Forest Management Plan
for
Two Forest Properties
Owned by The Town of Raymond

401 Webbs Mills Road
Raymond, Maine 04071

Located on
The Egypt Road and Patricia Avenue
In the Town of Raymond,
County of Cumberland, State of Maine

Map 5 Lot 19
Map 14 Lot 34
May 2 , 2012

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History and Description

For consideration of this forest management plan, there are two forest parcels in Raymond, one located on the Egypt Road and known as the Files property, and a second located on Patricia Avenue.

Files Lot

Formerly owned by Raymond resident Trudy Files, this forest property is located on the Egypt Road in the vicinity of Farwell Bog. Purchased by the Residence of Raymond in 2006 it contains approximately 83 acres. Used as a town land fill for many years, it was abandoned to that use around 1980. Since then, this land fill has been closed, and the seven acre site has been stabilized using approved methods. In addition, several test wells have been located around the site to monitor ground water. Of the remaining acres, seventy three are occupied by forest, and three occupied by wetland and water.

Barbed wire located along a number of boundary lines and other features, is evidence that the Files property was once cleared of the trees and used for agricultural purposes. Sometime around the year 1900, it was abandoned to that use and allowed to grow back to trees. Timber harvesting has occurred at least twice since then, as evidenced by old decaying stumps, and newer decaying stumps. By counting rings on the newer stumps, and noting growth rates of these rings, it is likely a timber sale occurred in the 1940's. The most recent timber sale, authorized by the former owner, occurred around the year 2000.

With the exception of one house lot next to the Egypt road, this property is surrounded by other forested lots. A gravel road, Farwell Drive, leads from Egypt Road, in a southerly direction, for twenty six hundred feet or more, providing access for two adjacent forested properties and the home near Egypt Road. One of these abutting wood lots contains a home. This gravel road is a fifty foot right-of-way for the abutters, and has been surveyed and located with survey pins.

Most of the bounds of this lot have been located and identified. In some areas there exist barbed wire, and in other areas blazed and painted lines. A number of corner pins were located on the lines, two of which indicate corners of the Files lot. Other lines and corners were not found.

Beginning at Farwell Drive, the property has approximately 250 feet of frontage along Egypt Road. At fire lane # 259, the boundary follow this rough gravel road in a southerly direction, to a point near a stream. It then follows a barbed wire fence, which disappears, in a westerly direction, crosses a seasonal stream and corners near the reclaimed dump site at an un-located corner. The line continues southwesterly along a poorly flagged line, to another un-located corner. It then goes in a southwesterly direction across the end of Farwell Bog, to where a barbed wire fence is found. It then corners, and goes in a northwesterly direction along a line that is in part blazed and painted, to a pipe. All of the above mentioned lines are in common with property owner Farwell Associates. From the

pipe, the line goes northeasterly along a red blazed and painted line, to a corner pin. The line then goes in a northwesterly direction along a barbed wire fence to an unmarked corner. It then follows a barbed wire fence in a northeasterly direction, corners and goes west along an unmarked line to a corner near Farwell Drive. It then follows the westerly side of this road to the Egypt road.

Patricia Avenue Lot

For the purpose of creating a new landfill (dump) for the town of Raymond, this property was acquired some time around 1980. Located at the end of Patricia Drive it contains one hundred and forty acres. Also used as a town dump in the past, it too has been closed and stabilized appropriately. The former landfill, sludge building, and a cellular tower and building occupy the eighteen unforested acres of this property. With the exception of two very small ponds, the remaining acres are forested.

The southerly most corner of this lot is at a stone monument, where the towns of Gray, Windham and Raymond meet. Inscribed in the granite are the letters W and R. Other forest properties abut most of the parcel. There exists one home site near the easterly most corner, which is part of a development accessed from Ball Drive, off Brown Road.

Features of this property, including a stone wall on the southeasterly line, indicate the likelihood that is was cleared of trees and used for agricultural purposes. Some time after the year 1900, it was abandoned to that use and allowed to forest. Old decaying stumps and the age of advanced white pine regeneration indicate a timber sale occurred in the early 1960's. Two sites were noted where log brows likely existed. Log brows were typically located such that logs could be rolled directly onto a truck, requiring excavating the road so that the truck body was at ground level. This method of loading logs was not used much after the 1960's.

Located at the end of Patricia avenue, near a gate, the property line followed a red blazed and painted line in a southeasterly direction, which is also the line between Raymond and Windham, to the granite post scribed with an R and W. At the granite post, the line corners and goes northeasterly along a blazed and painted line, which is also the Gray and Raymond town line, to a stone wall. The line then follows the stone wall for approximately 1,000 feet, to the intersection of a blue blazed and painted line, continuing along this blue line to a two inch pipe. It then corners and follows a flagged line to another 2 inch pipe, where it corners. This leg of the property line goes in a nearly due south direction along a line with blue and orange flagging to a 3/4 inch pipe and stones. The line then goes in a nearly due west direction along a blazed and flagged line to Patricia avenue.

Owner Objectives

The towns objective for both properties is many, including the production of timber for income, and demonstrating good forest management. It is also to be maintained as open space for the benefit of Raymond residence and others. In addition, it is the towns objective to properly maintain the reclaimed area of the former dumps.

None of the recommendations in this plan preclude the owner from selling all the merchantable timber from the property, within the confines of the Maine Forest Practices Act or other laws or ordinances, should the owner need or want to maximize their return on investment.

Access

Access to the Patricia Avenue property is provided by a gated gravel road used to access the tower site and sludge building. Farwell Drive provides access to the Files property. It is also a deeded right-of-way for two forest properties and one home site.

Economics

Although generating an income from the forest is often not the top objective of the landowner, ultimately it is the timber value that pays the costs of owning and maintaining the property. The recommendations for forest management are intended to improve the production, quality and value of the existing and future forests. Sawlogs and veneer logs can have a value two to fifty times more than the equivalent volume of pulpwood or firewood. It is therefore the long term intent of this management plan to increase the yield of these higher value products. Among other things, thinnings can be planned to accommodate scenic views, esthetics and wildlife without compromising the need to produce quality timber.

Forest Management Plan

Because managing a forest is a long term proposition, this forest management plan has been written to cover a time period of approximately ten years. A re inspection of the property and an update or addendum may be necessary around the year 2022, to address changes in the condition of the forest resulting from any timber sales, other cultural treatment, or other events that alter its condition (fire, windthrow, disease etc.).

Boundary Lines

Maintaining a well defined property line is the best defense against preventing timber trespass, and eliminating any doubt where the property ends. Periodic clearing and repainting of lines will prevent its disappearance and the costly expense of its relocation.

All of the boundary lines on the Patricia Avenue property are flagged or blazed and painted. Although they can be located, re-blazing and painting trees along this line is recommended. A number of pipes were also found along the lines and on two corners.

The Files property lines need considerably more work. All of the existing lines should be re-blazed and painted. There are several lines and corners that will likely need surveying work to be established.

Wildlife

On the Patricia Avenue property, at least one snowshoe hare was noted, along with fresh pileated woodpecker cavity creating work.

Beaver activity has occurred on the Files lot, along with fresh pileated woodpecker work. Turkeys and a snapping turtle were noted, as well as an active porcupine den. Moose tracks were also noted.

Droppings from white tailed deer exist on both properties. These animals will survive almost in spite of what forest practice is done on the property. Retaining mast producers such as beech and oak for food production and hemlock for protection, will enhance deer habitat. Evidence of squirrels, birds, and other animals also exist. In consideration of these animals, adequate numbers of trees with cavities or wood pecker activity or heavy mast production should be retained for their benefit.

Significant wildlife habitats maps developed by the Department of Inland Fisheries and Wildlife show the existence of a deer wintering area on the Patricia avenue lot. Inland wading bird habitat has been mapped near or on the Files lot, in the vicinity of Farwell Bog. Correspondence from the natural areas program and associated maps are included in the appendix.

Insect and Disease

A number of insect and disease issues were noted on each property, the most significant is evidence of past defoliation by the Gypsy Moth on the Patricia Avenue.

Gypsy Moth

It is likely this insect visited the Files property as well. Evidence of its damage appears on occasion in the form of dead top branches and epicormic branches on the oaks. Future outbreaks of this forest pest are possible, although entomologist believe there may be more "predators" of this insect that may keep the populations down.

White Pine Weevil

White pine weevil has caused limited damage to the pine on both properties. The weevil is an insect which lays eggs in the terminal leader of the white pine during the spring. As the larvae develop, they consume the fleshy wood under the bark, causing the leader to die. In response, the next lower whorl of branches turn toward the sky, and all compete to become the trees replacement leader. This scenario often repeats itself for several years, resulting in multiple tops and crooked, limby stems. This damage is not fatal, and typically begins when the trees are between 6 and 10 feet tall. This issue is more important in regard to the white pine regeneration on the Files property. Damage form this insect is most significant on properties with clay soils of former fields reverting back to forest, neither of which is the case of these lots.

Blister Rust

Blister rust, a fungal disease of white pine, appeared on an insignificant number of individual trees. This fungus requires two hosts to complete its life cycle, therefore one white pine with the disease can not infect another white pine. A white pine can only be inoculated by the alternate host, gooseberries and currants. The most effective control of the disease is to eliminate the alternate host. It is unlikely this will be a significant problem for the future, but bears watching.

Maintaining a healthy vigorous stand of trees is the best defense against disease and insect attack. This can be accomplished by removing diseased and low vigor trees and retaining the most vigorous dominant trees for future forest growth.

Timber Harvesting Regulations

The Forest Practices Act of 1989 regulates timber harvesting on all forest property in Maine. Among other things, this law requires the landowner to complete a Forest Operations Notification prior to the sale of any amount of timber from the property. Boundary lines must also be flagged, by law, before harvesting timber. In addition to these laws, the Natural Resources Protection Act regulates stream crossings and forest access road construction near water bodies. Other laws regulate "pollutants" (including slash, soil and other materials) that may occur as the result of logging. An understanding of these laws is advised in advance of any timber harvesting or access road construction.

There is also a 600 foot Shoreland Zone around Farwell Bog, which affects the Files property. Although this zone has been expanded by the Town of Raymond beyond State mandated minimums, the rules that apply to timber harvesting are the same as the state minimum standards. In general, timber harvesting is limited to 40% of the volume in a ten year period, requires an even distribution of trees, and limits the size of crown openings. On ground measurements are necessary for locating this zone. Current Shoreland Zoning and the local timber harvesting ordinances are enforced locally by the Codes Enforcement Officer. Raymond, in part, has adopt the newest state mandated timber harvesting standards, of which may eventually be enforced by the Maine Forest Service. Providing that the language problem in this ordinance is corrected at the next Raymond town meeting, and towns that adopt this method of enforcing shoreland zoning meet the "critical mass" the Maine Forest Service will enforce timber harvesting regulations within the shoreland zoning. These updated standard will give forest landowners greater latitude in proper forest management in shoreland zones.

Water & Water Quality

Following best management practices (BMP's) for timber harvesting is the best protection against environmental degradation. In general, such practices include using portable skidder bridges or well constructed temporary fords to cross streams; timing the timber sale to suitable seasons of dry or frozen ground; properly locating major skid trails and minimizing the number of stream crossings.

Both properties have gravely, droughty soils at the higher elevation, where limitations of timber harvesting is less significant during wet season. There also exist seasonal drainage's and more poorly drained soils at lower elevations. Any timber harvesting in these wetter areas should be conducted under frozen or very dry soil conditions.

A publication on BMP's is available through the Maine Forest Service @ 1-800-367-0223.

Timber Inventory Method

Sixty seven variable radius plots were taken on the Patricia Avenue property, using a ten factor prism. These plots were located at predetermined yet arbitrary points, spaced on average every two hundred and eighty two feet apart, ultimately representing a plot per 1.82 forested acres. On the Files lot, fifty three plots were measured, spaced on average every two hundred and forty five feet, representing a plot per 1.38 forested acres. Within each plot, all trees four inches in diameter at breast height and larger were measured and recorded by species and product.

Based on the species composition in each plot, similar plots were grouped together to identify the stands mapped on the forest type map. In addition to the acres by forest type, the data from each plot is combined with other plots of the same type and used to determine the total timber volume by species and product for each forest type. All of the data in the Silvical Tables, and Timber Volume tables is generated from this timber cruise.

Due to accuracy levels inherent in sampling techniques, any volume or value stated are considered estimates. Volume and value estimate variances may occur due to trees that appear solid and healthy but have defects that are undetectable. In addition, timber value estimates represent current market conditions, and may be subject to change.

Conducting A Timber Sale

It is in the owner's best interest to employ the services of a consulting forester when the time comes to conduct a timber sale. As the owner's representative, a professional consulting forester will administer a timber sale in the landowners best interest. Among other tasks, consultants prepare a written timber sale agreement, mark each tree to be cut and provide an estimate of the volume and value of the timber to be removed. Conducting a timber sale in this manner gives the forest land owner the control necessary to meet the desired goal.

Selecting a reputable contractor with appropriate logging equipment is also important. Logging contractors should have adequate insurance, including workers compensation or a certificate that he is an independent contractor. Under Maine workers compensation laws, forest landowners are considered the employers of loggers harvesting timber on their land, and are responsible for injuries, if neither of the above workers compensation conditions are met. A complete understanding of these laws is advised in advance of contracting to sell timber to a logging contractor.

Recreation

This property is open to incidental recreation, and is part of the objective of the Town of Raymond owning this property. Signs on the Patricia Avenue property clearly restrict motorized vehicles from the reclaimed land fill area. Unfortunately, it appears that ATV users are travelling in this area. An access road located toward the north easterly side line does have pedestrian activity, as witnessed during the lot exam. At least two individuals use these trails for horse riding. This network of trails may also be used by wheeled ATVers and snowmobilers.

Invasive Species

Southern Maine is plagued with the problem of introduced plant species, also know as invasive species. These plant species, typically lower bushes or vines, can be very competitive with more desirable tree seedlings following a thinning or in the normal regression of a field back to forest.

Multi-flora rose exists near the gravel access road on the Patricia Avenue property, not far from the tower site. Nowhere else on the property were any invasive noted, and nowhere on the Files lot were invasives noted. Eliminating the multi-flora rose is recommended and is probably best done using herbicides.

Archaeological and Historic Sites

A review by the Maine Historic Preservation Commission of prehistoric and historic archaeology information available at this time, indicates that the Patricia Avenue property has no record of prehistoric or historic archaeology on site. For the Files property, the same Commission notes the possible existence of a former building, and included a map (copy in the appendix). As per the map, the former building site is probably on the northerly side of firelane 259, and likely on property identified by the town as Map 14, Lot 32. Correspondence and a summary of these finding is included in the appendix.

Maine Natural Areas Program

A review by the Maine Natural Areas Program (MNAP) indicates there is no documentation of threatened or endangered plant or animal species on the Patricia Avenue or Files property. There does exist a deer wintering area, which appears to effect a significant portion of the Patricia Avenue lot. An inland waterfowl and wading bird habitat is mapped near or on the Files lot, in the area nearest Farwell Bog. Neither of these designations effect timber harvest at this time. They may effect other development type uses.

Cost Shared Projects

In addition to sharing the cost of this forest management plan, the Project Canopy program also avails owners of cost sharing other projects. Reforestation, pre-commercial forest stand improvement, water quality projects, fish and wildlife habitat improvements, are among the general categories of needs a forest landowner may utilize. Cost sharing for the controlling of invasive, or precommercial weedings may be a consideration for cost sharing. Applying for these funds requires a written project plan, which includes an explanation and other details of the project, and a project location map. Funding for these projects may be limited or not available at this time.

Threatened and Endangered Species

None of the following plant or animal species were identified on this forest property during the plan assessment.

Plants	Animals	
Furbush's Lousewort	Peregrine Falcon	Loggerhead Turtle
Small Whorled Pogonia	Piping Plover	Bald Eagle
Prairie White-fringed Orchid	Roseate Tern	Eskimo Curlew
	Eastern Cougar	Gray Wolf
	Any of the five whale species	

Soils

The soils on both properties vary widely, from poorly drained soils located at the lower elevations, to well drained stony soils located at higher elevations. With the exception of the extremely wet soils, they provide for very good forest growth.

Operating timber harvesting equipment should be done under frozen or dry conditions at the lower elevations. On the well drained soils, operating timber harvesting machinery can be done during wet seasons.

A soils type map for each property is provided in Appendix B. This information has been generated from a soil survey of Cumberland County, conducted by the Soil Conservation Service (now known as the Natural Resources Conservation Service, NRCS) issued in 1974.

Hermon Series HhB HhC HhD	The Hermon series consists of deep, well-drained to somewhat excessively drained, gentle sloping to very steep soils. They are good for softwood, particularly Pine, and fair for hardwoods. Other than steep slopes, these soils are operable by machinery during most of the months of the year.
Ridgebury Series RgA	These are deep, nearly level, poorly drained soils formed on firm glacial till. They are wet most of the year. Due to their shallowness, windthrow can be a problem. The best time for logging operations is during the winter. White Pine, Hemlock and Spruce do the best here. This is a poor soil for hardwoods, although Soft Maple will often be found on them.
Woodbridge Series WsB	These soils are deep, moderately well-drained soils, level to moderately sloping. They derived from a stony glacial till which was dumped when the ice melted. These are very productive soils for tree growth. Equipment limitations are slight.

Forest Types

The following three character classification system is used to define each forest type. A forest type map is provided in the Appendix.

S = Softwood (>75% softwood)	**1** = seedling size	**A** = 85- 100% crown closure
H = Hardwood (>75% hardwood)	**2** = pole sized	**B** = 67 - 84% crown closure
M = Mixedwood (< 75% hardwood or softwood)	**3** = sawlog sized	**C** = 33 - 66% crown closure
		D = 0 - 32% crown closure

Patricia Avenue Property

Two forest types, each classified as a mixed wood stand, have been identified on this property (see Forest type definition for three character classification). These two stands total one hundred and twenty two acres. Following are descriptions and recommendations for each forest stand type.

Stand 1 Description, M3A

Occupying one hundred and one acres, this stand is classified as a mixed wood forest type. In general, it is located on the higher elevation portion of the property, and is a classic example of a pine-oak forest type. No matter what cultural forest practice occurs in these stand types, white pine and red oak eventually dominate the species composition.

With an average diameter at breast height (Dbh) of just under eight inches, it is considered a sawlog-sized, even aged stand, of approximately eighty years. White pine leads in timber volume, followed in declining volumes by red oak, soft maple, white oak, black oak, hemlock, white birch, and pitch pine. With a total volume equivalent of 2,961 cords, the stand averages just over 29 cords per acre with an average estimated timber value of $1,543.00 per acre. Currently, the basal area (a measure of stand density) is one hundred and six square feet, and is considered adequately stocked for optimum forest growth.

Known as strumella canker, a number of red oak have this disease, which causes a defective stem and often rot. On occasion, the red oak also display evidence of past gypsy moth defoliation. Other than these incidental issues, the red oak tends to be of good health and of fair to good quality. Most of the white pine are of good to very good quality, with a limited number showing symptoms of blister rust disease. Although none of the pitch pine are of sawlog quality they appear to be of good health. A relatively low volume of white birch exists, as they were either harvested years ago or have died. Considered mature or over mature, the remaining white birch will continue to decline with time. Showing some level of defect, often seems in the stem, the black and white oak are of fair quality on average. Because of the droughty site, the remaining species tend to be poor to average in timber quality, yet healthy. Advanced regeneration is dominated by white pine, and also includes white and red oak, beech, soft maple and moose maple.

Droppings from deer indicate this animal frequents this stand. Other evidence of animal activity includes cavity trees excavated by pileated wood peckers. Flying squirrels and other hole nesting species likely live in the some of the cavities of these trees or snags.

Stand 1, Recommendations

Conducting an improvement thinning that removes white birch and other maturing trees, and defective or diseased trees of all species is recommended. Any cultural practices should favor the retention of the highest quality trees of all species, in particular white pine and oak. In areas of high stand density, the forest will benefit from a thinning that reduces the stocking to an adequate level, approximately seventy five square feet of basal area. A thinning of this nature will concentrate future forest growth on the highest quality trees of all species. Openings created by the thinning will enhance existing advanced regeneration and stimulate new forest growth. Hardwood stump sprouts will provide food for deer and other animals. Retaining the best quality oak will also result in the continuation of quality mast production for deer, turkey and other mast consuming animals. Snags or trees with cavities should be retained at the rate of one per acre for the benefit of hole nesting animal species.

Stand 2 Description, M3A

Located at the most easterly corner of the property, this mixed wood forest type occupies the more poorly drained soils in the vicinity of a seasonal stream. Containing twenty one acres, hemlock leads in timber volumes followed in nearly equal volumes of white pine and soft maple, and distantly in declining volumes by red oak, pitch pine, white birch, white oak, and white ash. It appears this stand is older than stand one, and likely one hundred years or older. Timber harvesting probably occurred at the same time stand one was cut.

Classified as a sawlog sized stand, the average diameter at breast height is 9.3 inches. With a basal area of one hundred forty, the stand density is adequately stocked, to overstocked for optimum forest growth. Estimated at a value of $1,350.00 per acre, it contains a total volume equivalent of 808 cords (38 cords per acre).

Timber quality varies from very poor to very good, with the white pine appearing to be of the best quality on average. Many of the hemlock are quite large and though typically of good health, appear to be of poor to good quality at best. Soft maple also display poor to fair quality trees of good health. As in stand one, the white birch are mature and over mature and will continue to decline with time. The remaining species tend to be of fair quality. Other than normal decay, no disease issue was noted in this stand.

Advanced regeneration is very different than stand one, mainly due to the soils type. In some areas, there is no regeneration due to high crown density and the lack of sunlight striking the forest floor to stimulate regeneration. In other areas, fir, hemlock, soft maple, and beech appear. Significantly fewer numbers of white pine seedling exist.

Stand 2 Recommendations

Although the significant wildlife habitat indicates most of this property as deer wintering habitat, it is likely that deer frequent this stand for protection more than stand one. The higher density of the hemlock typically provides for better protection for these animals in poor weather conditions. Any thinnings in this stand should take this in consideration, as both forestry and wildlife objectives can be met.

Conducting an improvement thinning that removes mature white birch, and defective or poor quality trees of all species is recommended. In areas of high stand density, a thinning that reduces crown density to an adequate level, approximately one hundred square feet of basal area, is recommended. For the benefit of deer wintering, leaving scattered hemlock with large crowns, or dense stands of smaller hemlock is recommended.

A thinning of this nature will maintain existing deer wintering habitat and stimulate new and existing regeneration. Because hemlock regeneration already exists, this thinning will result in more growth of this species, and others, and create the next high density cover forest for future white tailed deer habitat.

Files Property

Two forest types have been identified on this property, one identified as a hardwood type and containing thirty one acres, and the second as a mixed wood type, containing forty two acres. In addition three acres are either water or wetland, and seven acres of reclaimed landfill.

Stand 3 Description, H2C

Classified as a hardwood forest type, this thirty one acre stand is located on four areas of the Files lot. With an average stem diameter at breast height of just under seven inches, it is considered a pole sized stand, with scattered sawlog-sized trees. Soft maple leads in timber volumes, followed in declining volumes by red oak, beech, white pine, hard maple, hemlock, yellow birch, white ash, poplar and spruce/fir. As with stand one of the Patricia Avenue property, this site tends to produce a forest type dominated by white pine and oak.

Most of the largest and probably the best trees were cut around the year 2000, leaving the stand understocked for optimum forest growth. It appears that white pine, red oak and hemlock were the major species cut that year. Since then, many of the residual trees have responded, with an increase annual growth, resulting in a current stand stocking level of sixty five square feet of basal area. This level of stocking is still low for optimum forest growth. Because of the latest timber harvesting, the residual trees were and still are of lower quality. In spite of their quality, in general, the health of these trees is good.

The greatest benefit of the most recent harvest, is the resulting regeneration. White pine saplings of ten or twelve years of age exist throughout the stand, and most frequently in most heavily cut areas. Beech, red oak, soft maple, hemlock, and a few fir also exist in sufficient numbers with the white pine. White oak, white ash, yellow birch, moose maple, and gray birch appeared on occasion, and on the very wettest soils, speckled alder. On the more poorly drained sites, fewer numbers of white pine appear. Raspberries and black berries are also present typically in heavily cut areas.

Evidence of a number of animals exist in the stand, including moose, deer and porcupine. Considerable amounts of excavation has occurred in the area southeast of the reclaimed landfill and the end of Farwell Bog, creating wetlands and possible vernal pools.

Stand 4 Description, M2C

Classified as a mixed wood forest type, this forty two acre stand is very similar to stand three, with the difference being the existence of higher volumes of hemlock. This stand composition difference probably has more to due with soils type than past harvesting methods, but certainly has been effected by both. With an average stem diameter at breast height of seven inches, it is considered a pole sized stand, with scattered sawlog-sized trees. Hemlock leads in timber volumes, followed in declining volumes by soft maple, white pine, beech, red oak, yellow birch, hard maple, white ash, white birch, spruce/fir, and poplar.

Treatment of this stand in the latest timber sale is identical to that of stand three, where most of the largest and probably the best trees were cut, leaving the stand understocked for optimum forest growth. It appears that white pine, red oak and hemlock were the major species cut. Currently the stand is understocked for optimum forest growth, with a stand stocking level of sixty eight square feet of basal area. Many of the larger trees are of lower quality, due to the most recent harvest, yet are of good health.

As in stand three, quality white pine regeneration is found throughout, along with beech, soft maple, red oak, hemlock, and fewer numbers of white oak, white ash, yellow birch and fir. Raspberries and black berries are also present in the heavily cut areas, and most often noted in the area of Farwell Drive.

At least one quality wildlife snag tree with cavities was noted. In an area somewhat central to stand four, a beaver dam has been constructed across a stream, causing a pond and death to trees in the area. A snapping turtle was noted during the lot exam, and likely heading for the pond created by the beaver.

Stand 3 and 4Recommendations

Due to the most recent timber harvesting, it is unlikely that conducting a commercial timber sale is feasible. In general, the best recommendation is to allow the forest to continue growing, and re-evaluate for further commercial recommendation in ten years.

The sapling regeneration present, is essentially the next forest. Significant numbers of sapling sized beech and soft maple are competing with sapling sized white pine. Controlling the beech and other hardwood competition is recommended, and will improve the regeneration composition, by reducing the number of hardwoods and increasing the number of white pine. Applying herbicides with a mist blower is the most effect and efficient way to get this pre commercial work done. Hardwood control by this method

should be done within the next three or four years, before these hardwood are too large. Using a brush saw or chainsaw to mechanically control the sapling sized hardwoods is also effective, however it is slower, more exhaustive and therefore more expensive to do. There are many acres on this property that would benefit from this weeding. Any person who performs this labor should be licensed, skilled at applying the treatment, and able to recognize the areas where this work is the most effective.

A third option may be to use lopping shears to cut undesirable hardwoods. With property training, Raymond residence with a desire to help culture this forest could volunteer time to do this work.

Suggested Cutting Plan & Other Cultural Practices

This plan is a guide and should be considered as such. Fluctuating forest product markets and other considerations may affect the timing of the timber harvest. None of the following recommendations preclude the owner from selling all the merchantable timber from the property, within the confines of the Forest Practices Act, should the owner need or want to maximize the return on his investment. In addition, and except for complying with the Maine Forest Practices Act and other laws or ordinances that may apply, the salvaging of timber as a result of disasters (natural or otherwise such as insect attack, disease, ice damage, windthrow, etc.) will in no way be restricted. The following recommendations are likely to generate between $25,000 and $30,000 in gross stumpage income from the Patricia Avenue property.

Time Period Recommendations

2012 - 2022 Stand 1, Patricia Avenue Lot

Remove mature white birch; remove lowest quality trees of all species, in particular trees with broken tops, multiple tops or decay. In areas of high stand density, conduct a thinning to remove smaller or intermediate trees of all species. Retain the occasional wildlife tree, including wolf trees or trees with cavities for the benefit of hole nesting animals. Efforts should be made to minimize equipment damage to advanced regeneration. Any cultural treatment should promote further growth of the highest quality trees of all species, especially white pine, and red oak.

Estimated Volumes to be removed

Sawlogs	175 Mbf
Pulpwood	350 cords

2012 - 2022 Stand 2, Patricia Avenue Lot

Remove mature white birch; remove lowest quality trees of all species, in particular trees with broken tops, multiple tops or decay. In areas of high stand density, conduct a thinning to remove smaller or intermediate trees of all species. For the benefit of deer wintering, retain adequate numbers of large healthy hemlocks with large crowns, promote growth and regeneration of high density hemlock understory. Otherwise, retain highest quality trees of all species, especially white pine, and red oak

Estimated Volumes to be removed

Sawlogs	40 Mbf
Pulpwood	120 cords

2012 - 2022 Stand 3 & 4 Files Lot

Allow forest to grow. Consider weeding hardwood saplings to increase white pine sapling composition. Re-inspect both stands for further recommendations in 2022

2022 Reinspect both properties further recommendations.
Locate, maintain and improve property lines as necessary, particularly on the Files property

Patricia Avenue Lot
Current Growth Rates & Silvical Data

Currently this land is growing about 30,900 board feet of sawlogs and 50.5 cords of firewood and pulpwood annually with a value of about $6,150.00.

Forest type	Acres	Av. Basal Area	Annual Growth Bd. ft.	Annual Growth Cds.	Growth/Acre Bd. ft.	Growth/Acre Cds.	Av. Dbh	Trees/Acre 4" & larger
Mixed Wood								
Stand 1	101	106	25,330	38.90	239	0.39	7.7	252
Mixed Wood								
Stand 2	21	140	5,573	11.65	265	0.55	9.3	229

Average Estimated Timber Volume per acre = 16.5, Cords, and 7,160 Board Feet
Average Estimated Timber Value per acre = $1,510.00.

Files Lot
Current Growth Rates & Silvical Data

Currently this land is growing about 2,900 board feet of sawlogs and 24 cords of firewood and pulpwood annually with a value of about $595.00.

Forest type	Acres	Av. Basal Area	Annual Growth Bd. ft.	Annual Growth Cds.	Growth/Acre Bd. ft.	Growth/Acre Cds.	Av. Dbh	Trees/Acre 4" & larger
Hardwood								
Stand 3	31	65	1,105	10.20	37.7	.033	6.8	220
Mixed Wood								
Stand 4	42	68	1,797	14.00	42.8	0.33	7.0	216

Average Estimated Timber Volume per acre = 13.2, Cords, and 1,080 Board Feet
Average Estimated Timber Value per acre = $280.00.

Current Timber Inventory
By Stand and Lot Total

These volume/product estimates are based on a professional judgement, and may vary due to undetectable defects in trees, or other variable factors (in particular markets).

Patricia Avenue						
Species	Stand 1		Stand 2		Total	
	Mbf	Cords	Mbf	Cords	Mbf	Cords
White Pine	518.0	595	56.0	56	574.0	651
Hemlock	0	22	90.0	127	90.0	149
Pitch Pine	0	5	1.5	22	1.5	27
White Oak	15.0	79	0.5	13	15.5	92
Red Oak	155.5	475	16.5	56	172.0	531
Black Oak	4.0	34	0	0	4.0	34
White Ash	0	0	0	9	0	9
White Birch	0	41	0	17	0	58
Soft Maple	10.0	305	6.5	166	16.5	471
Yellow Birch	0	9	0	0	0	0

Files Lot						
Species	Stand 1		Stand 2		Total	
	Mbf	Cords	Mbf	Cords	Mbf	Cords
White Pine	11.0	35	11.5	53	22.5	88
Hemlock	6.0	20	33.5	130	39.5	150
Spruce-Fir	0	3	0	10	0	13
Red Oak	7.0	65	1.0	60	8.0	125
White Ash	3.0	18	0	13	3.0	31
White Birch	0	6	0	6	0	16
Yellow Birch	2.0	24	1.0	44	3.0	68
Soft Maple	2.5	115	0	140	2.5	255
Hard Maple	0.5	41	0	27	0.5	68
Poplar	0	18	0	3	0	21
Beech	0	63	0	69	0	132

Current Timber Value

The following is an estimate of timber value and is not a guarantee of the value for sale purchases. Nearly all sawlogs are purchased by grade and therefore vary in value. These value estimates are based on a professional judgement and should not be used for negotiating a stumpage sale without the assistance of a professional forester with expertise in conducting timber sale (see page 4).

Current Sawlog Value
Patricia Avenue

	Total Volume	Total Value per Mbf	Total Value
White Pine	574.0	$200.00	$114,800.00
Hemlock	90.0	65.00	5,850.00
Pitch Pine	1.5	30.00	45.00
White Oak	15.5	70.00	1,085.00
Red Oak	172.0	150.00	25,800.00
Black Oak	4.0	100.00	400.00
Soft Maple	16.5	80.00	1,320.00
White Ash	12.5	90.00	135.00
		Total Sawlog Value	***$ 149,3000.00***

Current Pulpwood Value
Patricia Avenue

	Total Volume in Cords	Total Value per Cord	Total Value
Pine	678	$10.00	$6,780.00
Hemlock	149	14.00	2,086.00
Hardwood	1,195	18.00	9,810.00
Firewood	2,022	25.00	16,250.00
		Total Pulpwood Value	***$ 34,926.00***

Current Sawlog Value
Files Lot

	Total Volume	Total Value per Mbf	Total Value
White Pine	22.5	$140.00	$3,150.00
Hemlock	39.5	60.00	2,370.00
Red Oak	8.0	90.00	720.00
White Ash	3.0	100.00	300.00
Yellow Birch	3.0	75.00	225.00
Soft Maple	2.5	60.00	150.00
Hard Maple	0.5	120.00	60.00
		Total Sawlog Value	***$ 6,975.00***

Current Pulpwood Value
Patricia Avenue

	Total Volume in Cords	Total Value per Cord	Total Value
Pine	88	$7.00	$616.00
Hemlock	150	7.00	1,050.00
Spruce/Fir	13	7.00	91.00
Hardwood	245	10.00	2,450.00
Firewood	450	20.00	9,000.00
		Total Pulpwood Value	***$ 13,459.00***

Total Estimated Timber Value	**Patricia Avenue Lot**	**$184,226.00**
	Files Lot	**$20,434.00**
	Total	**$204,650.00**

Publications Available

Best Management Practices, Field Handbook
Maine Forest Service 1-800-367-0223

A Field Guide to Laws Pertaining to Timber Harvesting in Organized Areas of Maine
Department of Environmental Protection

Erosion Control on Logging Jobs
Maine Forest Service 1-800-367-0223

APPENDIX

A Glossary

B Location Map

C Forest Type Map, Patricia Avenue Lot

D Forest Type Map, Files Lot

E Forest Soils Map and Legend, Patricia Avenue Lot

F Forest Soils Map and Legend, Files Lot

G Archaeology and Historic Resources Review

F Maine Natural Areas

Appendix A

Glossary

Ac Acres

Basal Area

Total area in square feet of solid wood on one acre of land if all trees were cut off at Dbh and their sums added together. Basal area is a measure of stand density and is used as a guide to determine optimum stand density for maximum forest growth.

Best Management Practices (BMP's)

Guidelines for the reduction of erosion and sedimentation of water bodies (streams, ponds, lakes, rivers etc.) from logging activities.

Black Knots

Black knots are caused by limbs which die and remain on the tree. The tree continues to grow around the dead limb, creating a black knot in boards sawn from that tree. Black knots are a serious defect in White Pine and high grade hardwood lumber.

Blaze

To remove a spot of bark from a tree, usually with an axe, to make a semi-permanent mark and typically used to indicate a boundary line.

Board Feet (abbr.. Bd ft.)

A standard measurement of sawlog timber or lumber volume. One board foot is one inch by one foot by one foot. Transactions for timber or lumber sales are normally calculated in units of thousands of board feet (Mbf).

Boltwood

A sawlog that is shorter than standard log lengths. Boltwood is typically four feet long.

Co-Dominant Tree

References the position of the crown of a particular tree in the canopy of an even aged forest. Co-dominant trees typically occur in the greatest numbers within a stand and overtop all others with the exception of dominant trees.

Cord (abbr.. Cd.)

A standard of measurement of timber volume, normally used for pulpwood, boltwood or fuelwood volume. One cord measures four feet deep by four feet by high by eight feet in length

Dbh

Diameter breast height, the standard height at which a tree diameter is measured.

Den Tree

A tree with a cavity or cavities used by wildlife.

Glossary

Dominant Tree

References the position of the crown of a particular tree in the canopy of an even aged forest. Dominant trees are generally the largest trees in all measurable respects, with the crown positioned above other trees.

Epicormic Branching

The sprouting of dormant buds on the stem of a hardwood tree, often caused or enhanced by over thinning, defoliation and other environmental factors. Such branching typically reduces sawlog quality and thus sawlog value.

Forest Type

Groups of trees with similar combinations of species or of one dominant species (Ex. White Pine - Red Oak type or White Pine type).

Hardwood

Used to designate all broad-leaved or deciduous trees as a class. This would include maples, birches, ashes, oaks, aspens, beech and other broad-leaved trees.

Hardwood Type

A forest in which hardwood tree species comprise at least 75% of the stand.

Humus

Organic mat of decaying leaves, needles and woody debris on the surface of the ground.

Improvement Cut

The act of cutting trees in a forest which results in the improvement of the quality, health and value of the remaining trees.

Intermediate Trees

References the position of the crown of a particular tree in the canopy of an even aged forest. Intermediate trees generally have small crowns and are overtopped by many dominants and co-dominants. They typically do not respond to a thinning for many years, if at all.

Mast

Any nut, seed, or fruit produced by woody plants and consumed by wildlife.

Mbf

1,000 board feet

Glossary

Mixed Wood

Forest stands occupied by a mixture of softwood and hardwood tree species. Neither hardwood nor softwood tree species occupy more than 75% of the tree stocking.

Pole Size

Pole sized trees are 4" to 11" Dbh.

Pruning

The act of cutting off the lower branches of a tree in order to improve the future quality of the wood. Future growth on the pruned section of a tree will be knot free.

Pulpwood

Wood cut primarily for the manufacture of paper, usually the lower quality portions of a tree.

Reproduction

Young trees (seedling to sapling size) that become established following opening created in the forest canopy, either by natural causes or by the cutting of older trees.

Sapling Size

Trees in the size category of 1" to 3" Dbh.

Sawlog Size

Trees in the size category of 11 Dbh and larger, typically use for sawlogs.

Seedling

Trees that are less than 3 feet tall.

Shelterwood

Silvicultural cutting system that provides for a new stand of trees by removing the final cop in several stages.

Silvical

Tree Characteristic, rate of growth, tolerance to shade, frequency of seed production, etc.

Silviculture

The understanding of silvics of trees and the application of such to the interaction between different tree species in the forest.

Snag

A former tree, of which has died but remains standing and is often times in decay. The term is often associated with wildlife discussion.

Glossary

Silvicultural Clear-cut

Cutting that removes all tree to provide for a new stand by releasing seedlings already established, or to provide for seedling establishment by natural or artificial means.

Single Tree Selection System

A thinning system that removes individual trees periodically so that a mature forest is always present.

Softwood

Used to designate all coniferous (cone bearing) species as a class. This would include spruces, pines, balsam fir, hemlock, cedar, larch and other cone bearing species.

Softwood Type

A forest in which softwood tree species comprise at least 75% of the stocking.

Stocked or Stocking

A measure of the density of trees by Dbh normally expressed in number of trees per acre.

Stumpage

References the value and volume of the timber product as it stands in the forest.

Suppressed Tree

References the position of the crown of a particular tree in the canopy of an even aged forest. Suppressed trees are overtopped by intermediate, co-dominant and dominant trees. Suppressed trees typically are the slowest growing in a stand and the first to die as natural succession takes place.

Understory

Current vegetation occupying the ground beneath the forest canopy.

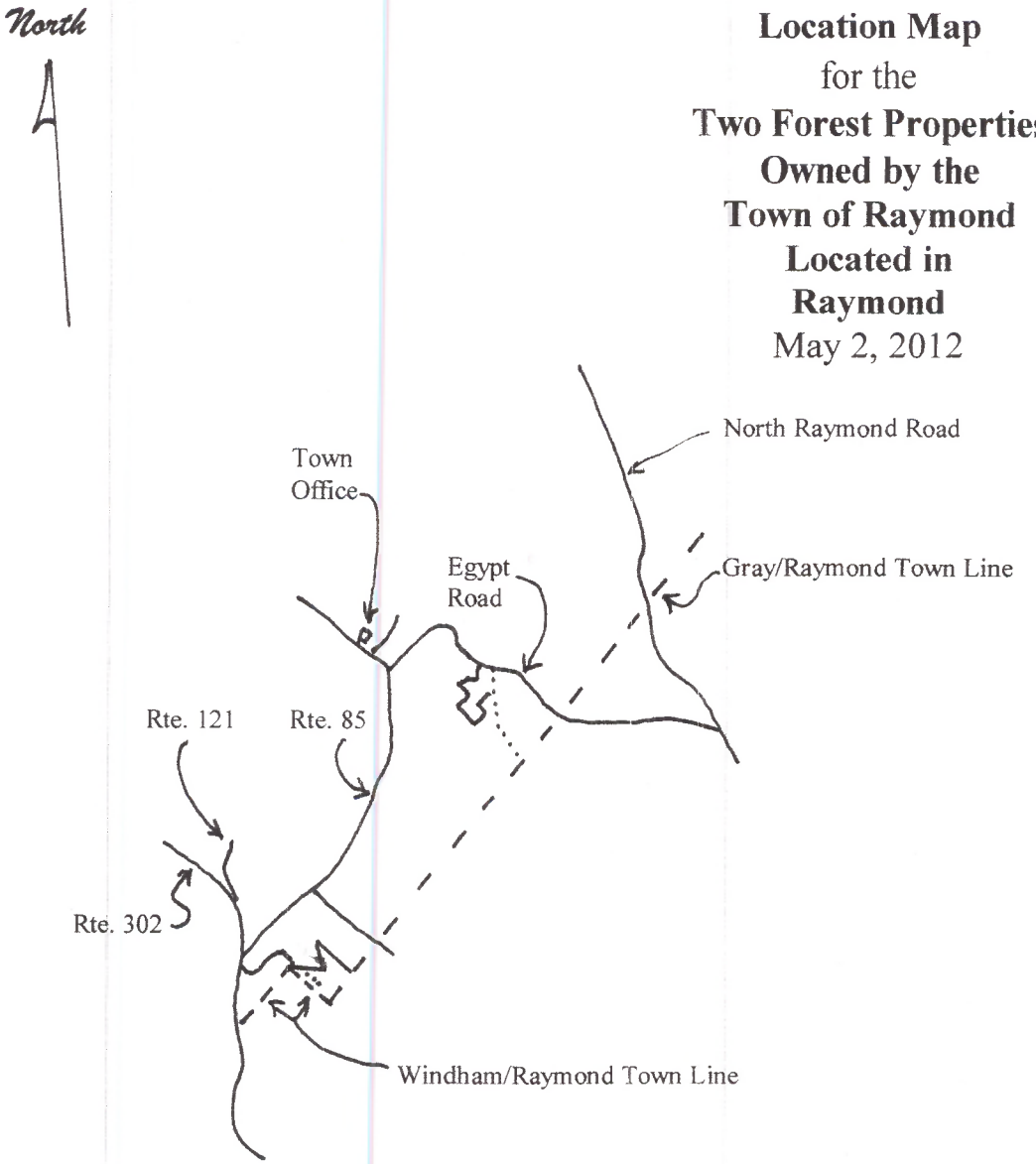
Vernal Pool

An ephemeral body of water that fills in the spring, holds water for at least 10 days, and dries up by fall some or all years and that does not contain fish.

Wildlife Habitat

Four basic components of habitat are food, water, cover, and space. Specific requirements for each of these components will vary with species, season of year, and the age and sex of the animal.

Location Map
for the
Two Forest Properties
Owned by the
Town of Raymond
Located in
Raymond
May 2, 2012



Prepared By

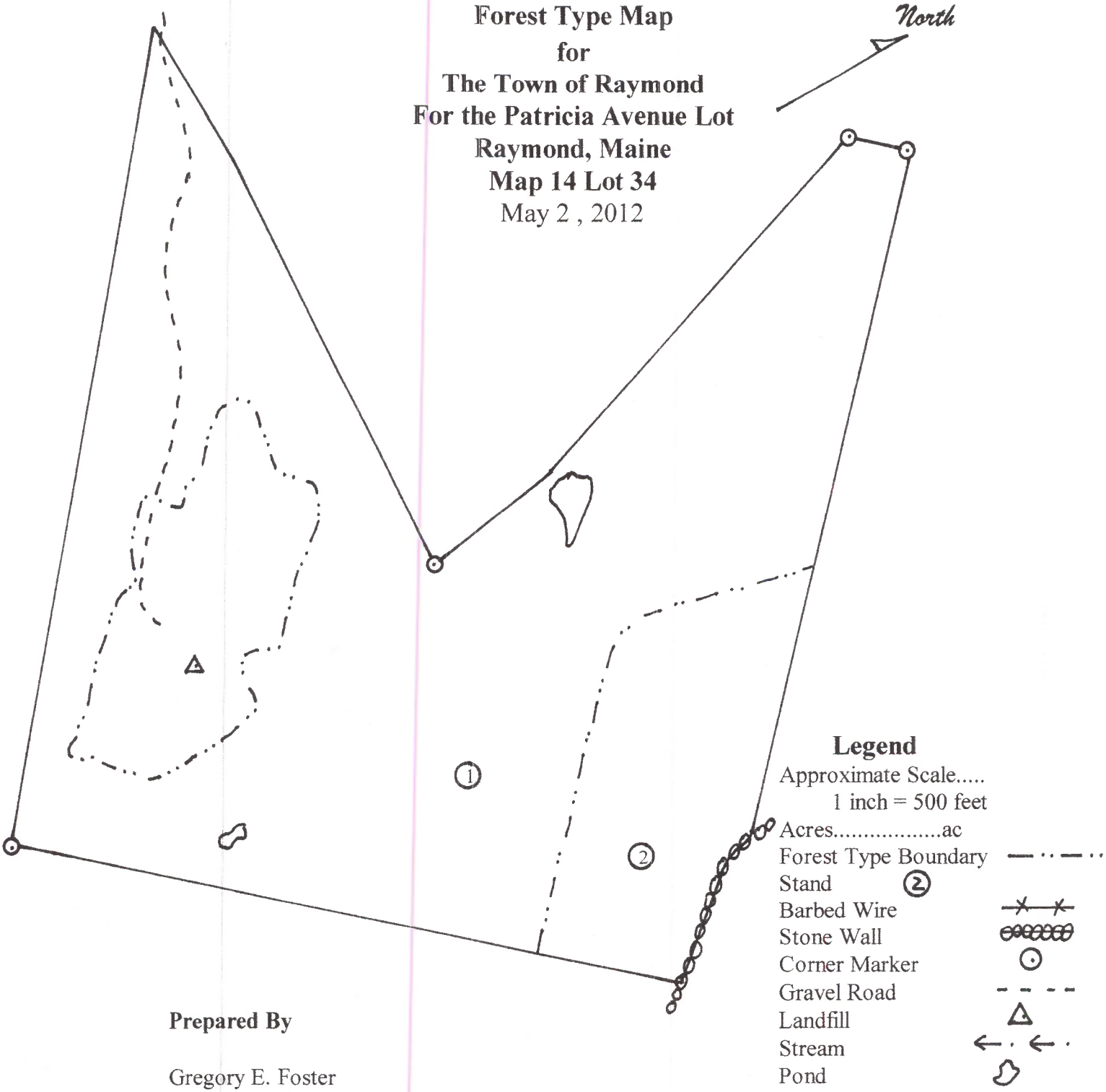
Gregory E. Foster
Timberstate G. Inc.
P. O. Box 157
Gray, Maine 04039
Professional Forester # 595
(This map is not a legal survey)

Legend

Approximate Scale.....
1 inch = 2 Miles
Paved Road
Files Property
Patricia Avenue Property

Forest Type Map
for
The Town of Raymond
For the Patricia Avenue Lot
Raymond, Maine
Map 14 Lot 34

May 2 , 2012



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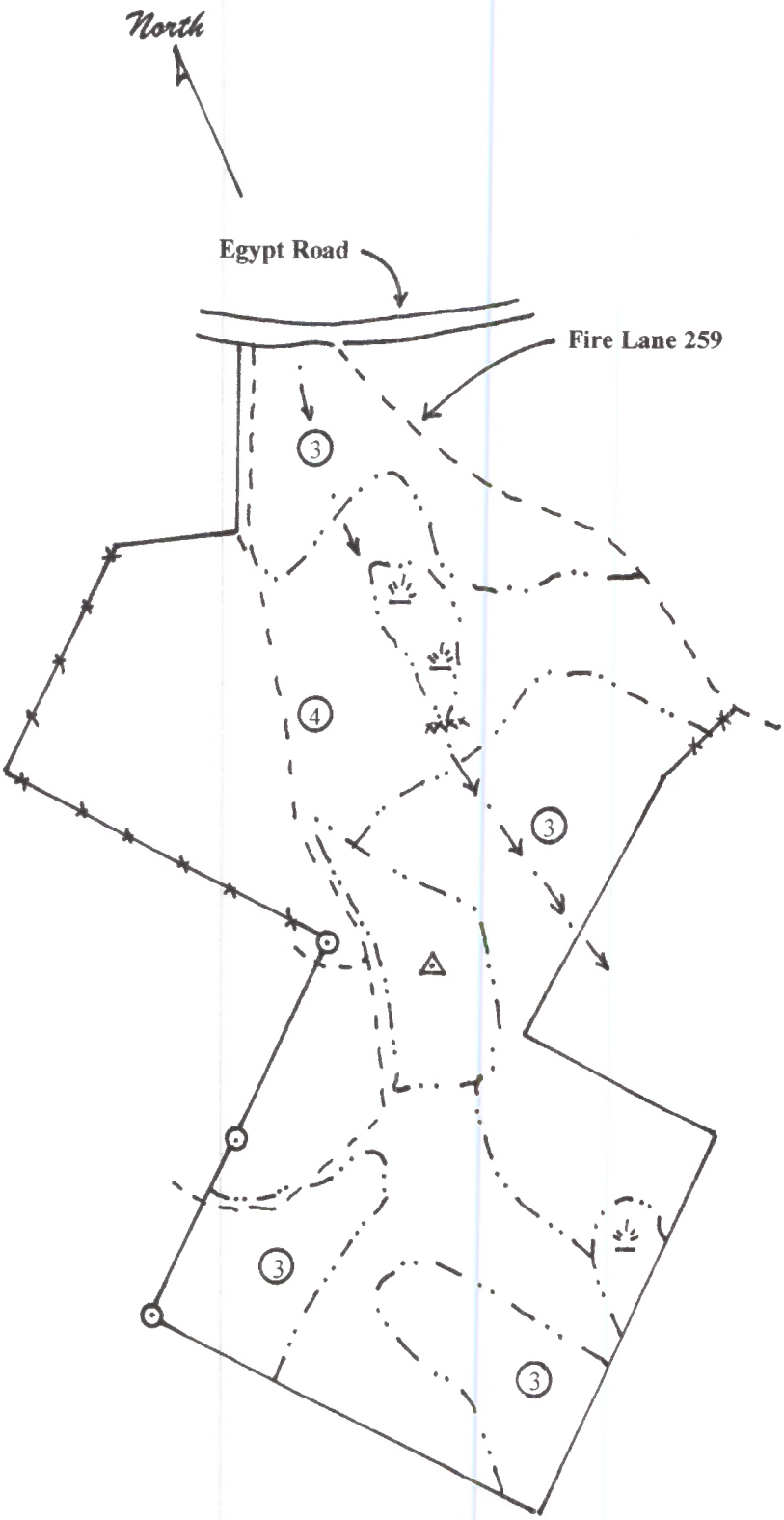
(This map is not a legal survey)

Forest Types

Stand 1 Hardwood	101	ac
Stand 2 Mixed Wood	21	ac
Reclaimed Landfill	18	ac



Forest Type Map
for
The Town of Raymond
For the Files Lot
Raymond, Maine
Map 14 Lot 34
May 2 , 2012

Legend

Approximate Scale.....
1 inch = 550 feet
Acres.....ac
Forest Type Boundary
Stand
Stone Wall
Barbed Wire
Corner Pin
Gravel Road
Landfill
Stream
Wetland/water
Beaver Dam

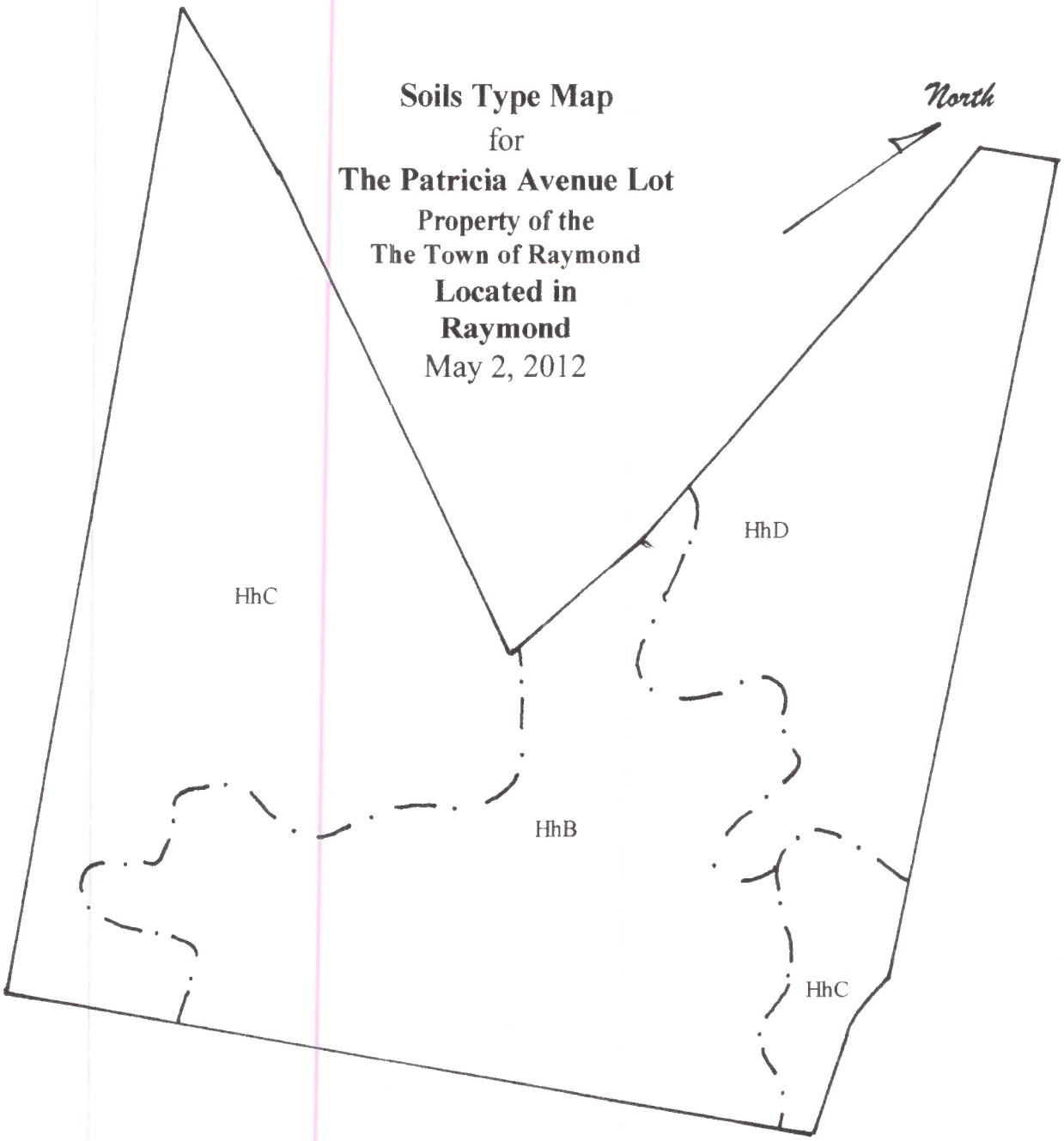
Forest Types

Stand 3	Hardwood	31	ac
Stand 4	Mixed Wood	42	ac
Reclaimed Landfill		7	ac
Wetland		3	ac

Prepared By

Gregory E. Foster
Timberstate G. Inc.
P. O. Box 157
Gray, Maine 04039
Professional Forester # 595
(This map is not a legal survey)

Soils Type Map
for
The Patricia Avenue Lot
Property of the
The Town of Raymond
Located in
Raymond
May 2, 2012



Legend

Aproximate Scale.....
1 inch = 500 feet
Acres.....ac
Soils Boundary
Stream

Soils

HhB Hermon Series
HhC Hermon Series
HhD Hermon Series

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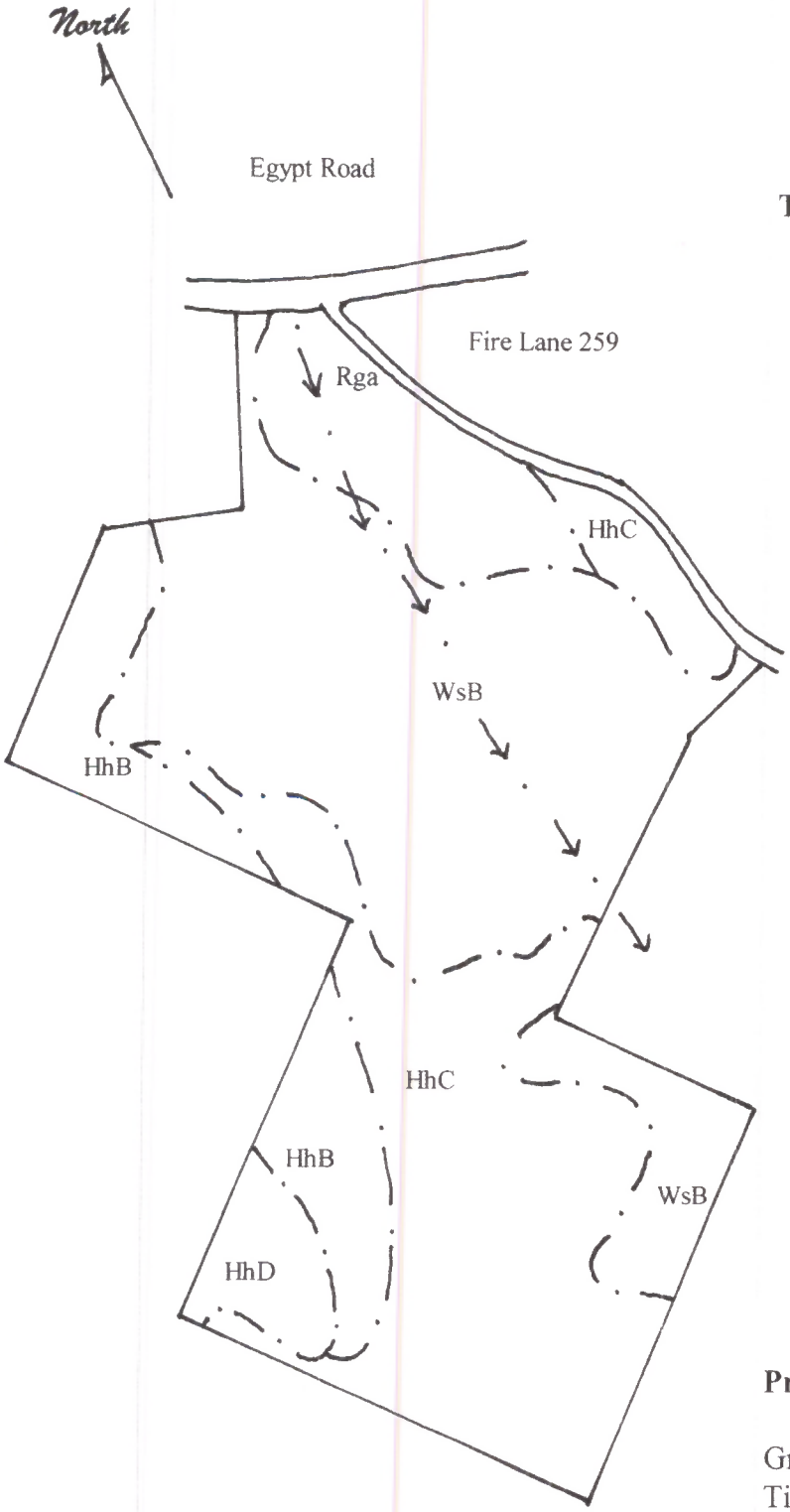


Soils Type Map
for
The Files Lot
Property of the
The Town of Raymond
Located in
Raymond
May 2, 2012

Legend

Aproximate Scale.....
1 inch = 500 feet
Acres.....ac
Soils Boundary
Stream

Soils

HhB	Hermon Series
HhC	Hermon Series
HhD	Hermon Series
RgA	Ridgebury Series
WsB	Woodbridge Series

Prepared By

Gregory E. Foster
Timberstate G. Inc.
P. O. Box 157
Gray, Maine 04039
Professional Forester # 595
(This map is not a legal survey)

STATE OF MAINE
DEPARTMENT OF CONSERVATION
93 STATE HOUSE STATION
AUGUSTA, MAINE
04333-0093

PAUL R. LEPAGE
GOVERNOR

WILLIAM H. BEARDSLEY
COMMISSIONER

September 12, 2011

Gregory Foster
P.O. Box 157
Gray, Maine 04039

Re: Forest Management Plan Review

Dear Mr. Foster:

In response to your request received on September 9, 2011, I have searched our data system for information on rare or unique botanical features, rare animal populations, and essential or significant wildlife habitats in the vicinity of the property in Raymond, on the border of Windham and Gray.

For individual parcel reviews, we use a simple checklist that summarizes our findings. The enclosed checklist includes our review of several data sets, some of which are maintained by MNAP and others that are maintained by the Maine Department of Inland Fisheries and Wildlife (MDIFW), and the U.S. Fish and Wildlife Service (USFWS). If a parcel intersects with a data set maintained by MDIFW or USFWS, please contact the appropriate biologist indicated on the checklist for additional information.

The eastern half of the property contains land that has been designated as Deer Wintering Area. According to the information currently in our files, there are no other rare species or important habitats documented within the property. This lack of data may indicate minimal survey efforts rather than confirm the absence of rare features.

Thank you for using the MNAP in the forest management planning process. If you have questions about the MNAP, or if you would like more information about this site, please feel free to contact me. You can also visit us on the web at http://www.maine.gov/doc/nrimc/mnap/.

Sincerely,

Lisa St. Hilaire

Information Manager
Maine Natural Areas Program
maine.nap@maine.gov
Phone: (207) 287-8046 Fax: (207) 287-8040

Enclosure
cc: Scott Lindsay, MDIFW Biologist

MAINE NATURAL AREAS PROGRAM
(207)287-8044 or maine.nap@maine.gov

Forest Management Plan Review

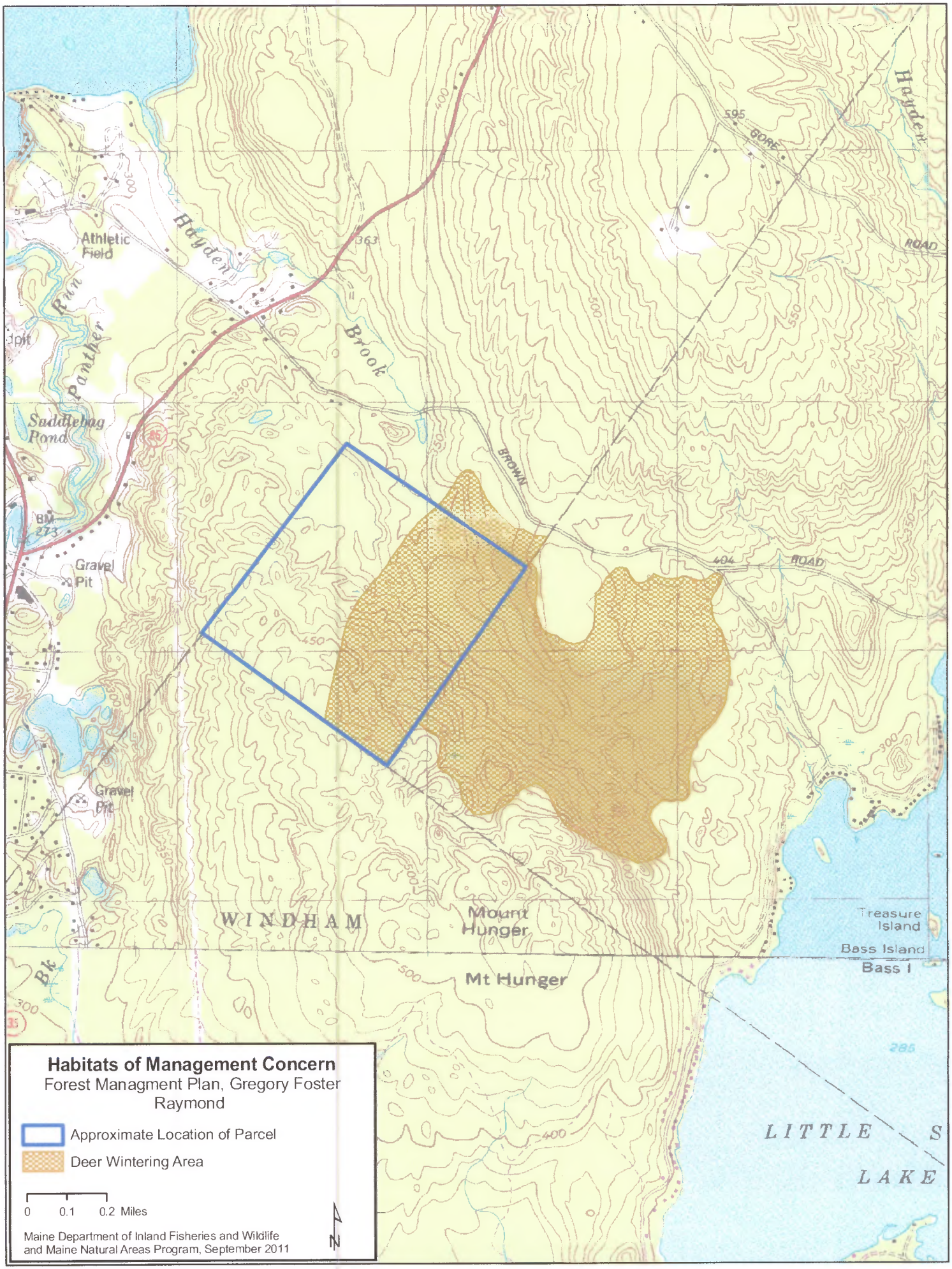
Forester: *Gregory Foster* Landowner: Lot Name: *Borders Windham and Gray*

Date Received: *9/9/2011* Town: *Raymond* County: *Cumberland* MDIFW Region: *A*

PLANT, ANIMAL, AND HABITATS	Documented to occur at the site? YES	NO	Contact the following biologist to discuss conservation considerations
Plants: rare, threatened and/or endangered *If yes, see attached summary table.*	☐	☒	
Natural Communities: rare and/or exemplary *If yes, see attached summary table.*	☐	☒	
Animals: rare, threatened, or endangered *If yes, see attached summary table.*	☐	☒	
Mapped Essential Wildlife Habitats:			
Roseate tern	☐	☒	
Piping plover and Least tern	☐	☒	
Mapped Significant Wildlife Habitats:			MDIFW Regional Wildlife Biologist, Scott Lindsay, (207) 657-2345 ext. 110
Deer wintering area	☒	☐	
Inland waterfowl and wading bird habitat	☐	☒	
Tidal waterfowl and wading bird habitat	☐	☒	
Significant vernal pool	☐	☒	
Shorebird roosting area	☐	☒	
Wild brook trout habitat	☐	☒	
Atlantic Salmon:			
Salmon watershed	☐	☒	
Salmon habitat: ☐ General ☐ Rearing ☐ Spawning	☐	☒	
Canada lynx: Does the site occur within a town which may provide habitat for lynx?	☐	☒	

LANDSCAPE CONTEXT	YES	NO
Does parcel intersect with a Beginning with Habitat Focus Area? Focus Area Name:	☐	☒
Is the parcel adjacent to state-owned land? Owner: Ownership type: ☐ Fee ☐ Easement Area Name:	☐	☒
Is the parcel within an area identified by MNAP as a potential inventory site for undocumented rare plants or exemplary natural communities? If so, MNAP will contact the landowner for permission prior to any inventory work.	☐	☒

Review completed by: KJE
Date: 9/12/2011
MNAP #: 2011_09_12_KE_02


Habitats of Management Concern
Forest Managment Plan, Gregory Foster
Raymond
Approximate Location of Parcel
Deer Wintering Area
0 0.1 0.2 Miles
Maine Department of Inland Fisheries and Wildlife
and Maine Natural Areas Program, September 2011
N
Athletic Field
Hayden
Pan
Panther
Brook
Saddlebag Pond
Gravel Pit
Gravel Pit
BM 273
BROWN
404
ROAD
595
GORE
ROAD
Hayden
WINDHAM
Mount Hunger
Mt Hunger
Treasure Island
Bass Island
Bass I
LITTLE
LAKE
S
Bk
400
450
500
550
300
350
363
286

September 12, 2011

Gregory Foster
P.O. Box 157
Gray, Maine 04039

Re: Forest Management Plan Review

Dear Mr. Foster:

In response to your request received on September 9, 2011, I have searched our data system for information on rare or unique botanical features, rare animal populations, and essential or significant wildlife habitats in the vicinity of the property in Raymond, on Egypt Road.

For individual parcel reviews, we use a simple checklist that summarizes our findings. The enclosed checklist includes our review of several data sets, some of which are maintained by MNAP and others that are maintained by the Maine Department of Inland Fisheries and Wildlife (MDIFW), and the U.S. Fish and Wildlife Service (USFWS). If a parcel intersects with a data set maintained by MDIFW or USFWS, please contact the appropriate biologist indicated on the checklist for additional information.

The south east corner of the property contains land that has been designated as Inland Waterfowl and Wading Bird Habitat. According to the information currently in our files, there are no other rare species or important habitats documented within the property. This lack of data may indicate minimal survey efforts rather than confirm the absence of rare features.

Thank you for using the MNAP in the forest management planning process. If you have questions about the MNAP, or if you would like more information about this site, please feel free to contact me. You can also visit us on the web at http://www.maine.gov/doc/nrimc/mnap/.

Sincerely,

Lisa St. Hilaire

Information Manager
Maine Natural Areas Program
maine.nap@maine.gov
Phone: (207) 287-8046 Fax: (207) 287-8040

Enclosure
cc: Scott Lindsay, MDIFW Biologist

MAINE NATURAL AREAS PROGRAM
(207)287-8044 or maine.nap@maine.gov

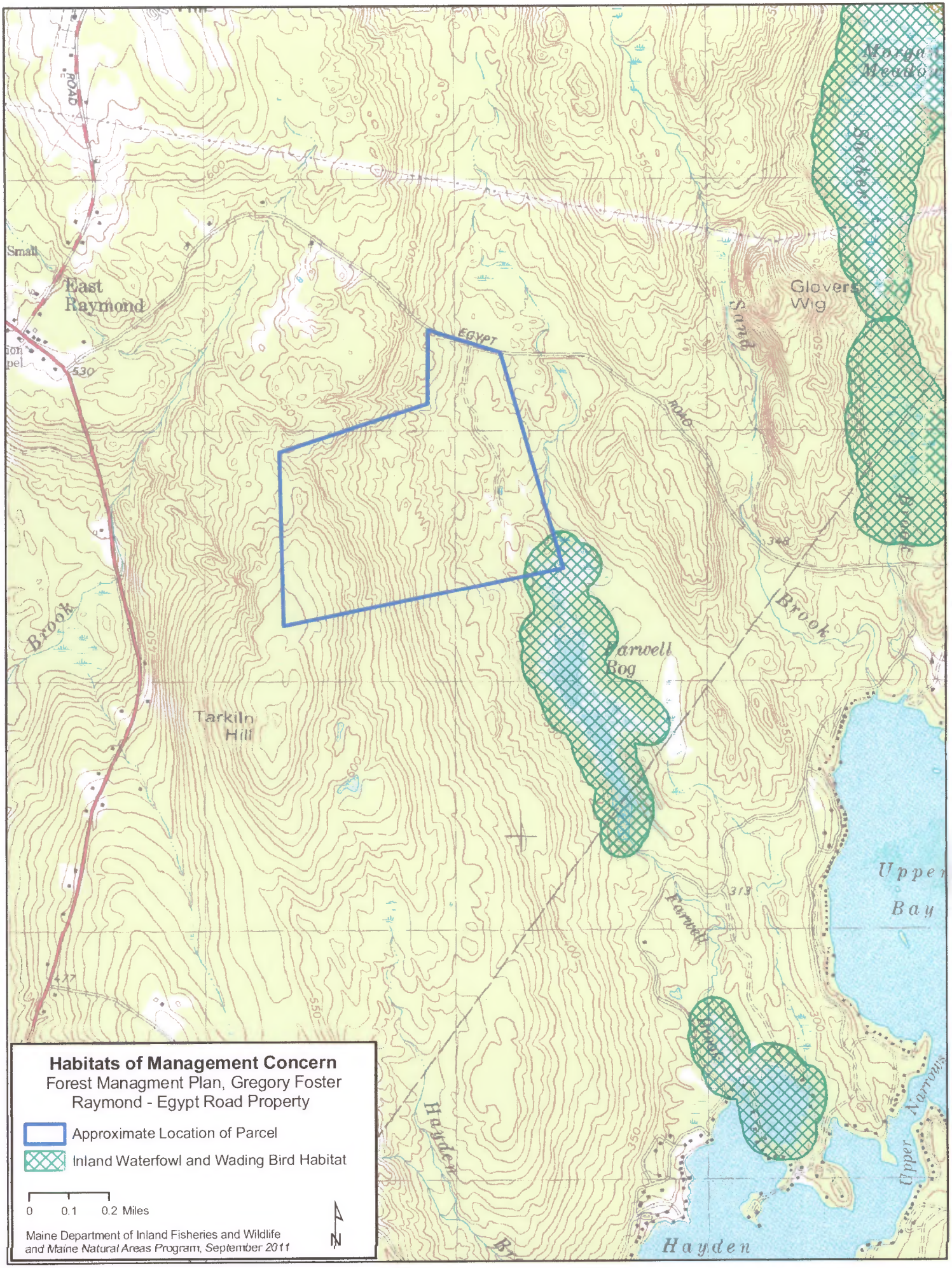
Forest Management Plan Review

Forester: *Gregory Foster* Landowner: Lot Name: *Egypt Road*
Date Received: *9/9/2011* Town: *Raymond* County: *Cumberland* MDIFW Region: *A*

PLANT, ANIMAL, AND HABITATS	Documented to occur at the site? YES	NO	Contact the following biologist to discuss conservation considerations
Plants: rare, threatened and/or endangered *If yes, see attached summary table.*	☐	☒	
Natural Communities: rare and/or exemplary *If yes, see attached summary table.*	☐	☒	
Animals: rare, threatened, or endangered *If yes, see attached summary table.*	☐	☒	
Mapped Essential Wildlife Habitats:			
Roseate tern	☐	☒	
Piping plover and Least tern	☐	☒	
Mapped Significant Wildlife Habitats:			MDIFW Regional Wildlife Biologist, Scott Lindsay, (207) 657-2345 ext. 110
Deer wintering area	☐	☒	
Inland waterfowl and wading bird habitat	☒	☐	
Tidal waterfowl and wading bird habitat	☐	☒	
Significant vernal pool	☐	☒	
Shorebird roosting area	☐	☒	
Wild brook trout habitat	☐	☒	
Atlantic Salmon:			
Salmon watershed	☐	☒	
Salmon habitat: ☐ General ☐ Rearing ☐ Spawning	☐	☒	
Canada lynx: Does the site occur within a town which may provide habitat for lynx?	☐	☒	

LANDSCAPE CONTEXT	YES	NO
Does parcel intersect with a Beginning with Habitat Focus Area? Focus Area Name:	☐	☒
Is the parcel adjacent to state-owned land? Owner: Ownership type: ☐ Fee ☐ Easement Area Name:	☐	☒
Is the parcel within an area identified by MNAP as a potential inventory site for undocumented rare plants or exemplary natural communities? If so, MNAP will contact the landowner for permission prior to any inventory work.	☐	☒

Review completed by: KJE
Date: 9/12/2011
MNAP #: 2011_09_12_KE_04


Habitats of Management Concern
Forest Managment Plan, Gregory Foster
Raymond - Egypt Road Property
Approximate Location of Parcel
Inland Waterfowl and Wading Bird Habitat
0 0.1 0.2 Miles
Maine Department of Inland Fisheries and Wildlife
and Maine Natural Areas Program, September 2011
N
East Raymond
Small
ROAD
EGYPT
ROAD
Glovers Wig
Brook
Farwell Bog
Tarkiln Hill
Farwell
Brook
Upper Bay
Upper Narrows
Hayden
Hayden
Brook

MAINE HISTORIC PRESERVATION COMMISSION
55 CAPITOL STREET
65 STATE HOUSE STATION
AUGUSTA, MAINE
04333

PAUL R. LEPAGE
GOVERNOR

EARLE G. SHETTLEWORTH, JR.
DIRECTOR

ARCHAEOLOGY AND HISTORIC RESOURCES REVIEW
FORESTRY PLAN

MHPC # F221-11 Date Received 9/ 9/2011
Township RAYMOND Forester TIMBERSTATE G INC
Parcel OFF BROWN RD Patricia Ave Property

******This worksheet was completed for informational purposes only******

Prehistoric (Native American) Archaeology (for further information: arthur.spiess@maine.gov)

- ☒ No prehistoric archaeological sites known. Based on location, soils and topography, none are expected.
- ☐ No prehistoric archaeological sites known because no survey has been conducted. However, the following area is archaeologically sensitive: _____
- ☐ The property includes known sites of archaeological importance. (See attached info)

Historic Archaeology (e.g. 1800s farms, etc.) (for further information: leith.smith@maine.gov)

- ☒ No sites are known, and none are expected (based on historic maps and documents).
- ☐ There are possible sites from former houses, barns, and outbuildings shown on maps from 1850 to 1920, now possibly recognizable as foundations or cellar holes. (See attached map.)
- ☐ The property contains known sites of archaeological importance. (See attached info)

Historic Buildings or Structures (for further information: robin.stancampiano@maine.gov)

- ☐ No historic buildings or structures are known or expected on the property (based on 7.5' USGS topographic maps and MHPC records.
- ☒ Buildings or structures may exist on the property that have not been evaluated for National Register eligibility. eligibility. Our office will provide an assessment if a request letter, photos of any buildings over fifty years of age that are on the subject parcel, and a 7.5' USGS topographic map with all photos keyed to it are submitted to our office.
- ☐ Buildings or structures exist on the property that are either listed in or eligible for nomination to the National Register of Historic Places. (See attached info)

The information on this worksheet is being provided for Forestry Management Planning purposes only.

If any construction or ground disturbing activities on these properties will utilize federal funding, permitting or licensing, initiation of Section 106 review with the Maine Historic Preservation Commission is required pursuant to the National Historic Preservation Act of 1966.

PHONE: (207) 287-2132 FAX: (207) 287-2335

MAINE HISTORIC PRESERVATION COMMISSION
55 CAPITOL STREET
65 STATE HOUSE STATION
AUGUSTA, MAINE
04333

PAUL R. LEPAGE
GOVERNOR

EARLE G. SHETTLEWORTH, JR.
DIRECTOR

ARCHAEOLOGY AND HISTORIC RESOURCES REVIEW
FORESTRY PLAN

MHPC # F223-11 Date Received 9/ 9/2011
Township RAYMOND Forester TIMBERSTATE G INC
Parcel OFF EGYPT RD Trudy Giles Property

******This worksheet was completed for informational purposes only******

Prehistoric (Native American) Archaeology (for further information: arthur.spiess@maine.gov)

- [x] No prehistoric archaeological sites known. Based on location, soils and topography, none are expected.
- [ ] No prehistoric archaeological sites known because no survey has been conducted. However, the following area is archaeologically sensitive: _____
- [ ] The property includes known sites of archaeological importance. (See attached info)

Historic Archaeology (e.g. 1800s farms, etc.) (for further information: leith.smith@maine.gov)

- [ ] No sites are known, and none are expected (based on historic maps and documents).
- [x] There are possible sites from former houses, barns, and outbuildings shown on maps from 1850 to 1920, now possibly recognizable as foundations or cellar holes. (See attached map.) 1871
- [ ] The property contains known sites of archaeological importance. (See attached info)

Historic Buildings or Structures (for further information: robin.stancampiano@maine.gov)

- [ ] No historic buildings or structures are known or expected on the property (based on 7.5' USGS topographic maps and MHPC records.
- [x] Buildings or structures may exist on the property that have not been evaluated for National Register eligibility. eligibility. Our office will provide an assessment if a request letter, photos of any buildings over fifty years of age that are on the subject parcel, and a 7.5' USGS topographic map with all photos keyed to it are submitted to our office.
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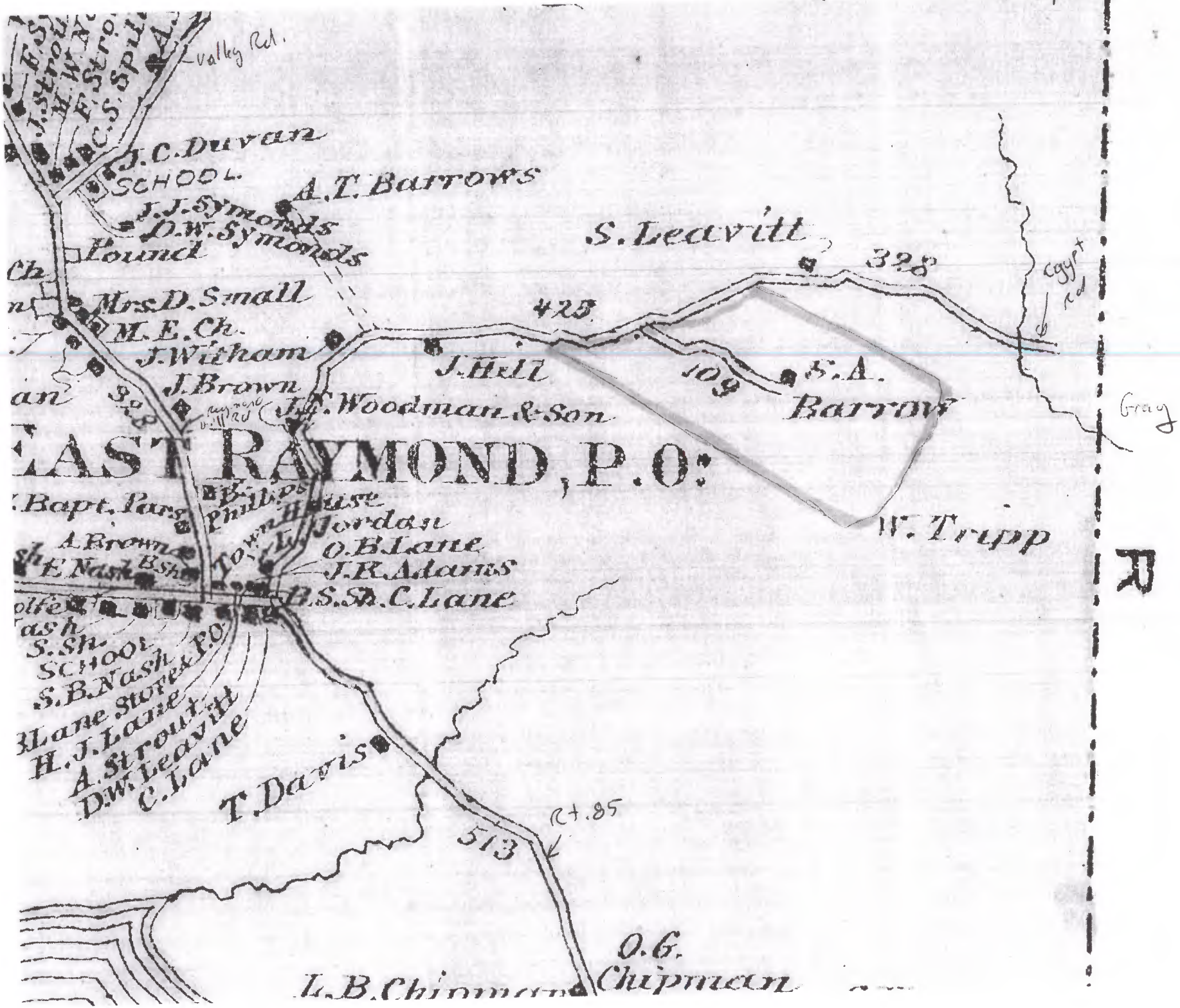
1871 Area of the File lot, Raymond