mt. Middlesex Grant, Piscataquis County	18
No. 10.	Rocky Mt. So. part Twp. 18, R. 13, W. E. L. S...	2
No. 11.	Trout Brook Mt., Twp. 5, R. 10, Piscataquis County	10
No. 12.	Otter Lake Mt., Twp. 3, R. 4, W. E. L. S.....	6
No. 13.	Mt. Chase, Twp. 5, R. 6, W. E. L. S.....	9
No. 14.	Ragged Mt., Twp. A, R. 9, W. E. L. S.....	43
No. 15.	Mt. Kineo, Moosehead Lake.....	9
No. 16.	Mt. Coburn, Twp. 3, R. 6, B. K. P. W. K. R....	11
No. 17.	Wesley Mt., Wesley, Washington County.....	19
No. 18.	Depot Mt., Twp. 14, R. 16, W. E. L. S.....	
No. 19.	Soper Mt., Twp. 8, R. 2, W. E. L. S.....	
No. 20.	Round Mt. Twp. 11, R. 8, W. E. L. S.....	
No. 21.	Aziscoos Mt., Lincoln Pl., Oxford County.....	10
No. 22.	Mt. Katahdin Twp. 3, R. 9, W. E. L. S.....	3
No. 23.	Bald Mt., Twp. 2, R. 3, E. K. R.....	19
No. 24.	Kibbie Mt., Twp. 1, R. 6, W. B. K. P.....	4
No. 25.	Priestly Mt., Twp. 10, R. 13, W. E. L. S.....	7
No. 26.	Boundary Bald Mt., Twp. 4, R. 3, N. B. K. P..	9
No. 27.	Williams Mt., Twp. 2, R. 7, B. K. P., W. K. R.	15
No. 28.	West Kennebago Mt., Twp. 4, R. 4, W. B. K. P.	10
No. 29.	No. 4 Mt., A, R. 14, W. E. L. S., Piscataquis County	7
No. 30.	Cobb Mt., Lee, Penobscot County.....	
No. 31.	Taylor Hill, Princeton, Washington County....	4
No. 32.	Tug Mt., Twp. XXX, M. D.....	1
No. 33.	Beetle Mt., Twp. 7, R. 10, W. E. L. S.....	7
No. 34.	Mattagamon Mt., T. 6, R. 8, W. E. L. S.....	9
No. 35.	Boarstone Mt., Twp. 8, R. 9, N. W. P., Elliotts- ville	13
No. 36.	Joe Mary Mt., A, R. 10, W. E. L. S.....	6
No. 37.	Cooper Mt., Cooper, Washington County.....	23
No. 38.	Musquash Mt., Topsfield, Washington County..	12
No. 39.	Green Mt., Twp. 4, R. 18, W. E. L. S.....	17
No. 40.	Mucelsea Mt., Twp. 5, R. 16, W. E. L. S.....	36
No. 41.	Saddleback Mt., Twp. 2, R. 1, Franklin County	30

No. 42.	Double Top Mt., Twp. 4, R. 10, W. E. L. S.....	6
No. 43.	*Nulhedus Mt., Twp. 5, R. 17, W. E. L. S.....	23
No. 44.	*Lawler Hill, Benedicta, Aroostook County.....	8
No. 45.	*Norway Bluff, Twp. 9, R. 9, W. E. L. S.....	4
No. 46.	*No. 9 Mt., Twp. 9, R. 3, W. E. L. S.....	
No. 47.	*Hedgehog Mt., Twp. 14, R. 6, W. E. L. S.....	4
No. 48.	*Three Brooks Mt., Twp. 15, R. 6, W. E. L. S...	
No. 49.	*Speckles Mt., Grafton, Oxford County.....	2
No. 50.	*Sourdnahunk Mt., Twp. 1, R. 11, W. E. L. S....	
No. 51.	*Mattamiscontis Mt., Twp. 3, R. 9, N. W. P.....	41
No. 52.	*Hedgehog Mt., Twp. 11, R. 4, W. E. L. S.....	
No. 53.	*Schoodic Mt., Twp. No. 9, Hancock County....	2
No. 54.	*Hinckley's Bluff, Twp. 9, R. 18, Somerset County	
No. 55.	*Almanac Mt., Lakeville Pl., Penobscot County..	
Total		557

*Stations established in 1914.

PATROLS.

One hundred seventy-five patrolmen were employed during the season, and one hundred seventy-five fires were reported by them. When the weather conditions would permit, these men were employed in the construction of telephone lines, lookout stations, trails, camps, etc. Fires which could not be extinguished by the regular force and on which it was necessary to employ extra help, were as follows:

Location.	Acres Burned.	Damage.	Cost of Fighting.
Twp. No. 6, Washington Co.....	1	\$20	\$13 90
Twp. No. 5, Washington Co.....	10	200	115 27
Pleasant Ridge Pl., Somerset Co.....	200		32 00
Twp. No. 33, Hancock Co.....	100	150	20 85
Edmunds, Washington Co.....	5	30	20 50
Twp. No. 10, Hancock Co.....	10	100	41 45
Twp. No. 24, Washington Co.....	5		36 25
Twp. No. 10, Hancock Co.....	10		13 50
Twp. 15, R. 7, Aroostook Co.....	25	25	6 80
Indian No. 3, Penobscot Co.....	4		41 50
Indian No. 3, Penobscot Co.....	8	500	82 06
Glenwood Pl., Aroostook Co.....	5	50	24 30
Twp. 24, M. D., Washington Co.....	3		150 50
Twp. 24, M. D., Washington Co.....	300		208 85
Twp. 24, M. D., Washington Co.....	200	500	301 92
Molunkus Pl., Aroostook Co.....	6	50	85 00
Little Squaw, Piscataquis Co.....	60	560	294 05
Macwahoc Pl., Aroostook Co.....	1200	1,500	2,629 17
Twp. 4, R. 9, Piscataquis Co.....	2	3	2 50
Twp. No. 7, Hancock Co.....	75	60	67 25
Twp. Letter D, Franklin Co.....	40	500	333 33
Big Squaw, Piscataquis Co.....	3	60	97 60
Hartfords Point, Piscataquis Co.....			7 00
Twp. 23 and 24, Washington Co.....	18	20	36 30
Indian No. 3, Penobscot Co.....	30	100	229 59

Location.	Acres Burned.	Damage.	Cost of Fighting.
Twp. 18 and 19, Washington Co.....	50	100	21 50
Twp. No. 19, Washington Co.....	6	25	9 50
Indian No. 4, Penobscot Co.....	5		24 00
Twp. No. 10, Hancock Co.....	3500	5,000	1,711 48
Lakeview Pl., Piscataquis Co.....	3		9 88
Wesley, Washington Co.....	7	100	6 00
Twp. No. 10, Hancock Co.....	3	25	51 75
Wesley, Washington Co.....	1		3 00
Twp. 15, R. 7, Aroostook Co.....	10	10	4 50
Lakeview Pl., Piscataquis Co.....	200	1,000	70 30
Indian Twp., Washington Co.....	$\frac{1}{2}$		53 38
Twp. No. 8, Hancock Co.....	200	50	31 66
Cooper, Washington Co.....	2	10	31 00
Twp. No. 10, Hancock Co.....	50		28 65
Twp. 15, R. 10, Aroostook Co.....	210	200	34 50
Mayfield, Somerset Co.....	5	10	74 75
Twp. 7, R. 4, Aroostook Co.....	200	800	50 20
Twp. No. 39, Hancock Co.....	50	50	20 10
Twp. 5, R. 4, Oxford Co.....	160	320	522 94
Twp. No. 6, Washington Co.....	$1\frac{1}{2}$	75	34 81
Hinckley Twp., Washington Co.....	$\frac{3}{4}$	20	38 12
Twp. 3, R. 3, Aroostook Co.....	2	20	80 54
Sandy River Pl., Franklin Co.....	50	100	289 65
Dyer, Washington Co.....			20 00
Brookton, Washington Co.....	5	25	42 25
Indian No. 4, Penobscot Co.....	1		16 00
Twp. No. 10, Hancock Co.....	5	5	22 50
Hobbs Town, Somerset Co.....	1	6	10 00
Twp. 8, R. 3, Aroostook Co.....	$\frac{1}{2}$	2	5 00
Little Squaw, Piscataquis Co.....			193 76
Cold Stream, Somerset Co.....	$1\frac{1}{2}$	7 50	95 65
Twp. No. 31, Washington Co.....	$\frac{1}{2}$		2 40
Twp. 15, R. 4, Aroostook Co.....	$\frac{1}{2}$		19 00
Twp. 5, R. 11, Piscataquis Co.....	300	500	598 20
Little Squaw, Piscataquis Co.....	3	25	60 60
Twp. 6, R. 7, B. K. P., Somerset Co.....	1	30	35 30
Twp. 3, R. 5, Aroostook Co.....			6 50
King & Bartlett, Somerset Co.....			22 50
Ten Thousand Acres, Somerset Co.....		2	6 80
Twp. D, R. 2, Aroostook Co.....	10		48 50
Twp. D, R. 2, Aroostook Co.....	5	40	71 50
Twp. 7, R. 8, Penobscot Co.....	$\frac{1}{2}$	20	97 28
Twp. No. 21, Hancock Co.....	1		16 25
Twp. No. 8, Hancock Co.....	2		30 00
Twp. 2, R. 12, Piscataquis Co.....			6 40
Twp. 5, R. 10, Piscataquis Co.....	650	300	608 45

Location.	Acres Burned.	Damage.	Cost of Fighting.
Twp. No. 2, Penobscot Co.....	2	20	69 75
Twp. 5, R. 11, Washington Co.....	$\frac{1}{2}$		6 75
Twp. 4, R. 9, Piscataquis Co.....	10		29 00
Kossuth, Washington Co.....	3	50	138 68
Twp. 12, R. 6, Aroostook Co.....	1	25	11 00
Twp. 5, R. 11, Piscataquis Co.....	50	250	107 00
Twp. 8, R. 10, N. W. P., Piscataquis Co.	1	10	37 70
Kingsbury, Piscataquis Co.....	40	200	78 50
Twp B, R. 2, Aroostook Co.....	3	10	21 25
Twp. 12, R. 17, Aroostook Co.....	4		6 50
Twp. No. 33, Hancock Co.....	50	75	54 65
Twp. 1, R. 9, Piscataquis Co.....	3		48 40
Indian Twp., Washington Co.....	2		54 00
Twp. No. 32, Hancock Co.....	60	175	136 85
Seboomook, Somerset Co.....			8 00
Twp. No. 28, Hancock Co.....	$\frac{1}{2}$	5	35 25
Twp. No. 43, Washington Co.....	$1\frac{1}{2}$		40 50
Twp. No. 27, Washington Co.....	7	200	82 70
Twp. 8, R. 5, Aroostook Co.....	$\frac{1}{2}$	10	18 00
Twp. 15, R. 5, Aroostook Co.....	2	20	48 50
Twp. D, R. 2, Aroostook Co.....	11	25	49 00
Twp. C, R. 2, Aroostook Co.....	$\frac{1}{2}$		6 50
Twp. No. 20, Hancock Co.....	3	100	39 50
Twp. 2, R. 4, Aroostook Co.....	$\frac{1}{2}$		48 80
Twp. Letter D, Franklin Co.....	4	4	64 75
Twp. Letter D, Franklin Co.....	$\frac{1}{2}$	1	11 00
Grand Falls Pl., Penobscot Co.....			3 75
Grand Lake Stream Pl., Washington Co.	$\frac{1}{2}$	25	35 12
Indian No. 4, Penobscot Co.....	$\frac{1}{2}$		7 00
Indian No. 3, Penobscot Co.....	8		36 00
Twp. 1, R. 11, Piscataquis Co.....	25	100	596 66
Twp. 2, R. 4, Aroostook Co.....	3	35	48 97
Holeb, Somerset Co.....			4 00
Kossuth Washington Co.....	1	40	87 19
	8,321+	\$14,685 50	\$12,199 80

IMPROVEMENTS.

Thirteen new stations were established as shown on list of lookout stations operated during the season.

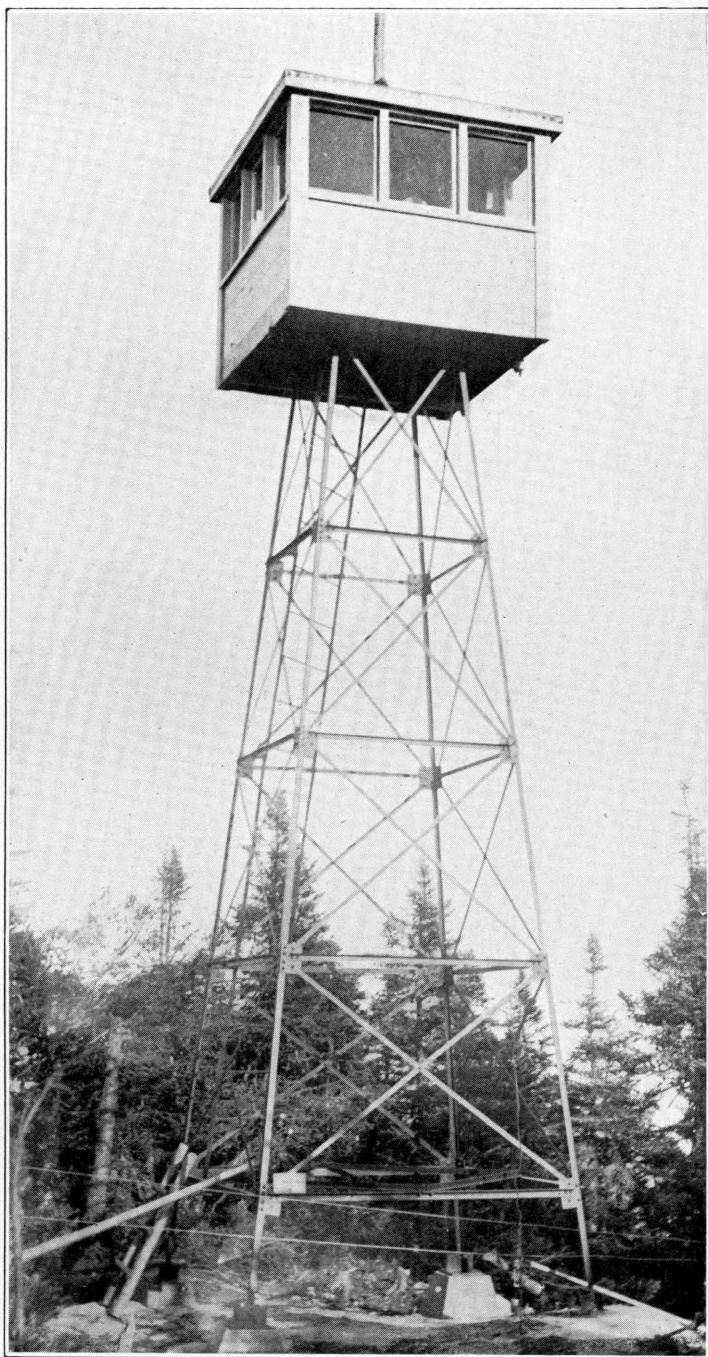
Thirteen steel towers were constructed on the following stations:

Station.	Watershed.	Height in feet.
Lead Mt.	Machias.....	36
Three Brooks Mt.	St. John.....	48
Hedgehog Mt.	St. John.....	24
Norway Bluff	St. John.....	24
Depot Mt.	St. John.....	60
Tumbledown Mt.	Kennebec.....	24
Coburn Mt.	Kennebec.....	24
Snow Mt.	Kennebec.....	24
Williams Mt.	Kennebec.....	48
Kibbie Mt.	Kennebec.....	48
Nulhedus Mt.	Penobscot.....	60
Saddleback Mt.	Androscoggin.....	36
West Kennebago Mt.	Androscoggin.....	24

It was the intention of this department to equip twenty stations with steel towers and arrangements were made accordingly. But as the season was exceptionally dry and expenses were extra heavy, it was thought advisable to postpone the erection of steel towers on the following *seven* stations until the spring of 1915:

Station.	Watershed.	Height in feet.
Beetle Mt.	Penobscot.....	12
Trout Brook Mt.	Penobscot.....	12
Mettagamom Mt.	Penobscot.....	12
Lawler Hill	Penobscot.....	48
Mettamiscontis Mt.	Penobscot.....	48
Ragged Mt.	Penobscot.....	36
Sourdnahunk Mt.	Penobscot.....	48

The steel and the portable houses for the above stations are stored at the foot of each mountain, except the material for Sourdnahunk Mt., which is stored at Norcross.



West Kennebago Mountain, Twp. 4, R. 4, W. B. K. P.

Improvements made as mentioned in reports of Chief Wardens were as follows:

Chief Warden J. B. Bartlett, Ashland:

During the past summer there has been built on Norway Bluff, Township 9, Range 9, a 24 foot steel lookout tower; a camp built on the side of the mountain for the watchman; four miles of telephone wire hung to connect with the Maine Forestry District wire at Munsungan Lake, giving the man on Norway Bluff lookout telephone connection with Oxbow Plantation. There has also been hung on the lower end of the Aroostook River telephone line three miles of wire; connecting with Libby Hotel, at Oxbow Plantation, giving the lookout man on Norway Bluff connection at two places. On Hedgehog Mountain, Township 11, R. 4, a temporary lookout tower of wood has been constructed, connecting the tower by three miles of wire with the line of the New England Telephone Co., on the West Chapman road, and giving thereby the man on the mountain telephone connection with Ashland, Mapleton and Presque Isle.

The temporary wooden lookout tower on Round Mountain, Township 11, Range 8 has been repaired, and the thirty miles of wire leading from this tower to Ashland has been repaired and kept in working order during the summer. The camp has a new cook stove, and is equipped with cooking outfit, dishes and blankets for two persons.

A lookout station was established on No. 9 Mountain, Township 9, Range 3, and two lines of telephone built from there. One leading to Howe Brook about 14 miles, and the other leading to Harvey's Siding about 16 miles.

Chief Warden, Forrest H. Colby, Bingham:

Reporting on the working and improvements of the Forestry Department in the Kennebec watershed the past summer will say that, although the season would have to be considered a very dry one there was only one fire of any extent, that being the one on Soldier Town, but as the land had recently been cut over the damage was not large. People who travel in the woods in general seem to be getting educated more and more each year in regard to being careful with fires. The efficiency of the Forestry Department is being improved each year. I have visited the lookouts on Boundary Bald, Attean, Coburn,

Tumbledown, Moxie Bald, and Saddleback Mountains. The erecting of towers is the greatest improvement that has ever been made in our Forestry Department, and I really believe that we have the best system in the United States. Of course there are many more mountains that need these towers, but they can be added from year to year as the funds will allow.

There has been a new telephone line constructed along the Canada Road from the Mount Coburn Road to the Jones Pond Road, near the Canadian boundary. This line is on the poles of the Northern Maine Telephone & Telegraph Company. From the top of Johnson (Coburn) Mountain to Jones Pond Road there are six telephone instruments with proper switches which may be used by anyone passing, in case of fire. The line from Lake Moxie, running south along the right of way of the Maine Central Railroad to Bald Mountain, has been thoroughly rebuilt and put on the poles of the Railroad Company with their consent, without charging any pole rental. A new line has been built from Jackman to the Boundary along the right of way of the Canadian Pacific Railway being placed on their pole, with their consent, without charge of pole rental. A new line has been built from Skinner to the Depot Camp, of the Spencer Lumber Company, by the Maine Forestry District, Hollingsworth & Whitney Company, Elizabeth S. Haynes and Spencer Lumber Company. The telephone line from Joseph White's and Harry Pierce's sporting camps to Eustis has been greatly improved. All the telephone lines in the Kennebec watershed have been more or less improved and reconstructed.

Wherever tools were lacking in the tool boxes they have been replaced by new ones; although most of the boxes in this section were well supplied. There is a good supply of tools in my stable, also a good camping kit and set of tools that were used by Edwin I. Small in the erection of the lookout stations. Another year if there could be a lookout tower erected on Mount Bigelow and Pleasant Pond Mountains I think the Kennebec watershed would be well supplied with lookout stations.

I most heartily urge that some form of amendment or addition be made to the Maine Forestry District law this winter to aid the organized towns in some sort of a lookout and patrol system. I would also advocate an addition to the law requiring all land owners to dispose of slash within one hundred feet of any railroad, carriage or buck-board road.

Chief Warden Eugene H. Smith, Norcross:

There has been during this season a telephone line run from Norcross to Charles Daisey's camp at Sourdnahunk Lake. The line from Joe Mary Mountain to the head of Pemaduncook Lake has been repaired and fixed, which is almost the same as running a new line. One mile of new wire has been added to this line.

Chief Warden C. C. Murphy, Rangeley:

On West Kennebago Mountain, the old wooden tower has been replaced by a twenty-four steel tower with house on top for the watchman. And on Saddleback Mountain a thirty-six foot steel tower has been erected with house on top, and a log camp has been built for the use of the watchman.

Chief Warden Fred C. Knowlen, Stockholm:

The Forestry Department has erected a lookout tower on Three Brook Mountain, Township 15, Range 6, W. E. L. S., the same being of steel fifty feet from the ground to the portable house, which is seven feet square, having three windows on each side, thus giving the lookout watchman a clear view in all directions at all times. This tower is connected by telephone line (built by the State this season), with the sporting camps on Square Lake, thence private line with the settlement at Guerette and the town of Stockholm. Arrangements were made with the New England Telephone Company to connect with their lines at Eagle Lake and Stockholm, the wire was bought and some twenty miles of it hung, but owing to the delay in getting the tower up, the remainder of the line (ten miles) will not be hung until spring. I would suggest that the best time to finish the line will be on the crust, when it can be put out on sleds. When this is completed the State will own thirty-five miles of telephone, connecting with the New England Tel. & Tel. Co., at Eagle Lake and New Sweden (central offices) and with all points where help can be called for if the watchman locates a fire in any part of this section. Each camp owner is a Deputy Forest Fire Warden, on duty only when the occasion demands.

A watchman's camp was built about one hundred rods from the tower where a never failing spring brook gives a supply of fine water. It is sixteen feet square, has three windows of 12 x 20 glass giving ample light and air, and is equipped with

stove and cooking tools. There is a telephone box in the camp as well as in the tower. There was also a row boat furnished the lookout station at a cost of twelve dollars, which was used in the erection of the telephone line along the shore of Eagle Lake, a distance of four miles, and it also follows the shore of Square Lake for about the same distance. With the completion of the telephone line (the material for same is all on the ground) and connection with the long distance so as to give the watchman a chance to communicate with the Forest Commissioner direct. A few tools for fighting fires, I think, will give this section all it will need.

Chief Warden L. P. Barney, Skinner :

Steel towers have been erected on Kibbie and Williams Mountains, and a new pole line six miles in from Skinner, which gives us good telephone service, has been built.

Chief Warden Ora Gilpatrick, Houlton :

Have kept a man for lookout purposes on Lawler Hill at which place we already have the material with which to erect a steel tower in the spring of 1915.

Chief Warden S. F. Peaslee, Upton :

There has been a telephone line constructed from main carriage road in Grafton Notch to summit of Speckle Mountain, which station has been established this summer ; tent and camping outfit supplied for the Station.

Chief Warden T. O. Hill, Topsfield :

This season the tall trees which obstructed the view on Musquash Mountain were cut down, a regular observation house built, the tower painted and new maps and tables furnished for same. A new lookout station established on Almanac Mountain, in Lakeville Plantation, equipped with glasses, maps and other necessary implements. One-half mile of telephone line built to connect with the main Dobsis Lake Telephone line.

Chief Warden E. L. Chase, Brownville :

Lookout Station established on Mattamiscontis Mountain, and erected a log camp placing it upon a rock foundation and using such material as would warrant its permanent use, and connecting it with the outside world by telephone, via, Cedar Lake, Ingalls, West Seboeis and Brownville Telephone Company, a distance of eight miles. This Mountain is located near the Range line between the eighth and ninth Ranges, N. W. P.

and Townships two and three in those Ranges, and overlooks a very large area which heretofore has been unprotected. This station is not completed; there is a forty-eight foot steel tower designed for this station and which has been taken to the place of erection together with the portable house.

Chief Warden Alfred K. Ames, Machias :

There has been a telephone line built from Machias Main River on the Air Line road (so-called) West as far as Beddington and then up Lead Mountain to the new steel lookout which has recently been built there. The lookouts at Lead Mountain, Tug Mountain and Wesley Mountain are now connected by a metallic circuit line (twenty-eight miles long) independent of all other lines. At Main River, Lily Lake, Mopang Stream and Lovejoy Hill, telephones have been installed in boxes on the poles so that the patrolmen can call up a watch-tower from these several points without any delay of walking or riding five or six miles to the watch-tower to get the desired information. Daily, several automobile parties pass over this road from Bangor to Calais, Grand Lake Stream and other eastern points and stop to lunch—generally from Beddington to Main River—and as a rule, they are people who are not familiar with the danger of forest fires, so it is necessary to keep patrolmen on the line of travel during the dry seasons. For the above reason, the new telephone line is a great aid to patrolmen.

Chief Warden D. W. Campbell 2nd, Cherryfield :

During the fire season of 1914, there was a particularly dry time during the last of May and the first of June. We did comparatively nothing fighting fire before the 27th of May as the fires would go out at night on the barrens, and they were covered with men burning for the purpose of raising blueberries. During this time it was impossible for the watchman on Lead Mountain to look off any distance, to locate fires, on account of smoke. One of these fires got away and did considerable damage on Twp. No. 10, at the same time there were numerous fires on the barrens, but they happened to be in localities where they could not spread.

In this district we have erected a new thirty-six foot steel tower on Lead Mountain, No. 28, and constructed five and one-half miles of telephone line connecting the tower with Cherryfield and Machias. We need a metallic telephone line between

Beddington and Cherryfield, as at present we have nothing but a ground circuit line, and it is not dependable.

September and October have been extremely dry, and owing to the open season on game, the danger from fires was very much increased.

Chief Warden Harry D. Stewart, Seboomook, in his report for the two years writes as follows :

Previous to the year 1913, there was no lookout station in my district. In June 1913 two stations were established, one on the summit of Green Mountain, (overlooking the North Branch of the West Branch of the Penobscot River) on Township 4, Range 18, and the other on summit of Mucelsea Mountain, on Township 5, Range 16. Upon both of these Mountains wooden towers have been constructed, (built of logs). The telephones for these stations are in small shelters near the foot of towers. During the past season a lookout station was established on Nulhedus Mountain, where a sixty foot steel tower was erected ; this Mountain is near the North line of Township 4, Range 17. The telephone for this station is in the house on top of tower.

A camp for each watchman has been constructed as near each station as a good supply of water could be found.

This season there has been constructed, under my supervision, a telephone line from the lookout station on Boundary Bald to connect with line of the Great Northern Paper Company, with central at Pittston Farm, a distance of fifteen miles.

The lookout station on Green Mountain has central also at Pittston Farm ; and stations on Mucelsea and Nulhedus Mountains are also on the same line and have central at Seboomook. When a fire is discovered the watchmen communicate with each other reporting range, etc., and by so doing are able to locate the position of a fire very accurately.

With lookout stations on Boundary Bald, Kineo, Spencer, Mucelsea and Nulhedus Mountains all reached by telephone by the Chief Forest Fire Warden of this district from his headquarters, you are able to obtain the best of results.

Chief Warden Louis Oakes, Greenville Jct. :

Some new improvements on the lookout stations and connecting telephones have been made. At the Squaw Mt. Station a new cabin has been built near the trail, 10 minutes walk from the summit, commodious enough for the watchman's use in

storing the season's supplies and tools, and the telephone line from the Moosehead State Hatchery road to the watchman's lookout house on the summit of the mountain repaired and reconstructed, and two new telephone boxes installed, one at the watchman's cabin on the summit of the mountain and the other in his home cabin along the trail, equipped with modern lighting protection. The improvements made on trail, telephone line and camp for this lookout have been of great value during the past season, as the watchman has been able to carry out a system of making a telephone call each day for the season, one at 7 o'clock A. M. and the other at 6 o'clock P. M., in order to know that his telephone line and instrument was in good order and report conditions. At the Kineo lookout station, repairs necessary to put the telephone line in good order have been made and one new telephone instrument installed. On No. 4 Mountain station the telephone line and instrument were repaired and put in good order and the watchman's camps connected with the Central at Roach River House, and our service from this mountain during this season furnished good results.

In the building of a new camp on Squaw Mountain, repairing and reconstructing the telephone lines for the three stations, adding new modern telephone instruments, good results have been obtained through the watchmen in quickly locating and promptly reporting small fires in their territory, which has been of great value in confining all fire to a small area.

Chief Warden J. L. Chapman, Milo, in his report for the 1914 season writes as follows:

We had very little rain fall from the early spring until the last of October and the small streams being nearly all dry or free from water. I think it has been remarked "the driest season since the year 1825" or the least rain has fallen through the month of October of any year since 1825.

Improvements made season 1914.

We first built new telephone line from the Ladd's Camp, B. R. 11, connecting with the White Cap Mountain line at or near B Pond distance four and one-half miles. This new line shortened the service and improved same to Milo. The line from Schoodic Station to Rand Cove, a distance of three and one-half miles, has been rebuilt, thus giving telephone service from Ragged Mountain Station to the Railroad Station at Rand Cove.

As the above mentioned station overlooks the entire length of the road from West Seboois to Rand Cove this is a good improvement. We also obtained permission from the Jordan Lumber Co., to use their line (built last season) from Katahdin Iron Works to Randall Camps, upon West Branch Ponds, Pleasant River, a distance of about twenty miles, thus giving good protection to the West Branch territory, as this line was connected with the Station on White Cap Mountain and other instruments at camps along the line.

A log tower was erected on White Cap Mountain with portable house on same. Height of tower about twenty feet. As this station overlooks a large area, I consider it an improvement of much value. On Boarstone Mountain a new portable house was built. As this mountain peak stands out abruptly it was not necessary to have a tower.

In my judgment the lookout stations are far ahead of any other service that we have had here in Maine.

By report from the Boarstone Mountain last summer to the Selectmen of Bowerbank the Town was saved from what might have been a serious forest fire and this is only one instance where the station did excellent work.

One new tool box with tools was added this season, part of the tools went to Ladd's Camp, to replace the tools burnt there last winter, and one other new box to the hermitage making two new boxes spring of 1914.

Chief Warden Ezra N. Williams, Great Pond:

The season has been an unusual one on account of the small amount of rainfall since early spring. At all times there was great danger of forest fires. A telephone line has been constructed from Township No. 32 to my headquarters.

Chief Warden George G. Nichols, Jackman:

In my territory during the past season there have been several important improvements of considerable value. A telephone line was constructed along the Canadian Pacific right of way, from Jackman to Boundary Pond, a distance of thirty-one miles. There are six instruments on this line, (connected with my office,) as follows: Boundary Pond, Lowelltown, Skinner, Franklin and Holeb. A new line was also constructed from the Heald Pond road, so called, to Lake Parlin, a distance of about twenty miles, with four emergency boxes connected there.

with, at convenient places. A line was constructed from Pittston Farm to Boundary Bald Mountain, a distance of thirteen miles.

Two lookout towers were erected, one on Attean Mountain and the other on Boundary Bald Mountain, both were constructed of wood. These towers are excellent for observation purposes and the comfort of watchmen.

Chief Warden George E. Hathaway, Jacksonville:

The watch tower has been boarded and shingled, and some fire tools placed at same.

Fire tools have been placed with one warden in each town or township, which has been a great help to get on a fire quickly.

A telephone line from Crawford to Cooper Fire Station, a distance of five miles, would help the watchmen in the Wesley and Cooper towers to locate a fire more correctly.

Chief Warden H. B. Buck, Bangor:

Condition of Stations: The Station at Depot Mountain, built in 1909, was but a platform on the top of a high spruce tree. It became unsafe for use last season. During the summer of 1914 a new sixty foot steel tower was erected and it commands an excellent view of the surrounding country. Rocky Mountain station was built by the landowners in the summer of 1907. It was built of logs and is not high enough for the territory. A new steel tower, thirty-six foot high, possibly a forty foot tower would be better, should be erected early in 1915. There are two bluffs and I think the tower should be erected on the one most northerly. This tower should be hauled to the mountain during the winter, to save expense. Soper Mountain station, built of logs in 1909, should be replaced with a steel tower. A thirty-six foot tower would be sufficient for this location. The road to the mountain has been swamped out, and if the tower is to be erected in 1915, it should be hauled to the mountain on the snow this winter, 1914-15. Priestly Mountain station was built in 1910, of logs and has a house on the top, well protected from the elements, and is still in good condition. This tower will last for several years to come and commands a good outlook.

During the summer the regular patrolmen took up the telephone line running from Cunliffe's Depot camp in northwest part of Twp. No. 14, R. 11 to the mouth of Musquacook Stream, and strung it along the tote road from Musquacook Lakes to

connect with the main Allagash line at Round Pond. This change gives the patrolmen at Musquacook Lake better service and the line is in a better location to keep in repair.

A new telephone line was built from Depot Mountain to English Lake, following the Canadian Boundary, a distance of about 22 miles. This line was built by Ross E. Miller and the regular patrolmen, during such times as it was not necessary to keep up patrol. The section in the vicinity of English Lake is badly exposed to fires from the Canadians clearing land on the opposite side of the Boundary, and the telephone line and the camp, built this season at the lake, near the Canadian Boundary in Twp. No. 12, R. 17, seemed a necessity for good service.

This territory is now well connected with telephone lines and when in good working order, the patrolmen can easily keep in touch with the Chief Warden. It requires constant attention on the part of the patrolmen to keep these lines clear as falling trees tend to either break the wire or bring it in contact with the ground, thus putting it out of commission.

Chief Warden John M. Brown, Eagle Lake:

The department erected a twenty-four foot steel tower on Hedgehog Mountain, which is in the Southwestern part of Township 15, Range 6, W. E. L. S. A house twelve feet by fourteen feet has been built at the foot of the Mountain at the side of a boiling spring of water, in which the watchman makes his home and where a supply of tools for fighting fires are kept on hand.

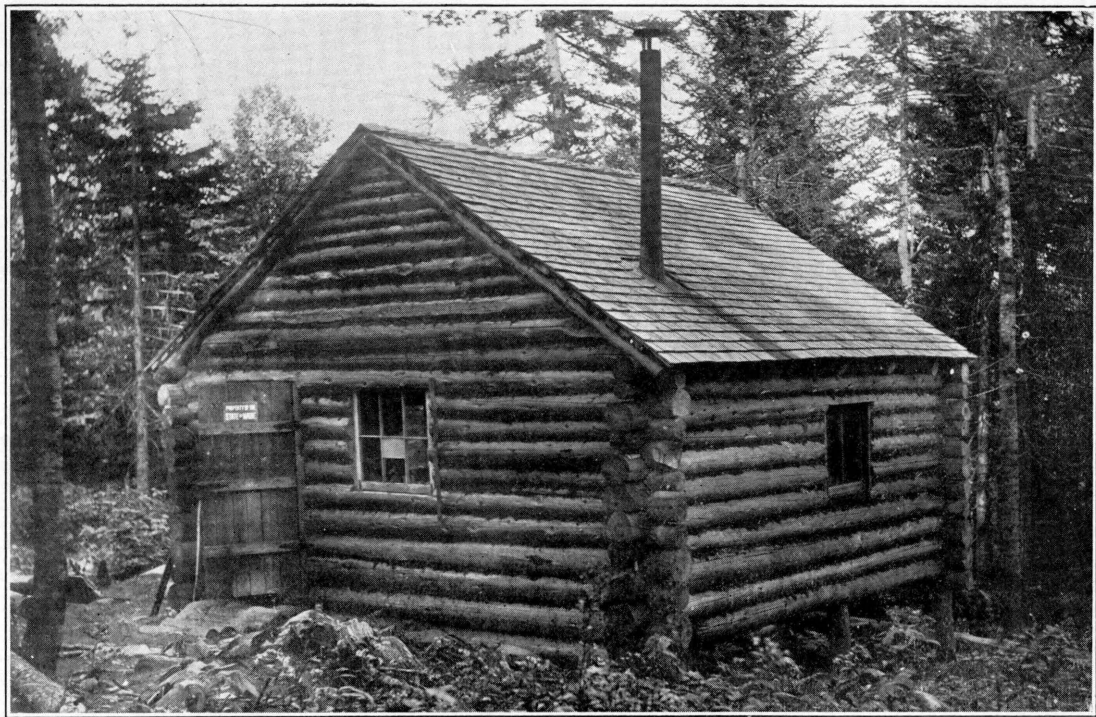
Chief Warden Fred S. Bunker, Franklin:

A lookout station established on Schoodic Mountain in Township No. 9, South Division, and a telephone line constructed from Franklin Station to the lookout station, a distance of six miles. A camp for the watchman was also built.

These different reports show over 200 miles of telephone lines constructed during the season. All lookout stations erected were equipped with maps, glasses, alidade, compass, etc.

RAILROAD PATROL.

As last year, chief wardens were appointed for the territory along the right of way of the railroads. These men were paid by the department and the State was reimbursed by the roads.



Watchman's Camp, West Kennebago Mountain.

Under the direction of these chief wardens, patrols, fire trains, etc., were maintained and expense paid by the railroads.

EXPENDITURES TO NOV. 1ST, WERE AS FOLLOWS:

Chief Wardens.....	\$11,442	39
Deputy Wardens	747	73
Expense extinguishing fires	12,645	60
Lookout Stations	25,067	98
Patrolling	25,389	25
Tools and Supplies	7,236	46
Other Expenses	2,030	96
	<hr/>	
	\$84,560	37

Expenditures on the different watersheds for same period:

St. John River	\$22,949	49
Penobscot River	29,540	66
Kennebec River	16,169	39
Androscoggin River	5,439	26
St. Croix, Union, Machias and Narraguagus Rivers	10,461	57
	<hr/>	
	\$84,560	37*

*Does not include Federal Appropriation, \$8,910.75.

Forest Fires 1914 on Unincorporated Townships.

AROOSTOOK COUNTY.

TOWNSHIPS.	Date.	Acres.	CAUSE.	Damage.
Twp. 15, R. 10	May 18	210	River drivers	\$200
Twp. 15, R. 7	May 20	25	Locomotive	25
Twp. 7, R. 4	May 26	200	Lightning	800
Macwahoc	May 25	1,200	Fishermen	1,500
Glenwood Pl.	May 30	5	Cigarette	50
Molunkus	June 5	6	Fishermen	50
Twp. 17, R. 7	June 11	10	Clearing land	10
Twp. 8, R. 3	June 13	2	Fishermen	20
Twp. 3, R. 3	June 26	2	Fishermen	20
Twp. 15, R. 4	July 27	2	Locomotive	20
Twp. 15, R. 5	Aug. 5	2	Campers	20
Twp. D, R. 2	Aug. 12	10	Blueberry fire	40
Twp. D, R. 2	Aug. 12	7	Lightning	10
Twp. 12, R. 17	Aug. 24	4	Unknown	25
Twp. 12, R. 6	Sept. 11	1	Fishermen	3
Twp. B, R. 2	Sept. 18	3	Clearing land	35
Twp. 2, R. 4	Sept. 19	3	Lightning	10
Twp. 8 B. 5	Sept. 22	3	Hunters	25
Twp. C, R. 2	Oct. 5	11	Hunters	25
Twp. D, R. 2	Oct. 8	11	Clearing land	25
		1,700½		2,840

FRANKLIN COUNTY.

Twp. Letter D	May 28	40	Match	500
Sandy River Pl.	June 19	50	Unknown	100
Twp. Letter D	Sept. 18	4	Not mentioned	8
Twp. Letter D	Oct. 16	4	Locomotive	1
		94½		609

HANCOCK COUNTY.

Twp. No. 10	May 16	10	Unknown	100
Twp. No. 8	May 17	2	Locomotive	60
Twp. No. 10	May 17	10	Unknown	5
Twp. No. 7	May 18	75	Unknown	5,000
Twp. No. 10	May 28	50	Not mentioned	5
Twp. No. 10	May 28	3,500	Blueberry fire	5
Twp. No. 10	May 28	5	Unknown	25
Twp. No. 10	June 11	3	Unknown	50
Twp. No. 8	June 19	200	Unknown	50
Twp. No. 39	June 26	50	Unknown	5
Twp. No. 21	Aug. 9	1	Unknown	175
Twp. No. 8	Aug. 9	2	Unknown	75
Twp. No. 32	Sept. 23	60	Not mentioned	5
Twp. No. 33	Sept. 24	50	Not mentioned	5
Twp. No. 28	Oct. 1	3	Hunters	5
Twp. No. 20	Oct. 2	3	Unknown	5,545
		4,021½		

OXFORD COUNTY.

Twp. 5, R. 4	May 28	160	River drivers	320
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PENOBSCOT COUNTY.

TOWNSHIPS.	Date.	Acres.	CAUSE.	Damage.
Indian No. 3	May 21	8	Cigarette	500
Indian No. 3	May 25	4	Unknown	
Indian No. 3	May 31	30	Campers	100
Indian No. 3	June 10	5	Locomotive	
Indian No. 4	July 6	1	Locomotive	
Twp. 4 R. 9	July 30	10	Campers	
Twp. 5, R. 11	Aug. 7	50	Campers	250
Twp. 7, R. 8	Aug. 13	1	Lightning	20
Twp. No. 2 N. W. P	Aug. 16	2	Fishermen	20
Grand Falls Pl.	Oct. 6		Hunters	
Indian No. 3	Oct. 5	8	Unknown	
Indian No. 4	Oct. 8	1	Unknown	
		119		890

PISCATAQUIS COUNTY.

Little Squaw	May 24	60	Campers	360
Hartford's Point	May 26		Lightning	
Big Squaw	May 27	3	Locomotive	60
Lak. view Pl.	May 30	3	Locomotive	
Kingsbury	May 31	40	Clearing land	200
Lakeview Pl.	June 2	200	Unknown	1,000
Twp. 4, R. 9	June 4	2	Campers	3
Little Squaw	June 11			
Twp. 5, R. 11	July 24	300	Unknown	50
Little Squaw	Aug. 11	3	Lightning	25
Twp. 5, R. 10	Aug. 13	650	Lightning	300
Twp. 2, R. 12	Aug. 20		Lightning	
Twp. 3, R. 13	Aug. 22		Incendiary	300
Twp. 8, R. 10, N. W. P	Sept. 13	1	Campers	10
Twp. 1, R. 9	Sept. 22	3	Burning camps	
Twp. 1, R. 11	Oct. 3	25	Unknown	100
		1,290		2,858

SOMERSET COUNTY.

Pleasant Ridge Pl.	May 1	200	Unknown	
Hobbs Town	May 26	1	Lightning	6 00
Mayfield	May 28	5	Chopping fire	10 00
Cold Stream	June 15	1 1/2	Unknown	7.50
East Moxie	June 15		Tramps	
Twp. 3, R. 5	Aug. 2		Lightning	
King and Bartlett	Aug. 5		Lightning	
Twp. 6, R. 10	Aug. 10	1	Lightning	30 00
Ten Thousand Acres	Aug. 13		Fisherman	2 00
Seboomook	Sept. 21		Locomotive	
Holeb	Sept. 25		Lightning	
		208 1/2		55.50

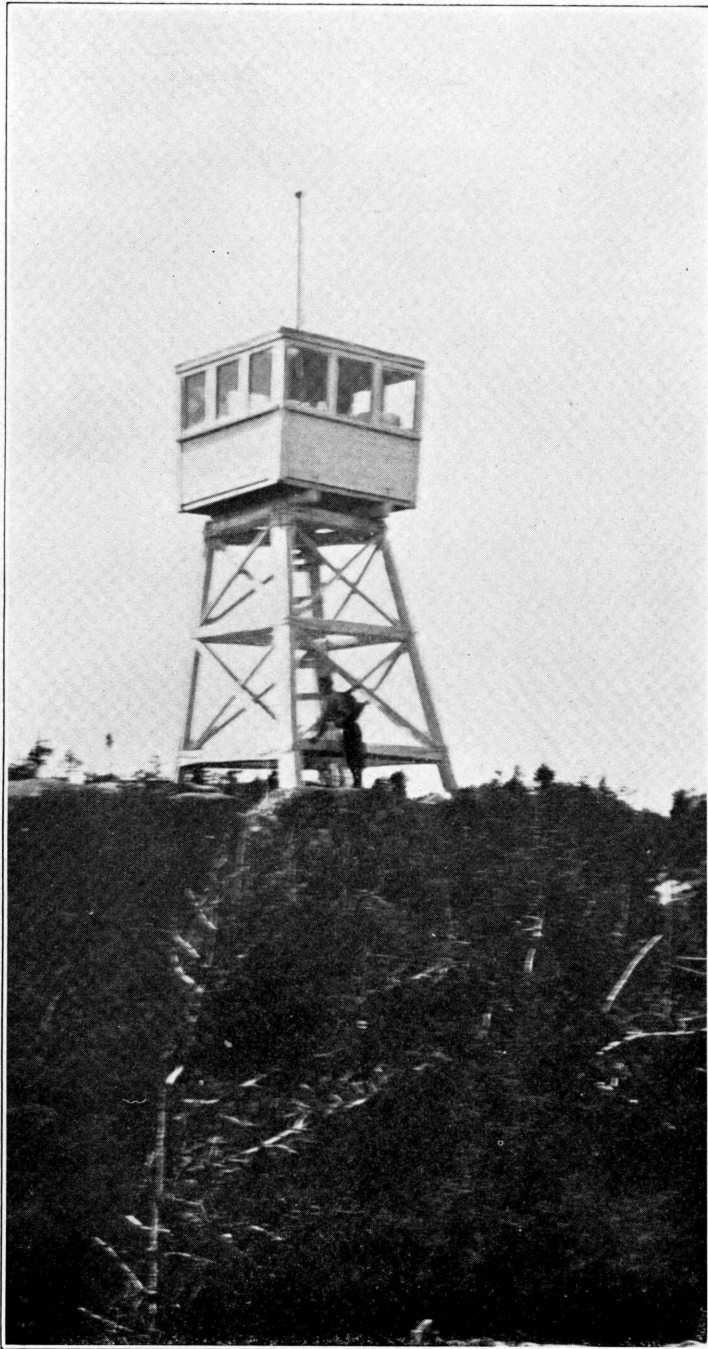
WASHINGTON COUNTY.

TOWNSHIPS.	Date.	Acres.	CAUSE.	Damage.
Twp. No. 19	May 17	6	Unknown	25
Twp. No. 24	May 18	5	Unknown	
Twp. No. 24	May 18	200	Blueberry fire	500
Wesley	May 20	7	Unknown	100
Twp. Nos. 23 and 24	May 21	18	Unknown	20
Twp. No. 24	May 24	300	Blueberry fire	
Twp. No. 24	May 24	3	Blueberry fire	
Twp. No. 26	May 27	1½	Campers	75
Edmunds	May 27	5	Clearing land	30
Twp. No. 33	May 28	100	Unknown	150
Cooper	May 29	2	Unknown	20
Indian Twp.	June 2	½	Campers	
Dyer	June 6		Incendiary	
Twp. Nos. 18 and 19	June 7	50	Fishermen	100
Wesley	June 11	1-5	Match	
Brookton	June 25	5	Fishermen	25
Hireckley	June 27	½	Incendiary	20
Twp. No. 31	July 14	½	Cigarette	
Twp. 5, R. 1	Aug. 13	½	Fishermen	
Kossuth No. 7	Aug. 25	3	Incendiary	50
Indian Twp.	Sept. 22	1½	Not mentioned	
Kossuth No. 7	Sept. 29	1	Campers	10
Twp. No. 43	Oct. 1	1½	Campers	
Twp. No. 27	Oct. 1	7	Campers	200
Grand Lake Stream	Oct. 12	½	Hunters	25
		718+		1,350

Unincorporated Townships.

SUMMARY OF 1914 FIRES.

County.	Acreage.	Damage
Aroostook	1,700½	2,840
Franklin	94½	609
Hancock	4,021½	5,545
Oxford	160	320
Penobscot	119	890
Piscataquis	1,290	2,858
Somerset	208½	55 50
Washington	718+	1,350
	8,311+	\$14,467 50



Wooden Tower, Spencer Mountain, Middlesex Grant.

Forest Fires 1914 on Incorporated Towns.

ANDROSCOGGIN COUNTY.

TOWNSHIP.	Date.	Acres.	CAUSE.	Damage.
Auburn.....	May 28...	75	Portable mill.....	2,000

AROOSTOOK COUNTY.

Perham.....	June 11...	6	Unknown.....	.....
Reed.....	Oct. 8.....	640	Unknown.....	300
		646		300

CUMBERLAND COUNTY.

Brunswick.....	April 18...	15	Burning brush.....	100
Brunswick.....	May 7.....	25	Maying party.....	.....
Brunswick.....	May 18.....	30	Locomotive.....	100
Brunswick.....	June 14...	40	Lunch fire.....	2,400
Freeport.....	April 24...	300	Fishermen.....	300
Yarmouth.....	April 25...	2	Locomotive.....	15
		412		2,915

FRANKLIN COUNTY.

Chesterville.....	May 30...	20	Unknown.....	50
Kingfield.....	May 31...	25	Unknown.....	150
		45		200

HANCOCK COUNTY.

Franklin.....	May 2.....	1	Unknown.....	.....
Ellsworth.....	Oct. 14...	20	Unknown.....	200
Taunton.....	June 27...	1	Locomotive.....	10
		22		210

KENNEBEC COUNTY.

Augusta.....	June 11...	5	Sparks from fire.....	.....
Monmouth.....	May 29...	1	Unknown.....	50
Oakland.....	May 28...	60	Unknown.....	.....
Winthrop.....	May 16...	40	Burning brush.....	.....
		106		50

KNOX COUNTY..

Camden.....	April 25...	5	Smokers.....	.....
Cushing.....	May 25...	130	Unknown.....	1,050
South Thomaston.....	May 28...	150	Smokers.....	300
		285		1,350

LINCOLN COUNTY.

TOWNSHIP.	Date.	Acres.	CAUSE.	Damage.
Alna	May 22	1,000	Fishermen	2,500
Boothbay	May 24	4	Burning brush	
Boothbay	April 25	12	Unknown	
Damariscotta	June 15	1	Steam saw mill	100
Newcastle	May 15	100	Mill	800
Newcastle	May 31	200	Clearing land	
Newcastle	April 10	50	Locomotive	
Newcastle	April 18	35	Clearing land	
		1,401½		3,400

OXFORD COUNTY.

Brownfield	June 11	125	Unknown	2,000
Hiram	May 29	20	Unknown	20
		145		2,020

PENOBSCOT COUNTY.

Etna	May 3	20	Unknown	50
Holden	May 31	150	Unknown	500
Argyle	Sept. 30	3,250	Hunters	250
Passadumkeag	Oct. 7	20	Hunters	50
		3,440		850

PISCATAQUIS COUNTY.

Brownville	June 1	5	Locomotive	
Brownville	June 11	50	Locomotive	
Foxcroft	August 2	1	Blueberry pickers	
Greenville	June 26	75	Locomotive	250
Sangerville	June 3	5	Unknown	
Willimantic	June 1	175	Unknown	
		311		250

SAGADAHOC COUNTY.

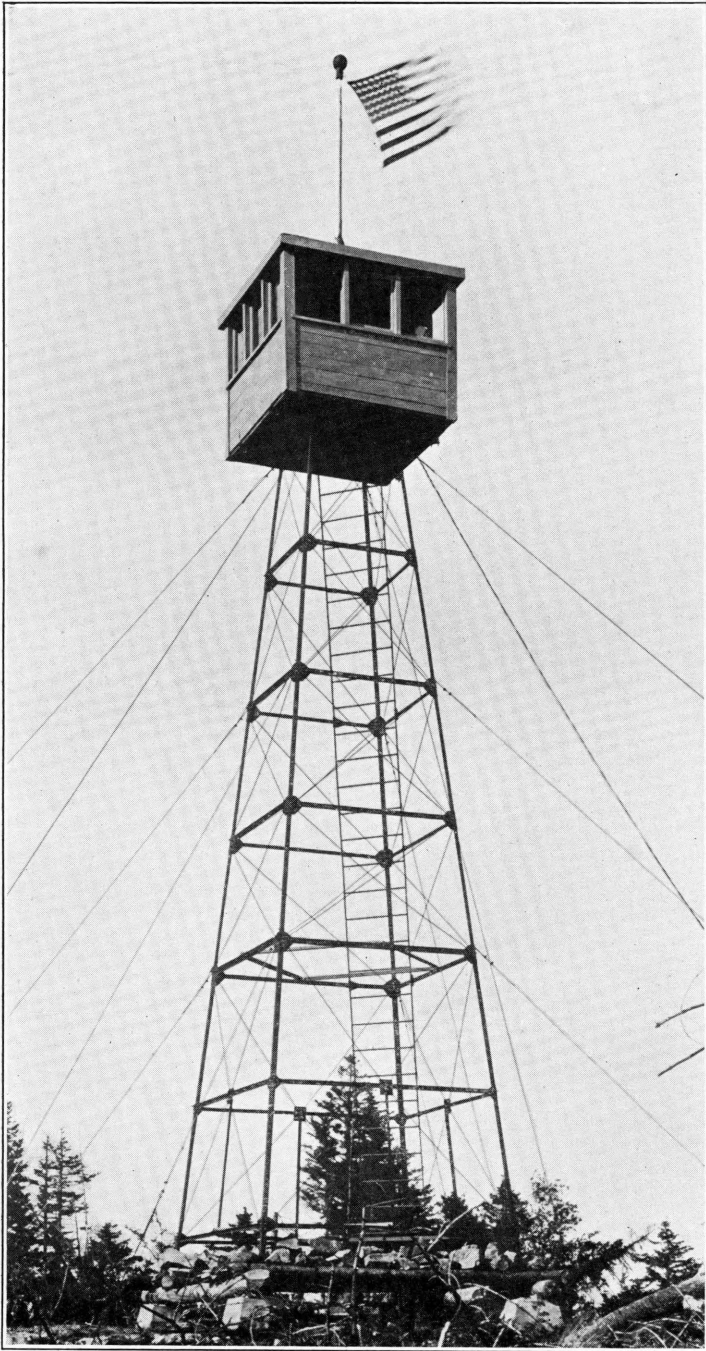
Phippsburg	June 23	200	Unknown	
Wiscasset	June 23	150	Unknown	
		350		

SOMERSET COUNTY.

St. Albans	June 17	5	Clearing land	
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WALDO COUNTY.

Montville	May 24	10	Unknown	
Unity	Oct. 1		Hunters	10



Lead Mountain, Twp. 28, Hancock County.

WASHINGTON COUNTY.

TOWNSHIP.	Date.	Acres.	CAUSE.	Damage.
Charlotte	June 26...	20	Unknown.....	40
Jonesport	May 29...	40	Clearing land.....	400
Baring.....	Oct. 1.....	10	Unknown.....	45
Charlotte.....	Oct. 5.....	12	Unknown.....	.....
		82		485

YORK COUNTY.

TOWNSHIP.	Date.	Acres.	CAUSE.	Damage.
Eliot.....	Sept. 21...	150	Fishermen.....	500
Parsonsfield.....	Oct. 12....	20	Hunters.....	300
		170		800

Incorporated Towns.

SUMMARY FOREST FIRES, 1914.

County.	Acreage.	Damage.
Androscoggin	75	2,000
Aroostook.....	646	300
Cumberland.....	412	2,915
Franklin.....	45	200
Hancock.....	22	210
Kennebec.....	106	50
Knox.....	285	1,350
Lincoln.....	1,401½	3,400
Oxford.....	145	2,020
Penobscot.....	3,340	850
Piscataquis.....	311	250
Sagadahoc.....	350 .....	.....
Somerset.....	5 .....	.....
Waldo.....	10	10
Washington.....	82	485
York.....	170	800
	7,405½	14,840

REPORT OF THE DEPARTMENT OF PUBLIC INSTRUCTION IN FORESTRY AT THE UNIVERSITY OF MAINE TO THE FOREST COMMISSIONER.

November 1, 1914.

To the Honorable Blaine S. Viles, Forest Commissioner, Augusta, Maine.

SIR:—I have the honor to submit the following report of this Department for the years 1913 and 1914:

These two years mark the greatest advance in this Department since it was established, in 1903. Owing to the increased appropriation made by the present Legislature, it has been enabled to increase its field of usefulness, not only at the University, but throughout the State. These advances may be briefly summarized as follows:

An instructor in forestry added to the teaching faculty

The addition of new courses to the curriculum

The strengthening of courses already offered

Extension lectures at the Normal Schools

Extension lectures to schools, granges, and clubs

The establishing of a summer school camp

The establishing of a State forest nursery

These will each be discussed in detail in the body of this report, under their proper headings.

REGISTRATION

The registration of new students taking the regular four-years course in forestry is as follows:

For the college year 1912-13..... 22

For the college year 1913-14..... 13

This year's registration is about normal, and the previous year's by far the largest in the history of the department.

Many of the students registered in 1913 found themselves entirely unfitted for the work, or the course too difficult for them, and changed during the year to other, and for them more

congenial lines of study. The present total register of students majoring in forestry is as follows:

Seniors	7
Juniors	5
Sophomores	6
Freshmen	13
Special	1
	<hr/>
Total	32

Besides this number 34 agricultural students elected a course in general forestry, in which especial stress is laid on general forestry principles and their application to woodlot management in this State.

DEGREES AND GRADUATES

Four graduates were awarded the degree of Bachelor of Science in Forestry in 1913, and four in 1914.

This brings the total number of graduates from this department up to 43. One of these is deceased, and of the remainder 71% are engaged in active forestry work at the present time. Some of the others are also engaged in work in pulp and lumber mills and in other work very closely allied with forestry. It has been the policy of the department to maintain a high standard rather than to merely increase the number of graduates.

SCHOLARSHIP

For each of the past two years a forestry student has received a scholarship prize, the value of which is sufficient to defray tuition expenses for one year. This prize is awarded by the University and is open to all students, and not merely those majoring in forestry. A comparison of the number of graduations with the number of registrations for each year would also indicate that a high degree of efficiency is required and maintained.

FACULTY

The increase in the appropriation made by the Legislature made possible the addition of an instructor to the teaching staff of this department. We are particularly fortunate in securing

for this position, Mr. Carleton W. Eaton, of Calais. Mr. Eaton is a graduate of Bowdoin College (1910) and of the Yale Forest School (1912); and up to the time of his appointment to this department, he was a member of the United States Forest Service.

The services of Mr. Lawrence V. Jones, a Bangor attorney, have also been secured for a course of lectures on Forestry Law. These lectures were given to the Senior class last year for the first time.

COURSES

Besides greatly strengthening the courses in Forest Measurements and Forest Management, the following courses have been added to the forestry curriculum:

- Economics of Forestry
- Forest Products (other than logs and lumber)
- Forest Policy
- Wood Preservation
- Forest Protection
- Forestry Law

With these additions, the number of subjects and the hours required are in accordance with the standard for undergraduate school of forestry, as set forth in the report of the Committee of the Conference of Forest Schools on Standardization of Instruction in Forestry, (1912).

Following is the curriculum now required of all regular forestry students:

FORESTRY CURRICULUM

FRESHMAN YEAR			
<i>Fall Semester</i>		<i>Spring Semester</i>	
Subject	Hours	Subject	Hours
Biology 1, 2, †4.....	4	Biology 2, 2, †4.....	4
Chemistry 1	2	Chemistry 2 or 4.....	3
Chemistry 3, †4	2	Chemistry 6, †4.....	2
Drawing, 1, *6	2	Drawing 2, *6.....	2
English 3	2	English 8	2
Mathematics 2	5	Mathematics 2	3
Military 1, *3.....	1	Mathematics 4	2
Physical Training	3	Military 2, *3	1
	—	Physical Training	1
	18½		—

SOPHOMORE YEAR

Agronomy 1, 2 *3.....	3	Biology 8, 2 †4.....	4
Biology 67, 2 †4.....	4	Biology 68, 2 †4.....	4
Civil Engineering 1.....	1½	Civil Engineering 2.....	1
Civil Engineering 5.....	1	Civil Engineering 4.....	1
English 3.....	1	English 4.....	1
English 9.....	2	English 10.....	2
History 5.....	3	Horticulture 2, 2 *3.....	3
Military 1, *3.....	1	Military 2, *3.....	1
Modern Language.....	3	Modern Language.....	2
	19½		19

JUNIOR YEAR

Biology 61, 2 †4.....	4	Biology 62 or 66.....	4 or 3
Civil Engineering 21.....	1	Civil Engineering 22.....	1
Civil Engineering 23.....	1	Civil Engineering 24.....	2
Civil Engineering 27.....	1	Forestry 6.....	2
Geology 5.....	3	Forestry 8, *6.....	2
Forestry 11.....	2	Forestry 10, *3.....	1
Forestry 13, *6.....	2	Modern Language.....	2
Horticulture 5, 2, †2.....	3	Physics 6.....	2
Modern Language.....	3	Electives.....	3
	20		19 or 18

SENIOR YEAR

Biology 3.....	2	Biology 66 or 62.....	3 or 4
Forestry 1.....	2	Forestry 12.....	2
Forestry 3.....	1	Forestry 14, *6.....	2
Forestry 5.....	1	Forestry 16.....	2
*Forestry 9.....	1	Forestry 18.....	2
Forestry 15.....	2	Forestry 20.....	2
Forestry 17, *6.....	2	Forestry 22.....	2
Forestry 19.....	1	Forestry 26.....	3
Forestry 21.....	3		
Forestry 25.....	2		
	17		18 or 19

EQUIPMENT

Numerous additions have been made to the equipment. These include the latest model Swedish increment borers, Forest Service compasses, Abney reflecting levels, Biltmore measuring sticks, log rules, timber scribes, and other necessary instruments.

A valuable collection of stereopticon slides, showing logging operations in the Southern Pine Region has been one of the most important adjuncts along this line; and the number of specimens of native woods has been more than doubled during the past two years.

The outfit for the summer school camp adds another important item to the equipment during this period.

EXTENSION WORK

In order to stimulate the interest in forestry and to impart some sort of elementary knowledge on the subject throughout the state, it was thought advisable to give extension lectures in the Normal Schools. While it is impossible with the present appropriation to reach all of the schools and colleges in the state, the plan is to reach the higher training schools; and in this way have the work carried on by the prospective teachers to the lower grade schools. In this way it was thought that a good deal might be done towards increasing the general interest in forestry work, and a greater appreciation of the importance of the subject to every citizen.

These lectures were, therefore, given at Gorham, Farmington, Machias, Presque Isle and Fort Kent; and they were very kindly received and a great interest shown at each school.

Besides these lectures, two lectures were given at the Bangor High School, one on "Forestry in Maine" and the other on "Lumbering." Both of these lectures were illustrated by stereopticon slides, and are available for other schools upon application to the department.

Special lectures on Forest Planting and Woodlot Management were given to the short course students in Agriculture and also in Horticulture, and extension lectures to The Thursday Club of Biddeford, the Waterboro Grange, the Stillwater Grange, the Horticultural Club of Bar Harbor, the Women's Club of Houlton, and the Men's Club of Brewer. Inspection and advisory work was given at Bangor, Oldtown, Orono, Seal Harbor, Auburn, Kennebunkport and Ogonquit. For all work outside of Orono, the person or club requesting the work paid all necessary expenses for travel and maintenance, with the exception of the Normal Schools.

A large and growing correspondence is also an important part of the work. By arrangements with the State Department and the United States Forest Service in the Department of Agriculture, all letters on the subject of forestry in Maine are referred for attention to this department. This keeps the department in close touch with those interested in the work.

SUMMER SCHOOL CAMP

Probably the most important development along the lines of extension work in forestry, was the establishing of a summer school camp short course. This is a two weeks course in the fundamentals of forestry. It was introduced to meet the needs of two classes of students, namely: young men just out of high schools who are undecided as to whether or not they intend to take a professional course in forestry, and more mature men, such as guides, patrolmen, cruisers and those interested in timber lands and pulp manufacturers. For the first class of men, such a course will often save much disappointment and possibly a year in college, for it will give them a very good idea of just what the work is like and what the conditions of actual field work are. For the second class of men, it is intended to give what elementary knowledge of the subject it is possible to present in so short a time, and to at least demonstrate the aims and methods of forestry.

In 1913 this course was given near Princeton, Maine, on Indian Township. Through the kindness of Mr. Charles F. Eaton, of Princeton an old logging camp was made available for cook-shack and mess-quarters. Tents were provided as sleeping quarters for the men. There were five students at this camp.

For the same course in 1914, Mr. Charles E. Adams, of Bangor, offered his camp at Stacyville, on the East Branch of the Penobscot River, about one hundred miles north of Bangor. The tents and camp equipment were moved to this new location, and it will in all probability be made the permanent place for holding the summer camp course, since it would be very difficult to secure a place as well located for timber cruising in a variety of types of forest, and at the same time so well appointed. There were seven students this year.

For this course there are no examinations or entrance requirements of any kind, excepting that the student be in good health and not less than eighteen years old. No tuition is charged, but the expenses of living in camp are divided pro-rata among the students in attendance, and this is the only necessary expense.

The work given includes lectures in Silviculture, Measurements, Economics of Forestry, Forest Botany, Forest Protection, and Lumbering, and periods are provided for discussions of topics suggested by the students as well as for reading and study. This work takes up the mornings, and the afternoons are devoted to field-work and practical demonstrations as well as training in the use of forestry instruments.

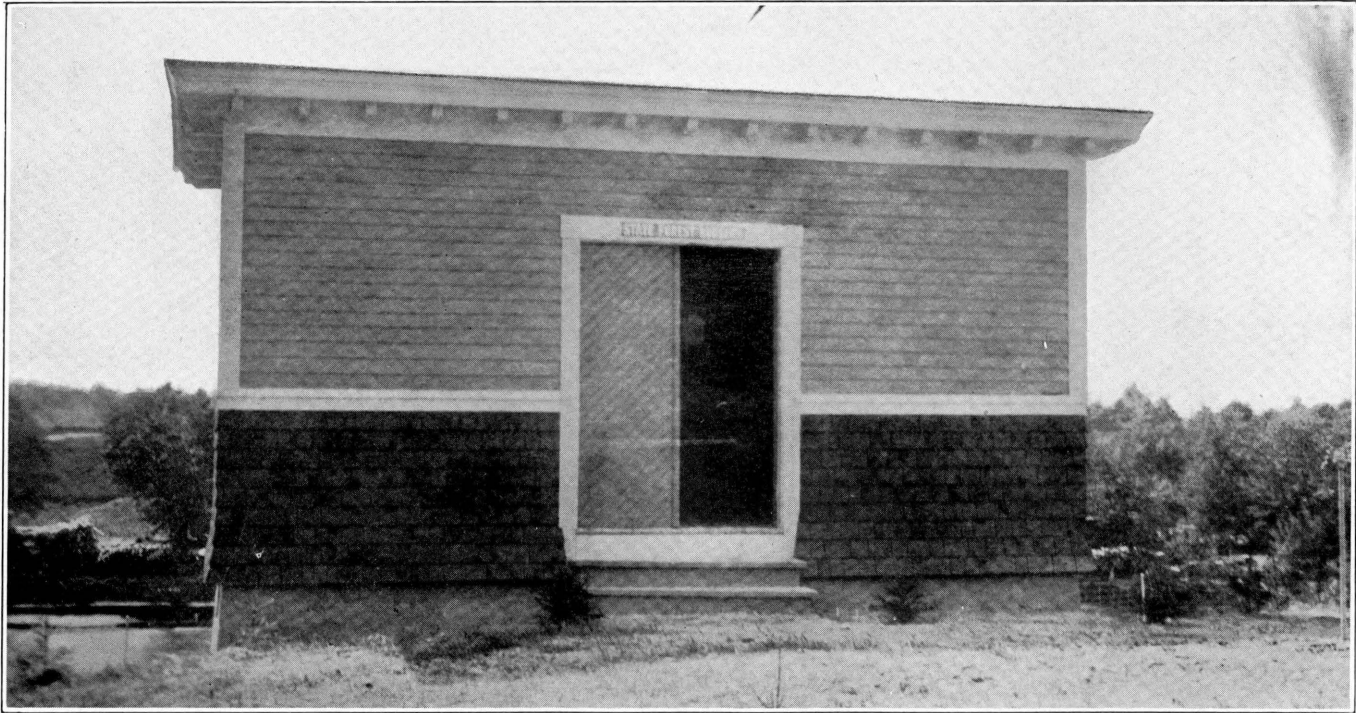
This course is entirely separate and apart from the regular courses at the University, and no University credit can be given for work done there. It, however, fills a distinct place in the educational work of this department, and when it becomes better and more generally known, will no doubt be one of the most popular courses offered.

PUBLICATIONS

During the period covered by this report numerous articles have been contributed to forestry periodicals and to the newspapers, and the following bulletins have been published through the kindness of the Extension Department of the University of Maine, in their regular monthly bulletin—"Timely Helps for Farmers": Vol. 5, No. 12. The Spruce Bud-Worm, Vol. 7, No. 1. Extension Course in Forestry, Vol. 7, No. 7. Forest Planting, Vol. 7, No. 8. A Classified List of American Literature on Forestry Subjects, for General Reading and Reference. These bulletins will be included, in an appendix, as a part of this report.

FOREST NURSERY

A special appropriation from the present Legislature made possible the establishing of a State Forest Nursery in connection with this department. One thousand dollars a year for each of the years 1913 and 1914 was provided for carrying on this part of the work, the funds to be expended under the direction of the forest Commissioner.



Packing and Shipping House.

A plot of about two acres was provided by the University and work on the site was begun as early in 1913 as funds were made available. This was, however, too late for extensive spring planting. The results were slightly anticipated, and three seed beds of white pine were started in the early spring by the class in Silviculture. These provided one-year-old plants for transplanting this spring.

The site required a considerable amount of grading and cultivation before it was in condition for nursery purposes. This work was done in 1913, and also the construction of a store house and packing room 12' by 20' in dimensions, with a concrete foundation and cellar floor. This house is used for the storage of seeds, tools and implements, and for a work room in handling and packing stock for shipment.

A complete system of water piping has also been installed, and the area surrounded by a six-foot steel wire fence, the material for which was contributed as an advertisement and demonstration, by the American Steel and Wire Company, of New York.

In the spring of 1914, planting was begun on a commercial scale, the work being done by the forestry students. Forty seed beds were established, and a part of the one-year-old white pine seedlings were transferred to transplant beds in the new nursery. In addition to this, a number of older transplants were moved from their previous position, where they had been growing for some six years past. These plants had been grown for experimental purposes as a part of the regular work in the field required of students in the class in silviculture. Most of these are now too large to be recommended for forest planting, but they are very suitable for decorative planting or for landscape work.

The stock on hand in the nursery at the present time is as follows:

Seedlings—1914

White pine (<i>Pinus strobus</i>)	100,000
Red pine (<i>Pinus resinosa</i>)	50,000
Austrian pine (<i>Pinus Austriaca</i>).....	17,000
Scotch pine (<i>Pinus sylvestris</i>)	8,000
Norway spruce (<i>Picea excelsa</i>)	40,000
Larch (<i>Larix laricina</i>)	3,500

Ailanthus (<i>Ailanthus glandulosa</i>)	600
Catalpa (<i>Catalpa speciosa</i>)	300
Butternut (<i>Juglans cinerea</i>)	23
Seedlings—1913	
White pine (<i>Pinus strobus</i>)	12,500
Transplants—(From 1913 seedlings)	
White pine (<i>Pinus strobus</i>)	8,500
Transplants—Four-years-old	
White pine (<i>Pinus strobus</i>).....	345
Douglas fir (<i>Pseudotsuga taxifolia</i>).....	30
Transplants—Six-years-old	
White pine (<i>Pinus strobus</i>).....	103
Norway spruce (<i>Picea excelsa</i>).....	116
Pitch pine (<i>Pinus rigida</i>)	12
Red spruce (<i>Picea rubens</i>).....	23
White spruce (<i>Picea canadensis</i>).....	37
Douglas fir (<i>Pseudotsuga taxifolia</i>).....	121
Noble fir (<i>Abies nobilis</i>).....	16
Balsam fir (<i>Abies balsamea</i>)	200
Bull pine (<i>Pinus ponderosa</i>).....	37
Black cherry (<i>Prunus serotina</i>).....	97

These plants are all in thrifty growing condition, and will be furnished at actual cost of production to prospective planters in Maine.

While several small sales of the larger sized transplants were made this season, the nursery can hardly be considered to be on a commercial basis until it is producing an annual supply of three-year-old transplants, since this is the size that is usually recommended for forest planting under average conditions in this region.

In addition to the very valuable experience gained by the forestry students in practical work in the forest nursery, it will enable the prospective forest planter in Maine to secure good planting stock at a minimum price.

CONCLUSIONS

In reviewing the work of the past two years, it will be seen that a considerable advance has been made, not only in the work of the department at the University of Maine, but for the general advance of forestry interests throughout the state.

It is suggested that for the next year means be provided for reorganizing the Maine Forestry Association. This association should include all who are actively engaged in lumbering and wood manufactures of all kinds, as well as owners of timber land and others whose interest is chiefly from the more general standpoint of economics or aesthetics. Such an organization would have a wide influence for the advance of the forestry interests in this state.

The department is at present facing a deficit, owing to the increased work taken up during the past year. The increase of one thousand dollars made in the appropriation for this work by the present Legislature is not sufficient to pay the necessary running expenses of the department at the present time. It made possible the addition of an instructor, but it does not leave enough margin to furnish supplies, tools and equipment which are vitally necessary to the growth and well being of the department.

Unless a special appropriation is made for the further maintenance of the forest nursery by the next legislature, it is going to entail an increased cost of some six hundred dollars for manual labor and supplies, per annum.

The general interest in forestry throughout the State is increasing every year. Likewise the work of this department is increasing. To do this work we should not be hampered as we have been in the past by a lack of money. It is hoped that the coming Legislature will make much more generous provision for this work than has ever been made before.

Sixty-eight per cent of the land area is either forest or waste land; more than one-third of the population depend for their income, either directly or indirectly, upon the forests; the water-power and forestry interests are inseparable; and how much hunting, fishing, and summer resort business would be done in Maine if we had no forests? Further argument seems unnecessary. The conclusion is so obvious.

Very respectfully submitted,

JOHN M. BRISCOE,

Professor of Forestry.

FOREST PLANTING.

DEPARTMENT OF FORESTRY.

JOHN M. BRISCOE, M. F., Professor of Forestry.

CARLETON W. EATON, M. F., Instructor in Forestry.

In order that the great area of waste land—the aggregate of the small unproductive areas of many farms—may be put to some use, of as productive a nature as possible, the legislatures of the State of Maine have enacted laws that offer both tax rebates and bonuses for the establishing and maintaining of forest tree plantations, and assist in the establishing by offering nursery stock at minimum price. With every possible facility thus offered by the State, viz.—cheap and good stock, taxation exemption, prizes, and the assistance of the Department of Forestry—surely all that is necessary is that the progressive farmers and other owners of waste lands be acquainted with the facts, in order that they take advantage of them.

In accordance with a recent act, a forest tree nursery has been established at Orono, in connection with the School of Forestry at the University of Maine. The nursery is located along the east bank of the Stillwater River, near the University, and comprises an area of two and one-half acres. It has been inclosed by a substantial wire fence, soil prepared, a very neat store and work house erected, and a start will be made in raising nursery stock on a large scale this spring (1914). This year there will be very few trees of the proper age for distribution; in 1915 there will be a small number of two year stock available. Thereafter the nursery will be producing to its full capacity of approximately 200,000 two and three year old trees annually.

A large variety of trees will be grown; the species white pine, Norway spruce, and European larch being chiefly for extensive planting, while various other native and exotic species will be raised for purposes of experimentation or decorative planting.

About 75% of the output will be white pine, as this tree makes the most profitable planting investment for the average soil of this State—being the fastest grower and yielding quickest returns. Red and Norway spruce may be desirable on some sites for some purposes; and the European larch is a very rapid grower, of a good quality of lumber, adapted to wet ground.

Plantations of white pine have already been grown in this country with great profit to the owner. Thinnings in stands from 20-30 years of age have resulted in surprising returns on the money invested, and the remaining stand made more valuable than ever by the same operation.

Before a land owner decides to spend money on planting trees, he of course wants to see wherein such action is going to benefit him. In brief, the advantages of establishing a plantation of white pine may be given as follows:

(1) Every farm has its patch of land that is of use for neither tillage nor pasturage, but which is capable of growing lumber as its sole productive crop.

(2) A plantation on such land is producing a very valuable crop, however slowly, instead of lying idle; it is exempting that land from taxation for 20 years—no small item in itself; it is putting that land on the *asset* side of the sheet and making the whole farm more desirable and valuable in consequence.

(3) On January 1, 1929, 15 years from now, it may receive the prize of \$500, or one of the four others, as provided by the Benjamin C. Jordan fund. (See Appendix).

(4) If the farm is to be sold before it is time to thin the stand so that the farmer can get direct returns on his investment—the potential value of the young pine should not only make the sale value greater but would also have a moral effect in putting the sale through.

(5) If the farm stays in the family, and the planter does not live to reap the harvest of his work, he has left his heirs a valuable piece of ground instead of a waste stretch, and has set an example that, when emulated by the younger generation, will bring to *them* a high profit.

(6) A woodlot has its important part to play on each farm; and white pine is a valuable species in the lumber market.

(7) After the stand is established it requires practically no care or expense by the owner.

(8) Reclaims the unfertile land on which it stands so that it ultimately becomes of agricultural value.

METHODS OF REFORESTING.

In general, there are two classes of lands that should be reforested: (1) Open places occurring within the woodlot, which have not begun to come up in seedling growth, or which have begun to support an undersirable species that can be cut out at the expense of a little time, and (2) open areas that are rocky or supporting only a valueless weed growth—all open places that are not used for pasturage or cultivation.

There are two methods of reforestation: (1) Seeding; (2) Planting. The former has found little success by reason of (1) The large amount and expense of the seed required, (2) Insufficient preparation of the soil before seeding; (3) Unfavorable weather during the year; (4) Destruction of the seeds by squirrels, mice, and birds. The method of seeding is not to be recommended, as the chances of absolute failure are too great, and even if the results are finally successful the expense will very probably be as high and the trouble more than planting entails, and the resulting stand will not be as uniform.

Planting is better by far and may be relied upon, when properly done, to produce results. Either wild or nursery grown stock may be used. The former has the following disadvantages: (1) Wild stock receives a severe set-back in transplanting, and (2) the cost of digging it up is often as great as the cost of the nursery stock. Nursery trees should be used wherever possible in reforestation for the following reasons: (1) It withstands transplanting, even may benefit by it; (2) it is cheap in proportion to the results that may be expected; (3) it has been raised with especial care as to root and crown development, and general health; (4) it is obtainable at the best age and period in the growth of the tree, for adapting itself to the site and making good growth; (5) The plants being of uniform age and size the resulting stand is most advantageously handled.

The experience of the U. S. Forest Service and of operators everywhere has shown conclusively that planting well grown stock is the most advisable method of reforestation, and that, properly done, the percentage of failures should not be more than 10% nearer 3% to 5%—of the trees set out.

The age at which trees should be planted is at two or three years. On sites of good soil, with good moisture conditions, two year old stock is sometimes very satisfactory. On the average land it is recommended that the stock be three years old,—having had one year in the seed-bed, and transplanted once to specially prepared beds for two years longer. It has been found that three year old trees, once transplanted in the nursery, make the most profitable stock to use.

PLANTING IN THE FIELD.

The best method of putting the transplants in the ground is that in which the mattock is used for making the hole. Two men working together, one handling the mattock and the other putting in the plants, can cover about an acre a day under good conditions. The trees should be spaced approximately six feet apart each way—much wider spacing, except under half shade such as occurs in openings within the woods, would result in too limby growth, and a narrower spacing would crowd too much. Using 6 x 6 spacing it takes 1210 trees to the acre. Taking the cost of the transplants at \$5 per thousand, and labor at \$2 a day, the total cost of stocking an acre of land amounts to about \$10.

SUPPLY OF PLANTING STOCK.

The State Nursery is not of sufficient size to furnish transplants for all the unproductive land in the state, except through a great number of years. The function of this nursery can be only to supply enough stock to each applicant, for a few acres, to give demonstration of the practicability of the method and advantage of reforestation. It is entirely feasible that the trees be grown at home, however, and a short description of how this can be done is given in the bulletin issued by this Department—"Suggestion for Woodlot Owners in Maine." This may be obtained upon application. Raising the nursery stock from seed is however, to be recommended only when reforestation operations are to be conducted on a large scale.

There are a number of commercial nurseries that are equipped for supplying large quantities of stock very reasonably. A list of such dealers is given in the appendix.

DETAILS OF PLANTING.

Heeling In.—Plants received from the nursery will probably be packed in a box with sphagnum moss. They usually are tied in bundles of 100, with the crowns open to the air, and the roots carefully protected from drying out through their wrapping of wet moss. Upon unpacking the young stock, which should be done at once, great care must be taken that the roots are not exposed for any length of time to the sun and air, as they dry out very quickly and result in injury to or the death of the seedling.

If they are to be set out in the field immediately, it should be sufficient to moisten the moss over the roots, and place in the shade or cover with burlap. However if they are to be kept for some length of time it is better to "heel them in." This consists in digging a deep V-shaped trench with the spade—one side of the trench vertical, the other sloping. Lay the plants carefully on the sloping side so that the roots lie straight and free, and so that the crowns project two inches above the ground surface. Then fill in the soil, around the roots—taking care not to injure them. The loose fill in the trench should then be packed down hard and watered. If possible they should be located, while heeled in, on the north or shady side of a building, and if so disposed of should keep for weeks.

If moss is not available for protecting the roots during planting it is effective to dip the roots in a puddle of thin mud, so that they are coated with a moist, muddy layer, or the plants should be carried in a pail so that the roots are constantly immersed in thin mud.

Planting.—Two men working together make the most economical crew for planting, although it is possible for one man to do it efficiently. Two men should be able to plant upwards of an acre a day under average conditions. One man carries the basket of plants—with their roots protected—and assists the mattock man in placing the tree. The mattock, or spade if preferred, should be driven deep in the ground, and the soil thus loosened, lifted and brought back just far enough to allow the insertion of the plant. It is not necessary to remove the mattock from the hole. The plant should be tucked carefully down behind the blade so that the roots lie straight in the hole, and the



Entrance to the Nursery.

crown and an inch or two of the stem—depending on the age and size of the plant—project above the ground. Then the mattock should be withdrawn, the plant being still *held upright*, and the sod allowed to fall back. The earth around the base of the plant should then be firmed with the hands, the feet used to tramp down the sod, and the process is complete.

The trees should be planted in parallel rows, a line being kept by the eye. They should be spaced 6 feet apart each way, about two steps plus the distance to where the mattock hits the ground on a natural swing, and not directly opposite, but alternating in the rows.

The key to successful planting lies in getting the roots properly placed, as the tree is put in the ground. The hole should be made deep enough so that the root lies straight down freely. Properly planted, failure can be due only to poor stock, or extremely dry weather immediately following the planting. It may be that the roots have become dried out in shipping, or may have been badly barked in transplanting—whereat the shipper or transportation company is at fault. If a rain can be prophesied for the next day, or a shower threatens, then is the time to get the plants in the ground. Cloudy days, and days when there is no wind, should be taken advantage of.

Preparation of the Ground:—No special preparation of the ground is required for planting, as is often the case in seeding. Sometimes a plough furrow is run along the lines in which the young trees are to be set. This is, however, an unnecessary and useless procedure in many cases.

On some areas or parts of an area it may be well to clean out any young hardwood or shrubby growth that is throwing a shade on the ground. It is useless to plant white pine on an area that will be covered with heavy shade as soon as the foliage comes out; spruce does better in shade, and larch does not stand it at all. Very often the site can be put in condition for planting by the use of a heavy brush knife or sickle, in a short time. In doing this it is not always necessary to clear the whole of the ground; it is sometimes sufficient to clean off three feet or so immediately around where each tree is to be put in.

Time for Planting:—The best time for planting is immediately after the frost has left the ground in the spring—or after enough has left to preclude the danger of frost throw, so that the roots

can get hold of the ground. It may usually be done successfully before the regular spring work of farming comes. It may also be done in the early fall, but this time is not recommended as the trees are not always able to get their roots established before frost comes—resulting in frost throw the following spring.

Mixtures.—It is very often advantageous to plant a mixture of trees; one species to form the late merchantable volume of the stand, another to crowd the more valuable species into good form and to be such rapid growth that it can be removed at the proper time in the life of the stand to return a good profit. White pine and European larch do well together in this manner, and should be planted in the proportion of two of the former to one of the latter.

Care of the Plantation.—Once the trees are set in the ground very little care is necessary until the branches begin to overlap and to die off from shading. This should occur after about ten years, and a light thinning may then be made.

Pruning.—If desired, the lower persistent dead branches may be knocked off, but the pruning of live limbs is to be discouraged.

Fire.—It is essential that fire be kept out of the stand. A light surface fire will very easily scorch through the bark of the young trees, and result in their death, but after they have reached a diameter of about four inches the danger from serious fire injury becomes less. If the fire danger is excessive an effective preventative measure may be found in raking the litter and dead grass away from the outer boundaries of the plantation for a width of about 10 feet.

Animals.—For the first few years care should be taken that the trees are not trampled by cows or horses, and sheep should be rigorously excluded. Deer will occasionally nip the top off of the tender spruce seedling.

Insects.—The greatest pest to the white pine plantation is the weevil. This is a small borer that works in the trees up to the time that they are about ten feet in height. During the early life of the plantation the trees should be inspected occasionally and immediate action taken if the weevil is found.

This borer works in the whorl of branches at the base of the leader or tip of the tree. Small, round holes are to be found

between the bases of the branches in the whorl. Later in the season the leaves on the tip become brown, and the leader dies. When the weevil appears in the stand the top of the tree should be cut off and burned, to prevent its spreading to others. A side branch will then grow around and take the place of the leader. Frequent inspection and prompt action will sometimes save several years in the growth of the stand, while it may be that no trouble of this sort will be experienced at all.

Logging:—Ground free of slush, dense, weedy growth, and dead or decaying trees will give little opportunity for insects and fungi to breed. Consequently it is not advisable to plant too soon after logging. Little fear may be had of the subsequent health of the young trees when they are put in a clean piece of ground.

Thinning:—Unless the trees crowd badly no thinning should be made until the stand is from 20-30 years of age. At this time the poorer trees, those that have become overtopped, and enough of the others to leave good air space around each of the crowns of the trees left, should be removed. This material should be of boxboard size, and bring a fair price. The remaining stand should thenceforth accelerate in growth, particularly in diameter, the stand as a whole, in final cut and thinnings, having yielded a maximum cut per acre.

APPENDIX.

A LIST OF DEALERS IN NURSERY STOCK IN NEW ENGLAND.

George L. Mahoney & Co., Saco, Me.

Jesse Coffin, Brunswick, Me.

W. B. Whittier Nursery Co., South Framingham, Mass.

American Forestry Co., South Framingham, Mass.

Northeastern Forestry Co., New Haven, Conn.

Mount Carmel Forestry Co., Hartford, Conn.

Keene Forestry Co., Keene, N. H.

L. E. Williams, Exeter, N. H.

Prices vary with the seasons, and the size and kind of stock wanted, but any of the above dealers will be glad to quote prices for large or small quantities of stock.

RESOLVE OF THE 76TH LEGISLATURE OF THE STATE OF MAINE, CHAPTER 263.

Resolve, to Establish a State Nursery to Encourage the Re-forestation of the Waste Lands of Maine.

Resolved, that the sum of one thousand dollars be and hereby is appropriated for the year 1913, and the sum of one thousand dollars for the year 1914, to be expended by the forest commissioner for the purpose of establishing a state forest nursery in connection with the school of forestry to supply forest tree seedlings at a cost of production for use in planting the waste lands in the State of Maine.

(Approved April 4, 1913)

Revised Statutes, Chapter 9, Part 10 of Chapter 6, as amended by Chapter 169 of the Public Laws of 1907, as amended by Chapter 136 of the Public Laws of 1909.

Whenever a landholder plants or sets apart for the growth and production of forest trees and cleared land or land from which the primitive forest has been removed, and successfully cultivates the same for three years, the trees being not less in

number than six hundred and forty on each acre and well distributed over the same, then, on application of the owner or occupant thereof to the assessors of the town in which such land is situated, the same shall be exempt from taxation for twenty years after the expiration of said three years, provided, that said applicant at the same time files with said assessors a correct plan of such land with a description of its location, and a statement of all the facts in relation to the growth and cultivation of said incipient forest; provided, further, that such grove or plantation of trees is during that period kept alive and in a thriving condition.

(Approved March 24, 1909)

SENATE DOCUMENT 160—SYNOPSIS.

Under the provisions of a gift of Benjamin C. Jordan, five prizes are to be awarded to the owners of the best forest plantations. The prizes range from twenty-five dollars to five hundred dollars, and are awarded at intervals of eighteen years. The first award will be made on January 1, 1929. Competitors must register their lots and the judging will be done in accordance with a set of rules that may be obtained from the forest commissioner at Augusta.

A CLASSIFIED LIST OF AMERICAN LITERATURE ON
FORESTRY SUBJECTS FOR GENERAL READING
AND REFERENCE.

JOHN M. BRISCOE, M. F., Professor of Forestry.

The Forestry Department receives frequent requests for information as to the best books and publications on various forestry subjects. Many who can not spare the time to take a full course at the University are, nevertheless, desirous of obtaining more or less complete information on some particular phase of the subject in which they are most interested. Others wish to read up in preparation for a more complete study at a later date. Since correspondence courses in this subject have never proved satisfactory and have been discontinued, this list has been prepared especially for those who wish to take a course of selected reading on the subject of Forestry.

Since foreign publications are not generally available even in the Public Libraries of rural communities, the list has been confined chiefly to American books and publications. It makes no pretension of being complete, but is intended to be merely suggestive.

The works are classified under the following headings for the convenience of the non-technical reader, so that he may refer to any branch of the subject which he wishes to investigate:

Care of Trees
Dendrology—(Identification of Trees)
Economics
General
History
Identification of Wood
Lumbering (Utilization)
Management
Measurements
Physiography

Silviculture—(Establishing, tending and protection of forests)
Wood Preservation

Periodicals and Current Literature

All of these being sub-divisions of the general subject of Forestry.

In the listing of each work the following order has been observed: Name of publication; name of author; name and address of the publisher; Price, according to latest quotations. (The latter is not guaranteed, since it is subject to change at any time.)

In general the most desirable book, *if only one can be read*, is given first under each sub-heading; but further than this no regular order or precedence has been observed in the listing.

A CLASSIFIED LIST OF AMERICAN LITERATURE ON FORESTRY
SUBJECTS FOR GENERAL READING AND REFERENCE.

CARE OF TREES.

The Care of Trees, B. E. Fernow, Henry Holt & Co., N. Y.....	\$2 00
Shade Trees in Cities and Towns, Wm. Solotaroff, John Wiley & Sons, N. Y.....	3 00
Practical Tree Repair, Elbert Peets, McBride, Nast & Co., N. Y.....	2 00
Diseases of Trees, H. M. Ward, The MacMillan Co., N. Y.....	4 00
Diseases of Economic Plants, Stevens & Hall, The MacMillan Co., N. Y.....	2 00
Bureau of Entomology Bulletins, (Send to Superintendent of Documents, Washington, D. C., for Price List No. 41, which gives a complete list of all the publications of this Bureau of the United States Department of Agriculture, on Forest Insects).	

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The Natural Replacement of White Pine on Old Fields in New England States, Forest Service Bulletin, No. 63, U. S. Dept. of Agriculture.....	10
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INSECT DAMAGING SPRUCE TREES THE SPRUCE BUD-WORM

By J. M. BRISCOE, Professor of Forestry

Many inquiries have been received during the present year in regard to an insect which is doing considerable damage to the spruce and fir trees in this state. Specimens of the insect have been received both by the Experiment Station and the Forestry Department of the University of Maine. These specimens have been identified by the entomologists as the larvae or caterpillars of the spruce bud-moth (*Tortrix fumiferana*) which injure the young growth of spruce and fir, and sometimes also hemlock and larch.

This insect eats the buds and young leaves of spruce and fir chiefly, causing a brown and withered appearance of the infested trees.

About one hundred years ago the spruces west of the Penobscot river and along the coast of Maine were badly injured and many of them killed by the attacks of an insect believed to be this same species. Some thirty to thirty-five years ago another outbreak of the spruce bud-moth occurred, lasting four to five years. During this attack also many of the spruces and firs along the coast were injured, and many of these trees while not killed outright by this insect, were, owing to their weakened condition, left as an easy prey to the spruce bark beetles. Dr. A. S. Packard in a paper written at that time says—"The pleasure of driving over this picturesque road, with its striking northern, harsh and wild scenery and frequent glimpses of Casco Bay in former years greatly enhanced by riding through bits of deep dark spruce forests, has been not a little marred by the acres or even square miles of dead spruces, stripped of their dark sea green foliage, reduced to skeletons, and presenting a ghostly, saddening and depressing sight, which border the road.

And, indeed one may travel through the spruce forest of the coast from Portland to Rockland and meet with similar sights." It was not, however, till the spring of 1909 that this insect again began to attract attention, first in Pennsylvania and later in New York and Canada. In 1910 it was much worse in the centers of the infestation, and in 1911 it had spread to the coast of Maine where its work is now attracting so much attention. This season the pest is widely distributed over the state, reports having been received at the Experiment Station from localities in Aroostook, Penobscot, Hancock, and Piscataquis counties, and it very probably occurs in others.

The insect which is responsible for the destruction is a small caterpillar about three-quarters of an inch in length when full grown. Its head is blackish, the body ranging from pale brown to a rich umber brown, diffused with green, each joint with several conspicuous whitish warts each with a dark center from which a single hair arises. The miller or moth is about one-half inch in length, measuring when spread out nearly an inch from tip to tip of wing. The legs, body and hind wings are a glistening umber brown, the fore wings have a ground color of bluish gray and when freshly emerged marked with several conspicuous blotches and dashes of very dark brown to almost black.

The eggs which are laid soon after emergence of the moth are pale green, scale-like, flat beneath, and slightly convex above.

The insect passes the winter on the trees as very small caterpillars which, as soon as the new growth starts in the spring, begin to feed on the leaves of the terminal twigs, thus causing the brown and withered appearance of the trees. These caterpillars stop feeding by the middle of June and transform to the chrysalis or pupal stage in thin webs among the living and dead needles at the ends of the branches, not always, however, in the suspended position as shown in the illustration. By the first of July the adults begin to come out from the chrysalis stage and appear on the wing as small grayish moths, often appearing in vast numbers on the trees and flying to light. They continue to fly and to deposit their eggs in small greenish masses on the needles until about the middle of July, when the moths die and disappear. The eggs soon hatch and the young caterpillars become partly grown before the end of autumn.

passing the winter among the terminal shoots of the trees where they remain until the next spring, when the life process is repeated.

There are no practical ways of protecting forest trees from the attacks of this insect, but in the case of a limited number of small trees around a residence or in parks, the foliage could be protected by spraying with arsenical solution (arsenate of lead, $2\frac{1}{2}$ lbs. to 50 gallons of water) about the time of the opening of the buds and the appearance of the new growth in the spring.

The information acquired by the United States Department of Agriculture through the Bureau of Entomology regarding the seasonal history of this insect indicates that there is no occasion for any great alarm as to its continued presence, or any extensive loss of spruce and fir anticipated as a result of its work. The insect has many natural enemies which multiply very rapidly as the Ichneumon and the Braconid flies, which fortunately are quite numerous this year. These may be counted on within a few years to reduce the numbers to a point where the limited amount of damage attracts no attention and does little injury.

Since, however, one or more years may elapse before these parasitic enemies of the spruce bud-moth gain control, the destruction of some of the spruces and firs is inevitable.

Note—Acknowledgement is due to the Maine Experiment Station and the United States Bureau of Entomology for data included in this article.

BENJAMIN C. JORDAN FUND.

At the session of the Legislature of 1909 Benjamin C. Jordan, of Alfred, who for many years has been interested in conserving the timber lands of Maine, presented to the members the unique proposition of giving to the state the sum of \$1,000.00. The conditions of said gift are set forth in the following proposition, signed by Mr. Jordan:

I would like to give to the State of Maine, to be its property forever, one thousand dollars, on condition that in consideration of said gift the state shall, once in 18 years, offer five prizes to be called the Jordan Forestry Prizes, as follows:

\$500.00	1st prize
\$250.00	2d “
\$125.00	3d “
\$100.00	4th “
\$25.00	5th “

Said prizes to be offered now by the State for the five best lots of young forest growth in the State and awarded by the State Forest Commissioner subject to the approval of the Governor, January 1st, 1927, and once in 18 years afterward forever, after a careful examination of all lots competing in accordance with the following rules:

Rule 1. Each lot shall consist of one parcel of not less than ten acres in some what regular shape and shall be accurately surveyed and plotted.

Rule 2. The majority of said trees shall not be less than ten feet nor more than thirty feet high and not less than ten nor more than thirty years old when the prize is awarded.

Rule 3. Said forest may consist of any of the following kinds of trees, but other circumstances and conditions being equal, preference shall be given in the following order: White Pine, White Oak, Hickory, Chestnut, Hacmatack, White Ash,

Yellow Oak, Red Oak, Bass, Hemlock, Spruce, Norway Pine, Pitch Pine, Cedar, Fir, Poplar, Birch, Maple, Beech and Elm.

Rule 4. All competitors for the prizes shall file in the office of the State Forest Commissioner, their intention to compete, together with a correct and definite survey and plan of the lot, ten or more years before each award, and when such notice has been filed, said lot shall be eligible although the ownership may have changed.

Rule 5. Myself and my heirs shall have the same right as others to compete for the prizes.

Rule 6. In awarding prizes, other circumstances being equal, the following conditions shall be considered in the order named:

(a) Right number of trees per acre. (b) Even distribution over whole lot. (c) Health and thriftiness of trees. (d) Adaptation of the varieties of trees to the soil in which they stand. (e) Uniformity of size of trees. (f) Size of trees. (g) Size of the lot.

BENJAMIN C. JORDAN.

Alfred, Maine, January 14, 1909.

In accepting the offer the Legislature passed the following resolve:

Resolved, That the offer of Benjamin C. Jordan, of Alfred, Maine, giving to the State of Maine, one thousand dollars, to be known as the Jordan fund, conditions of which are herewith annexed, be hereby accepted, and the conditions of which shall be carried out by the State Forest Commissioner.

The \$1,000.00 was deposited with the state treasurer by Mr. Jordan, as required during the year 1909.

Competitors have filed intentions with the Forest Commissioner as follows:

GARDINER, MAINE, Oct. 27, 1914.

Blaine S. Viles, Esq., Land Agent and Forest Commissioner, Augusta, Maine.

DEAR SIR:—We hereby notify you that we intend to compete for the Benjamin C. Jordan Forestry Prize, and attach hereto engineer's plan of our White Pine plantation at Gardiner, Maine.

Three year old pine transplants were used throughout, the 1910 planting being spaced approximately 5' x 6', and the 1914 planting 5' x 5'. Plants were from 6" to 10" tall when set out.

This plantation can be seen from the cars of the Lewiston, Augusta and Waterville St. Rwy. about one mile west of Gardiner.

Respectfully yours,

GARDINER FORESTRY CO.,

..

(Signed) D. H. DARLING, *Sec'y.*

AUGUSTA, MAINE, NOV. 11, 1914.

Hon. Blaine S. Viles, Land Agent and Forest Commissioner.

DEAR SIR:—I respectfully file my intention to compete for the Benjamin C. Jordan Prize, with the following statement of facts.

In 1907, a parcel of land known as "Greenwood Church," 22.95 acres, from which the primitive forest had been removed, was set apart for the growth of an incipient forest.

In 1907, the pine and spruce trees on the lot were trimmed, and 3000 pine and 1000 spruce were set out by John Appleton.

In 1908 and 1909, 1900 pine and 1000 spruce were set out by Blaine S. Viles.

In 1911, 2000 pine were set out by Blaine S. Viles.

.....
Very respectfully yours,

(Signed) SAMUEL CONY MANLEY,

Trustee under the will of Joseph H. Manley.



SAVE THE FORESTS

The Forests are about **14,291,918 Acres**

Furnish employment to thousands of people.

of Protect water powers valued at **\$150,000,000.**

Furnish a playground for the Nation.

Maine Are the most valuable asset of the State.

More timber has been **Wasted** in the past than **Utilized.**

The **Community** loses from **Forest Fires** many times the amount of loss to the **Individual Owner.**

GOOD CITIZENSHIP DEMANDS—

THE LAW COMMANDS—

Strict Observance of the following Precautions:

DON'T throw away **burning** matches, tobacco, cigars and cigarettes.

DON'T kindle camp fires in **dry** periods.

DON'T kindle camp fires in **dangerous** places; **near logs, rotten wood, leaves, etc.**

DON'T kindle a camp fire at a distance from **Water.**

Always totally extinguish a camp fire before leaving it.

If you find a fire **Put it Out** if possible. If you can't do this **Spread the Alarm** by notifying the nearest **Fire Warden** and other interested parties. Also wire the **Forest Commissioner,**

BLAINE S. VILES, Augusta, Maine.

REPORT

ON

ISLAND TITLES

ALONG THE

COAST OF MAINE

UNDER

RESOLVE OF 1913, CHAPTER 180

BY

MELVIN H. SIMMONS

OF AUGUSTA

MEMBER OF THE KENNEBEC BAR

To the Honorable Blaine S. Viles, Land Agent for the State of Maine.

I herewith submit my report of my investigation of island titles on the coast of Maine, which has been in progress, with such time as I could devote to same, since July of 1913,—said investigation being made for your office under Resolve of 1913, Chapter 180.

From the statement of facts accompanying, it appears that the object of the resolve is to determine what islands along the coast, the State of Maine still retains title to; and its context would indicate that even the smaller islands and ledges were considered of importance.

An examination of the charts of the Maine coast, with its long indented coast line, dotted with very numerous islands, together with an examination of the data at hand relative to the disposition of these islands, led me to realize the importance and necessity of devising some good system, a pursuance of which would, as far as possible, give me the required results.

I accordingly obtained the services of the late Joseph Williamson, a man who had a considerable experience with island titles and a good knowledge of the sources of land titles in Maine, to assist me in devising some method of doing this work. After an examination of the material available, we adopted a method along the lines of which this work has been done.

METHOD.

I was unable at the Land Office, or elsewhere, to find any index or catalog of the islands on the Maine coast, and perhaps none was ever made. It was apparent that as a starting point it would be necessary to make a catalog of all such islands as the Resolve contemplated, and such a catalog as would locate each island definitely and avoid the confusion incident to the similarity of names which are everywhere found.

In looking for some map covering the entire coast, and on such a scale as to show the smaller islands, I found the only

map of such description, was the coast charts published by the United States Coast and Geodetic Survey, which I adopted and which furnishes the basis for this whole investigation. These charts, nineteen in number, cover the entire coast.

From these charts I proceeded to make a catalog of every island and ledge on the Maine coast as far as it appeared from said chart to be in any part above water at high water mark. I listed some thirteen hundred islands and ledges along the coast.

DESCRIPTION OF CARD INDEX.

To avoid confusion in names, as well as to make possible an accurate listing of these islands, I adopted the method of dividing each chart into squares, using lines of longitude and latitude of four minutes each. I thus have the longitude and latitude of each square, by which it may be readily located. I have numbered each square on these charts consecutively commencing with 100, to avoid confusion with island numbers; and numbered each island in the square consecutively beginning with one. The size of these squares is a mere arbitrary selection with a view of making a square as large as possible consistent with its not containing too large a number of islands to be easily listed.

I then prepared a card index of all these islands, not in alphabetical order of their name, but in numerical order of the squares, using a heavy index card for each square, followed by cards in numerical order containing the name and number of islands as appear on charts. As stated before, this method definitely locates a particular island, and avoids the confusion caused by the fact that many of these islands have the same name.

This card index and charts are a part of this report, and are filed with it in the Land Office.

HOW TO USE THE CARD INDEX.

For information about a particular island, locate the island on the series of charts. It will be found numbered in a certain square—for instance, island No. 1 in square 100. Go to the card index and under square 100, as indicated on the heavy index cards, on the first card will be found whatever this investigation may have discovered about that particular island.

With an index or catalog of all of these islands, it then became a process of eliminating those already conveyed.

I find, like all other lands in Maine, the three great sources of island titles along the coast are from ancient grants by the British Crown and its grantees (which will be more fully discussed later); the Commonwealth of Massachusetts—Colony of Massachusetts Bay, the Province and State of Massachusetts—before the separation of Maine and afterwards during its joint ownership in the public lands; and the State of Maine.

There is on file in the State Land Office copies of deeds given by Massachusetts and Maine, and a separate index of island conveyances. The island index is arranged alphabetically, and was made by going through the list of deeds and listing each island as therein named.

From the fact that Massachusetts commenced deeding these islands as early as 1780, invariably designating them by letter rather than name, with reference to some ancient plan or survey; the fact that these islands have often changed names since their conveyance; and the fact that many of them were conveyed by name without sufficient description as to location to distinguish them from other islands of the same name—made this index of little use, in determining whether an island as known and designated on the maps today was ever conveyed by Massachusetts or Maine. For illustration: If you wanted to know whether Ingall's Island had been conveyed by Massachusetts or Maine, an examination of the index would not show its conveyance, as it was conveyed by Massachusetts under the name of island A, and the index would so have it. To determine just what island as shown on the maps today, was intended in each of these conveyances, either by other names or imperfect description, involved considerable labor. Fortunately the old Massachusetts plans under which most of these islands were deeded have been preserved, and are on file at the Land Office; so by a comparison with the coast charts, it has been possible to locate the islands intended. From various other sources I have located islands granted under meager descriptions and feel that I have had good success in locating the islands intended in these conveyances, and making this index of practical use today.

My index above described will show the name under which an island was conveyed, if by another name than it now bears; the person to whom it was conveyed; book and page of record at Land Office; and a reference to book and page of plans. To take the above illustration, the card in my index designated "Ingalls Island"—its present name—would show as follows: "Conveyed as Island A to William Ingalls, June 15, 1786. Vol. 4, Page 27. Plan Book 8, Page 142."

My report must necessarily appear largely in my card index, as I have there attempted to indicate on the card for each island the disposition made of it, if any, and any facts relative to it. I do not think it expedient to mention individual islands already conveyed in a report of this kind—the facts about such may be found in the index. Nor does my report or index attempt to deal with titles subsequent to their conveyance by the State, the fact of such conveyance eliminating the island from my list as far as the object of this inquiry is concerned.

In making this investigation, I have come across a great deal of information relative to Maine island titles, much of which I shall incorporate into this report even at the risk of making it bulky and disconnected, with an idea of preserving it and making it easily accessible to anyone interested in this subject.

In my research I was unable to find any works treating of the source of titles to these islands as a whole, but was obliged to gather my information from various historical works, acts and resolves.

At this point it will perhaps be of benefit to enter into a history of legislation relative to the sale of these islands from two of the great sources of title, Massachusetts and Maine, from the time of the Treaty of Peace of 1783,—when this territory came wholly under the control of Massachusetts—to the present time. (The matter of ancient grants from the Crown will be treated hereafter.)

MASSACHUSETTS.

By a resolve of May 1, 1781, a committee consisting of Jedediah Preble, Johnathan Greenlief, David Sewell, John Lewis, and William Lithgow was appointed to look after the unappropriated lands of the Commonwealth. They were authorized to protect them from trespass; to examine the authority

of claims of title; to run the lines between lands of individuals and the Commonwealth; to make plans and ascertain the acreage.

By resolve of July 11, 1783, a special committee, with authority similar to the above, was appointed for lands within the County of Lincoln. It consisted of Samuel Phillips, Jr., Nathan Dane, and Nathaniel Wells.

By resolve of October 28, 1783, a mode for doing the business of the Commission was pointed out to the Committee. Among other things, it recommended that a surveyor be added to the committee and Rufus Putnam was appointed. The Committee was authorized and directed "to proceed in the disposal of said lands at public or private sale."

In July of 1784 the Committee contracted with Rufus Putnam for a survey between the rivers Schoodic and Cobscook. Putnam made his survey, and reported in November of that year. In 1785 he undertook the survey of the coast from Penobscot River to Cobscook. This work was completed and reported by the Committee to the General Court in 1786. Its reference to islands is as follows: "Together with 360 islands, being all the islands between Passamaquoddy Bay and Penobscot Bay, including all the islands in that Bay east of a line drawn from the West extreme of the Fox Islands to the mouth of the Penobscot River."

In Vol. 1, Eastern Lands, Deeds, etc., Massachusetts Archives, pages 510 to 521 are the instructions given Putnam, Dodge and John Barnard, who made the surveys of these lands. The instructions to Putnam were as follows: "You will begin your survey at Soward Neck and the River Cobscook where your surveys terminated last year, and continue them westward. Take a general plan of the sea coast to Penobscot Bay, and the situation of the principal rivers between Penobscot River and Cobscook as far into the country as you may find best, and of the islands found West of Quoddy Head, as far Westward as you shall survey the main." A very full report of the doings of this Committee on lands in Lincoln is to be found in the first pages of this volume. Putnam's Plans of island survey are on file in the Maine Land Office, Vol. 8.

In 1785 the Committee advertised the sale of these lands, announcing "besides, a number of valuable islands are also ready for sale."

By resolve of November 30, 1785, John Brooks was added to the Committee in place of Nathan Dane.

By resolve of November 16, 1786, Leonard Jarvis and Rufus Putnam were added to the Committee. "Any two of whom by consent of the majority are hereby empowered to transact and complete any business that is or may be assigned to the Commission by virtue of the aforementioned or other resolves."

By resolve of March 26, 1788, John Read and Dr. Daniel Cony were made members of the Committee.

By resolve of June 19, 1801, the Committee for the sale of Eastern Lands were discharged and John Read and Peleg Coffin were appointed agents for the Commonwealth with all powers that the Committee possessed.

By resolve of March 15, 1805, William Smith was appointed agent in place of Peleg Coffin.

Other resolves relative to this subject are :

Resolve of February 27, 1813,

Resolve of June 13, 1817,

Resolve of June 17, 1820,

Resolve of January 30, 1823,

Resolve of June 13, 1823,

Resolve of February 22, 1828,

Resolve of March 14, 1832.

In 1819 James Malcolm, acting under the Land Office, surveyed the islands lying outside the limits of the Waldo Patent returning plans and description of same which are now on file at the Land Office.

I have gone into this matter of Massachusetts resolves creating this Commission and Agents, and changing its personnel from time to time, quite extensively because under them that great mass of islands from the Penobscot to the St. Croix were surveyed and very many of the larger and important ones sold; the deeds bearing the signatures of these various members of this Commission. Some 150 islands, outside of those grants made of groups which contain large numbers of islands, such as the Fox Islands and Mt. Desert, were made by Massachusetts prior to the Separation. A large number of these often being sold to one person.

MAINE BECOMES A STATE.

On June 19, 1819, the General Court passed the Act of Separation by which Maine became a state. On August 24 a proclamation was made that provided "That the consent of this Commonwealth be and the same is hereby given that the District of Maine may be formed and erected into a separate and independent state, if the people shall in the manner, and by the majority hereinafter mentioned, express their consent and agreement thereto upon the following terms and conditions; and provided that Congress of the United States shall give its consent thereto before the fourth day of March next."

It directed the voters of Maine to vote on the question July 24th. On August 24th a proclamation was made that the required majority had been obtained, and the call issued for a convention. The convention met October 11 and completed the proposed Constitution October 29th, when it adjourned to January 5, 1820. The proposed Constitution was submitted to the people in town meetings on December 6, 1819, and adopted. The convention applied to Congress for admission, which was granted March 3, 1820. Maine became a state March 15, 1820.

MAINE BECOMES A JOINT OWNER OF THE PUBLIC LANDS.

The Act of Separation provided: "And all lands belonging to the Commonwealth within the District of Maine shall belong the one-half thereof to the said Commonwealth, and the other half thereof, to the state to be formed within said District, to be divided as hereinafter mentioned."

So that by the Act of Separation, as soon as Maine became a State it acquired along with other public lands a joint ownership in all islands along the coast then owned by Massachusetts with a few exceptions hereafter mentioned.

The Act of Separation further made provision for a division of these public lands, and the appointment of a commission of six commissioners to make the division.

"They shall have full power and authority to divide all the public lands within the District between the respective States in equal shares or moities, *in severalty* having regard to quantity, situation and quality; they shall determine what shall be surveyed and divided from time to time, the expense of which

survey and the Commissioners shall be borne equally by the two states."

Pursuant to this section of the Act, Commissioners are appointed by Massachusetts and Maine. They commenced their work in 1822 and finished in 1827, during which time a great deal of the public land jointly owned by the two states was set off in severalty.

At the completion of their work the doings of the Commissioners in the form of the minute of all their meetings and findings were made up in duplicate in the handwriting of their secretary, and filed one with Massachusetts and one with Maine. The doings of these Commissioners is of the utmost importance in tracing land titles originating from Commonwealth or State conveyances during the period of joint ownership of these lands. The copy filed with the State of Maine was dug out of obscurity by ex-Secretary of State Brown, who realized its value, and is now on file at the Secretary of State's office.

On December 28, 1822, the Commissioners took up the matter of a division of islands, and proceeded to divide the islands remaining unconveyed between the Commonwealth and the State of Maine.

The records of the Commissioners contain a list of the islands awarded to Massachusetts and Maine, giving location and acreage. The lists are preceded by the following statements:

"And thereupon the Commissioners divided and assigned to the share of the Commonwealth of Massachusetts, all the right, title and interest which the said Commonwealth or the said Commonwealth and the State of Maine had or might have in the islands hereinafter named and described within the State."

"And to the share of the State of Maine the Commissioners assign all the right, title and interest the said Commonwealth and the State of Maine had or may have in the islands hereinafter named and described within the said state."

The lists are followed by this statement: "And the said Commissioners do adjudge that the said right, title and interest in the islands assigned to the share of the said Commonwealth of Massachusetts and to the share of the State of Maine are equal, and that the said Commonwealth of Massachusetts and the said State of Maine do have and hold the right, title and

interest in the said islands in the shares assigned to them respectively *in severally*."

I will digress from the narrative of this report at this time to deal with the title of islands deeded by Massachusetts during her period of joint ownership with the State of Maine, and I think it will be of enough value to those tracing island titles in the future to warrant incorporating in this report a list of islands conveyed by Massachusetts during this period, showing her right to convey the whole title. During the period from the time Maine became a State and became a joint owner in the public lands—March 15, 1820—to the time Massachusetts disposed of her interest—October 5, 1853, Massachusetts conveyed many islands in severalty. As the deeds by which these islands were conveyed made no mention of the title of the State of Maine, and it is a possible construction that Massachusetts may be deeding only her interest,—to one knowing of the joint ownership during this period, in an examination of these deeds at our registries, it is not apparent where Massachusetts gets its right to deed the whole title. I understand there have been frequent inquiries on this point by owners and prospective purchasers of islands deeded during this period.

There are two ways by which Massachusetts after the Act of Separation acquired or retained a right to deed the whole title to these islands:

First: By the Act of Separation itself.

Section 7 of the Act provides as follows:

"All grants of land, franchises, immunities, coöperate or other rights, and *all contracts for*, or grants of land not yet located, which have been or may be made by the said Commonwealth *before the separation of said District shall take place*, and having or to have effect within the said district, shall continue in full force, after said district shall become a separate state."

This section provides for those grants by the Commonwealth made during the period between the date on which the Act of Separation was passed, June 19, 1819, and the date on which Maine became a State. The Act seems to clearly consider an interval of time between its passage and a compliance by the District of Maine with the conditions which would make it effective, and a possible failure of a sufficient majority of the voters of Maine to be obtained in favor of separation, and to

make provision for grants and contracts made by the Commonwealth in the interval so that they might be valid whatever the outcome.

It also reserves from the granting clause of this Act all lands contracted for prior to the time when separation took place, and some islands were subsequently deeded under that provision.

Second: By the assignment in severalty of various islands by the Commissioners, as has been previously described.

All islands conveyed by Massachusetts alone between the date on which Maine became a State—March 15, 1820—and the date of the deed from Massachusetts of her remaining interests in the public lands—October 5, 1853—showing her right to convey the whole title.

Name.	Present Name.	Location.	Date.
Black Island (Assigned by the Commissioners)	Spruce	North of Isle of Holt	Sept. 2, 1825
Island G. (Assigned by the Commissioners)	Buckle	North of Isle of Holt	Sept. 2, 1825
Poor Island (Assigned by the Commissioners)	Green	Near Deer Isle Thoro- fare	Sept. 2, 1825
Island M. (Assigned by the Commissioners)	Bold	Near Deer Isle Thoro- fare	Sept. 2, 1825
Island I. (Assigned by the Commissioners)	Devil	Near Deer Isle Thoro- fare	Sept. 2, 1825
Camp Island (Assigned by the Commissioners)		Near Deer Isle Thoro- fare	Sept. 2, 1825
Island H. (Assigned by the Commissioners)	Little Camp	Near Deer Isle Thoro- fare	Sept. 2, 1825
Indian Island (Assigned by the Commissioners)	Russ	Near Deer Isle Thoro- fare	Sept. 2, 1825
Ash or Saddleback (Assigned by the Commissioners)		Near Deer Isle Thoro- fare	Sept. 2, 1825
Island D. (Assigned by the Commissioners)	Shingle	Near Deer Isle Thoro- fare	Sept. 2, 1825
Island E. (Assigned by the Commissioners)	Enchanted	Near Deer Isle Thoro- fare	Sept. 2, 1825
Islands K. & L. (Assigned by the Commissioners)	Coat I's	Near Deer Isle Thoro- fare	Sept. 2, 1825
Island V. (Assigned by the Commissioners)	Rock	Near Deer Isle Thoro- fare	Sept. 17, 1823
Island W. (Assigned by the Commissioners)	Andrews	Near Deer Isle Thoro- fare	Sept. 17, 1823
Island X. (Assigned by the Commissioners)	Mark	Near Deer Isle Thoro- fare	Sept. 17, 1823

Name.	Present Name.	Location.	Date.
Island Z. (Assigned by the Commissioners)	Sand	Near Deer Isle Thoro- fare	Sept. 17, 1823
Moose Island (Contracted for by Samuel Allen, October 18, 1819)		Near Deer Isle Thoro- fare	Dec. 10, 1822
Dyer Island (Contracted for by Edward H. Robbins, Jr., June 10, 1818)		Narraguagus Bay	Apr. 19, 1821
Pond Island (Contracted for by Edward H. Robbins, Jr., June 10, 1818)		Narraguagus Bay	Apr. 19, 1821
Jordan's Delight (Contracted for by Edward H. Robbins, Jr., June 10, 1818)		Narraguagus Bay	Apr. 19, 1821
Trafton's Island (Contracted for by James Campbell, June 22, 1819)		Narraguagus Bay	Aug. 17, 1837
Goard Island (Contracted for by James Campbell, June 22, 1819)		Narraguagus Bay	Aug. 17, 1837
Birch Island B (Assigned by the Commissioners)		Frenchman's Bay, near Mt. Desert	Nov. 18, 1820
Island D. (Assigned by the Commissioners)	Trumpet	Blue Hill Bay, near Mt. Desert	Sept. 17, 1823
Ship Island (Assigned by the Commissioners)		Blue Hill Bay, near Mt. Desert	Sept. 17, 1823
Island E. (Assigned by the Commissioners)	Little Driscoe	A little So. Mispeskey Reach	Sept. 17, 1823
Tebut or O. Island (Assigned by the Commissioners)	Sheep	Mispeskey Reach	Sept. 17, 1823
Island I. (no name) (Assigned by the Commissioners)		A little So. Mispeskey Reach	Sept. 17, 1823
Island G. (Assigned by the Commissioners)	Stevens	A little So. Mispeskey Reach	Sept. 17, 1823
Island M. (Assigned by the Commissioners)	Shabbit	A little So. Mispeskey Reach	Sept. 17, 1823
Islands Q, R. S. T, U (Assigned by the Commissioners)	Goose	A little So. Mispeskey Reach	Sept. 17, 1823
Driscoe or Island P	Doyles		July 14, 1836
Allen's Island (Assigned by the Commissioners)		At the mouth of George River	July 17, 1823
Bald Porcupine (Contracted for by Wm. W. Parrott, June 10, 1818)	Sheep Porcupine	East Mt. Desert	June 16, 1820
Great Porcupine (Contracted for by Wm. W. Parrott, June 10, 1818)	Long Porcupine	East Mt. Desert	June 16, 1820
Little Porcupine (Contracted for by Wm. W. Parrott, June 10, 1818)	The Hop	East Mt. Desert	June 16, 1820
Middle Porcupine (Contracted for by Wm. W. Parrott, June 10, 1818)	Burnt Porcupine	East Mt. Desert	June 16, 1820
Jordan's Island (Contracted for by Wm. W. Parrott, June 10, 1818)		East Mt. Desert	June 16, 1820

Name.	Present Name.	Location.	Date.
Heron	Turtle	East Mt. Desert	June 16, 1820
(Contracted for by Wm. W. Parrott, June 10, 1818)			
Turtle	Heron	East Mt. Desert	June 16, 1820
(Contracted for by Wm. W. Parrott, June 10, 1818)			
Lane of Schoodic Island		East Mt. Desert	June 16, 1820
(Contracted for by Wm. W. Parrott, June 10, 1818)			
White Island		Eggamoggin Reach	Aug. 28, 1824
(Assigned by the Commissioners)			
Campbell Island		East of Deer Isle	Feb 10, 1824
(Contracted for by John Campbell, Oct. 18, 1819)			
Head Island	Birch	Near West end of Lit-	
(Assigned by the Commissioners)			
Brimstone		tle Deer	Sept. 17, 1823
(Assigned by the Commissioners)			
Four Acre Island		Between Ten Pound and	
(Assigned by the Commissioners)			
Holt's Island		Matinicus	Nov. 14, 1831
(Assigned by the Commissioners)			
Holt's Island		Opposite Heard's Bay	Sept. 24, 1832
(Assigned by the Commissioners)			
Holt's Island		Carrying Place Bay	Sept. 24, 1832
(Assigned by the Commissioners)			
Great Green Island		Near Matinicus	July 14, 1823
(Assigned by the Commissioners)			
Hog Island		Near Matinicus	July 28, 1823
(Assigned by the Commissioners)			
Little Green Island		Off Thomaston	1833
(Assigned by the Commissioners)			
McCobbs Island		Off Thomaston	1823
(Assigned by the Commissioners)			
Manana		Near Monhegan	1823
(Assigned by the Commissioners)			
Monhegan			1823
(Assigned by the Commissioners)			
Matinic		Near Matinicus	1824
(Assigned by the Commissioners)			
Moose Island		Bluehill Bay, near Mt.	
(Assigned by the Commissioners)			
Ragged Arse		Desert	1824
(Assigned by the Commissioners)			
Ragged Arse		Near Matinicus	1831
(Assigned by the Commissioners)			
Seaveys Island		Off Thomaston	1823
(Assigned by the Commissioners)			
Sowards Island		Flanders Bay, near	
(Assigned by the Commissioners)			
Wooden Ball		Gouldsboro	1825
(Assigned by the Commissioners)			
Wooden Ball		Near Matinicus	1823
(Assigned by the Commissioners)			

The only islands assigned to Massachusetts in severalty by the Commissioners not conveyed by her at the time of her deed to Maine of her remaining interests in the public lands—Oct. 5, 1853, are as follows:

Name.	Present Name.	Location.	Date.
B. Island	Folly	Between Mt. Desert and Bartletts	
A Island	Black	In Mt. Desert Bay	
Hopkins	Alleys	In Mt. Desert Bay	
A. Island	The Twinies	East of Thomas Island —Frenchman's Bay	
B. Island	The Twinies	East of Thomas Island —Frenchman's Bay	
Black Island		Frenchman's Bay	
Burnt Island		Frenchman's Bay	
Petit Manan		South of Steben	
Bar Porcupine	Bar Island	Frenchman's Bay, Mt. Desert	

A complete list of lands in Maine contracted for with Massachusetts prior to the Act of Separation is to be found in the Massachusetts Resolves of 1820, page 167.

MASSACHUSETTS AFTER THE SEPARATION.

By resolve of January 30, 1823 and June 13, 1823, George Coffin and the Treasurer were appointed agents with instructions to sell all lands, reserved lots and islands which fell to the share of the Commonwealth in the division by the Commissioners, and complete the same if possible within the present year—1823.

Acting under these instructions, the agents proceeded to sell these islands, and as will be seen from the foregoing tables, had sold almost all the islands assigned to Massachusetts by the Commissioners before disposing of the balance of the public lands to Maine—1853.

MAINE BECOMES SOLE OWNER OF PUBLIC LANDS.

The year 1853 marks another epoch in the history of the public lands in Maine. Back in 1821 before the division by the Commissioners an effort was made to purchase these lands of Massachusetts, and a committee appointed to negotiate with a committee of the Commonwealth. The committees met and reached an agreement as to the purchase of these lands belonging to Massachusetts. On March 19, 1821, a resolve ratifying the agreement was introduced, but neither of the State Legislatures would ratify it. For a number of years there had been

a growing feeling of dissatisfaction with the policy of Massachusetts in the management of its public lands, especially in the building of roads and bridges and making such improvement as would open the lands to settlement. This culminated in a resolve of the Legislature April 3, 1852, directing the Governor to lay before the authorities of Massachusetts the grievances of which Maine complained. The final result was an offer by Massachusetts to sell to Maine all her lands in this state, and the same were purchased by Maine's Executive. This purchase was ratified by the Legislature by resolve of September 23, 1853.

Pursuant to this agreement a deed was given by Massachusetts to Maine under date of October 5, 1853. Although a full schedule of the lands conveyed by this deed was incorporated in it, no mention whatever was made of islands. A copy of this deed is contained in House Document No. 14 of the Public Documents of 1854.

Whatever interest Massachusetts retained in the islands along the coast of Maine, would, however, pass by the following clause of the deed:

"Together with all the right, title and interest of said Commonwealth to and in any other lands within the said State of Maine, whether described or not described in this deed, not heretofore granted or conveyed by said Commonwealth."

So that by this deed Maine became sole owner of all islands, title to which was in Massachusetts at that time.

MAINE—1820 TO 1876.

A resolve of June 26, 1820, authorized the appointment of a Land Agent.

An act entitled "An Act to promote the sale and settlement of public lands" approved February 25, 1824, provided that the islands which had fallen to Maine in the division of lands with Massachusetts claimed by settlers might be sold and conveyed to them upon such terms and conditions as the agent deemed just and equitable. "And all other said islands and parts of said islands as may not be held or claimed as aforesaid, shall be sold by said agent in such manner as to him may seem fit."

By resolve of March 26, 1826, the Land Agent was authorized to make conveyances of all lands granted by the Legislature.

An act entitled "An Act to promote sale and settlement of public lands." Approved February 20, 1828, provided for the appointment of an agent by the Governor and Council to superintend and manage the sale of public lands, and authorized him to sell and convey certain lands. It repealed all previous acts relative to the sale and settlement of public lands.

The first Land Agent was James Irish and acting under the above acts and resolves and by special resolves of the Legislatures some of the islands, principally among those assigned to Maine by the Commissioners, were disposed of.

That the islands along the coast early came under the attention of the Legislature is to be seen from a resolve of March 23, 1838, directing the Land Agent to procure from Massachusetts an attested copy of all plans and surveys of islands situated in this state. Also a schedule of all islands sold by Massachusetts; and deposited same in Land Office.

Acting under this resolve, Oliver Frost went to the Massachusetts land office and made a copy of all records, plans and documents relating to islands since the establishment of the land office in 1784; and prepared a schedule "embracing all islands on the coast of Maine which had been surveyed under the authority aforesaid, and which were not embraced in any grant of Main land."

In his report which is contained in full in Land Agent's report of 1839 he says:

"I have arranged them—islands—in a table according to the requirements of said resolve, designating all islands sold by Massachusetts, the date of such sale, and the names of the respective purchasers, to which I have added the number of acres contained in each island, the page referring to the book of plans in the land office where their relative situation may be seen, and those assigned to the State of Maine in the division of lands between the Commonwealth since the Separation."

He also made copies of all plans Massachusetts had of islands and filed them in our Land Office.

Notwithstanding this interest manifested in islands and the securing of all possible information relative to same, no great number of islands were conveyed during this period.

The first island conveyed by Maine was September 6, 1824. Until 1876 she disposed of but forty-one islands, and twenty-nine of these were conveyed prior to 1830, mostly from among those assigned to her by the Commissioners. An examination of the reports of land agents prior to 1875 shows little or no space devoted to the subject of islands in their reports on the public lands. This long period of comparative inactivity in the disposition of islands while other lands were being rapidly disposed of, is probably due to the fact that but little information was to be had about those not included in the Massachusetts surveys, most of which were early disposed of, no schedules ever having been made by the Land Office of the others.

MAINE DETERMINES TO DISPOSE OF ALL HER ISLANDS.

The year 1876 is an important one in the history of island legislation, for in this year Maine started in earnest to get rid of all her islands.

This year was preceded by some activity on the part of the Land Office to determine the State's interest in these islands, and the Land Agent, Parker P. Burleigh, calls attention to them in his report of 1875 as follows:

"Among the very numerous islands in the ocean and bays which skirt the shores of Maine, many are still the property of the State, but exactly which is not known. No full schedules have ever been made of them, though plans of them exist among the documents donated by the State of Massachusetts. During the past year progress has been made in ascertaining the state of the title to these islands, but the difficulty of the task and the very great number of them makes the work a slow one. Frequent applications are made for the purchase of one or another, but no sales have been ventured in the present state of the records. The perfecting of these schedules with proper entries of the character, position and other necessary information respecting the property, forms an important duty yet to be performed."

Following this report the Legislature in 1876 passed the following act:

Chapter 79, of the Laws of 1876—approved February 11, 1876:

“That the Land Agent under the direction of the Governor and Council is hereby authorized and required to sell all the islands on the coast belonging to the State, at *public auction*, after suitable plans and examination shall have been made, and proper notice given of the time and place of such sale in such newspapers as may be deemed necessary.”

Under this act the Land Agent, Edwin C. Burleigh, made an investigation of island titles along the coast with an idea of determining what islands the state still owned, a committee from the Council visiting many of the islands. The result of this investigation is shown in the Land Agent's report for 1876:

“Under the provisions of the statute of 1876, Chapter 79, entitled ‘An Act to authorize the sale of islands belonging to the State,’ a very thorough examination was made into the title of the very many islands which skirt the coast of Maine, in order to ascertain what had been sold, also to determine what remained to be sold under the act. The search necessarily carried the examination back to the earliest history of the State, even to the time of the Revolution and before, and involved a great amount of labor and research among the archives of Massachusetts and Maine. The investigation thus instituted disclosed certain conveyances and grants of very many of the islands at different times, the perpetuation of which information has been thought of sufficient interest and importance to warrant their publication in connection with this report. The schedules H and I annexed contain lists of all such, with the dates of the grants and names of grantees or purchasers.

“Besides those thus granted and conveyed, a list of sixty-six in number remained, the title of which appears never to have passed from the State. As many of these were more or less in occupation of individuals, the committee of the Council on public lands visited the islands so far as they are located west of the line of Washington County, and ascertained the facts respecting them. This investigation leads to the conclusion that the title of all of these was still in the State, and therefore subject to be sold under the Act referred to.

“A public sale of all of these was accordingly made at Rockland on the 21st day of November, 1876, previous notice having been given according to the Act. Payment has since been made and deeds executed of the whole list, except those which will

probably be sold at an adjourned sale to be held in December, unless previously paid for by the bidders.

"The aggregate amount of money already received from the sales is \$1,109.15. The annexed schedule J contains a list of all the islands thus sold, together with the names of the purchasers and sums bid. *With the exception of some small unimportant islands lying in front of the County of Washington*, the above disposes of all the islands belonging to the State, so far as has been possible to ascertain."

The adjourned sale was held on December 28, 1876. This report contains a schedule of all islands conveyed by Massachusetts prior to 1852; and all islands conveyed by Maine prior to November 24, 1876.

The Council passed the following orders relative to this sale:

Council order of October 26, 1876: "Ordered that the Land Agent be and is hereby directed to advertise for sale all the islands along the coast of the State of Maine belonging to said State, at public auction, at Rockland, November 21, 1876, at 10 o'clock A. M."

Council order of November 17, 1876: "That the sale of islands belonging to the State under the act of 1876 be made under the conditions that if the title of any island fail or be found not in the state, the consideration money paid therefor shall be refunded, or if such title shall partially fail, then such part of the consideration shall be refunded as in the opinion of the Governor and Council shall be proportionate in value to the whole. All deeds of islands sold under said Act, shall describe only the right, title and interest of the State, and the deed shall express in substance the purport of the foregoing conditions."

These sixty-six islands were for the most part sold for a few dollars each, the price ranging from twenty-five cents to four hundred and forty dollars. Thirty-four brought \$5.00 and under; ten more between \$5.00 and \$10.00; the whole yielding \$1,109.15. This sum could hardly have paid the expense of the investigation.

This investigation at this time must have covered exactly the same field as I am at the present time, as its object was the same, to wit: To determine what islands the State then owned; but outside of the list of islands conveyed prior to 1876, and a

list of the islands title to which were found in the state and sold, contained in the report for that year, I was unable to find at the Land Office or elsewhere any record of their work. In such an investigation they must have considered such questions as the location and validity of the ancient grants, the construction of the various deeds of some of the larger groups of these islands; in fact must have considered all phases of the state's title to islands on every part of the coast—from a close examination of the results of their work, as shown by the islands they sold, I know they did. A complete record of their work at that time would have aided very materially in any later investigation, and probably made any such investigation unnecessary. The want thereof, being so obvious a loss, has prompted me to make this report somewhat fuller than a compliance with the resolve under which I am acting would necessitate.

The next year the following act was passed by the Legislature:

Laws of 1877, Chapter 166—Approved February 7, 1877: "The Land Agent under the direction of the Governor and Council, is hereby authorized to sell either at public auction or *private sale*, any islands on the coast belonging to the State."

The report of the Land Agent for 1877 is as follows:

"Under the acts of the Legislature of 1876 and 1877 seventy-seven islands lying in the sea along the coast of Maine were sold during the past year, as appears in schedules annexed. Several remain which were withheld from sale on account of the uncertainty of title."

Under the above Act, during this year, the islands above mentioned, lying in front of Washington County, were disposed of. They were sold in blocks to seven purchasers, and the State realized \$251.00 from the sale. They were disposed of under a Council order similar to that of November 17, 1876.

An act passed in 1878, Chapter 51 of the Laws of that year, authorized the Land Agent under the direction of the Governor and Council to convey islands.

These conveyances in 1877 ended the attempt by Maine to dispose of all of its islands, the state at that time considering the task completed, as shown in the Land Agent's report for 1878:

"The islands along the coast belonging to the State have been sold and conveyed excepting some unimportant cases, and where serious doubt exists as to the right of the State to interfere."

However, from this time to 1892 islands received some attention in the reports of the Land Agent, and often a revised schedule of those that had been previously conveyed were annexed.

The Land Agent in his report of 1880 says on this subject:

"On account of the almost numberless islands on our coast, it has been found difficult to ascertain the number belonging to the State, so that they might be placed on the market. The only way that now appears feasible is to act on each application as presented."

ISLANDS RECOGNIZED AS VALUABLE FOR SUMMER RESORTS.

The growing value of our islands for summer resort purposes commence now to be realized, as shown by the Land Agent's report of 1882:

"There are numerous applications now on file in the Land Office for islands and ledges on our coast, and as the Land Agent has no personal knowledge of the value of them, and their value does not appear to warrant the expense of a personal inspection, no action has been taken on them.

"Our sea coast, lined with almost innumerable islands, has become a fashionable summer resort for large numbers of the inhabitants of the crowded cities on the Atlantic Coast, and the inviting cool summer breezes are drawing a large population onto these islands during the hot summer season. This summer travel is not likely to decrease, but appears to be increasing each year. Small and barren islands, hitherto of no value, are sought for by these pleasure seekers, and houses have been erected for their accommodation. The title to these small islands has not been considered of any consequence, but when expenditures of money are to be made upon them, it becomes a question of some importance to know who holds the title."

In his report of 1883 the Land Agent says:

"The sale of lands and islands must be limited, as it was supposed that all the islands and lands, except such as were reserved for settlement, were sold in 1878."

In his report of 1889 the Land Agent says:

"The repeated calls for information about the titles to islands on the coast is somewhat perplexing. Inquirers evidently think that there is somewhere a schedule of all the islands on the coast and that they can easily ascertain whether the State claims any title or not. All islands not previously sold, and that were considered to be of any value, were scheduled by Maine and Massachusetts in 1822, and divided between the states as provided in the Act of Separation. These islands have all been sold, and the islands remaining were not considered of any value, and no list or schedule of them was ever taken or filed."

In his report of 1892 the Land Agent says:

"I have prepared a new list of all islands that have been conveyed by the State, including those by Massachusetts before Maine became a State. The general opinion seems to be that the islands not included in this list are still the property of the State and should be so regarded, although in many instances there are pretended owners basing their claims upon the fact that members of their family have claimed them for many years. In some instances where improvements have been made, and the land actually occupied, perhaps these claims should be recognized to a certain extent, but where there has been no actual occupation and no improvements made, I fail to see how any valid claim against the State can be set up."

The Forest Commissioner's Report for 1908 contains a revised schedule of islands conveyed to that time. He says:

"The islands of the State have always been the source of much controversy, and there is still much interest taken in them. The bulk of the islands in which the State has or had an interest has been disposed of by deed or grant."

"In 1876 an Act was passed by the Legislature authorizing and requiring the Land Agent to sell, under the direction of the Governor and Council, all the islands on the coast belonging to the State. Acting under that order the majority of the unsold islands were disposed of. Little account was taken at that time of small islands or ledges. Owing to the general increase of values in coast property for summer resort purposes, there has of late years sprung up a demand for even the smaller of these. It has, however, become the settled policy of the Governor and Council to refuse all applications for these small islands and ledges, deeming it of more general interest to retain

these resting or landing places for the general use of fishermen and the public."

An examination of the acreage of islands sold in 1876 and 1877 shows that islands as small as one-half acre were considered in those sales.

One reading these reports of the different Land Agents since 1877 must be struck by the varied opinion as to the number and value of islands belonging to the State—some considering the State as having disposed of practically everything it had, and others considering the State as still retaining many valuable islands. This cannot be wholly accounted for by the fact that a general increase in value of coast property for summer resort purposes, made the smaller islands of importance and value.

The cause, I believe, is rather lack of information at the Land Office as to the source of title of islands on some sections of our coast, where Massachusetts or Maine have made few or no conveyances, and there are many valuable islands,—the reports reflecting the opinion of individual land agents on the State's title to such.

From the time of the large sales in 1876 and 1877 to the present time Maine has continued to dispose of a few islands from year to year. For a while by act of the Governor and Council until that body adopted a settled policy or reserving the remaining islands to public use and refused all applications for them: and then by resolves of the Legislature.

The policy long ago adopted by the Governor and Council of saving the remaining islands and ledges for public use, has been gaining favor in recent years, and culminated in the last Legislature in the following act:

Chapter 132, Section 2, Laws of 1913: "The title to all islands located in the sea within the jurisdiction of the State of Maine, except such as has been previously granted away by the State, or are now held in private ownership, shall remain in the State of Maine and be reserved for public use."

Thus ends the history of island legislation by two of the great sources of island titles, with a complete reversal of that policy of 1876 which sought to rid the state of every island it owned.

ANCIENT GRANTS.

The third great source of island titles is grants from the British Crown, proprietors, and in some instances Indian grants, prior to the Treaty of Peace in 1783.

An investigation of these grants takes us back to some of the earliest settlements on this Continent, and makes one almost entirely dependent on historical works for information concerning them.

These grants were made with little actual knowledge of the geography of the country, and not only over-lapped each other, but often covered the same territory as previous grants. This fact was the cause of almost endless contention and litigation, which retarded the settlement of the lands for many years. These claims of adverse claimants under these various grants, purchases from the Indians, and possessory titles, as far as the main land is concerned were finally adjusted, often by grants of other territories, as the simplest way of adjustment where there was an abundance of land of little value.

Islands, as well as mainland, were included in these ancient grants, but were probably of not enough value or consequence to receive much attention in those adjustments that confirmed land titles along the coast. Any attempt at this late date to definitely trace the title of many of these islands back to some particular grant would perhaps be impossible.

Some of the best authorities I have found on these early grants are the following:

Sullivan's History of the District of Maine

James Sullivan—1795

Statistical View of Maine

Moses Greenleaf—1816

A Survey of the State of Maine

Moses Greenleaf—1828

Oliver Frost's Report on Lands Reserved

Land Agent's report of 1839

Sources of Land Titles in Maine

Hon. Chas. W. Goddard, 4th revision
of Maine statutes—1883

Introduction in Volume I, York Deeds

History of the Wild Lands of Maine

Land agent's report of 1908

With his survey of Maine in 1828 Moses Greenleaf published a map of the District of Maine, the first correct one ever made of the District. This map shows the character of the occupation along the entire coast—whether proprietary, Indian deeds, or possession—setting each off in different colors.

It will perhaps be of value here to give a brief description of these early grants.

SOURCES OF LAND TITLES.

1. Nov. 3, 1620: Grant to the Council of Plymouth known as the Great Charter of New England conferring in fee simple all the North American Continent and *islands* between the parallels of 40 and 48 (from the Bay of Chaleur as far South as Philadelphia).

Note: An earlier grant of land in Maine was made by the Crown, but this is the first one under which titles are claimed.

2. August 10, 1622: Council of Plymouth granted to Gorges and Mason a patent conveying all the country between the Merrimac and Kennebec to the furthest head of said Rivers and sixty miles inland, with all the islands and islets within five leagues of the shore which they intend to call the "Province of Maine."

3. 1627-28: Grant by the Council of Plymouth to Colony of Massachusetts Bay—John Endicott et als—between the Merrimac and the Charles, and within three English miles to the Northward of the River Merrimac, or to the Northward of any and every part thereof from the Atlantic and Western Sea and Ocean on the East part to the South Sea on the West part. (A part of Maine subsequently claimed under this grant.)

4. January, 1629: Grant to the Pilgrims by Council of Plymouth of the Kennebec or Plymouth Patent—15 miles in width on each side of the Kennebec River between Woolwich and Cornville.

This grant was sold by the Pilgrim Colony in 1661 for 400 pounds to four persons.

In 1753 the land passed to a company, and was thereafter known as the Kennebec Purchase.

The Great Charter of New England was surrendered by the Plymouth Council to Charles I on June 7, 1635, who divided all

the territory of the Council not deeded into eight Royal Provinces, four of which were in Maine. Gorges obtained Western Maine, being all the territory between the Piscataqua and the Kennebec.

There were six permanent settlements at that time :

1. Agamenticus (York).
2. Piscataqua (Kittery Point and North half of Isle of Shoals).
3. Black Point in Scarboro.
4. Lygonian Plantation or Casco (Portland and vicinity).
5. Pejepscot Settlement on lower Androscoggin.
6. Kennebec Patent.

5. April 3, 1639: Gorges obtained a Provincial Charter of his territory "All that par, purport and porcon of the Mayne Lands of New England aforesaid, beginning at the entrance of Pitcatway Harbor, extending up that River and through Newichawannock and Salmon Falls River Northwestward one hundred twenty miles, and then overland to the utmost Northerly end of the line first mentioned, including the North half of the Isle of Shoals—also all the *islands and inlets within five leagues of the Mayne*, along the coast between said River Piscataquay and Sagadahoc, all of which par, purport or porcon of the Mayne Land we do for us our heirs and successors create and incorporate into one province or county, and we do name ordain and appoint that the porcon of the Mayne Lande and premises aforesaid shall forever hereafter be called and named The Province or Countie of Mayne."

In addition to the Gorges and Mason Grant—Portsmouth to the Kennebec—and the grant to the Pilgrim Colony—15 miles each side of the Kennebec—and any right the Massachusetts Colony might have under its grant from headwaters of the Merrimac,—the Council of Plymouth made twelve other grants as follows :

1630.

1. To Lewis and Bonythan on the North side of the Saco River four miles along the coast and eight miles inland, with adjoining islands.

2. To Oldham & Vines, a similar tract in Biddeford, on the South side of the Saco, with adjoining islands.

3. The Muscongus Grant, a territory thirty miles square between the Muscongus and Penobscot Rivers, afterwards known as the Waldo Patent, and islands within three miles of the main.

4. The Lygonian Patent, extending from Kennebunk to Harpswell and forty miles inland, including islands of Casco Bay—rights of soil and government. Assigned to Alexander Rigby April 7, 1643. Confirmed to him by Earl of Warwick and Council in March, 1646.

1631.

1. The Black Point Patent in Scarboro, to Cannock, 1500 acres on the seacoast on the East side of Black Point River.

2. The Pejepscoct Patent on the North side of the Andros-coggin River, to Bradshaw.

3. The Agamenticus Patent,—to Godfrey et als, York, 12,000 acres.

4. Richmond Island and 1500 acres on the mainland at Spirkwink in Scarboro,—to Bagnall.

5. Capre Porpoise—2000 acres on South side,—Stratton.

1632.

1. The Trelawney & Goodyear Patent between Black Point and the River and Bay of Casco, including the ancient town of Falmouth (Portland and vicinity) Cape Elizabeth and a part of Gorham.

2. The Pemaquid Patent at Bristol between the Muscongus and Damariscotta Rivers—12,000 acres along the seacoast and up the river *besides all the islands three leagues into the ocean.*

3. The Way and Purchase Patent on the lower Andros-coggin, reaching to Casco Bay.

“The whole embracing the entire seaboard from the New Hampshire line to the Penobscot (except the coast between Sagadahoc and Damariscotta, a tract of five leagues including the Sheepscot Plantation *and the Islands*, and the most even of that small strip was claimed under the Kennebec Patent and purchases from the Indians.

Some of these grants conflicted with each other.

In 1651 the Massachusetts Bay Colony put forth a claim under their grant to a point as far East as Goose Rock (on the line which still divides Falmouth and Cumberland) and Split Rock on the Northern part of Upper Clapboard Island (Sturtevant's).

Massachusetts proceeded to enforce its government over the inhabitants of the Provinces of Mayne and Lygonia.

Massachusetts later—1671—under another survey claimed East as far as Whitehead Island in Penobscot Bay.

In 1676 Gorges and Mason obtained a decision on their complaint against Massachusetts Bay instituted in 1659 extinguishing the claim of Massachusetts Bay Colony to Maine, but leaving the rightful ownership of the Province undetermined.

On May 6, 1677, Gorges gave John Usher for the Massachusetts Colony an assignment of the Province of Maine as granted to Gorges by Charter of King Charles I, April 3, 1639, "excepting grants made by the original proprietor or his agents."

Note: Under this assignment Massachusetts claimed the Province of Mayne—New Hampshire line to the Kennebec.

DUKE OF YORK GRANT.

March 12, 1664: The King granted to his brother James, Duke of York the whole region between the St. Croix and Pemaquid, and then to the Kennebec "The Territory of Sagadahoc "New Castle" "the County of Cornwall."

This was an encroachment on the Kennebec Patent, The Pemaquid Patent, Muscongus Patent, Sheepscot Plantation and others.

This patent was confirmed by a new patent to James, June 22, 1674.

Reverted to the Crown on James' abdication in 1688.

On May 6, 1692, the Province of Massachusetts Bay, The Pilgrim Colony at Plymouth, The Province of Maine (New Hampshire line to the Kennebec) together with Sagadahoc (between the Kennebec and Nova Scotia) and Acadia, (Nova Scotia including New Brunswick) were incorporated into the Royal Province of Massachusetts Bay by the Charter of William and Mary.

The County of York was incorporated in 1640 and embraced the whole of Maine until Nov. 2, 1760, when the Counties of Cumberland and Lincoln were created by act of the Provincial Legislature.

Other counties incorporated while part of Massachusetts were Hancock and Washington, May 2, 1790; Kennebec, April 1, 1799; Oxford, March 4, 1805; Somerset, June 1, 1809.

The French at times claimed the coast of Maine as far West as the Kennebec, but the only French grant recognized was that of Louis Fourteen in April, 1691, to Monsieur de La Motte Cadillac, grandfather of Madame De Gregoire which was confirmed to her by Resolve of Massachusetts July 6, 1787, as to such part as the Commonwealth then had title to. (This grant was part of Mt. Desert and nearby islands.)

Also Indian deeds of certain lands between the New Hampshire line and Damariscotta have been held good.

By 1716 the whole region between the Piscataqua and the St. Croix was united at last in a single political division, but the Kennebec was still an important boundary. Unappropriated lands on the Eastern side of the River still belonged to the Crown. The right to govern the territory had been granted to Massachusetts, but the right to the soil remained in the King. It followed as a matter of law and was provided in the Province Charter that while the general court might of its own motion dispose of lands West of the Kennebec, no grants East of the River could take effect until they should be approved and confirmed by the King. This distinction continued during the remainder of the Colonial period.

The powers of government and territorial rights reserved by the King, as well as those previously conveyed by Charter, passed finally by conquest to the State of Massachusetts, and was formally relinquished by the Treaty of Peace between Great Britain and the United States concluded Sept. 2, 1783.

It will be seen from the above abstract that at an early date the entire coast from Portsmouth to the Penobscot, including the islands, had been covered by these grants of the Council of Plymouth.

MAINE'S TITLE TO ISLANDS.

It is a popular theory that Maine in her sovereign right as a state has title to all islands and ledges in the sea not previously

conveyed either by herself or Massachusetts, as expressed in the report of the Land Agent for 1892, above given; but we have seen in the earlier pages of this report that Maine's title to these islands is that of a purchaser, and she came into possession of such islands and such only as Massachusetts had title to at the time of Separation—1820—and the time of the deed or her remaining interest in 1853.

This leads us to the question, What title had Massachusetts to these islands along the coast of Maine at the time of separation, involving the two further questions, What part of them did she ever have title to, and What of those had she conveyed prior to that date, both of which because of the antiquity and indefiniteness of these early grants are difficult problems which perhaps it is impossible to answer with entire satisfaction.

SOMETHING OF MASSACHUSETTS TITLE.

We may say the source of all island titles emanates from the British Crown who laid claim to such by right of discovery and possession, as our entire coast ultimately came under the control of Great Britain by the conquest of Canada in 1759, followed by the treaty of 1763 extinguishing the French claim to the eastern part of our coast,—as none of the French grants have been held good save that of one in the vicinity of Mt. Desert by Louis XIV to Monsieur de la Motte Cadillac in 1603, which was afterwards confirmed to his heirs in part by Massachusetts. Under the various grants from the British Crown, and the obtaining of its remaining interests by conquest resulting in the peace of 1783, title to the coast and islands is held.

We have seen in the above abstract of sources of land title that the Colony of Massachusetts Bay under its grant of 1627 and 28, and the Royal Charter issued by Charles I, March 4, 1628, asserted claim to the coast of Maine and all islands along the same in 1651 as far as the dividing line between Falmouth and Cumberland, and later—1671—as far east as Whitehead Island in Penobscot Bay, but this claim, although some of the grants made by the Colony at that time held good, was extinguished by a decision obtained by Gorges and Mason in 1676 on their complaint against Massachusetts Bay Colony instituted in 1659.

On May 6, 1677, Massachusetts Colony obtained from the heirs of Ferdinando Gorges an assignment of the Province of Maine as granted to Gorges by Charter of April 3, 1639, "*excepting grants made by the original proprietor or his agents.*" Under this grant Massachusetts claimed the Province of Maine—Portsmouth to Kennebec. But numerous grants had been made by Gorges and his agents, as well as infringing grants by the Council of Plymouth within this territory which held good, such as the Lewis and Bonythan grant on the west side of the Saco River; the old Oldham and Vines grant on the south side of the Saco; the Black Point grant in Scarboro; the Lygonia grant from Kennebunk to Harpswell, and others.

In the "History of the Wild Lands of Maine" the author says:

"It will be seen from the foregoing sketch of the grants from the Crown and Council of Plymouth, and the claims under Indian deeds, that out of the territory purchased of Gorges, and the additional territory included in the charter of William and Mary in 1691, about 2,500,000 acres were covered by previous grants, the titles under a part of which were then admitted, and the remainder has been since adjudged to be good; and which of course never passed into the hands of the Colony as proprietors of the soil. These lands with but trifling exceptions occupy the whole of the present County of York, all the sea coast of Cumberland, the whole of Lincoln and Waldo, the greater part of Kennebec and upward of 200,000 acres in Somerset,—embracing the whole of that part of the country which was settled prior to the war of 1756, and much the larger part of that which was settled before the Revolution."

Charter of William and Mary to the Inhabitants of the Province of Massachusetts Bay, October 7, 1692:

The Province of Massachusetts Bay, The Pilgrim Colony, at Plymouth, The Province of Maine (New Hampshire line to the Kennebec) together with Sagadahoc (between the Kennebec and Nova Scotia) and Acadia—(Nova Scotia including New Brunswick) were incorporated into The Royal Province of Massachusetts Bay.

By this Charter lands were granted to the inhabitants of the Province of Massachusetts Bay from Nova Scotia to Piscataqua, *subject to all previous grants, "with all the islands and*

islets lying within ten leagues directly opposite to the mainland within the said bounds."

The Governor and Assembly were authorized to make grants within the Province of Maine—Portsmouth to the Kennebec—but provided "no grant or grants of land between Sagadahoc to the Gulf of St. Lawrence to be of any force, validity or effect until approved by the King."

It will be seen that the right to govern the territory east of the Kennebec was granted to Massachusetts, but the right to the soil remained in the King. This continued during the remainder of the Colonial Period. This point was under consideration in *Hill vs. Dyer*, 3 Maine, page 441, lands in the town of Sullivan granted during this period being involved.

Treaty of Paris—September 3, 1883.

By this treaty Great Britain acknowledged the independence of the United States and relinquished the claim to the government and territorial rights of the same, and every part thereof.

The East boundary was defined in this treaty as follows:

"East by a line to be drawn along the middle of the River St. Croix from its mouth in the Bay of Fundy to its source, and from its source directly north to the aforesaid highlands, which divide the rivers that fall into the Atlantic Ocean from those which fall into the River St. Lawrence; *comprehending all islands within twenty leagues of any part of the shores of the United States, and lying between lands to be drawn due east from the points where the aforesaid boundaries between Nova Scotia on the one part, and East Florida on the other, shall respectively touch the bay of Fundy and the Atlantic Ocean, excepting such islands as now are or heretofore have been within the limits of Nova Scotia.*"

It will be seen by this treaty that whatever title remained in the British Crown to the lands and islands of the territory now embraced in the State of Maine, passed to Massachusetts Bay. Thus Massachusetts acquired title to such part of the coast and islands between the Kennebec and St. Croix as remained in the Crown.

LANDS BETWEEN THE PENOBSCOT AND ST. CROIX.

Perhaps something should be said here of the French occupation and claims to the eastern part of our coast, although no

grants, except one afterwards confirmed by Massachusetts have been held good, as the very fact of this French occupation and claims prevented any effective settlements or grants of this territory during that period when the remainder of the Maine coast was being settled and made the subject of grants. Not until near the close of the war of 1756—treaty was made in 1763—were any effective settlements or grants made, and even these grants as they required confirmation by the Crown—the trouble preceding the Revolution coming on and preventing same—were not confirmed until after 1783, and then by Massachusetts.

FRENCH OCCUPATION.

The coast of Maine was a bone of contention between England and France for over two hundred years, both claiming it by right of discovery. By a Royal Patent November 8, 1603, Henry IV of France granted Acadia to De Monts being all the territory between the fortieth and the forty-sixth degrees of northern latitude—Cape Breton to the Hudson. A settlement was made on the St. Croix as early as 1604. A Jesuit settlement was made at Mt. Desert in May of 1613. These settlements were destroyed by Captain Argall and a fleet of fishing vessels from Virginia. Settlements were made as far east as the Penobscot—Castine.

The eastern coast of Maine followed the fortunes of Acadia, being alternately in the possession of England and France, and having its coast continually ravaged and its settlements broken up by the numerous wars between those two countries. During this period England held without much contention the coast as far east as the Kennebec, and France the coast from the Penobscot, except those periods when England was in possession of same by treaties; the coast in between was always a subject for dispute between them.

The treaty of St. Germain's March 20, 1632, ceded Acadia to France. In 1655 the Province was confirmed to the English who held it for thirteen years. By treaty of Breda July 31, 1667, Acadia was again ceded to France. Her agents extended their jurisdiction westward to the Penobscot, and laid claims to the coast as far west as the Kennebec. By the treaty of Utrecht March 30, 1713, Acadia again came into possession of the Eng-

lish. The capture of Canada in 1759 finally confirmed the territory in Maine to England. Not until then were conditions east of the Penobscot stable enough to be conducive to permanent settlement.

So that Massachusetts in 1783 took title to these lands and islands east of the Penobscot practically free from any prior grants, and their disposition has been made for the most part since the establishment of the Massachusetts Land Office, 1784, which has given us surveys and proper records of their conveyance. So that by eliminating the conveyances of Massachusetts we may know with certainty what islands Massachusetts retained title to at the time of Separation.

LANDS BETWEEN PORTSMOUTH AND THE PENOBSCOT.

From the foregoing description of Massachusetts' title to the Maine coast and islands, and of the ancient grants, the difficulty is apparent along sections of the coast covered by these early grants and settlements prior to the peace of 1783, of determining just what particular islands Massachusetts acquired, so that by eliminating all those she has since conveyed,—if it was possible to ascertain that fact with accuracy—we might know definitely what islands she retained title to at the time of the Separation. It would involve in the territory between Portsmouth and the Kennebec determining with exactness the extent and validity of these various grants infringing and carved out of the Gorges territory, which, as we have seen, caused endless disputes and litigation for many years and were perhaps never adjusted in their bearing on islands; determining the validity of the grants made by the various proprietors and their agents, the descriptions of which are difficult of application today; and determining the validity of possessory and Indian titles. Along the remainder of the coast to the Penobscot we would meet with much the same difficulty.

Perhaps no amount of investigation along these lines today would give us any practical results, or accomplish with certainty the object desired.

There is, however, one other path we may pursue, which ought to give some definite knowledge as to Massachusetts title to these islands, and that is Massachusetts attitude towards them during that period from 1783 to the time of Separation.

when under her Commissioners and Agents for the sale of eastern lands, she made full inquiry into the title of various claimants to lands in Maine, with a view of determining her own right and title; surveyed those lands, and opened them to sale and settlement. I think we may fairly presume that from Massachusetts known activity in the survey and sale of islands that she would overlook no considerable number of them along a wide extent of our coast, which in size compared favorably, and in value must have exceeded those which were surveyed and sold by her. Her Commissioners, keenly alive to her interests in the public lands, were in a better position to know her title at that time, than we are to determine it today. Whether she ever had title, or had parted with it prior to this time, as may be the case in some instances, is immaterial to our inquiry as to what title she had at the time of Separation.

Yet it is a fact that many of our most valuable islands in this section have never been granted by either Massachusetts or Maine.

MASSACHUSETTS ATTITUDE DURING THIS PERIOD.

1. *Surveys*: An examination of the surveys made at this time as shown by the plans left us and the reports of the surveyors, shows us that island surveys were at first made only as far west as a line drawn from the west extreme of the Fox Islands to the mouth of the Penobscot. Later under James Malcolm the islands were surveyed lying outside the limits of the Waldo Patent, such as Monhegan, Matinicus, and Allen and Burnt off the mouth of the St. George River. She surveyed nothing west of these.

2. *Sales*: During this period an examination of the islands conveyed will show that Massachusetts made no conveyance of any islands west of the west line of the Waldo Patent, and none west of the Penobscot, but such as lay without the limits of the Waldo Patent. The farthest island west conveyed by her is Monhegan. After the separation she joined Maine in the conveyance of one island within these limits,—little Mark Island near Harpswell, in 1827—but this was a quit-claim to the United States for lighthouse purposes.

3. *Division of Islands*: The division of the public lands by Commissioners immediately after the Separation has been

already described, and need not be again repeated. An inventory was taken of the public lands belonging to Massachusetts within the District of Maine and a division made by the Commissioners. They made a division of islands as well as the other public lands, and their doings on this point are expressed in their report as follows:

“The Commissioners proceeded to a division of the islands, which by a report of George W. Coffin, agent of the Land Office, of the Commonwealth of Massachusetts, appeared to remain, in the title thereto, the property of the Commonwealth”

A list of the islands divided is given in their report, so that we may know definitely just what they were, after determining what islands under the names that we know them by today were included in this division.

This report made by Mr. Coffin at this time upon which the Commissioners based their division, would undoubtedly throw a great deal of light upon this subject as he must have investigated Massachusetts title to islands on this section of the coast, and it would seem must have satisfied the Commissioners from Maine of lack of title to them, as a reason why they were not submitted for division,—but a diligent search both at the Land Office here and the Massachusetts archives has failed to discover it nor was I able to find anything in the records and reports of these Commissioners throwing any light on Massachusetts title to islands in this section—the most such an examination yielded was a certainty that in the performance of their duties relative to the exploration and sale of public lands, they had no dealings with them.

An examination of the list of islands thus divided and the location of each, shows that in this division no islands were divided west of the west line of the Waldo Patent—those farthest west lying off the mouth of the St. George River—Allen, Burnt and Monhegan.

I do not by any means intend to convey the idea that no islands but those included in this division passed to Maine by the Separation and subsequent purchase, for it is very obvious from an examination of the island surveys, as shown by the Massachusetts plans, returned and now on file, that very many of the smaller islands were not included in these surveys and

plans, probably for the reason they were not then considered of any consequence or value for purpose of sale—but of course such an explanation would not apply to a failure to include such valuable islands, even at that time, as those of Casco Bay, for instance.

While the mere fact that a certain island or islands were not included in this division seems of no consequence to me, the fact that this division comprised only islands along a certain section of our coast—East of the Penobscot, with the exception of those lying without the Waldo Patent—confirming as it does Massachusetts' attitude towards these other islands, as shown by her surveys and sales, seems to me of the greatest importance as showing the view of Massachusetts and Maine on this point at that time.

MAINE'S ATTITUDE TOWARDS ISLANDS IN THIS SECTION.

Since Maine became a state and acquired an interest in the islands along the coast, she has made conveyances, within the limits of this territory under consideration, of only sixty-seven islands and ledges of the very many valuable islands along this section of the coast. All of these, with two exceptions, were conveyed subsequent to 1880—Little Mark in 1827 jointly with Massachusetts to the United States for lighthouse purposes, and one of the Isle of Shoals in 1876. These conveyances were the result of applications to the Governor and Council or Legislature by persons wishing to acquire these islands, rather than any attempt on the part of the State to sell them, and if this fact indicates anything, being a conveyance of the State's right, title and interest may express a willingness on the part of the State to part with any title it might have, if the purchaser desired it, rather than an assertion of title by the State to islands within these limits. That such is a fact in some instances, is known from an examination of reports and correspondence with the Committee of the Council relative to their sale.

As previously shown in the History of Island Legislation in Maine, the State in 1876 ordered an investigation made of her title to islands on the coast as preliminary to a sale of "all islands on the coast belonging to the State." In pursuance thereof the Land Office made such an investigation—see Land

Agent's reports 1876-77—and proceeded to sell at public sale all islands belonging to the State so far as it was possible to ascertain. An examination of the schedule of islands sold at that time and their location, shows that with one exception no island was conveyed west of Monhegan—the exception being Cedar Island of the Isle of Shoals. So that while Maine has conveyed islands to some extent within this territory under consideration upon application being made for them, the one instance when acting upon information based upon an investigation of island titles, she offered islands for sale, she seems to have carefully kept out of these limits.

While, as has been previously stated, no records remain of the conclusions arrived at by the investigator of island titles at that time to islands within these limits, the results of his labors, as shown in the schedule of islands sold would indicate that he at that time considered the State had no interest in these islands under consideration.

In 1890 the State sold Wood Island, in Casco Bay near Phippsburg, to Charles W. and George W. Pye. This was an island not previously conveyed by Maine or Massachusetts unless included in confirmation of land titles in Falmouth in 1684. An action was commenced against the purchasers, and they were advised by counsel their title was not good.

The following resolve is found in the Laws of 1895, Chapter 93:

“That the sum of \$250.00 and interest from July 3, 1890, be and is hereby appropriated for the purpose of reimbursing Charles W. and George W. Pye for money paid by them to the State for property to which the State had no valid title.”

For the reasons above stated, it seems to me that Massachusetts at the time of Separation had no title to islands west of the Penobscot, except such as lie without the limits of the Waldo Patent, the most westerly of these being Monhegan—either never having title to the same because of grants of settlements prior to her acquisition of the coast of Maine, or having previously conveyed them in her confirmation of land titles to the inhabitants of the District. If Massachusetts had no title at that time, then Maine took none when she acquired Massachusetts' interests in the public lands.

I realize that this conclusion is contrary to the popular theory and that perhaps many will not agree with me in it, but my investigation has convinced me of this fact, and I have endeavored to set forth at some length the reasons therefor.

Accordingly I shall not here report as unconveyed any islands west of the Penobscot, except such as lie outside the Waldo Patent, but merely note on my index cards such conveyances as have been made by Maine within this territory, and make an entry on all other cards of "Title not Acquired by Maine—See Report."

SOMETHING OF THE TITLE OF PARTICULAR GROUPS OF ISLANDS
EAST OF MONHEGAN.

Cobscook Bay and Tributaries.

There are a number of islands in the inland tidal waters in this vicinity of which there is no record of a conveyance as such. The towns in this part of Washington County were surveyed by Rufus Putnam, and conveyed from 1786 to 1800. The outline of these towns, giving their boundaries, are to be seen in Plan Book No. 8 at the Land Office. These towns along the coast from Calais to Cross Island were for the most part deeded as a whole, and an examination of their descriptions will show that they were deeded by metes and bounds going entirely around them, and would include any islands within their boundaries.

In the town of Cutler, islands within its bounds are especially mentioned. An exception is the towns of Eastport and Lubec—number 8—which were granted to various settlers. A few of the islands, such as Treat, Dudley, Burial and Pope's Folly were conveyed in 1785, and all others in these two towns were conveyed to Solomon Thayer May 30, 1825, recorded Volume 3, Page 143.

I have made an entry on my index cards of islands in this vicinity of "Surveyed and Sold as a part of Mainland" without attempting to state under which particular grant they were included. There are some thirty-five islands disposed of in this way which do not appear on the index at the Land Office of Islands Granted, as ever having been conveyed.

Mt. Desert and Vicinity.

On July 23, 1688, certain officers of Louis XIV granted to Monsieur de la Motte Cadillac "The place called Donaquec, con-

sisting of two leagues on the seashore and two leagues in depth, viz: One league on each side of Donaquec—now Jordan—River, together with the island of Mt. Desert and other islands which are on the forepart of said two front leagues.”

This grant was confirmed by Louis XIV in April, 1691, specifying the mainland, but not mentioning any islands whatever. This territory came finally into the possession of Massachusetts by the Treaty of 1783. On November 6, 1786, Marie Therese de Gregoire—granddaughter of Cadillac—and her husband petitioned the General Court of Massachusetts to confirm to them the territory covered by this grant. On July 6, 1787, the General Court by resolve granted to the de Gregoires. “All such part of the island of Mt. Desert and the other islands and tracts of land particularly described in the grant of Louis XIV to Cadillac *which now remain the property of the Commonwealth.*”

The island of Mt. Desert had previously been conveyed to Gov. Bernard, and later confiscated. Prior to the de Gregoire grant, by resolve of June 23, 1785, one-half of the island was restored to his son, John Bernard; while some of the other islands that might have been within the limits of the original grant to Cadillac, such as Black and Placentia to the south, had previous to this grant been disposed of by Massachusetts, and thus would not be included in it.

The Gregoires could not take possession until after their naturalization, which took place November 2, 1787. Shortly after, November 23, 1787, by a resolve, Samuel Thompson was appointed to join with them in establishing their lines between the lands granted them and those of the Commonwealth.

On August 2, 1792, the Gregoires conveyed to one Jackson their interest in these lands conveyed to them by Massachusetts, specifying thirteen islands, each of which is named and the number of acres given—all of which lie south and west of Mt. Desert. This property afterwards came into the possession of the Bingham.

Although this deed of the Gregoires conveying all their interest, specified certain islands, it would seem to me that by the terms of the original grant as later confirmed by Massachusetts—one league on each side of the Jordan River, and islands which are on the fore part of said two front leagues—many other of the smaller islands would be included in this grant which lie in

front and between the east and west bounds of the same. This seems to have been the construction given by the purchasers of this property as shown by their conveyances.

The exact limits of this grant are difficult to ascertain. Its construction was before the Maine court in *Roberts vs. Richards*, reported Vol. 84, Me., page 1, in which it was held that Round Porcupine was not within the limits of this grant, but was to the east thereof. The court based its decision largely on the contemporaneous and subsequent acts of the parties to the grant, saying, "It is idle to undertake to ascertain what islands lay on the fore part of said two front leagues two centuries ago, by making it depend upon the precise curvature of the banks of the river where it now empties into the sea."

From the report of Commissioner Thompson, and the specification of islands in the deed by Gregoire, it is certain that Bartlett's Island on the west lies in front of this grant, and the above decision locates Round Porcupine outside its eastern limits.

Accordingly, of islands and ledges within these known limits not conveyed—Maine has conveyed a few islands within these limits such as Black, N. W. of Bartletts; Folly, between Bartlett and Mt. Desert; The Twinies east of Thomas Island—I have made an entry on my index cards of "Within the Gregoire Grant." Some twenty-three islands and ledges are included. These, including Mt. Desert and others mentioned in the Gregoire Grant, do not appear in the index at the Land Office of Islands Granted as ever having been conveyed.

WALDO PATENT.

A very full description of this grant is to be found in Williamson's History of Belfast, where a chapter is devoted to it. The author says:

"Before surrendering their charter, the Plymouth Council made several grants of land within the State of Maine which, through all subsequent revolutions of government, have been generally respected and upheld. One of these subordinate grants was the Muscongus Patent, called from the river of that name."

In 1629 the Council of Plymouth granted to John Beauchamp and Thomas Leverett a tract 30 miles square on the west side of Penobscot Bay extending from the Penobscot River to the Muscongus—now Medomac—River. Williamson says of its limits:

"It includes the whole of the present County of Knox, except the Fox Islands, and of Waldo County, except what is now Troy, Burnham, Unity, Freedom, Palermo and a part of Liberty. Subsequent surveys added a portion of Penobscot County."

This tract came afterwards into the possession of Brigadier General Waldo, and from him descended to the family of General Knox. The part of the above grant applicable to islands is as follows: "Together with all islands lying and being within a space of three miles within the space of said land and premises or any of them."

This grant was confirmed to the heirs of General Waldo by Resolve July 4, 1785. The part applicable to islands reads as follows:

"Together with all islands whose center falls within three miles of any part of the land before described." Other resolves applicable to this grant are: February 17, 1798—February 23, 1798—February 5, 1800.

The construction of that part of this grant applicable to islands was before the Maine court on report in *Lazell vs. Boardman*, reported in 103 Maine, page 292. The issue there was whether Ensign Islands deeded to the plaintiff by Maine in 1879 was within the Waldo Patent, and that point depended on whether the statute of the marine mile was contemplated by the terms of this grant. The court said:

"It is not claimed that the State acquired any title to any part of the territory or islands included in the Muscongus Grant or Waldo Patent. It is likewise agreed that the island, if measured by the statute mile, is more than three miles from the mainland, and therefore became the property of the State by the Articles of Separation from Massachusetts; and if measured by the geographical or marine mile, that it is less than three miles from the mainland, and consequently became a part of the Muscongus or Waldo Patent, and was never owned by the State."

The court held that the three mile limit should be measured by the marine mile, which defeated the title granted by the State.

A great many islands lie within these limits none of which appear in the index of Islands Granted at the Land Office as ever having been conveyed. As per the scale of the coast charts which I adopted as a basis for this work, such islands as appear to be within the three mile limit, as above defined, I have entered

on my index cards as "Within the Waldo Patent"—some one hundred islands and ledges.

FOX ISLANDS.

The first permanent settlement of these islands was in 1762. By the time of the Revolution there were a great many settlers on the two islands. After the Peace of 1783 a great many new settlers arrived. A meeting was held in March of 1785 by the inhabitants and it was voted to petition the general court praying to be quieted in full possession of their lands—"They therefore pray that Your Honor would relinquish any claims that the Commonwealth may have to the said islands, to all the inhabitants, their heirs and assigns forever."

Resolve of March 13, 1786:

"Whereas it appears to the court from a survey and plan of certain islands lying in Penobscot Bay, within the County of Lincoln, called Fox Islands, taken by Rufus Putnam in the year 1785, that said islands contain 16,527 acres (and that not more than one-half of said islands is of any value) whereon were seventy-five settlers before the first day of January, 1784; and whereas John Calderwood and other settlers on said islands have petitioned this court for a grant of the same to them their heirs and assigns;

Therefore resolved: That all the islands belonging to and composing the Division of the Fox Islands as described on the aforesaid plan, viz: Bounded westerly and northerly by Penobscot Bay; easterly by Fox Island Bay (which separates these islands from the Isle au Haut and Deer Island Division of islands) and southerly by the Atlantic Ocean, be and are hereby granted and confirmed, with all the privileges and appurtenances to the same belonging, to John Calderwood and the other settlers who settled there before the first day of January, 1784, their heirs and assigns, on condition that the said Calderwood and others interested as aforesaid appropriate of good land two hundred acres for use of the ministry, and two hundred acres for the use of a grammar school; and that they pay into the treasury of this Commonwealth within one year from this date, on interest, the sum of 108 pounds in specie, for the expense of surveying the said islands and other charges, and also the sum of 66 pounds, 7 shillings, in consolidated securities of this Commonwealth.

Provided, that where any original settler has sold, or otherwise disposed of his improvements to any other person, the purchaser of such improvements, his heirs or assigns shall hold the same lands which such original settler would have held by virtue of this resolve, if there had been no such sale or disposition."

Other resolves relative to these islands are:

Resolve of February 19, 1787.

Resolve of June 17, 1791.

I have set out the description of this grant in full, as its construction determines the title to very many of the smaller islands in this vicinity.

This group was surveyed by Rufus Putnam, and a plan returned of it, called "The Fox Island Division." This plan shows the outline of this cluster of islands, and contains a list of twenty-one which were surveyed, and make up the acreage of sixteen thousand five hundred and twenty-seven acres. Others are shown on this plan which bear no name and were not surveyed; while perhaps still others do not appear on the plan at all.

Were any other islands than the twenty-one named on this plan, together making up the acreage specified in the preamble of the resolve, included in this grant?

A glance at the map will show that the two large Fox Islands named on the old plan as North and South Fox Islands, and the numerous small islands surrounding them, form a distinct group of islands separated from the mainland and all other islands by a considerable expanse of water on all sides.

While a reference is made, both in the preamble and granting clause of this resolve, to the Putnam plan, the group of islands is also definitely bounded—on the west and north by Penobscot Bay; east by Fox Island Bay (which separates these islands from the Isle au Haut and Deer Island Division); and southerly by the Atlantic Ocean.

It would appear to me from the location of these islands, distinctly grouped by themselves as they are, that the bounds specifically mentioned would be controlling, and that all of the islands of this group, whether mentioned in the list accompanying the plan or not, would be included. They were probably not considered of enough importance by Putnam to survey.

During the former investigation of island titles in 1876, this question was under consideration; and I found from looking

over the correspondence of that time on this subject that a legal opinion on the construction of this grant was furnished the Land Office by Hon. Albert W. Paine, of Bangor, which I think it will be of value to quote here.

"I have carefully examined the language of the resolve in favor of John Calderwood et als making a grant of the Fox Islands; also the maps of the premises at my command, including one of an old date and from these and the language of the resolve I have no doubt of the true conclusion to be drawn. The grant is doubly described, viz: First by the general name of "Fox Islands" and secondly by a definite boundary. If any doubt exists under the first designation, the particular bounds would seem to conclude the matter. Their bounds or limits are the Penobscot Bay on the one side—the Fox Island Bay (or Isle au Haut Bay)—and the Atlantic Ocean on the other. What the Fox Island Bay means is defined to be the bay which separates the Fox Islands from the Isle au Haut or Deer Island. As a matter of fact it is known that there is a broad bay between the two clusters, leaving no doubt as to the meaning. All islands between the one bay named and the other are included in the grant, although not named in the list or reckoned in the number of acres named. The reason for not naming the islands is very clearly shown by the Resolve, wherein they are said to be 'one-half of no value.'

"At all events I regard the conclusion as very clear as above stated. The whole cluster of the "Fox Islands" between the Penobscot Bay and Fox Island or Isle of Haut Bay is granted."

I have accordingly entered on my card index of these islands, some eighty-five in number—"Granted to John Calderwood et als by Resolve of March 13, 1786." None of these islands appear on the index at the Land Office of Islands Granted as ever having been conveyed.

DEER ISLAND.

Hosmers' Sketch of Deer Isle says:

"When the settlers first came here it was not altogether certain to whom the territory belonged. The first grant made of it was by James I as it was included in its description. It was in 1620, to the Plymouth Company, in England, and that embraced

all between the 40th and 48th parallels of latitude. Afterward the Earl of Sterling had a grant of all the State as far west as Pemaquid, now the town of Bristol. It was surrendered in 1688 to the Province of Massachusetts, and a few years after confirmed to her. In 1783, some twenty years after settlements were begun here, it was secured to her by the treaty of that year, and that fully established her ownership."

By resolve of March 22, 1786, Deer Island and Sheep Island, were granted conditionally as follows: One hundred acres each to Joseph Tyler and eighty settlers; the remainder to Joseph Tyler and fifty-eight others.

By resolve of March 24, 1788, the conditions not having been complied with as specified in the previous resolve "the whole of islands aforesaid excepting as hereinafter mentioned be and hereby are granted and confirmed under Joseph Tyler and George Tyler."

A resolve of March 7, 1791, repealed the resolve of 1788, the conditions of payment not having been complied with.

By resolve of February 22, 1796, all of both islands was confirmed to settlers before January, 1784, and January, 1786.

A deed of these islands from Massachusetts to Joseph Tyler et als was given February 20, 1810, recorded Vol. 4, Page 45, Mass. Deeds, Maine Land Office. The description in this deed is as follows: "All the right, title and interest of the said Commonwealth in and unto the residue of Deer and Sheep Islands in the County of Hancock aforesaid which remain after quieting the settlers on said islands in one hundred acres each who settled before the first day of January, 1784. . . ."

This deed is based on Putnam's plan, and from the description would, on casual inspection, appear to grant those two islands as there shown. But the grantees are described as "Joseph Tyler of Deer Isle and fifty-eight others named in the said resolve of the 22nd day of March, 1786, their heirs and assigns forever." Moreover the deed describes all of the above resolves mentioned, as being made pursuant thereto.

The resolve of March 22, 1786, to which the other three resolves refer for a description of the land granted, contains a very much different description of these two islands than appears from the plan as they are designated thereon. As the deed is made pursuant to these several resolves, it would appear

to me that we must look to them for a description of the lands intended to be included in the grant.

In the resolve of March 22, 1786, the following description appears, and is made up from the Putnam plan; "Northerly on Eggamogan Reach, which separates Deer Island from T. No. 4, lying between Penobscot River and the Indian River: Beginning at Hardy's Point, at the north end of the said island; from thence running Southeasterly by several headlands to Campbell's Point; from thence Southwesterly to the Northwest point of Campbell's Island; thence by the Westerly and Southwest shore of Campbell's Island to the South extreme of the same; from thence Easterly, passing on the Southerly side of Island B; as marked in said plan, to Northeast point of Stinson's Neck; from that Southerly, touching the extreme headlands of Stinson's Neck, to the most Southerly point thereof; from thence Southwesterly to the East point of Baviges Neck; from thence Southerly to the Southeast point of Deer Island; from thence Southwesterly and Westerly touching the extreme headlands of Deer Island to a point thereof opposite Crotch Island by Deer Island Thorofare; from thence Northwesterly to the West point of Deer Island near Southwest Harbor; from thence Northerly touching the extreme of Sheep Island to Donham's Point or Ragged Head; from thence Northeasterly touching the East extreme of Carne Island to Hardy's Point aforesaid which description includes Deer Island proper, Greenlaw Neck, Stinson's Neck, Naviges Neck, and Sheep Island which lies near the west shore of Deer Island."

It will be seen that this description not only designates these two islands by name, but commencing at Hardy's Point on the Northwest corner of said island, goes completely around these two islands from headland to headland, signifying the intention of not only including in the grant those two islands as designated on the plan, but everything lying within these lines running from headland to headland.

This would include a great many small islands lying in and about Deer Island within the headlands, that otherwise did not appear to have ever been granted by the State, about which there has been more or less controversy. I have accordingly entered these islands on my index cards as "included in Grant of Deer Isle,"—there are numerous small islets and ledges close

to the shore of Deer Island, within these bounds, not named on the chart, which do not appear in my index. None of these islands appear in the index at the Land Office of Islands Granted, as ever having been conveyed.

I have gone into this matter of the granting of island groups somewhat fully, setting out in full the deeds or resolves granting them, because some of these involve the construction of those deeds or resolves upon which the title of many small islands depends, and I thought the same would be of value to anyone interested in island titles in these vicinities. Also they dispose of some 250 islands and ledges not appearing on the Island Index at the Land Office as having been conveyed. This fact, together with the fact, as has been seen, that the islands along a large section of our coast were disposed of by ancient grants from the Crown and its grantees—including hundreds of valuable islands,—and which, of course, do not appear as having been granted by this index, may account for the varying opinions held at the Land Office, as expressed in the reports of their Agents from year to year, as to the number and value of Islands still remaining in the State.

SOMETHING AS TO THE SETTLEMENTS BETWEEN THE MUSCONGUS AND THE KENNEBEC.

Pemaquid and Vicinity.

In 1632 the Council of Plymouth granted to Robert Aldsworth and Gyles Elbridge a tract of 12,000 acres, and one hundred acres to each settler who should be planted upon the territory within seven years, and reside there three years.

This grant was located from the head of the Muscongus River to the head of the Damariscotta River, and between them to the sea—covering the present towns of Bristol and Bremen. It included the Damariscove Islands, and all islands and islets within the limits aforesaid three leagues into the main ocean.

This territory was claimed by several other claimants, either as included in part in grants to them or from Indian purchases. Not until 1813 were the disputes of these various claimants finally settled.

Boothbay and Vicinity.

The territory between the Damariscotta River and the Kennebec, a tract about five leagues in width, very early attracted settlers. A settlement was made at Cape New Wagan as early as 1623. By 1630 there were fifty families on the Sheepscot farms. The Damariscove Islands, including Fisherman's Island, the Hypocrites, Damariscove proper, White Island, Heron Island and Pumpkin Rock are supposed to have been owned by one Humphry Damerill before 1650. In 1614 they were shown on the map as Damerill's Islands. Settlements were made at Georgetown and Arrowsic Islands as early as 1623.

Title to many of these larger islands in this vicinity were from Indian deeds. The Peninsula, now the town of Boothbay, and coast in that vicinity was claimed by at least three rival claimants under grants and Indian purchases.

ISLANDS OF CASCO BAY.

On February 4, 1884, John T. Hull made a report to the City Government of Portland on "Title of Islands within the limits of Portland." As what he says in this report is applicable to all islands of Casco Bay, and the report now being out of print and copies very scarce, I will quote from it here quite extensively—in fact make an abstract of it.

Hull says:

First grant was King James to Council of Plymouth in 1620. Council of Plymouth granted to John Mason and Sir Ferdinando Gorges the territory from the Merrimac to the Kennebec. Subsequently in 1634 Mason and Gorges divided the territory, Gorges taking the part between the Piscataqua and the Kennebec, excepting certain previous grants made by the Council of Plymouth to other parties. Gorges obtained at that time a new patent which made his title good as to the land between these two rivers.

In 1636 Gorges conveyed to George Cleeve and Richard Tucker by a lease of two thousand years, the territory which now comprises the City of Portland on the mainland, and also Hog Island. This is the first conveyance of any of the islands. The Dye Patent purchased by Col. Rigby, was founded on a

grant made by the Council of Plymouth to John Dye et als of a tract of land between Cape Porpoise and the Kennebec, extending back forty miles. The existence of this grant caused a great amount of litigation and disturbance subsequently. Gorges sold a few of the islands in Portland.

Cleeve went to England in 1647, and by his influence Sir Alexander Rigby purchased the Dye Patent. Cleeve was appointed Rigby's agent, and he renounced his former allegiance to Gorges, and as agent for Rigby commenced selling lands and making grants of territory claimed by Gorges. This brought on a controversy between the Gorges government and Cleeve acting under the Lygonia Claim, which resulted in Massachusetts taking possession of the territory in 1653, and its purchase from the grandson of Gorges by the Governor and Colony of Massachusetts Bay in 1678. By that purchase Massachusetts received a good title of all the territory now within the limits of Portland, except what had previously been conveyed by Gorges and Cleeve on the mainland, and the two islands Hog and Peaks.

While the territory of ancient Falmouth was in dispute between the rival claims of Gorges and Rigby, some of the islands were taken possession of by squatters, after Massachusetts obtained possession of Falmouth under the purchase from Gorges' heirs. She did not recognize these squatter titles, but all the parties who owned them were obliged to obtain the title from Massachusetts.

After the purchase of Maine, Thomas Danforth was appointed President of Maine. He came to Falmouth in 1680, and made grants to various persons, respecting all grants made under Gorges and Cleeve. He granted several islands, which with those granted by Gorges and Cleeve, took up about all of the principal islands within the limits of Portland. This action showed that at that time Massachusetts claimed to own the islands as a portion of the estate purchased of the Gorges heirs.

After Massachusetts acquired a right to the soil of Maine by purchase, some fear seemed to have been entertained by land holders as to the security of their titles. In 1681 the General Court empowered the President of the Province to make legal confirmation to the inhabitants of their properties in the land under his hand and seal according to the directions of their charters.

In accordance with this authority, President Danforth came to Falmouth and on the 29th day of July, 1684, executed a deed to Captain Edward Tyng et als, trustees on the behalf and for the sole use and benefit of the inhabitants of the Town of Falmouth as follows:

"All that tract or parcel of land within the Township of Falmouth in said Province, according to the lines and limits of said township, to them formally granted by Sir Ferdinando Gorges, Knight, or by any of his agents or by the General Assembly of Massachusetts, with all privileges and appurtenances to the same appertaining or in any way belonging; all Royalties reserved to His Majesty by the charter granted to Sir Ferdinando Gorges, Knight, as also that by said charter granted to said Sir Ferdinando Gorges, Knight, his heirs and assigns, together with the rivers, streams and coves contained within the limits or bounds of said township, always to be excepted and reserved."

Similar indentures and conveyances were given by President Danforth to the towns of North Yarmouth and Scarboro. The execution of this deed shows two things; first,—That Massachusetts had a rightful claim and a good title to land in Falmouth; not previously granted, including islands in Casco Bay that had not previously been conveyed by Gorges or his agent. Second,—That in accordance with these rights they had given and conveyed by good deed to the inhabitants of Falmouth, as described in said deed, intending that the inhabitants should have a good title to, and full possession to the lands granted."

During the time from 1684 to 1820 I cannot find by any researches that Massachusetts ever claimed any of the territory, or made any sales or grants within the limits of old Falmouth.

When Maine was separated from Massachusetts an inventory was taken of the public lands in the District of Maine belonging to Massachusetts by Commissioners. The public lands were sub-divided between Massachusetts and Maine by Commissioners appointed on the part of both states for that purpose. In their report the Commissioners say: "And we have divided and allotted the islands in the said state, which by a report of George W. Coffin, Esq., agent of the Land Office of the Commonwealth of Massachusetts, appeared to remain, in the title thereto, the property of the Commonwealth. . . ."

In the division of islands I find no mention of any of the islands of Casco Bay and vicinity. Therefore if Massachusetts had no claim to any of the islands of Casco Bay, within the limits of the City of Portland, Maine has none. If Massachusetts owned them and did not divide them at that time, they would pass by deed in 1853.

Conclusion. The investigation of this part of the question seems to be conclusive as to these facts: That in 1684 Massachusetts had granted to the town of Falmouth all the unsold and ungranted territory; that it has not claimed any of it since; and that the State of Maine as succeeding to the right of Massachusetts has no valid claim to any of the ungranted islands in Casco Bay.

Old Falmouth included Cape Elizabeth, Portland, Deering, Westbrook and Falmouth. Similar deeds to that mentioned above were given by President Danforth to trustees for the inhabitants of North Yarmouth, Scarboro, and York.

If Mr. Hull's construction of this deed of President Danforth to Falmouth,—that it includes all the unsold and ungranted territory within the limits of the town—is correct, then possibly all of Massachusetts' interest to the coast and islands between the Kennebec and Portsmouth was disposed of in the confirmation of titles of lands to the inhabitants of the several coast towns within these bounds, as President Danforth was authorized to make legal confirmation to the inhabitants of the District of Maine. That he gave such trust deeds as that to Falmouth to the inhabitants of North Yarmouth, Scarboro, and York, I know, but from sources available I have been unable to learn of others to the inhabitants of the other coast towns within these limits.

Possibly a careful investigation of this point by someone by training qualified for such work, would give us definite information as to both the construction to be given and the number of these trust deeds, and might determine the question of Massachusetts' title of these islands between the Kennebec and Penobscot at the time of Separation beyond all doubt whatever. I could not spare the time for such a research and there are undoubtedly others who from their knowledge of the available

ancient records and material in York and Cumberland counties, better qualified for this work if it is deemed of sufficient importance.

The following is a list of islands and ledges along the coast between the Penobscot and St. Croix Rivers, and outside the Waldo Patent, which appear never to have been conveyed by Massachusetts or Maine:

No name: W. County—St. Croix River—a little north of Pleasant Point—sometimes called Lower Island—about three rods square.

Simpson's Island: W. County—East Machias—North of The Rim—size two or three acres.

Lobster Island: W. County—Machiasport—A small ledge in upper part of Little Kennebec Bay.

Porcupine Island: W. County—Little Kennebec Bay—off end of Johnson's Point, and connected with it at low water,—a very small island of little value.

Buckhead Ledges: W. County—Machias Bay—a small rocky island destitute of vegetation, about 200 yds. from Birch Head.

Gray's Rock: Washington County—Little Kennebec Bay—a large ledge barred to shore.

Fans Island: W. County—Little Kennebec Bay—a small island with a growth fir.

Gull Rock: W. County—Englishman's Bay—West of Black Head.

Calf Island: W. County—Englishman's Bay—near Calf Point—1 acre, about half bare rocks. Worth about \$100.

Shag Ledge: W. County—Englishman's Bay—south of Pt. Mann—a small low rocky island covered with grass.

Shag Rock: W. County—Englishman's Bay—east of Double Shot Island.

Green Island: W. County—Englishman's Bay—north of the Brothers—1-2 acre—of little value.

Pulpit Rock: W. County—Englishman's Bay—south of Halifax Island—a low bare islet, entirely destitute of vegetation.

Bar Island: W. County—Chandler Bay—N. E. Popplestone Beach—a fair sized island barred to shore.

John White's Island: W. County—North of Cape Split—entrance to Ports Harbor—a rocky island of about 5 acres, partly wooded,—worth about \$50.

Nash Harbor Island: W. County—north of Cape Split—entrance to Nash Harbor—a low, rocky partly wooded island, of about 3 acres—worth about \$50.

Marsh Cove Island: W. County—off Moose Neck—Cape Split Harbor—about 7 acres partly wooded—value \$100.

Pot Rock: W. County—south Cape Split—a barren rock about 10 feet above high water line.

Daniel's Island: W. County—north of Carrying Place Cove—Moose Neck—6 acres, mostly rocks—worth about \$30.

One of the Goose Islands: W. County—west of Moosebec Reach.

Duck Ledges: W. County—east of Moose Neck—three large bare rocks or ledges all uncovered at half tide, with the northernmost almost bare, showing as a bare, white rocky islet.

Sea Duck Rock: W. County—south of Norton Island and Moosebec Reach—a high bare rock.

Batson's Ledges: W. County—west of Great Wass Island—a great mass of ledges of which the most prominent is a rocky islet about 20 feet high, called Batson Ledge, a little over 350 yds. long and always bare.

Norton Island Ledges: W. County—south of Norton Island and Moosebec Reach—bare rocky islet.

The Old Bachelder: W. County—west of Great Wass—a bare ledge.

Popplestone Ledge: W. County—west of Great Wass.

Norton Point Ledge: W. County—west of great Wass.

One Bush Island: W. County—N. W. Head Harbor—a low, rocky islet.

Virgin Island: W. County—east of Moosebec Reach and Kelley's Point—a small islet with a round grassy top—without trees.

Woodward Island: W. County—south of Head Harbor Island—probably barred by Crow Point. Very small islet.

Black Rock: W. County—S. E. Nash Island.

Stanley's Ledge: W. County—west of Great Wass—bare and rocky, and connected with Outer Sand Island by a bar of sunken rocks.

Egg Rock: W. County—S. W. Great Wass.

Seal Rock: W. County—S. W. Great Wass.

Freeman Rock: W. County—S. E. Great Wass.

Cranberry Island: W. County—Harrington River—N. W. Hardwood Point—of not much value.

No name: W. County—Harrington River—Sandy Cove—small islet or ledge.

Chamberly Island: W. County—Harrington River—Pinneo Point—a low sandy islet with its surface covered with scrubby bushes and its shores lined with boulders,—worth about \$25.

Guard Island: W. County—Pleasant River—north of Guard Point—worth about \$15.

Shag Island: W. County—Harrington Bay—west of Ripley's Neck.

Otter Island: W. County—Pleasant Bay—near northwest part of Dyer's Island. Worth about \$50.

Potato Island: W. County—Pleasant Bay—south Ripley's Neck—1 1-4 acres—a small low rocky island.

No name: W. County—Pleasant Bay—near northwest part of Dyer's Island.

Goose Island: W. County—North of Tumble Down Dick Head.

Gooseberry Nubble: W. County—Pleasant Bay—north of Norton's Island.

Money Islands—Washington County—Gouldsboro Bay—north of Roger's Point. Two rocky islets joined at low water to Roger's Point.

Hogg Island: W. County—Pinkham's Bay—north of Dyer's, Worth about \$20.

Pop Island: W. County—upper part of Dyer's Bay—worth about \$20.

Fish Island: W. County—upper part of Dyer's Bay—south of Good's Point. Worth about \$20.

Bar Island: W. County—upper part of Pigeon Hill Bay—west of Dyer's Point. Oval in shape and about 5-8 of a mile long; a bar dry at 3-4 ebb connects it to the mainland; contains 84 acres and is valued at \$420.

No name: W. County—Carrying Place Cove—north Petit Manan Point—a fair sized island sometimes called Sheep.

Pea Island—W. County—Pigeon Hill Bay—south of Dyer's Point.

Douglass Island Ledge: W. County—Narragausus Bay—north of Douglass Island—a detached rock.

Seal Cove Ledge: W. County—east of Bois Bubert—about 250 yds. from shore and out at high water.

Big Pot: W. County—Pleasant Bay—north Cone Island—a high bare islet entirely destitute of vegetation and about 100 yds. long.

Little Black Ledge: H. County—entrance to Prospect Harbor—south Cranberry Point—a bare ledge nearly covered at high water.

Big Black Ledge: H. County—entrance to Prospect Harbor—south Cranberry Point—a bare rocky islet.

Bar Island: H. County—Gouldsboro Bay—south of Young's Point—about 2 acres.

Bald Rock: W. County—Gouldsboro Bay—southwest of Dyer's Point.

Little Ledge: W. County—Dyer's Bay—South Dyer's Point.

Boney Chess Ledge: W. County—Dyer's Bay—south of Dyer's Point.

The Castle: W. County—Dyer's Bay—south of Dyer's Point.

Gull Rocks: W. County—Pigeon Hill Bay—west Bois Bubert.

Egg Rock: W. County—Pigeon Hill Bay—south Bois Bubert—a small low rocky island about 10 feet high and destitute of vegetation.

Schoodic Ledge: H. County—north of Schoodic Island.

Middle Ledge: H. County—north of Schoodic Island.

Stewart's Island: H. County—Skillings River—Kilkenney Cove. A small low wooded island of oval shape—contains about five acres and worth about \$50.

Sheldrake Islands: H. County—Skillings River—Young's Bay. Two bare rocks lying close together and connected at low water.

Young's Island: H. County—Skillings River—southwest of Young's Point. A low wooded island of oval shape—about 150 yds. long, about 50 yards from shore—contains about 5 acres.

Hill's Island: H. County—Skillings River—N. E. Hyde's Point—middle of entrance to Hill's Cove—joined to shore at low water. Contains 10 acres—worth about \$100.

Shooting Ledge: H. County—Skillings River—Raccoon Cove—small island composed of bare rock.

Bean's Ledge: H. County—north of Bean's Point—Sorrento—a detached rock or island.

Welsh's Ledge: H. County—Sullivan Harbor—south of Ingalls Island.

Hog Island: H. County—Flanders Bay—west Gouldsboro—a large island of considerable value.

No name. H. County—West and close to Stave Island—several rocky islets joined to each other and to the shore at low water.

Bigger's Island: H. County—east shore of Winter Harbor—about 20 feet high and about 400 yards long—contains 15 acres and worth about \$300.

Holmes Island: H. County—east shore of Winter Harbor—small island about 20 feet high and near shore—contains 3 acres and worth about \$100.

No name: H. County—East shore of Winter Harbor—north Bigger's Island—contains about 1-4 acre and of little value.

Pond Island: H. County—west of Schoodic Point—near northern shore of Pond Island Cove. Contains 8 acres and is worth about \$100.

The Triangles: H. County—Blue Hill Harbor.

Clossons Island: H. County—west shore of Morgan's Bay—a half tide bar island 50 yds. from shore. Size about 50 x 70 ft. at high water—of small value.

Bird Rock: H. County—Morgan's Bay—west of Jedd's Island—a bare rock islet—30 yds. in diameter.

Seal Ledge: H. County—Morgan's Bay—northwest of Jedd's Island—a bare islet.

Goose Rock: H. County—Union River—south of Newbury Neck—about 100 yds. from shore and sometimes called Treworky Hub—about 1-4 acre with a growth of scrub spruce.

Carleton Island: H. County—Blue Hill—Salt Pond—about 5 or 6 acres—worth about \$250.

Long Island Hub: H. County—southwest of Long Island—half tide bar of about 50 yds. connects it with main island—about 1-4 acre of broken ledge with a few bushes on it.

Seal Rock: H. County—south of Long Island.

Chatto's Island: H. County—Eggamoggin Reach—Center Harbor—a rocky islet of irregular shape, 30 feet high and 400 yds. long—valued at \$225.

No name: H. County—Eggamoggin Reach—south of High Head—ledge of 1-4 acre at high tide.

Gander Island: H. County—south of Flye Point—a sand split of but little value.

Goose Island: H. County—south of Flye Point—contains about 1 acre—but little value.

Flye Island: H. County—south of Flye Point—contains 12 acres and worth about \$300.

Channel Rock: H. County—south of Flye Point—a high round bare rock.

No name: H. County—Eggemoggin Reach—east Hog Island.

York or Sheep Island: H. County—east Stinson's Neck and close to same—a small island.

No name: H. County—east Stinson's Neck and close to same—a very small islet.

Long Ledge: H. County—Blue Hill Bay—south of Opechee Island—a bare rocky islet.

Lamp Island: H. County—Blue Hill Bay—north of Pond Island—a small island 100 ft. long and 70 ft. wide—joined at low water to Pond Island—bar has about three feet of water at high tide—of but little value.

The Triangles: H. County—Blue Hill Bay—S. E. of Black Island and east of Phinney's Island—three small bare rocks joined at low water by ledges—area about 150 yds.

West Barge: H. County—Blue Hill Bay—east of Pond Island—a group of bare rocks.

East Barge: H. County—Blue Hill Bay—east of Pond Island—a group of bare rocks.

Ship and Barges Ledge: H. County—Blue Hill Bay—east Pond Island—has a beacon on it.

Sheldrake Rock: H. County—south of Stinson's Neck—sometimes called Eastern Yellow Rock—a very small island of a peculiar whitish color.

Phoebe's Island: H. County—south of Stinson's Neck and east of Saddleback Island—a small island.

Egg Rock: H. County—Jericho Bay—northwest of Swans Island—a mass of bare rocks with a beacon on it.

Halibut Rocks: H. County—northwest of Marshall Island—two islets, one of which has a beacon.

Clam Island: H. County—Deer Island Thorofare—southwest of Eastern Mark Island—a large mass of rocks—two small nubbles always out.

Garden Islands: H. County—close to north shore of Swans Island—south of Orono—two small islands.

Ram Islands: H. County—east of Swans Island and close to same—a small island.

Potato Field: H. County—Burnt Coat Harbor—an islet about 100 yds. in diameter—low and level and 100 yds. from shore.

No name: H. County—east shore of Burnt Coat Harbor—Long Cove—two low flat islets joined to each other and the shore at low water.

Little Black Island: H. County—southwest and close to Black Island—Blue Hill Bay—probably barred to Black Island.

Inner Dawes Ledge: H. County—Blue Hill Bay—northwest and close to Black Island.

Greene Islands: H. County—Blue Hill Bay—south Black Island—also called Scrag Islands—two small rocky islets 3-4 mile south of Black.

Drum Island: H. County—Blue Hill Bay—south Black Island—a very small island—3-4 mile south of Black Island.

Eastern Fog Island Ledge: H. County—Jericho Bay—northwest of Fog Island.

Popplestone Ledge: H. County—Jericho Bay—east of Fog Island.

Rich Ledge: H. County—east of Isle au Haut—north of York Island.

Doliver's Island: H. County—east of Isle au Haut—north of York Island—contains 1-2 acre and worth about \$50.

Rabbit's Ear: H. County—between Isle au Haut and York Island—contains about 1-2 an acre and worth about \$50.

North Poppelstone Ledge: H. County—west of Marshall's Island.

Saddleback Ledge: H. County—Jericho Bay—west of Marshall's Island.

Spirit Ledge: H. County—Jericho Bay—east of Marshall's Island.

Green Ledge: H. County—Jericho Bay—south of Fogg Island.

White Ledge: H. County—Jericho Bay—south of Fogg Island.

York Island: H. County—east and close to Isle au Haut—a large island close to the east shore of Isle au Haut, incorporated as part of town—contains 50 acres and is valued at \$300.

High Sheriff Island: H. County—southwest of Swans Island—a bare rock about 100 yds. in diameter.

Black Ledge: H. County—south of Marshall's Island.

Heron Island Ledge: H. County—south of Swans Island.

Brimstone Island: H. County—south of Swans Island—a small islet between Greene and Heron.

Scrag Island: H. County—south of Swans Island—a rocky islet—low—with northern half covered with trees.

No name: H. County—south of Swans Island—between Scrag and Harbor Island—a small bare rock.

John's Island Dry Ledges: H. County—southwest of Swans Island.

Dry Money Ledge: H. County—southwest of Swans.

Harbor Island: H. County—north of Little Deer Isle—Buck's Harbor—a good-sized island—about 40 feet high at ends and quite low in middle.

Buck Island: H. County—south of Cape Rosier and Weir Cove.

Thrumcap: H. County—east of Cape Rosier—south of Orcutt's Harbor—a small low islet about 100 yds. in diameter.

Black Ledge: H. County—south of Cape Rosier.

Fiddle head: H. County—south of Cape Rosier—northwest of Hog Island—a rocky islet—bare of trees—connected at low water with Hog Island.

Two Bush Island: H. County—west of Little Deer Isle—a small low level island.

Little Sally Island: H. County—east and close to Little Deer Isle—a very small round islet 175 yds. from shore—joined by a bar.

No name: H. County—west of Little Deer Isle and northwest of Eaton's Island.

Spoon Ledge: K. County—north of Fox Islands.

Sloop Island: K. County—north of Fox Islands—a small islet.

Torry's Castle: H. County—between Deer Isle and Torry's Islands—a bare rock.

Two Bush Islands: H. County—south of Stonington.

Round Island: H. County—south of Stonington—a bold, rocky islet about 30 feet high and 250 yds. long.

Grog Island Ledge: H. County—Deer Isle Thorofare—northwest of Grog Island.

Sheep Rock: H. County—east of Deer Isle—south of Sheep Island—a small white rock, which at low water forms a large ledge.

No name: H. County—two small islets—Deer Isle Thorofare—east and close to Camp Island.

No name: H. County—Deer Isle Thorofare—north of Devil's Island.

The Brown Cow: H. County—southwest of Deer Isle—a bare rock or islet about 10 feet out at low water and at high tide nearly covered.

Sparrow Island: H. County—South of Deer Isle and Crotch Island—a small islet.

West Halibut Ledge: H. County—south of Deer Isle and Crotch Island—a bare rocky islet with somewhat steep faces.

Scraggy Ledge: H. County—south of Deer Isle and Crotch Island.

Marsh Cove Ledge: H. County—west of Isle au Haut and close to Kimball's Island—a small ledge.

No name: H. County—between Merchant's Island and George's Head—south of Deer Isle.

No name: H. County—between Isle au Haut and Merchant's Isle.

No name: H. County—north of, Isle au Haut and Burnt Island.

No name: H. County—north of Isle au Haut—near Point Lookout.

No name: H. County—west of Isle au Haut and close to north shore of Kimball's Island.

No name: H. County—north of Isle au Haut and close to north shore of Burnt Island.

The Cow Pen: H. County—east of Isle au Haut—several small islands.

The Turnip Yard: H. County—east of and close to Isle au Haut—small ledges.

The Halfway Rock: H. County—east Isle au Haut.

White Horse: H. County—east of Isle au Haut and south of Little Spoon—a bare rocky islet 200 yds. long and 20 feet high.

Black Horse: H. County—east of Isle au Haut and south of Little Spoon—bare rocky islet 20 feet high.

Grass Ledge: H. County—north of Fox Islands—about 150 yds. in diameter.

Green Island Seal Ledge: K. County—south of Muscle Ridge and Large Greene Island—two half tide ledges close together.

Two Bush Ledge: K. County—northwest of Matinicus—150 yds. in diameter.

Eastern Black Ledge: K. County—east of Matinicus—100 yds. in diameter.

Western Black Ledge: K. County—east of Matinicus.

The Hogshhead: K. County—south of Matinicus—a small detached bare rock.

Pudding Island: K. County—south of Matinicus—about 150 yds. from north shore of Ragged Island—1-8 mile long, rocky and barren.

Zepher Ledges: K. County—northeast of Matinicus.

Brig Ledge: K. County—South of Matinicus—a rocky islet—100 yds. in diameter.

High Ledge: K. County—south of Matinicus—a rocky islet.

Camp Cove Ledge: K. County—south of Matinicus—a bare rock.

Greene Ledge: K. County—south of Matinicus—a rocky islet 100 yds. in diameter.

Negro Islands: H. County—Bagaduck River—north of Castine—two fair sized islands.

Winslow's Island—H. County—Northern Bay town of Penobscot—a small island.

Gravel Island: H. County—Bagaduck River—north of Young's Island—a very small island about 20 feet high—of coarse gravel.

Young's Island: H. County—Bagaduck River—quite a large flat island.

Pumpkin Island: H. County—Bagaduck River—near Johnson's Point—a small islet close to shore.

Green Island: H. County—South Bay—North Brooksville—quite a large island.

Nabs Island: H. County—South Bay—North Brooksville—a fair sized island.

Hutchinson's Island: Waldo County—East of North Islesboro—and barred to it—quite a large island.

Nauticus Island: H. County—Castine Harbor—quite a large island, low and rocky.

Ram Island: H. County—Castine Harbor—a small island.

Trotts Ledge: H. County—Bagaduck River.

Hospital Island—H. County—Castine Harbor—an islet low, rocky and wooded.

Great Island & Small Island to South of it: H. County—Castine Harbor.

Sheep Island: H. County—Smith's Cove—Brooksville.

No name: H. County—east shore Smith's Cove—east of Sheep Island.

No name: H. County—east shore of Smith's Cove—south of Henry's Point.

No name: H. County—east shore of Smith's Cove—south of Henry's Point.

Dry Ledges: K. County—between Allen and Burnt Island.

Little Burnt Island: K. County—north of Burnt Island and connected at low water.

Black Rock: K. County—west of Metinic—a bare rocky islet.

Cat Ledge: K. County—east of Metinic.

Duck Rocks (two): L. County—west of Monhegan—one has a beacon on it.

Eastern Duck Rocks: L. County—North of Monhegan—a bare rocky islet.

Inner Duck Rocks: L. County—west of Monhegan.

Seal Ledges: L. County—west of Monhegan.

Old Hump Ledge: K. County—a bare rock 150 yds. square—west of Allen's Island.

Seal Ledges: K. County—west of Allen's—a large rock.

Little Egg Rock: K. County—southwest of Allen's Island—a bare rocky islet 175 yds. long.

Shark Island: K. County—southwest of Allen's—a bare rocky islet 250 yds. long.

VALUE.

The resolve under which this investigation is made directs the Land Agent to determine the value of these islands. An examination of the above list of islands reported as unconveyed, will show that many of them are small islets and ledges of but little value—for the most part they would not warrant the expense of an examination, and even then any estimate of value would be largely speculative. Of the larger islands reported, I have given their value so far as I could get an opinion of the same by the assessors of the towns in which they are located. I have made an entry of same on my index cards.

OWNERSHIP.

The above islands appear never to have been conveyed by Maine or Massachusetts. A number of them, especially those near the mainland, are claimed by various persons who have been in possession of them for years and paid the taxes assessed upon them. I have in mind one island—York, just east of Isle au Haut—of which I find no such conveyance, and yet find records of its conveyance by its claimants as early as 1798. Of such islands, I have made entry on my index cards of such facts as I have been able to learn as to their claimants.

Has the State title to such islands? There are two things to be considered, which I will discuss briefly:

1. *Bar Islands*: There are many islands either barred to the mainland, or some larger island, by bars which are laid bare at some stage of the tide, which have always been claimed by the owners of the adjoining lands and conveyed by them in their conveyances of such, or claimed by the successive owners of such lands.

It seems to me that such an island is no less a separate and distinct island because of the fact of its being connected either to the mainland or another island by such a bar, and being such, would not pass in deeds from the State as appurtenant thereto.

Of course, in some instances, this fact might depend upon the construction of a particular deed given by the State of such adjoining land. If such lands or islands were deeded by reference to a plan, the plan would control—this might show the barred island as a separate island, or as part of the adjoining

land. Again, in the case of islands—and perhaps in some instances in deeds of the main—if deeded by name without reference to plans, and without particular description, the deed would convey what that name was commonly understood to designate or cover.

There is on file at the Land Office a legal opinion by Hon. Albert W. Paine, of Bangor, on this subject, furnished the agent in 1876 when a previous investigation of island titles was being made. It goes quite fully into this subject. Acting under it, the State conveyed many of such islands then, and has to some extent since.

This question was under consideration by the Maine Court in *Inhabitants of Eden vs. Pineo*, reported in 108 Me., P. 73. The court there held that Bar or Rodick Island near Mt. Desert, to be a separate island and no part of Mt. Desert Island, although there was a bar between the two left bare by the tide twelve hours out of every twenty-four.

This question was called to the attention of the Legislature by Oliver Frost in his report on islands made in 1838. His report says:

“It will be seen by reference to the plans herewith returned, that there are many small islands and ledges represented near the shores and contiguous to larger islands, and frequently connected with them by bars, of which no account was taken by surveyors. It is supposed that these were reckoned as a part of the mainland or islands with which they were connected—and in all applications for the purchase of such small islands not contained in the schedule, nor in the assignments to the respective States, care should be taken in all new contracts, to preserve the equitable rights of the purchasers of our larger islands.”

In connection with this point, the question arises, What formation of rocks, ledges or other substances arising above the surface of the water may be termed an island?

This question was before the Maine court in *Babson vs. Tainter*, reported in 79 Me., P. 368. It was held that a parcel of land containing about two acres, unfit for the habitation of man, must be considered as having size and permanency enough to entitle it to the appellation of an island—and would be subject to adverse possession.

In *King vs. Young*, reported in 76 Me., P. 76, the Court held that a mussel-bed over which water flows at every tide is not

an island, but flats. Other cases bearing on this subject are cited in these decisions.

2. *Adverse Possession:* Many of these islands have been claimed by persons and their grantors for years, under some sort of occupation. The question arises, could these claimants by an open and adverse possession acquire title thereto against the State?

That title by adverse possession could not be acquired at the present time is a certainty, under the principle of law that title by adverse possession cannot be acquired, except by statute, against the sovereign, be it Crown, or National Government or State—and we have no such statute. See *United States vs. Burrill*, 107 Me., p. 382.

But at an earlier date both Massachusetts and Maine had statutes under which the decisions seem to hold a title by adverse possession could be acquired.

Revised Statutes of Massachusetts, 1836, C. 119, S. 12.

Revised Statutes of Maine, 1840, Chapter 147, Sec. 12.

Revised Statutes of Maine, 1857, Chapter 105, Sec. 11.

Revised Statutes of Maine, 1871, Chapter 105, Sec. 11.

Revised Statutes of Maine, 1883, Chapter 105, Sec. 11.

The Maine statute was as follows: "No real or mixed action for the recovery of any lands shall be commenced in behalf of the State unless within twenty years after the time its title shall accrue."

Decisions under these statutes, holding or assuming that a title by adverse possession may be acquired against the State are:

Nichols vs. Boston, 98 Mass., P. 42.

Treat vs. Lord, 42 Me., P. 552.

Hinckley vs. Haines, 69 Me., P. 76.

Roberts vs. Richards, 84 Me., P. 1.

This statute was repealed by Chapter 368 of the Public Laws of 1885, but such repeal was undoubtedly not retrospective.

If title by adverse possession could have been acquired against Massachusetts or Maine prior to 1885, the question then becomes of importance, What must the character of such possession have been to have been considered adverse to the State so that it would ripen into title?

The only Maine case I find in which this exact point is involved is that of *Roberts vs. Richards*, reported in 84 Me., P. 1.

Here the issue involved was whether possession of an island had been of such a character that the claimant might have acquired a title thereby against Massachusetts and Maine.

The facts depended on by the plaintiff to constitute an adverse possession were as follows: Claiming possession under color of title—an invalid deed; payment of taxes; pasturing sheep on the island; cutting grass on parts of same; erecting a brush fence across it, and occasionally repairing same; erecting a flag staff and a short flight of steps.

The Court in its opinion goes into a very full discussion of this whole subject citing many cases on all points involved. The Court held that these acts were not sufficient to disseize the State of its title, saying in part:

“The law does not undertake to specify the particular acts of occupation by which alone a title by adverse possession can be acquired. Every case must from sheer necessity be determined by its own peculiar circumstances, for the essential particular acts are as various as the nature and locality of real property, the purpose for which it is adapted or to which the owner or claimant may choose to apply it.

“The doctrine of adverse possession rests upon the presumed acquiescence of him against whom it is held, and such acquiescence rests upon notice express or implied, which it not to be presumed by the court, but may be inferred by circumstances. The essential use and occupation unless expressly brought home to the knowledge of the owner, must be of such unequivocal character as will reasonably indicate to him visiting the premises during the statute period, that instead of their suggesting the probable invasion of a mere occasional trespasser, they unmistakably show an asserted exclusive appropriation and ownership. There must be overt acts which leave no room to inquire about intention, and which amount to actual ouster.

“All that was done upon this comparatively barren, uninhabitable rock in the sea, with no stream or spring of fresh water thereon, was to take a little hay, feed down the grass, which had caught in the spots of shallow soil and among the bushes, and throw up the short fence mentioned. Nothing of any value was ever put upon it except the temporary fence, flagstaff and short flight of steps erected by the Fremonts.

"If the Agents of the State had seen everything there including the presence of the few sheep whether in or out of their pen. the cutting of the small quantity of grass which grew there, spontaneously, all of which could be of no injury to the State and but slight benefit to the harvesters, they would hardly suspect that the authors of these acts were other than harmless technical trespassers."

I have not attempted to inquire into the character of the occupation of these various claimants and their predecessors in title. Such an investigation of each individual island whenever there is a claimant, involving the character of the possession prior to 1885, the facts about which would be difficult to ascertain today, would, it seems to me, in most instances involve an expense out of all proportion to the value of the island, and then would be but an expression of opinion on my part.

While this investigation perhaps has not yielded as definite results as the framer of the resolve under which it is made may have anticipated, I trust that it may be of value.

I have incorporated into this report many things about islands which I have come across during my investigation, with an idea of preserving them, and making them easily accessible to anyone interested in this subject. If it furnishes some suggestions or ideas, or contains data for useful reference, which will lighten to some extent the labors of those tracing island titles, or of some future investigator for the State, the length of this report may perhaps be justified.

Respectfully submitted,

MELVIN H. SIMMONS.

November 16, 1914.

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