

Shank Painter Pond Wildlife Sanctuary Management Plan

(1/11/2000)

Town of Provincetown, Massachusetts



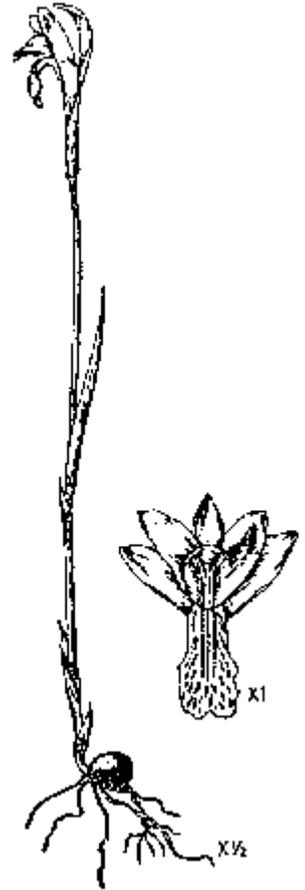
Prepared for:

Town of Provincetown Land Bank Committee

Prepared by:

The Compact of Cape Cod Conservation Trusts,
Inc

Barnstable, Massachusetts



Arethusa bulbosa L.
Shank Painter pond is the only known Cape Cod location of this orchid, listed as threatened species by the Commonwealth of Massachusetts.

Shank Painter Pond Wildlife Sanctuary Management Plan

TABLE OF CONTENTS

[A. INTRODUCTION AND AUTHORITY](#)

[B. BACKGROUND](#)

[C. SITE HISTORY](#)

[D. SITE DESCRIPTION](#)

[E. ENVIRONMENTAL SIGNIFICANCE](#)

1. Plant and Wildlife Habitat
2. Forest significance
3. Wetlands
4. Scenic Value
5. Enhancement of Existing Open Space

[F. EXISTING USES](#)

[G. LEGAL PROTECTIONS AGAINST CONVERSIONS OR DISPOSAL](#)

[H. THREATS TO NATURAL RESOURCES](#)

1. Plant and Wildlife Habitat
2. Forest Significance
3. Wetlands
4. Scenic Value
5. Adjacent Open Space

[I. MANAGEMENT RECOMMENDATIONS](#)

1. Plant and Wildlife Habitat
2. Access
3. Property Integration
3. Capital Costs and Funding
4. Property Regulations and Uses
5. Habitat Improvements

[J. PLAN AND IMPLEMENTATION](#)

1. Property Management
2. Property Security
3. Fire Plan
4. Update and Review

[RETURN TO TITLE PAGE](#)

A. INTRODUCTION AND AUTHORITY

This Management Plan is intended to provide guidelines for conservation and passive recreation uses at the Shankpainter Pond Wildlife Sanctuary in Provincetown, Massachusetts. The Conservation Area is composed of two lots totalling almost 30 acres. Lot 1, owned and managed by the Provincetown Conservation Trust (deed conveyed December 31, 1999), is approximately 22.05 acres comprising most of Shankpainter Pond's northern shoreline and its bordering wetland, a rare quaking bog. Quaking bogs are unique and host a number of rare species, making this parcel of particular significance. This parcel, donated to the Trust by Shankpainter Associates, Inc., will be protected in perpetuity exclusively for conservation purposes. Lot 2, purchased from Shankpainter Associates, Inc. in 1999 with land bank funds for \$1.6 million by the Town of Provincetown, is composed of both upland (6.81 Ac.) and wetland (.35 Ac.) totalling 7.52 acres. The entire lot is under the management authority of the Provincetown Conservation Commission. Taken together, Lots 1 and 2 comprise the Shankpainter Pond Wildlife Sanctuary.

This Management Plan, with its maps and appendices, is intended to comply with the goals and objectives of the Massachusetts Self Help Program, the 1995 Provincetown Open Space and Recreation Plan and the Cape Cod Commission's Development of Regional Impact Decision. Protection of this Sanctuary is also intended to be consistent with many of the goals and objectives outlined within the Outer Cape Capacity Study, the Massachusetts Watershed Initiative, and the Statewide Comprehensive Outdoor Recreation Plan.

Under Massachusetts statute, lands held by the Conservation Commission under M.G.L. c. 40 s. 8C (i.e.; lot 2) are to be used for conservation and passive recreation purposes. Lands held by the Provincetown Conservation Trust (i.e.; lot 1) are to be protected for the same purposes, according to the purposes of the Trust. This Management Plan is being produced by The Compact of Cape Cod Conservation Trusts, Inc. on behalf of the land's stewards, the Town of Provincetown and the Provincetown Conservation Trust (PCT), with private

funding through the PCT. It is intended to reserve the Shankpainter Pond Wildlife Sanctuary for quiet public enjoyment at a level of use appropriate to sustain the significant natural resources identified on the property as described in Section E of this Plan.

[Return to Table of Contents](#)

B. BACKGROUND

By an overwhelming margin, in April 1999, the Town of Provincetown voted to appropriate up to \$1.6 million to purchase the 7.52-acre Lot 1 from Shankpainter Associates, Inc., thereby saving it from a pending five-lot residential development. The decision to purchase the Shankpainter land for conservation purposes was in order to protect its natural features and functions, including two small interior wetlands and its primary function as part of the buffer to the Shankpainter Pond/Quaking Bog. In a separate but related transaction, Shankpainter Associates, Inc. donated lot 1, 22.05 acres of quaking bog and associated wetlands, to the Provincetown Conservation Trust. The total land protection project yielded 30 acres of critical conservation land.

The special value of the Shankpainter Pond area has been recognized for over 30 years, beginning in 1968, when the town's master plan recommended including the pond within the boundary of the Cape Cod National Seashore. In 1975, 1986, and later in 1995, the town's open space plan rated this area as the town's top priority for protection. In spite of these declarations, exorbitant land prices and public sentiment against eminent domain land takings kept its acquisition for conservation out of reach.

A brief history of efforts to protect Shankpainter Pond reflects the unique environmental significance of this area. Parts of the following chronology are borrowed from the 1995 Provincetown Open Space and Recreation Plan and other existing sources:

YEAR ACTION (SPP = Shankpainter Pond)

late 1950's National Park Service (Hal Hinds) conducts study indicating unique value of SPP

1961 Cape Cod National Seashore (CCNS) established with boundary excluding most of SPP due to local opposition

1963 Dragon's mouth orchid discovered in SPP bog (Hinds)

1966 State legislature enacts inland wetland protection act

1968 Provincetown Master Plan recommends adjusting CCNS boundary to include SPP

1973 11 acres of SPP wetland filled for campground, south side

1974 3 acres of SPP wetland filled, east side

1975 Provincetown Open Space Plan gives SPP highest priority for protection

1976-7 Provincetown Planning Board seeks land swap with CCNS to protect SPP

1979 0.5 acre of SPP wetland filled; dragon's mouth orchid site reconfirmed on bog

1979 Town Meeting article to buy 75 acres on southwest side of SPP for \$750,000 withdrawn due to lack of support; ACEC nomination suggested by state

1980 Provincetown Conservation Trust (PCT) founded as a voluntary, private means to preserve SPP

1986 Provincetown Open Space Plan lists SPP as the top Significant Natural Resource Area

1987 Zoning Bylaw revised to prevent filling or building in inland wetlands

1991 Cape Cod Commission includes SPP in its proposed regional open space greenbelt

1992 PCT receives gift of 3.3 acres of shoreline on south side of SPP

1995 (Feb. 15) 19 lot subdivision for 50 acres along north rim of SPP submitted by Patrick family (Shankpainter Associates); reviewed by Cape Cod Commission as a Development of Regional Impact (DRI)

1995-97 Various versions of subdivision are submitted and reviewed; negotiations for conservation purchase continue with town, PCT, and state

1997 Cape Cod Commission, Provincetown Conservation Commission, and Provincetown Planning Board approve five lot subdivision plan for lot 2.

1998 (Nov.) Provincetown adopts Cape Cod Land Bank bill

1999 (April) Provincetown Town Meeting votes to appropriate up to \$1,600,000 to purchase lot 2 for conservation; Self-Help application submitted for reimbursement of Shankpainter purchase.

1999 Shankpainter Associates donates 22.05 acres (lot 1) of Shankpainter Pond/Quaking Bog to Provincetown Conservation Trust (PCT)

1999/2000 Town of Provincetown and PCT retain The Compact of Cape Cod Conservation Trusts to assist in creation of a management plan for both lots, totalling almost 30 acres and referred to as the Shankpainter Pond Wildlife Sanctuary.

In 1997, after a lengthy permitting process, the Cape Cod Commission, the Provincetown Planning Board, and the Provincetown Conservation Commission approved a five lot subdivision for the 7.52 acre Lot 2, then owned by Shankpainter Associates, Inc. Active marketing of these lots during the negotiation process with the town and trust, made the land's development imminent, and its swift protection essential.

With the passage of the Cape Cod Land Bank bill in 1998, significant funds for the purchase of open space became available for the first time and in April of 1999, Provincetown Town Meeting voted by greater than a 2/3 majority to borrow up to \$1,600,000 to acquire the 7.52

acre lot. To help offset the cost of this acquisition, the town sought and received grant reimbursement funds from the state's Self-Help program *See chart below*. In addition, the town obtained funds previously allocated for this project (in 1996) from the Massachusetts Highway Department Transportation Enhancement program. The PCT also holds a perpetual conservation restriction on this lot to provide an additional layer of protection. (TO BE COMPLETED THIS YEAR)

In a separate but related transaction, Shankpainter Associates donated the abutting Lot 1, a 22.05- acre wetland lot, to the Provincetown Conservation Trust. This wetland comprises approximately half of the shoreline of Shankpainter Pond and its buffering wetlands and, as part of a rare quaking bog habitat, is very significant. The bog has been identified as the largest quaking bog on a barrier beach/coastal dune system found anywhere in the world. This, along with its status as one of the largest unfragmented forested properties in Provincetown, makes it vitally important for the sake of both regional and planetary biodiversity.

Along with ownership of this special land comes the responsibility to manage it wisely. This management plan is an essential step in the continued protection and sustainable public use of this area. The 30-year long effort to preserve this land from development would be lost without a plan for its future. "Provincetown's jewel", as it has been called, must be wisely cared for in order to maintain its shine.



C. SITE HISTORY

Prior to and during this century's efforts at preservation, the Shankpainter Pond area experienced extensive human use. Remnants of an ice mining operation from the 19th Century remain in the pond and approximately 85 acres of the bordering wetland have been filled in during this century for residential and commercial purposes. To the east, the area is commercially zoned and several businesses exist, including a laundromat. On the south shore of the pond is a 15 acre, 114 site campground which has been built on an 11-acre fill zone. This campground was cited for violations including one in 1976 for seepage from a comfort station into the pond and in 1979 for illegal fills.

Historically, Shankpainter Pond and its immediate surrounds have been part of the Provincelands, which have been under public ownership since 1654. In 1893, however, when the Commonwealth established Provincetown's current municipal boundary and permitted private land ownership for the first time, most of the pond, and all of the bog, became part of the town's holdings. When the Cape Cod National Seashore

was established in 1961, the National Park Service considered a boundary change that would have included the pond, but this proposal failed when it encountered local resistance to the eminent domain property taking (only the extreme western end of the pond lies within the Seashore boundary). Further efforts to merge the pond into the Park also failed, most likely due to continuing conflicts over eminent domain and Town resistance to further federal control.

In the winter of 1979, the Outer Cape Environmental Association (OCEA) began to look more closely at the Pond's protection. With assistance from The Nature Conservancy, the state Division of Conservation Services, and the local Conservation Commission, an article to purchase about 75 acres on the south shore for the price of \$750,000 (including a portion of the quaking bog) was submitted to Town Meeting. This effort also failed and OCEA turned to the state Department of Environmental Management (DEM) for help. Cleverly, they proposed that because Shankpainter Pond is a Great Pond (i.e.; greater than 10 acres in size), and as such is owned by the Commonwealth, then the bog, which literally floats on its waters, is also part of the pond and is owned by the State (state ownership could provide the level of protection they were seeking). This didn't work either, however, since only exposed surface water is included in a Great Pond's boundary designation.

A brief flirtation with designation as an Area of Critical Environmental Concern proved insubstantial since its designation would not have provided any actual regulatory protection. It was decided that the limited value of an ACEC designation would not have warranted the time and effort put in to the proposal. Although the pond and bog is afforded some protection under the Wetlands Protection Act, even that has proven unable to adequately protect it. A case in point occurred in 1974, when the Department of Natural Resources (now DEP) overruled two Provincetown Conservation Commission decisions, which would have prohibited fillings in the bog. The result? Three and a half acres adjacent to the bog were filled in spite of the documented presence of rare species and the risk of flooding. In reaction to the failure of these efforts, the Provincetown Conservation Trust was formed in January 1980 in order to preserve the pond and other local habitats.

In the mid 1980's, and again in the mid 1990's, when development pressure reached peak levels, the urgency of protecting this area intensified. This pressure, along with new funds made available by the passage of the land bank bill, have finally made possible partial protection of this jewel of Provincetown, Shankpainter Pond and Bog. Through the perseverance of the Town, PCT, the Cape Cod Commission, The Compact, the State, and numerous groups and individuals, the preservation of this large and important piece of the Shankpainter Pond watershed has become a reality.

[Return to Table of Contents](#)

D. SITE DESCRIPTION

The 30-acre Shankpainter Pond Wildlife Sanctuary is composed of two distinct habitats: quaking bog wetland Lot 1 and the wooded upland Lot 2. Lot 1 is almost entirely wetland, characterized by the presence of a rare quaking bog and its associated rare species. Lot 2 consists of a wooded dune sloping steeply to Shankpainter Pond/Bog, serving as the upland buffer to Lot 1. This lot also has two interior inland wetlands located in its northern corner. Taken together, lots 1 and 2 comprise almost 30 acres and are part of a larger system of interconnected dune ponds which grace this area of Provincetown. Lot 2 contains the upland area which was most threatened by residential development pressure. Devegetated, erosional areas remain as byproducts of excavation and grading work performed during development preparations.

Non wetland soils on site are old, post glacial Holocene dune deposits which have succeeded to a pitch pine woodland. The thin thatch layer of leaves and pine needles covers soils composed of fine aeolian sand identified by the Soil Conservation Service (now, NRCS) as Hooksan sand, hilly and rolling (HoC; HoD). Several areas of the site have been eroded by unauthorized off-road vehicle use and clearing operations with subsequent migration of the sand down steep slopes toward the shrub swamp and bog edges.

Two small shrub swamp isolated wetlands exist in the northeast corner of Lot 2. These are due to the presence of hydric poorly drained soils, with water at or near the surface for most of the growing season. SCS identifies this as a Berryland mucky, loamy coarse sand (BmA). These two wetlands comprise only 1.36 acres of the 7.52 acre Lot 2. Wetland flora include red maple (*Acer rubrum*), black alder (*Ilex verticillata*), water willow (*Decodon verticillatus*), swamp azalea (*Rhododendron viscosum*), large cranberry (*Vaccinium macrocarpon*), wool sedge (*Scirpus cyperinus*), cotton sedge (*Eriophorum virginicum*), hardhack (*Spiraea tomentosa*), and sphagnum moss (*Sphagnum* spp.) Though no state-listed plant species was recorded, a colony of rock polypody fern (*Polypodium virginianum*), a rare plant in sandy coastal areas, was found overlooking the southside of the large wetland on adjacent lot 4 (DiGregorio) within the area under conservation restriction by the PCT. Shankpainter Bog (Lot 1) soils are primarily wetland in nature with SCS classification as Freetown mucky peat.

The site ranges in elevation from a low of 4 feet above sea level near the pond wetlands to a high of nearly 50 feet above sea level. The area's hilltops provide great views to the pond and depressions offer refuge from brisk ocean winds. Mixed treecover provide pockets of sunlight and shade, openness and more intimate protected areas.

Shank Painter Pond Wildlife Sanctuary

Land Ownership

Lot Delineations

Land Holdings of the Provincetown Conservation Trust at Shank Painter Pond

Entrance to the land from the north is provided via a curb cut and entry road from Route 6 and from the east by Ship's Way (private). The sand entry road from Route 6, cut for development purposes, is excessively wide and unfinished. Nonetheless it offers clear and direct access to the interior of the site. This is the nearest vehicular access point. Access from Ship's Way is provided within the deed for pedestrians, non-motorized bicycle, horseback, and emergency and municipal vehicles only (see Appendix A). This is the easiest access point for pedestrians from the downtown area and surrounding residential areas.

Several large unvegetated areas (see Figures 5 and 13) have resulted from prior development preparations including the sand roadway, cul-de-sac, and other cut/fill areas. Section I of this plan provides revegetation recommendations.

[Return to Table of Contents](#)

E. ENVIRONMENTAL SIGNIFICANCE

1. Plant and Wildlife Habitat

The entire site lies within and estimated habitat for rare and endangered species and, according to the Massachusetts Natural Heritage and Endangered Species Program, Shankpainter's Bog harbors five state-listed rare animal species and six state-listed plants. Rare and threatened plant species include dragon's mouth orchid, rose pogonia, golden club, adder's tongue fern, bogbean, few-flowered sedge, threadleaved sundew, pitcher plant, bladderwort, grass pink, and nodding ladies' tresses. Rare animals found there include the Eastern spadefoot toad, spotted turtle, Eastern box turtle, Water-Willow stem borer moth, Chain Fern borer moth, and the bog turtle (per Sabatia). The bog contains the only known Cape Cod population of the Arethusa orchid (*Arethusa bulbosa*). Rare in Massachusetts and declining in New England, it has been discovered in only six places state-wide. Both overcollection and loss of habitat have contributed to this decline (Ibid). Overall habitat value for mammals, reptiles, and amphibians is deemed high (Ibid.) In addition, upland woodlands within the Sanctuary provide good habitat for more common flora and fauna.

Sabatia, The Compact, and others have noted the diversity of upland and wetland vegetative covers, a factor which enhances wildlife abundance, diversity, and survival. Evidence of both large and small mammalian use of the land was present including skeletal remains, tracks, scat, and burrows. The small size of trees limited the number of habitable cavity nests, though some were present, particularly near the interior wetlands. Avifauna is typical of a pitch pine woodland, with local breeders such as blue jays, black capped chickadees, tufted titmice, downy woodpeckers, and common crow. Winter migrants included red breasted nuthatch and yellow rumped warbler (Sabatia).

Sabatia also found one male eastern box turtle with an estimated age of ten years on adjacent Lot 4. Box turtles are omnivores, feeding on a variety of insects, fish, toads, berries, fruits, and fungi. Its home range usually averages between 150 and 750 feet. The Eastern Box Turtle is decreasing in numbers throughout its range in Massachusetts and is a Species of Special Concern in the state (Digregorio). Its major threat is the destruction of woodland habitat by residential and roadway construction.

Wetland wildlife predictions were conducted by Sabatia using the Wetland Habitat Index for Non-game Species (WETHings), a computer based data bank created by experts at the University of Massachusetts. WETHings produces lists of wetland dependent fauna for a particular study site. Considering the presence of five vegetative cover types (three wetland and two upland), a hypothetical list of predicted mammals, reptiles, and amphibians was produced by Sabatia for the Shankpainter area.

Additional notable observations include the discovery of a regionally rare plant species (rock polypody) by Sabatia. Although a thorough vernal pool investigation has not been conducted, Sabatia presents the possibility that the larger isolated wetland southwest of the warehouse could provide such habitat due to its capacity to hold standing water for two consecutive months in the spring and its lack of fish (Sabatia; see appendices). Gilbert and Hinds have also observed a ribbon snake, common here but seldom seen on the outer Cape.

2. Forests

Woodland is at a premium in Provincetown with so much of the land being unwooded sand dune. The Shankpainter Pond area is part of a wooded dispersal corridor that includes Foss Woods, and the Duck Pond/Clapps Pond area. The protection of this forested habitat provides a lasting refuge from the openness of the dunes and developed areas.

The predominant vegetative cover type in the upland area is Pitch Pine-Oak-Sassafras woodland with a shrub layer composed primarily of ericaceous species including black huckleberry (*Gaylussacia baccata*), low-bush blueberry (*vaccinium angustifolium*), sheep laurel (*Kalmia*

angustifolia) and maleberry (*Lyonia liogustrina*). Other shrubs include inkberry (*Ilex glabra*), poison ivy (*Toxicodendron radicans*), black cherry (*Prunus serotina*), dwarf sumac (*Rhus copallinum*), northern bayberry (*Myrica pennsylvanica*), and shadbush (*Amelanchier canadense*). The canopy coverage averages 50%-60% in this area with only 45-50 foot heights, due to the dwarfing influence of salt laden winds. The predominant shrub layer averages about two to three feet with occasional taller shrubs up to eight feet. Beneath the trees, in the more shady areas, checkerberry (*Gaultheria procumbens*), Pennsylvania sedge (*Carex pennsylvanica*), and striped pipsissewa (*Chimaphila maculata*) dominate. In the more open areas, woolly heather (*Hudsonia tomentosa*), bearberry (*Arctostaphylos uva-ursi*) and American beach grass (*Ammophila brevigulata*) are predominant.

This land represents one of the largest unfragmented forested areas in Provincetown. It provides excellent habitat for numerous wildlife species with ample cover, nesting opportunities, escape routes, and food. Woodlands here also act to slow and filter water runoff before it reaches the adjacent wetlands.

3. Wetlands

The wetlands on this site represent the area's most significant feature. Lot 1 is almost entirely composed of the Shankpainter Bog, the largest quaking bog known to exist in a barrier beach/coastal dune ecosystem worldwide (LeBlond) and the only bog known in Massachusetts to exist in a coastal dune system (DFW).

Quaking bogs develop in ponds where a lack of fresh water interchange causes the accumulation of dead plant matter. This plant matter releases acids which prevent, or significantly slow, bacterial decomposition, thereby causing a characteristically thick mat of plant matter to form atop the water. These floating bogs are called "quaking" because they quiver beneath a walker's feet. Debris that does sink to the bottom of the pond forms peat beds.

The acidic nature of the bog and subsequent lack of organic breakdown deprives the environment of nutrients and makes for difficult living conditions. Only species which have adapted to the unique environment of the quaking bog can survive here. Many of these are rare, including some carnivorous plants, which have adapted to a lack of organic nutrients by "learning" to extract needed nourishment from insects. Shankpainter Bog contains at least five species of carnivorous plant including: Pitcher plant (*sarracenia purpurea*), Round-leaved sundew (*Drosera rotundifolia*), Spatulate-leaved sundew (*D. intermedia*), and at least two bladderworts (*Utricularia* spp.) - (LeBlond). There are also three different kinds of native orchids found growing here: Snake's mouth (very common), *Arethusa* (very rare) and the Grass Pink.

The dominant flora of the quaking bog is the ubiquitous sphagnum moss, which grows in thick, spongy layers forming hummocks and hollows which bend to the weight of the traveler but yet are strong enough to support diverse plant communities above. Within the rich bounty of the bog exist such acid and water tolerant shrubs as highbush blueberry, swamp azalea, and bayberry. Somewhat less tolerant though adventurous native trees existing in the Shankpainter Bog are Pitch Pine, Red Maple, and Black Cherry trees. Other plants include dwarf cranberry, early-blooming bogbean, and a close relative of the jack-in-the-pulpit, *Arrum Arum* (Gilbert and Hinds).

Habitat Areas Existing Conditions Shank Painter Recharge Area

4. Scenic Value

Scenic value is very high at Shankpainter Pond. This property has several topographic high points from which wonderful views of the pond can be enjoyed (see Site Photos-Fig. 8). The proposed trail (Figure 12) follows existing paths which access these high points. Benches which take advantage of these views will be appropriately situated. Generally speaking, the varied topography and well developed woodlands provide wonderful interior views of the property. The only eyesores are areas which have been denuded by previous clearing operations, occasional construction debris, and some litter.

5. Enhancement of Existing Open Space

Shankpainter Pond Wildlife Sanctuary enjoys a direct connection to the National Seashore both to the north and to the south. To the north, it abuts 500-foot wide Route 6 highway layout (mostly wooded at this location), which connects to the Duck Pond and Clapps Pond areas which extend into the park. To the southwest, the wetlands and water bodies which comprise the Shankpainter Pond area extend across the park's boundary. With the protection of these lots, almost the entire northern boundary of Shankpainter Pond is protected. Connections to downtown Provincetown via Ship's Way and Shankpainter Road is also possible. Proposed improvements will enhance and promote these connections.

F. EXISTING USES

The Shankpainter Pond Wildlife Sanctuary is open to the public for passive recreational use. As stated within Self-Help funding regulations, "any property acquired with self-help assistance is open to all citizens of the Commonwealth, and that no major alteration of this property, or changes in the proposed uses can take place without the prior approval of the Secretary of the Executive Office of Environmental Affairs, and possibly the general court."

Existing uses are primarily pedestrian. People come to enjoy wildlife and scenery, walk dogs, or simply to sit and relax quietly. Some mountain bikes use the area but do not adversely affect the site and foot trails are in excellent shape. Parking currently takes place near Route 6, at the boundary of the property, and does not infringe on natural resources (see Figure 15 for proposed parking layout). The use of motor bikes has caused devegetation and erosion of some areas.

[Shank Painter Pond Wildlife Sanctuary Site Photos](#) [The Site Photos Were Not of Quality for Viewing](#) [Off Site Connections To Existing Open Space](#) [Existing Open Space \(West End\)](#)

[Return to Table of Contents](#)

G. LEGAL PROTECTIONS AGAINST CONVERSIONS OR DISPOSAL

Shankpainter Pond Wildlife Sanctuary was acquired for conservation, open space, and passive recreational uses only. It is protected from conversion to other uses by a combination of conservation restrictions, statutory provisions, the Constitution of the Commonwealth, and the charter of the Provincetown Conservation Trust. The town, which owns Lot 2, cannot simply decide to put Shankpainter land to other uses, such as housing, schools, or cemeteries, or dispose of or sell the property. The strongest protection against this possibility is the existence of a conservation restriction (CR), held by the PCT over the Town on the entire 7.52 acre Lot 2 (Appendix C - to be completed). The CR provides permanent legal protection of the site's conservation values. Without such protection, changes in the use of the property by the Town would be possible, though difficult. Such changes would require:

1. a majority vote of the Conservation Commission that Shankpainter Pond was no longer needed for conservation
2. a two-thirds vote of Provincetown Town Meeting; and,
3. review under the Massachusetts Environmental Policy Act and approval by the Secretary of Environmental Affairs; and,
4. a two-thirds roll call vote of the Massachusetts General Court (state legislature) and signature by the Governor; and,
6. restitution of State Self-Help funding by dedicating a property of similar utility and value, as approved by the Secretary of Environmental Affairs, to the general public for conservation and recreational purposes.

In addition, with the CR recorded on the property, in order for the above conditions to take effect, the CR would also have to be terminated, using steps outlined above, plus a recorded vote of the majority of the then-sitting trustees of the PCT agreeing to release the restriction. Additionally, any site which receives Self-Help grant assistance must remain as permanently protected conservation and/or recreation land (Commonwealth of Massachusetts DCS).

Lot 1, being composed almost entirely of wetland and being owned by the Provincetown Conservation Trust, is afforded protection under the Massachusetts Wetland Protection act and the charter of the PCT.

[Return to Table of Contents](#)

H. THREATS TO NATURAL RESOURCES

The natural features which provide the environmental significance of the Shankpainter Pond Wildlife Sanctuary are described in Sections D and E. Management of the area is intended to protect and, where appropriate, enhance those characteristics. The Management Recommendations proposed in Section I are based on an overall goal of providing limited passive recreation that will not disturb significant

natural features or minimize the threats listed below:

1. Plant and Wildlife Habitat

Threats to plants and wildlife include vehicle use, trampling, human overuse, collecting, dogs, and disease/infestation. Existing walking trails are in excellent condition though some are located on steep slopes and would become unstable and erosive if pedestrian traffic were to substantially increase. The proposed trail layout (Figure 13) designates only a portion of the existing trails to the new trail system in order to prevent this. Other trails will be left unmarked, to be discovered by adventurous travelers. The use of some trails may be discouraged or prohibited.

Use of ORV's, including trucks and all-terrain vehicles (ATV's), have left significant scars here in the form of denuded roads and clearings. Though development activities have halted, these open areas leave the land more susceptible to erosion and wildlife disruption. Also, open areas invite motorized vehicle use in a way that wooded areas do not. Section I includes revegetation recommendations.

Hunting should be explicitly prohibited at the site due to the proximity of dwellings (Figure 11) and roadways, and use by pedestrians. Also, disturbance from gunshots would adversely effect wildlife not only within the site's boundary, but on the extensive surrounding waters and wetlands. Plenty of in-season hunting opportunities exist within the nearby National Seashore.

Hunting Setbacks

2. Forests

Threats to the woodland include cutting, disease, filling, ORV use, and flooding. There has been extensive recent cutting, filling, and ORV use associated with prior efforts to develop this land. Several broad areas of barren sand have been left behind in the wake of these activities. The main entrance to the land is along a 30-40 foot wide sand road which has been cut through the trees and rough graded leaving unvegetated slopes and sand piles. If left unvegetated, these areas will continue to erode, threatening the adjacent native vegetation and wetlands. Drainage patterns have also been altered and may affect the structure and viability of some stands (and possibly the isolated wetlands) due either to drought or flooding.

A slower but certain threat to woody vegetation is the progression of migrating sand dunes on the north and east sides of the property which have clearly begun to bury some trees on their lee side. As these dunes migrate inland towards the south and west, both forest and wetland will gradually become buried.

There is no apparent evidence of brown tip moth or other infestation affecting the pitch pines. The use of off-road vehicles (ORV's) is apparently confined to the existing roads except near the edge of Route 6 where several unbounded areas have been used by vehicles. ATV's and motorbikes have reportedly been a problem. The success of revegetation efforts will require vehicular restrictions.

3. Wetlands

Threats to wetlands include dumping, filling, erosion, and changes in water quantity and quality. Wetlands in the area are threatened mostly by erosion of sandy unvegetated areas (see Figures 5 and 12) Along the entry road, steeply graded banks spill sand towards the two isolated wetlands to the north. To the south, sand is beginning to slide towards the bog from recently denuded areas. One of the highest priority Management Recommendations is to revegetate these areas to prevent further erosion.

Due to the clearing and grading performed here, large uneven areas of sand have been left. Cutting of the road has altered natural drainage patterns though it is not yet clear if this has any adverse effects. In order to prevent any impact to the adjacent wetlands, these areas should be feathered into the natural topography as closely as possible and care should be taken to provide drainage routes which mimic the natural topography.

4. Scenic Value

Threats to the visual quality of Shankpainter Pond Wildlife Sanctuary include the erection of permanent structures, existing and potential erosive areas, cutting, natural vegetative succession, and litter. Structures such as benches and viewing platforms proposed as part of the trail plan will be situated in areas that provide, rather than obstruct, views. Existing bare areas are the most present eyesore on site. Figure 13 illustrates revegetation plans for these areas. The proposed trail plan avoids erosive slopes and cutting does not appear to be a problem. The natural growth of woody plants on the slopes near the bog may eventually obscure some of the remarkable views currently existing from the ridges and hilltops, however, the dwarfing influence of winds will probably keep the height of these trees to a minimum. It will be important when revegetating slopes to plant lower growing species. Some construction debris and assorted litter remain on the site though in general

the area is clean and cleanup and removal can be accomplished within one day.

5. Adjacent Open Space

The proximity of Shankpainter Pond Wildlife Sanctuary to the Duck Pond and Clapps Pond areas and to the National Seashore make this area of Provincetown very attractive for passive recreational use. Dedication of this land to conservation purposes should not increase pedestrian use to harmful levels since this land was already being used unofficially for similar purposes. Formalizing connections to adjacent conservation properties will help to expand the perceivable area of the Sanctuary. This purchase should also spur the protection of remaining unprotected land within the Shankpainter Pond watershed. The undetermined fate of the state highway layout is a future concern.

[Return to Table of Contents](#)

I. MANAGEMENT ISSUES AND RECOMMENDATIONS

1. Habitat Improvements

a) Revegetation

The major habitat improvements at the site will be the revegetation of denuded areas. The total area in need of restoration is approximately 20,000 square feet. The majority of this area (12,000 sf) is within the subdivision road layout, with the remainder scattered throughout the site in smaller plots. In general, the restoration work will include grading the land to meet existing contours, placement of topsoil and seeding with a mixture of grasses, shrubs and trees native to the site. In steeply sloping area, some erosion control and/or slope stabilization measures may also be necessary.

Additional restoration work may be undertaken off-site, along a 200 foot stretch of the subdivision road where it connects to Route 6. This section is on state highway property and is a logical extension of the trail connection to CCNS. Since the Massachusetts Highway Department provided a \$246,628 grant to the town in support of the acquisition of the property, we are anticipating their cooperation in restoring this portion of the trail.

The specific site restoration tasks will be based upon the recommendations of the USDA Natural Resources Conservation Service, Cape Cod District. NRCS recommends seed mix No. 1, composed of Little Bluestem and Switchgrass. Exact seeding rates are included in Figure 14. Suggested shrubs include bayberry, beach plum, and rugosa rose. Some American beach grass may be warranted in sandier areas. Imported topsoil or other improvements may also be necessary. A complete planting plan with specific quantities, costs, and locations should be conducted prior to any site work. District staff have already viewed the site and are expected to work cooperatively with the town and Cape Cod National Seashore on this project. The Trust is exploring the use of volunteers provided through Americorps-Cape Cod to complete the bulk of the work. The Compact has signed on to be a Community Service Site for the program to bring this type of support to the land trusts on Cape Cod. Americorps volunteers are available to government and non-profit organizations on Cape Cod through August 25, 2000 under a cooperative arrangement between Barnstable County and The Job Training and Employment Corporation.

Because dead wood and snags are a primary source of food and shelter for many animals, they should only be removed where they block trails, represent a safety hazard to pedestrians, or pose disease threat to healthy trees. Invasion by foreign species is not a problem. Vista pruning is not necessary at this time though in the future it may be warranted near dedicated viewing areas. Proper permits will be required if and when this becomes a possibility.

Proposed Improvements

Permanent Seeding Recommendations

Warm Season Grass Planting Procedures

2) Access

a) Vehicular

Though there will be no direct vehicular access into the site, a conceptual parking layout (Figure 15) accommodating 5-6 vehicles is planned near the Route 6 entrance to the property within the state right-of-way. This area is already part of the subdivision curb cut and road layout. The parking design will include a turning area, bench, trash receptacle, suggested planting, gate, and sign. The main entry gate will prohibit vehicular entry and will direct pedestrian access in concert with a sign listing allowed and prohibited uses. This will be the main pedestrian access point.

The only vehicular access will be for emergency and maintenance vehicles via Ship's Way, which is recommended for improvement to accommodate this use as well as use by bicyclists and handicapped individuals.

b) Pedestrian

Pedestrian access will occur from the Route 6 parking area and Ship's Way. Parts of the existing trail system will be dedicated as public walking routes. Other areas will be discouraged from use with signs or barrier planting. The trail should take advantage of existing views and access to natural resources for both scenic and educational purposes. Benches and signage should be placed appropriately. Figure 13 shows the trail layout and associated amenities. Bicycle racks should be provided near both entry points.

Because of the sensitive ecological nature of the site, the trail will need to be designed around certain natural features. Steep slopes, wetland areas, nesting sites and rare species habitat are examples of areas to be avoided during trail design and layout. The main trail will follow the existing cart path through the site for much of its distance. As mentioned above, some of this coincides with the area cleared for the proposed subdivision road and will need to be restored. Short loops off the main trail are planned to provide views of the pond and bog, as well as distant views of Cape Cod Bay to the southeast.

The total length of the trail through the site is expected to be no more than 2,000 linear feet or slightly under one-half mile. Connections to downtown (via Ship's Way Road) and the Cape Cod National Seashore (across Rt. 6) will add approximately one mile to the overall trail system.

The finished trail will vary in width depending upon its location. The existing cart path is almost ten feet wide in some places. In undisturbed areas, the trail has gentle side slopes sparsely vegetated with native grasses and herbaceous ground cover. The overhanging tree canopy provides partial shading of the trail. The trail bed itself is moderately compacted to unconsolidated sand covered by a thin layer of pine and oak leaf litter. This is the general condition which should be replicated through restoration efforts.

New trail sections, including the bog loop will be designed and laid out to minimize erosion of slopes and provide a sufficient buffer to sensitive wetlands and state-listed species locations. This work should be done in cooperation with the Massachusetts Natural Heritage and Endangered Species Program.

c) Handicapped

The Americans with Disabilities Act of 1991 states that public facilities, including town lands, should meet federal guidelines for accessibility by handicapped persons. A 1994 evaluation by the Provincetown Disability Committee found that Provincetown's unique, steep dune topography render many public lands unsuitable for full accessibility (Open Space and Recreation Plan, 1995), a feature shared by Shankpainter Pond Wildlife Sanctuary. As part of the proposed trail plan the extension of Ship's Way where it enters the property as a utility/access easement will be hardened with blue stone dust and gravel to accommodate both bikes and handicapped individuals. This path should be continued south to the hill overlooking the pond where a viewing platform is proposed. The entire handicapped accessible pathway traverses flat to gently sloping terrain. It can be accessed via Ship's Way from Shankpainter Road and downtown Provincetown and constructed at minimal expense. Benches will be provided at appropriate intervals. A section of the trail could be marked with guide ropes and braille signs to serve blind visitors. Asphalt paving is not recommended as it would disturb the natural setting.

3. Property Integration

Directly north of the conservation area lies the Route 6 right of way. About 200 feet of undeveloped Massachusetts Highway Department (MHD) land exists between the conservation area and the paved roadway. MHD could be approached for a commitment of part of the right of way to conservation purposes or outright deed to the town for conservation.

To the northeast of the Sanctuary, the Provincetown Conservation Trust holds about two acres in conservation restriction including and surrounding the wetlands there.

To the east are several house lots of one acre or less bordering the pond. These owners could be approached for conservation restrictions on the undeveloped portions of their properties in an effort to increase the vegetated buffer zone along the pond.

To the west lies Shankpainter Pond and its wetlands. Further efforts to preserve unprotected lots along the pond edge should be made.

4. Capital Costs and Funding

The major expense associated with this Management Plan is the cost of revegetation in denuded areas. Large areas need to be revegetated including some labor intensive tasks. On behalf of the Town of Provincetown, the Compact of Cape Cod Conservation Trusts received a \$5,000 unrestricted grant from the Fields Pond Foundation, Inc. for design and layout of a foot trail to be integrated with Cape Cod Pathways, and the restoration of disturbed areas through replanting and regrading work. The Compact's estimated budget for the project follows:

Estimated Project Budget

1. Site Restoration/Improvements

Restoration Plan \$1,500.00
Site Re-grading along trail \$2,000.00
Restoration Planting (Americorps in-kind) \$ NA
Materials (fill, topsoil, plantings) \$5,000.00
Layout & Construction of Parking Area \$ 300.00
Supervision of Site Work \$1,000.00
Subtotal: \$ 9,800.00

2. Trail Planning and Construction

Trail Design and Plan Preparation \$250.00
Trail Layout \$125.00
Trail Construction (Americorps in-kind) \$ NA
Construction and installation of benches (2) \$300.00
Subtotal: \$775.00

Total Grant Request: \$10,575.00

In-Kind Contributions

Americorps Volunteers - labor for restoration and trail work \$2,400.00
Provincetown Conservation Trust \$ 200.00
Preliminary planning by The Compact \$ 400.00
Total In-Kind: \$3,000.00

Total Project: \$13,575.00

In-Kind contributions from groups including Americorps , the Provincetown Conservation Trust, The Compact and others is estimated at \$3,000.00. Some of the proposed work may also be performed by the Provincetown Public Works Department. Private donations of plant materials can be solicited by the town and/or land trust to help offset the costs. The Town's Capital Outlay Plan includes monies for improving town lands and facilities, but none has been dedicated or assigned yet to Shankpainter Pond Wildlife Sanctuary. Any work performed by the Department of Public Works is contingent upon operating budgets, available staff, season, and scheduling.

5. Property Regulations and Uses

Property regulations are governed by the Massachusetts Wetlands Protection Act (Lot 1), the charter of the Provincetown Conservation Trust (Lot1), conservation restriction document language (Lot 2), and the Cape Cod Commission's Development of Regional Impact decision dated 9/23/97 (Appendix E). All of the above documents prohibit development of the Shankpainter Pond Wildlife Sanctuary. Acceptable minor improvements include walking trails, observation decks, gates, signs, and small parking areas, all subject to review by the Provincetown Conservation Commission, Open Space Committee, and Provincetown Conservation Trust. Of particular import in the DRI decision was the sanctity of the wetlands, their buffers, and the ridge line. Only a proposed observation deck, sign, bench, and two small sections of trail occur within the wetland buffer zone. All other activities lie outside it. The ridge line is skirted by the main trail but not threatened by it. None of the proposed activities or structures will threaten the integrity of the natural resources on site. If in the future any uses cause damage to any of the natural resources on site, they should be revisited to ameliorate these problems.

Hunting should be strictly prohibited within the Sanctuary. Motorized vehicle use will be prohibited. The possibility of unauthorized use should be discouraged by signs, barriers, and regular monitoring. Bicycles will be encouraged to access the site and bicycle racks will be provided but no on-site use of mountain bikes will be allowed.

The following activities will be allowed in the conservation area within the above-mentioned guidelines: walking, picnicking, birdwatching, jogging, horseback riding, cross-country skiing, dog walking, nature study, photography, sketching, painting, and other passive recreation. Prohibited activities are: hunting, discharge or possession of firearms, motorized vehicle use (including dirt bikes and ATV's), all fires, alcoholic beverages, parking (except in designated area(s), and all other uses not specifically allowed.

The following activities are allowed subject to special approval and receipt of a special permit from the Conservation Commission:

- botanical or animal inventory
- archaeological study
- geological or groundwater investigation

- educational tours
- groups of ten or more people

Both allowed and prohibited uses should be posted on signs at both entries and within all publications associated with the site.

[Return to Table of Contents](#)

J. PLAN AND IMPLEMENTATION

1. Property Management

The sitting Chairperson of the Provincetown Open Space Committee will serve as the contact person for all inquiries and management coordination. Final plan design and management will be conducted by the Conservation Commission on behalf of the town, in consultation with the Recreation Committee, Public Works Department, and others as needed. Actual implementation of many of the management recommendations within this plan should be conducted by the Provincetown Public Works Department. The Police Department will respond to criminal complaints. In the event of conflicting interpretations regarding implementation, the Town Manager should be consulted in consultation with the Open Space Committee, the Conservation Commission, and the Provincetown Conservation Trust. The PCT will conduct an annual investigation of lands under their control to determine compliance and general environmental conditions. Any transgressions of boundary lines or allowable uses will be addressed accordingly.

2. Property Security

A volunteer stewardship committee should be appointed to report misuse and to suggest improvements at the Shankpainter Pond Wildlife Sanctuary. It should be appointed by the Open Space Committee and composed of neighborhood residents, Land Trust members and Trustees, Open Space Committee members, and other interested parties. Potential tasks include litter patrol, boundary patrol, and trail maintenance. This Stewardship Committee should report regularly to the Open Space Committee and Conservation Commission.

A temporary gate has been erected near the Route 6 entrance to the site. This should be replaced with a more permanent gate constructed of steel or heavy wood to prevent entry by motorized vehicles. There is also a 10-12 foot wide swing gate on Ship's Way which was open during site visits conducted in January 2000. This gate should also be made more permanent, with access allowed for emergency and maintenance purposes only. Keys to these gates should be held by the appropriate groups including the Fire Department and the Conservation Commission. Both gates should be accompanied by a sign listing both allowable uses and prohibitions. In the event that abuse of the no-vehicle rule is documented, other avenues of security (such as police patrols) should be instituted. All breaches of conduct should be reported to the police and logged to determine the extent of misconduct and an appropriate response.

3. Fire Plan

The goal of a fire plan is to ensure safe and adequate emergency vehicle access to suppress fires at Shankpainter Pond Wildlife Sanctuary, with particular aim to protect surrounding homes. The Fire Chief should submit a plan designating staging areas and proposed firefighting access and methods of water availability. There is a hydrant on site. In consultation with the abutters, the Conservation Commission should evaluate the amount of deadwood near its property's perimeter to achieve a balance between privacy and protection against fire.

4. Update and Review

This management plan should be reviewed every year by the Provincetown Open Space Committee and Conservation Commission. In advance of an annual public review of this plan, the Commission should confer with other town departments to determine their concerns. The Commission should update the plan as necessary and report to the Selectmen any problems regarding compliance. New or modified components to the management plan can be adopted by the Commission at any time after a publicly advertised public meeting.

End of Plan

[Return to Table of Contents](#)