

STATE OF WISCONSIN  
DEPARTMENT OF NATURAL RESOURCES  
Madison, Wisconsin

ITEM RECOMMENDED FOR NATURAL RESOURCES BOARD AGENDA

TO THE SECRETARY:

Date September 11, 1979

FROM: John M. Keener

SUBJECT: MASTER PLANNING - Approval of conceptual master plan for the Peters Marsh Wildlife Area, Langlade County.

1. To be presented at September Board meeting by C. D. Besadny.

2. Appearances requested by the public: None.  
Name \_\_\_\_\_ Representing whom? \_\_\_\_\_

3. Reference materials to be used:

Memorandum dated September 11, 1979 from John M. Keener to Anthony S. Earl.  
Peters Marsh Wildlife Area Master Plan (Concept Element).

4. Summary:

The Concept Element of the Master Plan has been developed for the Peters Marsh Wildlife Area which is located in Langlade County. The Department proposes to manage the property for forest game and waterfowl species as well as to provide public hunting and compatible outdoor recreational opportunities.

5. Recommendation: That the Natural Resources Board approve the Concept Element of the Master Plan.

APPROVED:

C. D. Besadny R 9/11/79  
C. D. Besadny, Administrator Date

A. C. Damon Deputy Secretary Date  
Anthony S. Earl 9/12/79  
Secretary Date

- cc: Judy Scullion - 5
- Ron Nicotera - 5
- Art Doll - 9
- Jim Huntoon - 4
- John Keener - 4
- Dave Gjestson - 4
- Pete Jensen - 3
- John Brasch - Rhinelander

Signed:

John M. Keener  
John M. Keener, Director  
Bureau of Wildlife Management

RECEIVED

SEP 18 1979

BUREAU OF  
REAL ESTATE

# CORRESPONDENCE/MEMORANDUM

STATE OF WISCONSIN

Date: September 11, 1979

File Ref: 2300

To: Anthony S. Earl

From: John M. Keener

Subject: Master Plan for the Peters Marsh Wildlife Area

The final Concept Element of the subject Plan is presented for your approval. The Plan has been subjected to a 45-day review by the appropriate Department functions, advisory groups and other resource agencies.

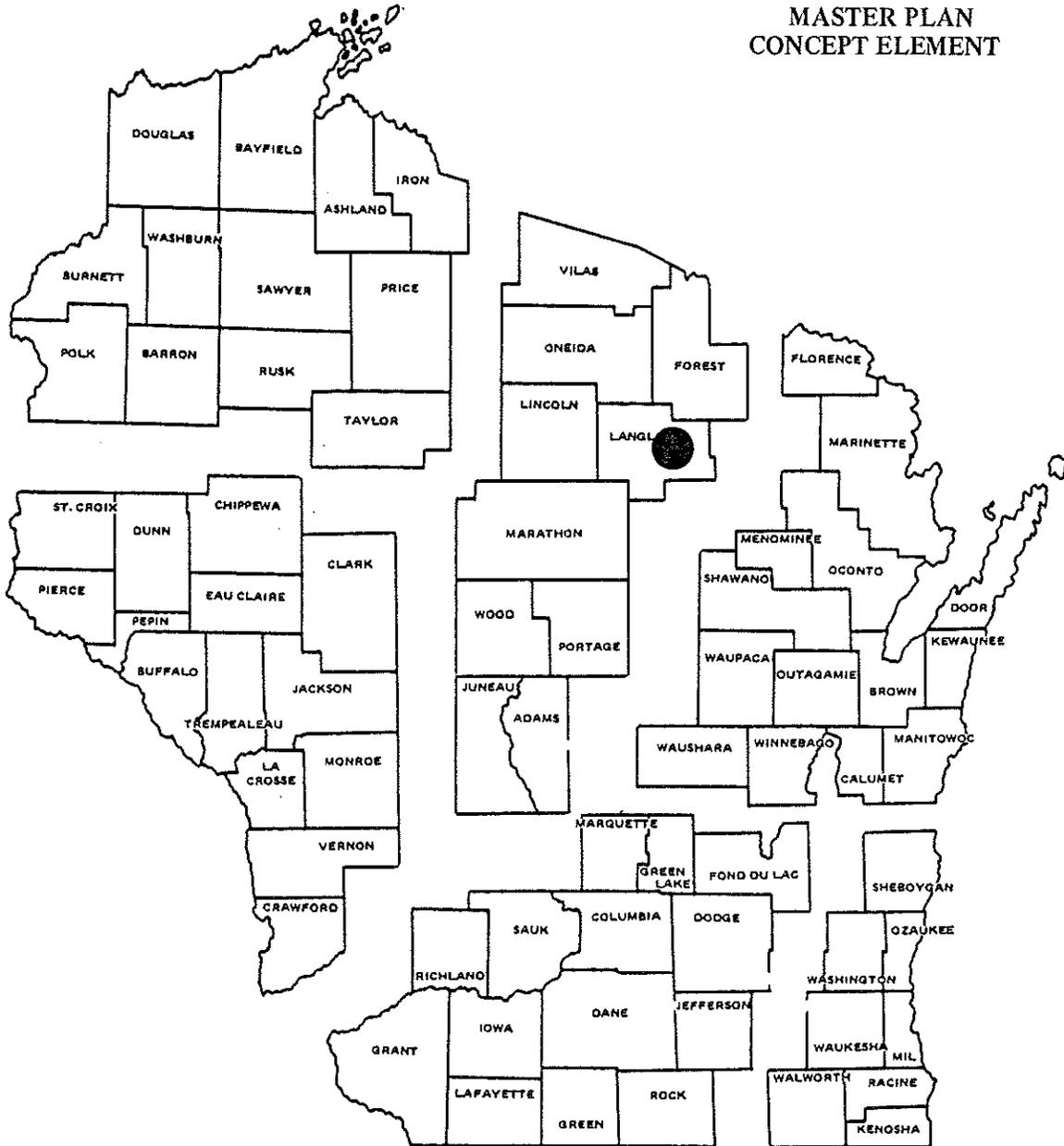
Comments received have been reviewed by the Bureau of Wildlife Management and the North Central District. Agreement was reached on the treatment of comments, the majority of which were incorporated into the final draft. No public controversy has been brought to our attention during the review process.

The Plan establishes objectives for producing deer, ruffed grouse and ducks, public hunting and trapping of game species and management of timber. The property management will provide additional benefits for nongame species and provide opportunities for compatible, nonhunting use such as bird watching, cross country skiing and hiking.

DLG:mg

cc: Judy Scullion - 5  
Ron Nicotera - 5  
Art Doll - 9  
Jim Huntoon - 4  
John Keener - 4  
Dave Gjestson - 4  
Pete Jensen - 3  
John Brasch - Rhinelander

PETERS MARSH WILDLIFE AREA  
 MASTER PLAN  
 CONCEPT ELEMENT



PROPERTY TASK FORCE

Leader - Carl J. McIlquham, Leader - Area Wildlife Manager  
 Raymond Hallisy - Area Forester  
 Max Johnson - Area Fish Manager  
 Clifford Knudsen - Conservation Warden

Submitted: March 29, 1979

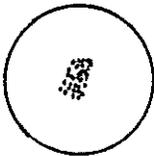
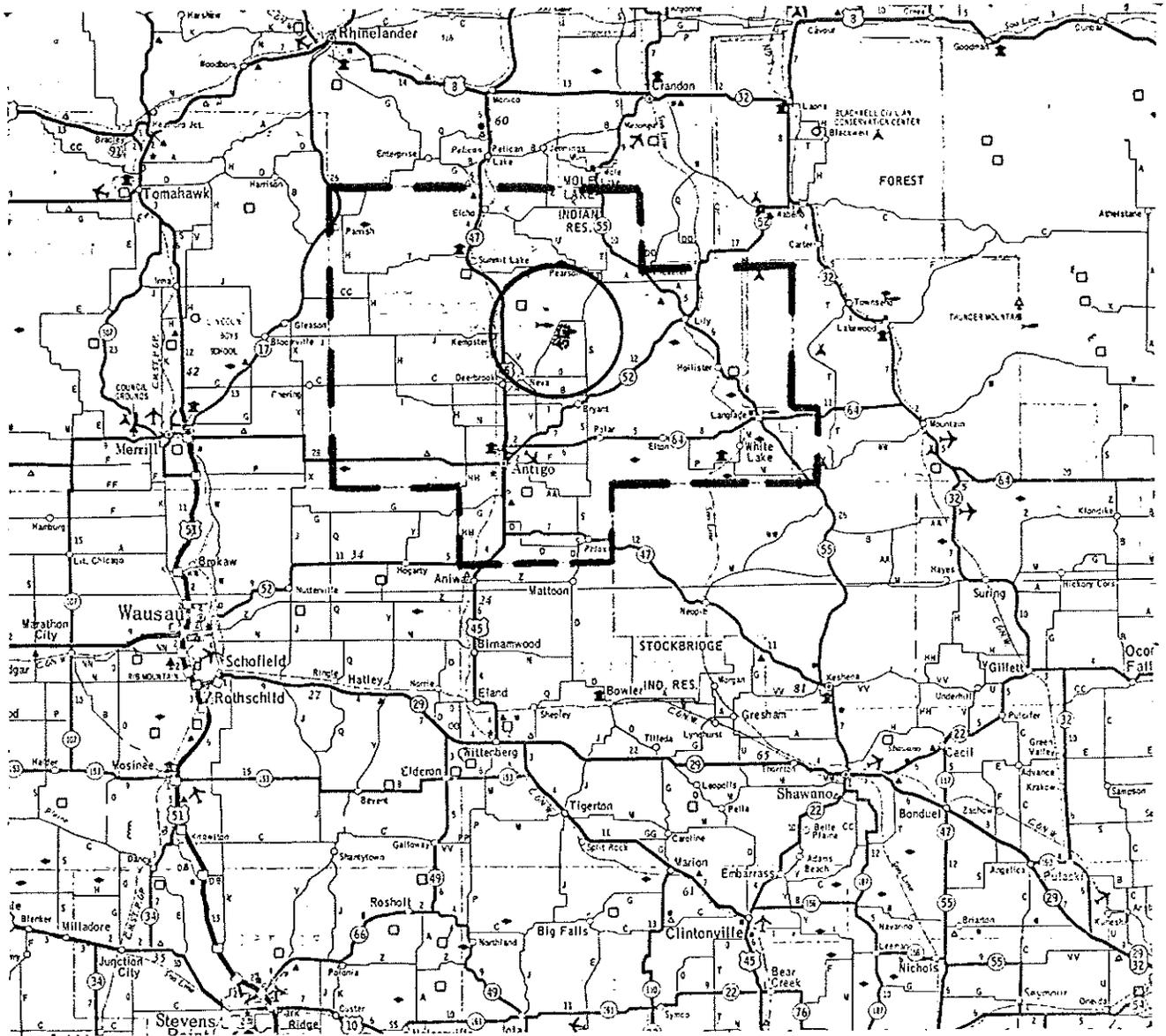
Approved by Natural Resources Board:

\_\_\_\_\_ Date

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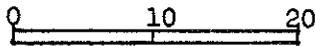
PETERS MARSH LOCATION MAP



Peters Marsh Wildlife Area



Langlade County Boundary



Miles

## BACKGROUND INFORMATION

### History of the Property

Private ownership of the Peters Marsh Wildlife Area property first occurred between 1865 and 1871. It was purchased at that time in parcels ranging in size from 40 acres up to entire sections. The record shows that some fires may have occurred in the area during the 1880's just after it was first logged. Fires of the 1930's were known to have covered the entire wildlife area. Most of the timber resources present today on the area began immediately after these burns.

The State made attempts to purchase the area in 1964, 1967 and finally was successful in 1971. At the time of purchase, the local county board, conservation clubs, and the general public interest were favorable to DNR ownership. Coordination of all landowners involved (the purchase of each one contingent on all others) resulted in purchase of the entire 1681 acres over a short time period. The land was purchased through fee title. Approximately 800 acres of the land were purchased with a three and five-year reservation of the timber and Christmas tree rights, respectively, by the past owners. Therefore, it was 1976 before full Department control of the area was obtained (Figure 1).

Just recently, an additional six acres was placed within the project boundary due to a rerouting of Langlade County Highway "A". This road was the west boundary of the project but the straightening of a corner of the road resulted in a six acre strip of land approximately 2000 feet long in private ownership (Fig. 1). Negotiations are now in progress for its purchase.

### Current Management Activities:

Timber removal has been accomplished on 205 acres involving eleven separate sites for the primary purpose of improving age distribution of the forest. Fifteen separate locations have been treated specifically to regenerate aspen. Trail development and improvement through gating, leveling, widening, seeding and mowing has occurred on the 10 miles of trail present within the project. A sharecropping agreement covering 21 acres of land has been negotiated on a portion of the agricultural lands. Approximately one mile of internal fences has been removed and several old buildings have been demolished. A project sign has been erected and three parking areas have been developed.

**GOAL:** To manage the Peters Marsh Wildlife Area for forest game and waterfowl species and provide public hunting and compatible outdoor recreational opportunities.

### **OBJECTIVES:**

1. Provide 500 participant days of deer hunting by managing for fall population of 30 deer per square mile of deer range (80 deer).

2. Provide 300 participant days of ruffed grouse hunting by managing for a cyclic high population of 300 ruffed grouse per section of suitable habitat (800 grouse).
3. Provide 200 participant days of waterfowl hunting annually while maintaining an annual production of one duck per acre of water on about 70 acres (70 ducks).
4. Provide a merchantable timber harvest on 250 acres during the next ten years.

#### ADDITIONAL BENEFITS:

1. Provide hunting opportunities for woodcock and trapping for muskrat and mink.
2. Provide for 1,000 participant days of compatible, non-hunting use such as bird watching, skiing and hiking.
3. Benefit nongame species indigenous to early plant successional stages.

#### RESOURCE CAPABILITY

##### Soils, Geology and Hydrology of Peters Marsh Wildlife (Fig. 2):

The Peters Marsh Wildlife Area lies astride two major geologic terrains having an economic mineral potential that is not very significant in this area, though bedrock outcrops are very sparse.

The large majority (75%) of the Peters Marsh Area is composed of one of three phases of Kennan soils. The west side of the wildlife area is predominantly an undulating phase of Kennan loam (20%). The central portion contains a hilly phase of Kennan loam (28%) and the east side has a hilly phase of Kennan sandy loam (27%).

Kennan soils are strongly acid, contain occasional pockets of sand and gravel and have a thin layer of topsoil. Permeability is moderately rapid with more than five feet to bedrock. Most of these soils accept septic system effluent adequately and provide a good foundation for roads and other structures. Presently soil erosion is very limited on the wildlife area. Caution must be utilized when disturbing these soils to insure proper conservation of this resource.

Adolph soils and peat are found around many of the ponds in the marshland comprise 13% of the area. Both soils are very wet, fine soils. They are very close to the water table and severely limit any type of development.

Available water capacity in Peters Marsh is classified as medium. However, a recent study by a hydrologist revealed that there is a 3,000-gallon-per-minute supply of water available a quarter mile to the west at Crystal Springs Fish Hatchery. Shadick Springs is also adjacent to the Wildlife Area and provides a good supply of high quality water.

Wildlife:

The property is presently occupied by species of wildlife common to disturbed forest land interspersed with small marshes. The forest and the water marsh environments are capable of management to improve wildlife habitat. The marsh complex involves 21 separate bodies of water ranging in size from .1 acre to 9.5 acres and provide a total of 50 to 125 acres of water depending on rainfall and water tables (average 70 acres).

Management of game species in the marsh complex is best suited toward mallard, blue-winged teal, wood duck, Wilson snipe, muskrat and mink, while potential in the upland community involves whitetail deer, ruffed grouse, woodcock and snowshoe hare. Sharptailed grouse formerly found on this property have disappeared because of changing habitat.

The mixed plant communities on the project provide habitat for many other species of animals, both permanently and seasonally. A complete listing of wildlife present on the project has never been compiled.

No endangered or threatened species are known to live on the area. All areas of development will be examined for the presence or absence of endangered and threatened species and appropriate protective measures will be taken for significant sites. If any sites are found during development, construction will be suspended until the Office of Endangered and Nongame Species (DNR) is consulted. The site(s) will be evaluated and protective measures taken for significant sites.

Fish:

The project area does not contain a fish population capable of management. All bodies of water are quite shallow. A combination of very shallow water and extremely low dissolved oxygen during the winter months prevents the development of any fish population.

Vegetative Cover (Fig. 3, Table 1):

Prior to state acquisition in 1971, the tract ownership involved five private individuals and one industrial firm, Owens-Illinois of Tomahawk. Land use included forest management, agriculture, trapping and hunting. With the exception of the Owens-Illinois tract, forest management activities were practiced only on a limited basis.

The state acquisition granted a three-year timber harvest deed to one of the former large owners. As a result, extensive logging rapidly altered the existing timber types. 727 acres were involved in this agreement. Several areas of hardwood were cut without regard to silvicultural practices. However, this timber harvest had a positive impact on wildlife populations, especially ruffed grouse and deer.

The forest recon indicates that during the next ten year period, the following acreage and volumes are recommended for cutting. It is recommended that 31 acres of the hardwood type be converted to aspen utilizing the post sale treatment practices.

1. Hardwood	194 acres	± 950 cords
2. Pine	6 acres	30 cords (first thinning)
3. Aspen	433 acres	±2800 cords

Of the forested area, 312 acres have sustained various degrees of aspen harvest by former owners. It is recommended that these areas be given first priority to salvage the residual aspen. In all cases, where necessary, the aspen type should be maintained by post sale aspen regeneration practices. Aspen sales are expected to average less than 20 acres per sale.

The suggested harvest cuts would yield an annual harvest of  $\pm$  380 cords per year for the next 10 years consistent with property objectives management.

There are no endangered or threatened plant species known to be found on the property. However, the Office of Endangered and Nongame Species will be contacted prior to the development of any site on the property to insure monitoring control.

#### Water Resources (Table 2):

The Peters Marsh project contains 21 bodies of water. All are relatively small and shallow ranging in size from .1 acre to 9.5 acres. The average maximum depth is five feet. All the lakes are considered seepage lakes with slightly acid, light brown, low alkalinity water.

Only one water body has been named, that being the 9.5-acre lake called Peters Lake.

#### Historical and Archaeological Features:

There are no known historical or archaeological features found on Peters Marsh Wildlife Area. The State Historical Society, Historic Preservation Division, 816 State Street, Madison 53706 will be contacted in advance of any development affecting major resource types.

#### Ownership (Fig. 1):

The approved acreage goal for the project is 1687 acres. Presently, 1681 acres are owned in fee title. Negotiations are presently in progress for the remaining six acres.

#### Current Use:

Current land use is predominantly hunting and trapping. However, trends toward general nature observation have increased significantly in the past few years. Present ownership appears adequate to provide a quality user experience. Its uniqueness and wildlife production potential make the area desirable for wildlife as well by people. Present demands made on public lands by recreationalists warrants continued public ownership of this project.

It is estimated that 500 hunter days of use are made of the area. Estimates of other uses in terms of participant days are as follows: trapping - 70, hiking - 50, wildlife observation - 50, other nonhunting uses - 100.

### Land Use Potential

The entire wildlife area is proposed as a Wildlife Development Area (RD2). The area has been manipulated by man considerably through timber sales, farming, and trail construction in the past. Improvement through cutting, burning or spraying, and planting will maintain its wildlife production capability on some areas and will improve it significantly on other areas. Without continued, orderly management, its wildlife production capability will decrease significantly.

### RESOURCE MANAGEMENT PROBLEMS

Private development encroachments - Presently six acres of land within the project boundary are privately owned. These acres are not significant to the wildlife aspects of the project but are significant to the public utilization of the wildlife area. The land is a narrow strip involving approximately 2,000 feet of road frontage on County Highway "A". Public lands completely surround this parcel. Development of this land and/or just posting of this 2,000 feet with "no trespassing" signs will limit the public's ability to utilize the present state ownership. This problem will be solved when purchase is consummated.

Poor Wildlife Habitat - Natural succession has only recently caused the sharptailed grouse to be eliminated from the Peters Marsh Wildlife Area and surrounding land. The habitat has passed the brush-grass community which is vital to their survival. The habitat is good for deer and ruffed grouse but is poor quality for sharptailed grouse.

The west portion of the marsh complex including the largest body of water in the project has a pH of 6.1. Most all the water within the project has a light brown water color (5-6 feet Secchi disc measurement). These factors tend to make the water quality less than desirable. Improved water quality would result in improved waterfowl and muskrat habitat.

Plant Diseases - A majority of the American elm within the project has Dutch elm disease. Removal of diseased elm will occur along with routine timber sales.

Fish Potential - The waters of Peters Marsh have never been considered as having any fishery potential. Management for fish may be possible, but is not feasible because of unreasonable cost/benefit ratios.

### LONG-RANGE RESOURCES, RECREATION NEEDS AND JUSTIFICATION

Over the past 20 years, the human population of Langlade County has decreased slightly. Projection to 1980 expects this population to remain unchanged. The Outdoor Recreation Plan for Langlade County compiled in 1974, concluded that the demand for hiking and sightseeing was expected to increase. It appears that hunting and cross-country skiing are also going to increase in Langlade County. Skiing simply because it is fashionable and hunting because of the increased pressure being placed on limited public lands in counties immediately to the south of the area.

Hunting pressure on deer has been recorded at 31 hunters per square mile of range on opening day for an entire game management unit, approximately 50 miles to the south of the Peters Marsh Wildlife Area. Overall pressure indicates that certain publicly used areas have at least 50 to 60 hunters per square mile on them at certain times. The continuing talk of quality in deer hunting is going to cause an increase in hunting pressure and more demand on Langlade County and the resources of the Peters Marsh Wildlife Area as hunters from this neighboring unit are made aware of these opportunities.

Peters Marsh also provides an opportunity for waterfowl hunting. Demand in the area for waterfowl now far exceeds the supply both for hunting areas and for supply of waterfowl. Peters Marsh adds both hunting acreage as well as production habitat to help meet this demand.

#### ANALYSIS OF ALTERNATIVES

1. No action - "As is management" would result in a partially managed area which would not realize its full wildlife production capabilities or its full recreational use capabilities. No action would result in natural succession replacing the now productive deer and ruffed grouse habitat with far less productive cover types. Approximately 60% of the area would be seriously affected. Northern hardwood would ultimately replace the aspen, birch, balsam, grass and upland brush types. Waterfowl production would also be adversely affected as natural succession would change the grass marsh complexes to a woody marsh less capable of waterfowl production. Hunting potential and success would also deteriorate.
2. Intensive waterfowl management - A possibility is present to improve waterfowl production and hunting opportunity through expanded water control and management. In order to accomplish this, water would have to be pumped either from underground or from a neighboring lake off the property. Control of water levels would then allow more productive waterfowl management, possibly doubling production as well as doubling hunting opportunity and hunter participation. Initial costs would exceed \$10,000 and annual pumping would be required. This was rejected as a viable alternative.
3. Manage the area for sharptailed grouse - Sharptailed grouse were found within the Peters Marsh Wildlife Area boundaries within the past ten years. Natural succession has caused the complete disappearance of this bird from the wildlife area proper. Management for this species would require the utilization of all the state-owned acreage plus leasing or managing of additional neighboring Langlade County owned lands.

Annually, vegetation control measures would have to be applied to control woody plant growth and invasion. Timber values would be greatly reduced. Ruffed grouse habitat would be destroyed. Improved conditions would result for mallards and blue-winged teal, while wood duck populations would decrease. Presently, one wildlife area in Langlade County is being managed successfully for sharptailed grouse. If this area were also managed for this species, manpower and equipment shortages would result.

4. Manage for timber production - Presently, approximately 1323 acres of the wildlife area is stocked. Historical survey data, soil types and adjacent timber lands suggest that an additional 273 acres has potential for timber; an additional 211 acres has limited timber potential. Deer, ruffed grouse, woodcock, Wilson's snipe, mallards, and blue-winged teal production would decrease if the entire area was managed for timber production.

There is approximately 30,000 acres of Langlade County forest land contiguous to this project. If the Peters Marsh were managed primarily for timber, its management would be similar to this 30,000 acres. Management for maximum timber production would defeat the purpose for which these lands were acquired.

5. Combined management for forest game, waterfowl, and recreational use of the natural resources available - Select portions of the area could be managed to greatly improve deer and ruffed grouse production and other areas can be manipulated to improve its waterfowl production capabilities. Through programmed development, public use of the area can be accomplished without affecting this improved production of wildlife. Utilization of the existing forest resources would be accomplished and timber production would continue on most of the productive sites. Under this proposal, annual management would be needed.
6. Enlarge the Project - The presently approved boundaries currently encompass over 90% of the pothole water resource within 1/2 mile of the existing project. Langlade County owns the remainder of the water areas and presently these lands are entered under the Forest Crop Program. Therefore, cooperative wildlife programs are possible on these lands with county approval. Expansion of the project would offer little increase in management potential and result in only minor increases in wildlife production and recreational usage.
7. Reduce project - To reduce the area would be contrary to the intent of the Department of Natural Resources in meeting its obligations for providing public use areas. Reduction would result in trespass problems as the wildlife area users would have trouble confining their activities within smaller boundaries. Reduction would also result in inadequate acreage to produce the variety and quantity of wildlife as set forth in the goals.

#### RECOMMENDED MANAGEMENT PROGRAM

The recommended alternative is to implement alternative number 5: combined management for forest game, waterfowl and recreational use of the natural resources. It is recommended that the entire 1687 acres be managed as a resource development area. Approximately 160 acres should be managed for mallard and blue-winged teal production and another approximate 160 acres be managed predominantly for ringneck ducks and woodducks. The remainder of the area will be managed primarily for forest game species. Figure 4 shows the locations of the specialized management recommended.

Management for the mallards, ringneck ducks and teal will consist of vegetation improvement around the water areas to improve nesting cover density, thus improving nesting success. The vegetation will be improved through use of chemicals, fire, cutting and possibly farm type operations.

The management for wood ducks will be accomplished through management of natural and artificial nesting structures. Management will be geared toward minimizing disturbance during nesting time and maintenance of secure nesting cover.

The possibility of improving water quality will be investigated. If fertilization or pH manipulation would improve aquatic vegetation composition or aquatic invertebrate life, this will be carried out to the benefit of waterfowl, muskrats and other wildlife species.

Forest game will be managed by maintaining at least 60% of the upland in an intolerant forest community. Distribution of age classes and distribution of the intolerant forest types will be the primary method of improving deer, ruffed grouse and woodcock production.

Improved distribution will be accomplished through closely coordinating commercial timber sales and noncommercial cutting. Maintenance of the natural forest openings and sharecropping of 21 acres of existing farm lands will be continued to add plant and animal diversity to the area and to maintain the area's deer production capabilities. Sharecropping will be monitored closely to insure conformance to property objectives.

Public utilization of the area and its resources will be enhanced through maintenance of the 10 miles of existing walking trails, maintenance of the three existing parking areas and maintenance of the large project sign on the area. Recreational development will be limited to approximately two miles of new trail construction, improvement of the existing parking areas, possible marking of trails and the preparation of a wildlife area brochure. Costs for these projects are expected to be approximately \$2,000 annually for materials, equipment and labor.

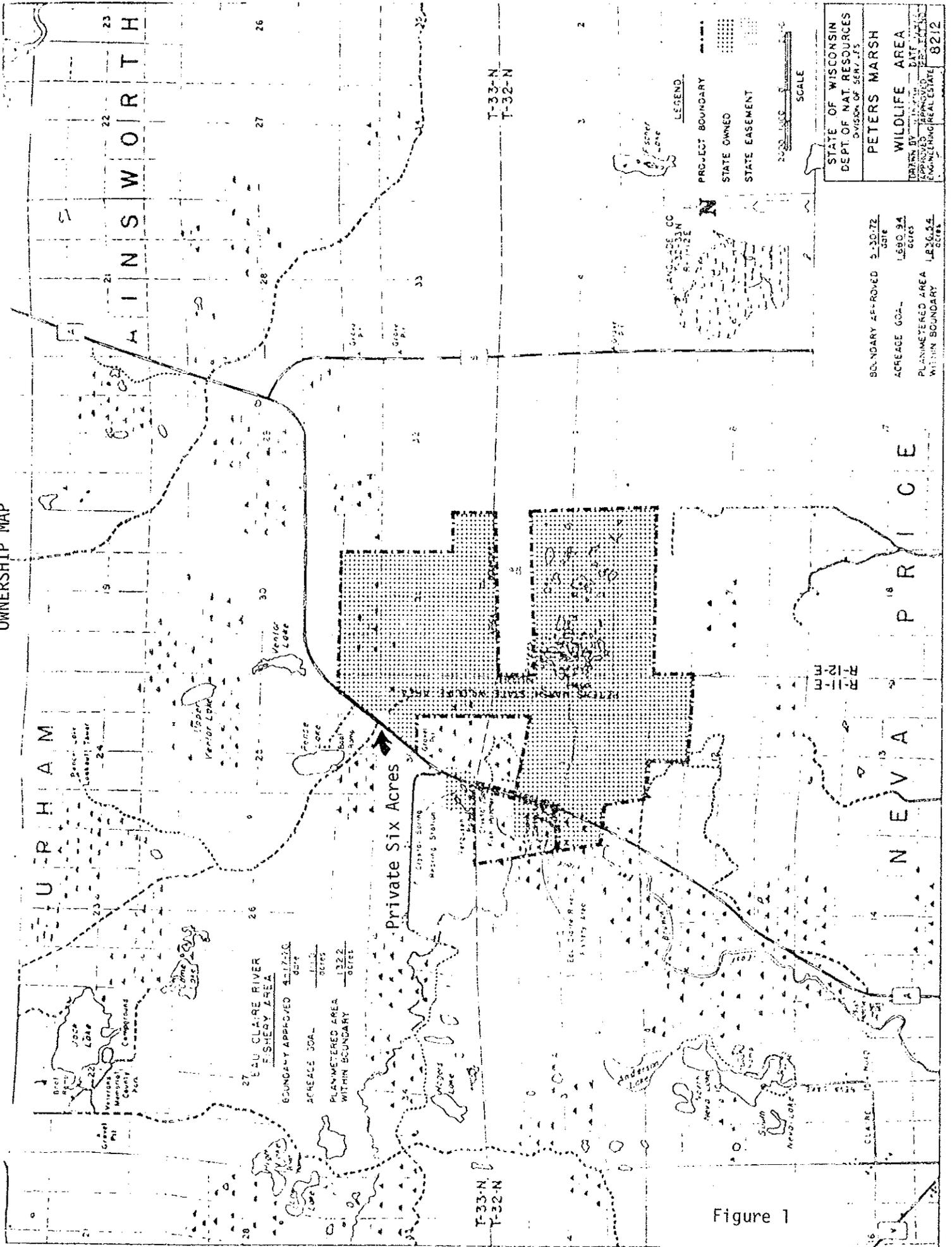
Regarding potential historical or archeological sites, all areas of development will be thoroughly investigated for the presence or absence of sites and appropriate protective measures will be taken for significant sites. If any are found during development, construction will be suspended until the State Historical Preservation officer is consulted. The site(s) will be evaluated and, if significant, would be preserved.

All areas of development will also be examined for the presence or absence of endangered and threatened species and appropriate protective measures will be taken for significant sites. If any sites are found during development, construction will be suspended until the Office of Endangered and Nongame Species (DNR) is consulted. The site(s) will be evaluated and protective measures taken for significant sites.

APPENDIX

Figure 1 . . . . . Ownership Map  
Figure 2 . . . . . Soils  
Figure 3 . . . . . General Cover  
Figure 4 . . . . . Waterfowl Management Areas  
Table 1 . . . . . Cover Type Analysis  
Table 2 . . . . . Water Statistics

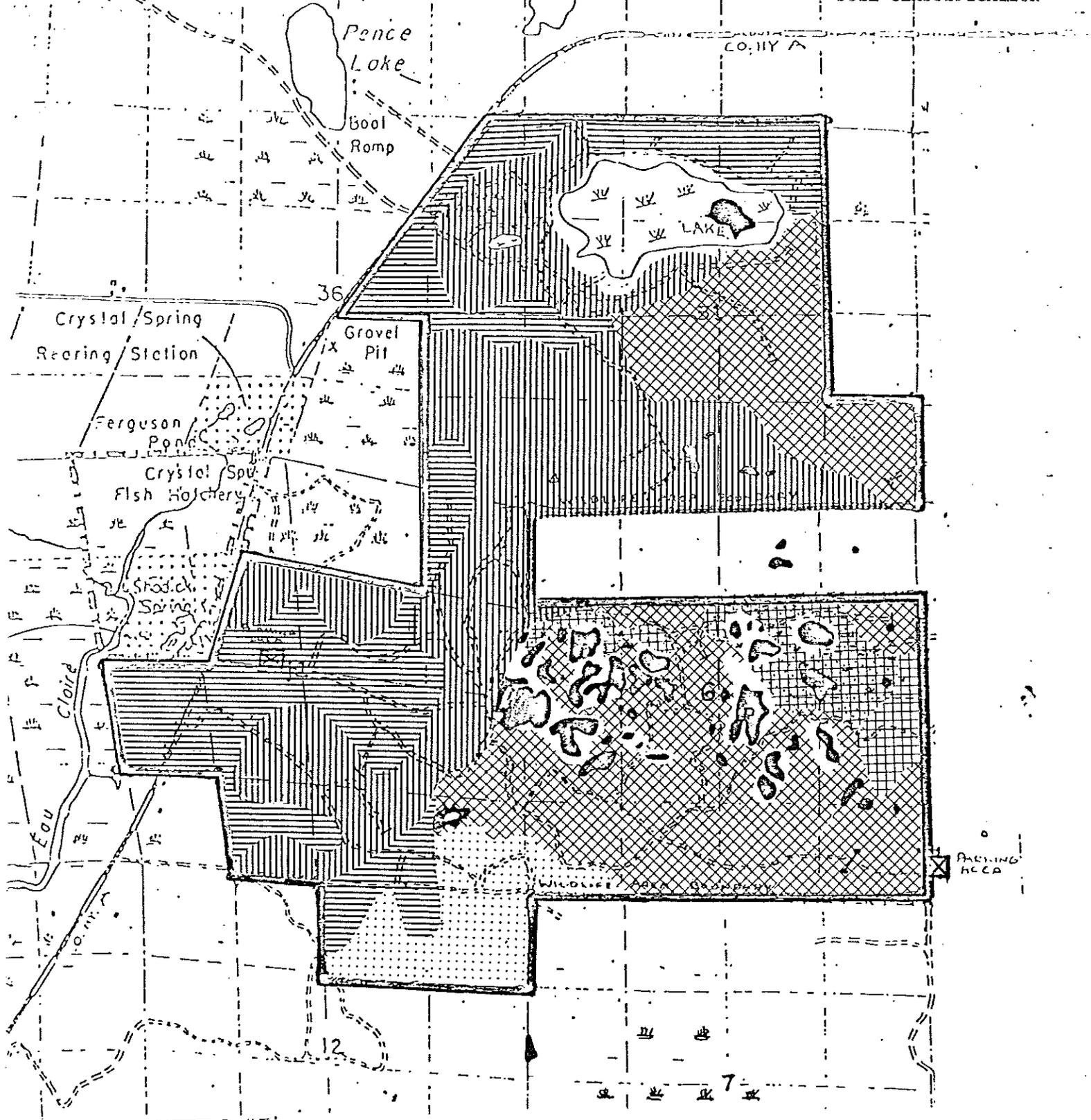
OWNERSHIP MAP



STATE OF WISCONSIN DEPT. OF NAT. RESOURCES DIVISION OF SER. & IS.	
PETERS MARSH	WILDLIFE AREA
DRAWN BY: [Name]	DATE: [Date]
APPROVED: [Signature]	FEE: [Amount]
ENGINEER/REAL ESTATE	8212

BOUNDARY APPROVED	5-130-72	date
ACREAGE GOAL	1690.34	acres
PLANNED AREA	1322.00	acres
WITHIN BOUNDARY	1636.54	acres

Figure 1



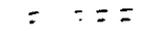
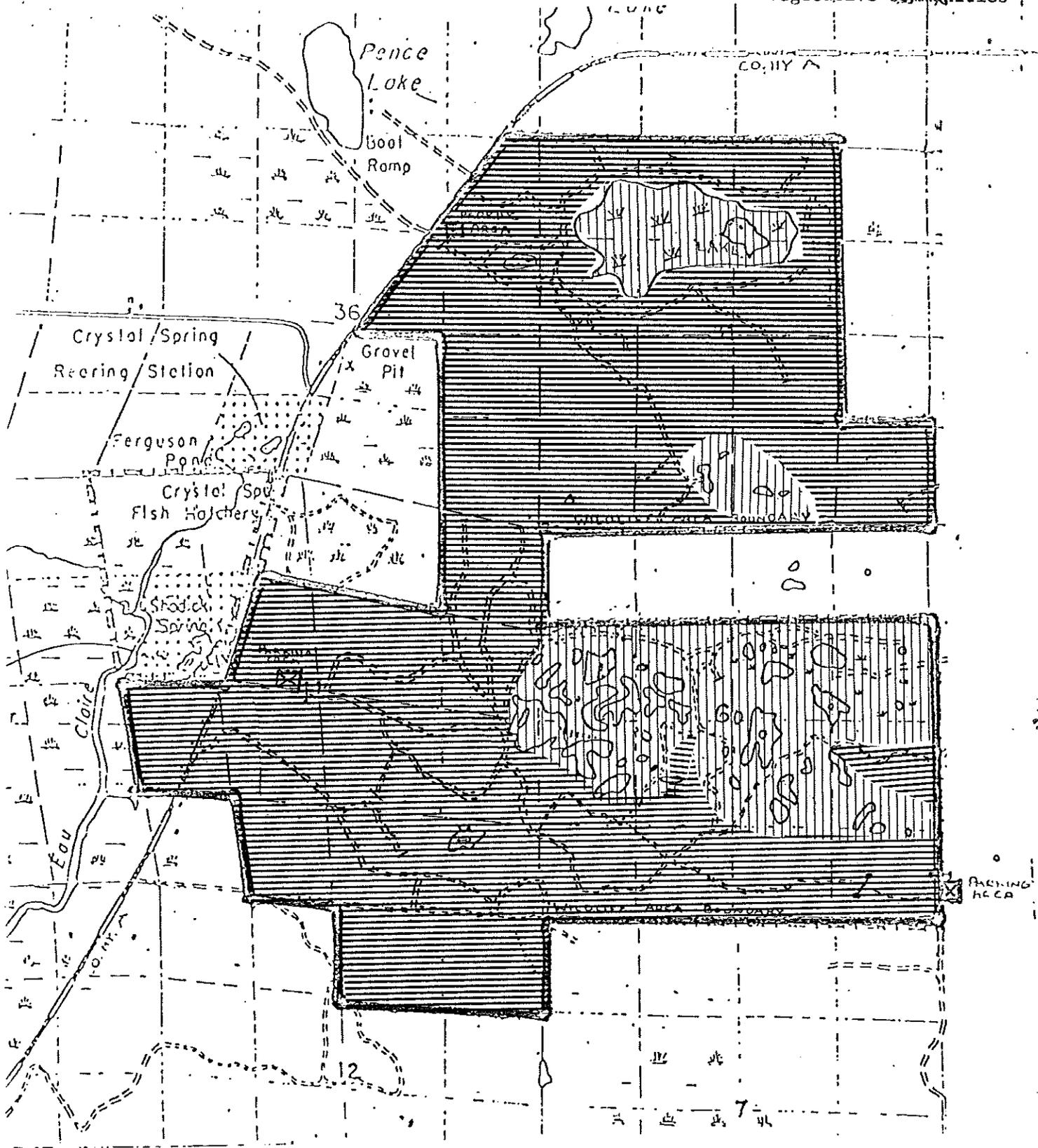
- |  |                  |   |                                  |   |                         |
|--|------------------|---|----------------------------------|---|-------------------------|
|  | Project Boundary |  | Kennan loam                      |  | Peat                    |
|  | Trail            |  | Kennan loam (hilly phase)        |  | Adolph                  |
|  | Marsh            |  | Kennan loam (sandy, hilly phase) |  | Rough stoney land       |
|  | Water            |   |                                  |  | Vilas stoney sandy loam |
- Resource Development Area - Wildlife Management Area

Figure 2



Project Boundary

Trail

Marsh

Water



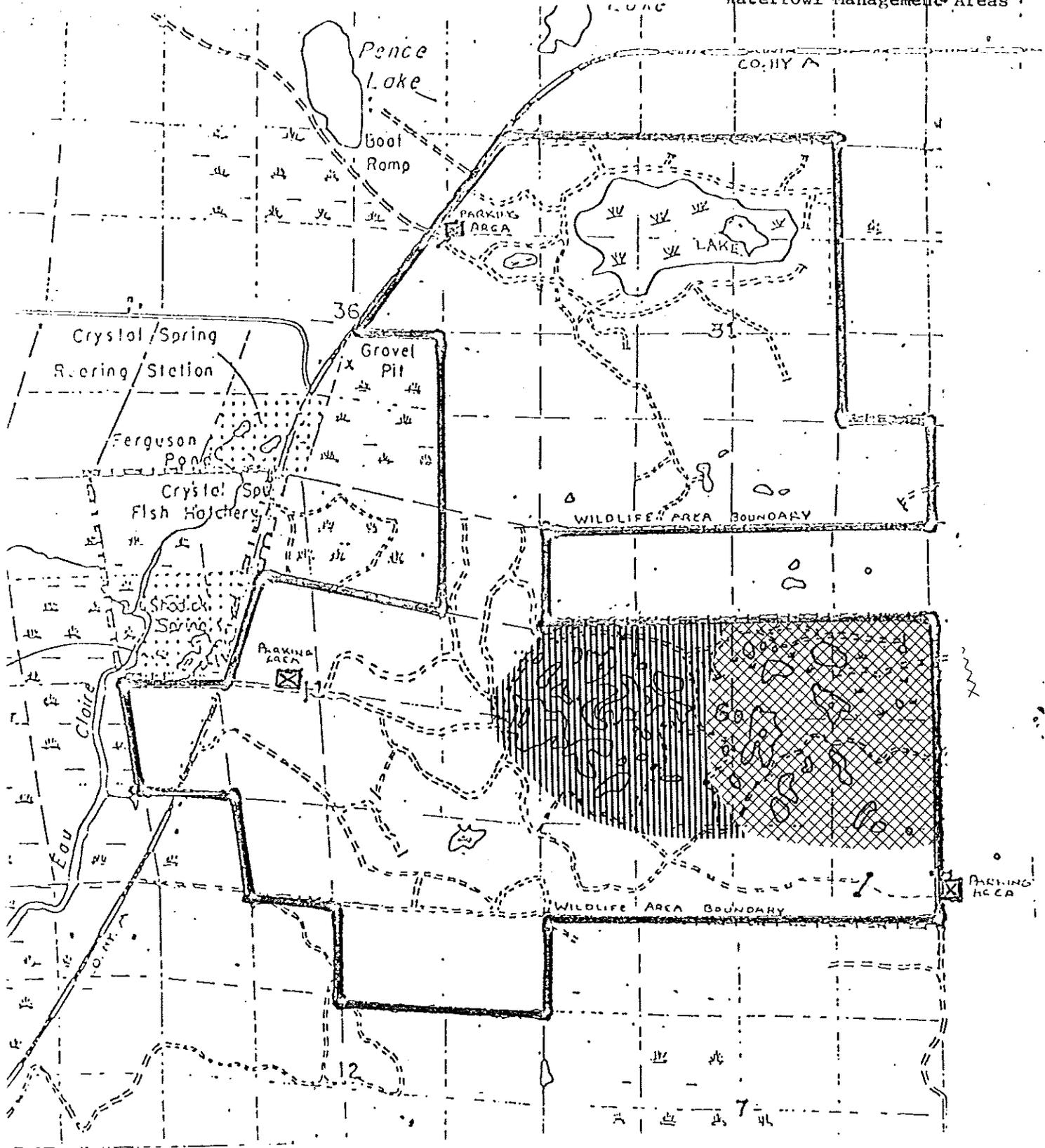
Marsh Community

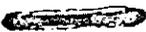
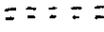
Forest Community

Figure 3

PETERS MARSH MASTER PLAN MAP

Waterfowl Management Areas



-  Project Boundary
-  Trail
-  Marsh
-  Water

-  Mallard - Teal Management Area
-  Woodduck - Ringneck Management Area

Entire project w/exception of -Forest game mgt. area  
Mallard/W.D. mgt. areas

Figure 4

Table 1

The timber types and vegetative cover involve the following acreage:

	Repro		5-9,11'	Poles		5-9,11'' 12	Sawtimber 9,11-15'	Other	TOTAL
	0-5'	0-5''		5-9,11"	5-9,11''				
Aspen	249	105	347	58					771
N. Hardwood	94		88	133	160	3			478
Balsam	28	5			26				59
Bl. Spruce				1					1
W. Birch					3				3
Red Pine				6					6
W. Pine						5			5
Xmas tree plantings								37	37
Field (Agric)								39	39
Grass								8	8
Upland Brush								189	189
Muskeg								43	43
Grass Bog								13	13
Lowland Brush (Willow)								24	24
Water (measured 1975; a record high level)								125	125
ROW								6	6
Totals	28	343	435	198	201	8		484	1807

PETERS MARSH WATER STATISTICS

Table 2

Unnamed Lake	Location		Surface Acres	Maximum Depth (Feet)	Miles of		S.D.F.	Littoral Zone	M.P.A. Source	Conductance 77°F.	pH	Water Color	Water-shed Area (sq. mi.)	Adjoining Wetlands (Acres)	
	Sec. T-N	R-E			Shore-line	public shore-line									Muck
6-3a	6	32 12	3.4	3	.29	0	1.12	100	Seep.	21	47	6.9	Lt.Br.	.1	1
6-3b	6	" "	1.7	3	.23	0	1.26	100	"	17	41	7.9	Lt.Br.	.1	1
6-4	6	" "	.8	3	.14	0	-	100	"	33	71	6.3	Lt.Br.	.1	0
6-7bb	6	" "	.7	4	.15	0	-	100	"	11	21	6.0	Lt.Br.	.1	1
6-7bd	6	" "	4.7	6	.48	0	1.58	97	"	10	21	5.8	Lt.Br.	.1	2
6-7cb	6	" "	2.0	5	.25	0	1.26	100	"	8	17	5.8	Lt.Br.	.1	3
6-7cd	6	" "	1.9	6	.30	0	1.55	98	"	12	24	5.9	Md.Br.	.1	1
6-7da	6	" "	1.2	6	.34	0	2.22	95	"	15	30	6.2	Md.Br.	.1	1
6-7db	6	" "	1.9	7	.30	0	1.55	100	"	11	27	6.2	Md.Br.	.1	1
6-8a	6	" "	.8	3	.13	0	-	90	"	9	23	6.6	Lt.Br.	.1	0
6-8c	6	" "	3.1	6	.28	0	1.13	100	"	7	16	5.6	Md.Br.	.1	1
6-9	6	" "	.6	5	.10	0	-	100	"	15	36	7.5	Lt.Br.	.1	0
6-10a	6	" "	.1	5	.03	0	-	90	"	18	42	6.1	Md.Br.	.1	0
6-10ba	6	" "	1.9	5	.31	0	1.61	100	"	8	16	5.6	Lt.Br.	.1	2
6-10bc	6	" "	.8	4	.10	0	-	100	"	6	19	6.7	Lt.Br.	.1	1
6-10c	6	" "	1.1	5	.18	0	1.22	100	"	6	20	5.7	Lt.Br.	.1	1
6-10d	6	" "	2.5	8	.30	0	1.35	80	"	8	19	6.0	Lt.Br.	.1	1
6-14b	6	" "	6.5	6	.69	0	1.93	100	"	9	26	6.8	Lt.Br.	.1	0
6-14ca	6	" "	.5	5	.10	0	-	70	"	58	82	7.2	Lt.Br.	.1	0
6-14cd	6	" "	2.0	6	.20	0	1.01	90	"	18	34	7.2	Lt.Br.	.1	1
Peters L.	1	" 11	9.5	5	.75	0	1.74	100	"	7	24	6.1	Lt.Br.	.1	10

Total: 47.7 As listed in surface water resources of Langlade County by Steuck, Andrews, & Carlson, DNR Fish Management, 1977.