

# **NAHANT OPEN SPACE AND RECREATION PLAN**

## **2008**



**Bailey's Hill**

.....Photo: Clark Quinn

**Prepared by the  
Nahant Open Space Management and Land Acquisition Committee**

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## SECTION 1. PLAN SUMMARY

This *Open Space and Recreation Plan* provides the Town of Nahant with a five-year program for protecting open land from overdevelopment, for managing open space, and for improving existing open space areas for passive recreation. Nahant faces open-space challenges that are different from those faced by other cities and towns. Nahant does not have to deal with districts within its own boundaries where heavy pollution is produced or with encroaching commercial development. However, there is increasing pressure to construct additional residential housing and to accommodate the varied and often formidable forces of change coming out of the large and expanding urban centers nearby. It is a sobering fact that, after almost four centuries of expansion and development, much of Nahant's original open space is gone.

This *Plan* recognizes the unique place of Nahant in the history of the Commonwealth of Massachusetts. It offers a comprehensive open space inventory (**Section 5**), the results of an Open Space Survey conducted early in 1999 (see **Appendix 2**), a discussion of the outcome of past conservation efforts, and an evaluation of the danger of allowing the development of the Town's remaining open space for residential housing. Community Vision and Goals and Objectives (**Sections 6 and 8**) and the Five-Year Action Plan (**Section 9**) are intended as a road map for the Town to follow to deal with its special open-space challenges. This *Plan* identifies general as well as specific goals, including the construction and maintenance of nature trails, the development of a management plan for the Heritage Trail similar to the one for Henry Cabot Lodge, Jr., Memorial Park and Bailey's Hill (see **Appendix 1**), and the designation of additional land for acquisition or conservation restriction. It is acknowledged that this *Open Space and Recreation Plan* will have to be reevaluated in the future.

## SECTION 2. INTRODUCTION

### *A. Statement of Purpose*

The Town of Nahant's first *Open Space Plan* was adopted by the Town in 1989. That project was the first task of the newly formed Open Space Committee. (The Committee, officially named the Nahant Open Space Management and Land Acquisition Committee, but known as the "Nahant Open Space Committee," is a volunteer group, now appointed by the Town Administrator, whose purpose is to address open space issues.) The Open Space Committee completed its first update of the 1989 *Plan* in 2000.

Many of the goals of the original 1989 *Plan* and the 2000 *Plan* have been accomplished. Henry Cabot Lodge, Jr., Memorial Park (Lodge Park) has been rehabilitated and rededicated. Construction of a recreation path now known as the Heritage Trail, starting from Little Nahant, extending through the Lowlands conservation area, and ending at Bailey's Hill, is in progress. Management plans have been written for Lodge Park and Bailey's Hill. Access to the Thicket (the Massachusetts Audubon Society Sanctuary) has been improved and the pollution problem in the Thicket has been solved. Also, a parcel of land adjacent to the Thicket has been acquired by the Town for use as open space. A number of Rights of Way including traditional access points to the ocean have been opened and appropriate signage posted.

The present document is a revision of the 2000 *Open Space Plan*. Its purpose includes the following: to assess the Town's accomplishments; to reevaluate and update the Town's previous goals and action plan; to meet the requirements set down in the 2001 *Open Space and Recreation Plan Requirements* of the Commonwealth of Massachusetts Executive Office of Energy and Environmental Affairs and thus qualify for conservation funding; and to help the Town focus on creating a vision for the future of Nahant.

### *B. Planning Process and Public Participation*

The process of writing this *Plan* included doing research, consulting with interest groups and relevant Town committees, and meeting to revisit and assess past objectives and develop future goals. This process provided a vehicle for reevaluating and articulating the work to be done in order to preserve Nahant's open space, protect its wildlife, and improve the Town's recreation opportunities.

The Nahant Open Space Committee began the process of writing an updated Open Space Plan in December 2004. The update for the handicap-accessibility evaluation for the Town's major open space sites, which had been developed by the Town Manager and the Americans with Disabilities Act (ADA) Coordinator, as required by the Executive Office of Energy and Environmental Affairs, was completed in December 2007 (see **Appendix 6**, "Section 504 Self-Evaluation"). The Committee chairperson is Linda Pivacek, and the other members are Deborah Aliff, John I. Benson, Pricilla P. Fitch, Sherry V. Smith, and Julie Stoller.

During this period the Committee held thirty official meetings. Notices for all of these meetings were posted at the Town Hall, and the meetings, held at the Town Hall, were open to the public.

Also relied upon for public input was the 1999 Open Space Committee Survey, updating an earlier survey done by this Committee in 1989. Out of 1,800 copies of the survey that were distributed to households or central locations, 258 completed copies were returned. Residents were asked to respond to specific questions and also to offer comments. A copy of the survey questionnaire and a tabulation of the results are included in **Appendix 2**.

In the research and development of this *Plan* the Committee also relied on input from the community and from public officials at public meetings and walks, as detailed in **Section 6A(2)(b)** of this *Plan*.

Responsibility for the sections of the present *Plan* was divided among the members of the Committee, and a projected date was set for the completion of each task. The Committee was fortunate to have the assistance of a number of individuals outside the Committee who had particular expertise in certain areas.

Town Administrator Mark Cullinan gave us his ongoing guidance and support throughout this effort.

The Town of Nahant Board of Selectmen supported the Open Space Committee's efforts and programs.

James McCurdy, a member of the Planning Board, wrote parts of **Section 3D** (Growth and Development Patterns).

Mary Irene Dickenson from the Nahant Historical Society contributed to the cultural and historical portion of **Section 4F** (Scenic Resources and Unique Environments). Calantha Sears provided information on and access to pressed-plant collections that were consulted in the preparation of **Section 4D** (Vegetation), provided access to historical maps that appear in **Appendix 3**, and contributed to the historical segment of **Section 3** (Community Setting).

Polly Bradley, past president of SWIM (Safer Waters in Massachusetts), wrote portions of **Section 4** (Environmental Inventory and Analysis), contributing especially to **Section 4G** (Environmental Problems).

Bernard Yadoff and Emily Potts analyzed and reported the results of the 1999 Open Space Committee Survey.

Town Constable Paul English, the Nahant Americans with Disabilities Act (ADA) Coordinator, and Town Administrator Mark Cullinan conducted the original survey of open space sites for handicap accessibility and updated the survey for the 2007 *Plan*.

Daniel A. deStefano, Director of the Nahant Public Library, provided the valuable service of maintaining and making accessible important reference sources needed in our research on the Town's social and natural history.

The Massachusetts Department of Environmental Management, Division of Resource Conservation, was consulted for information on the Massachusetts scenic landscape inventory.

Bob O'Connor and Melissa Cryan at the Massachusetts Executive Office of Energy and Environmental Affairs helped the Committee with information on the status of the 2000 *Nahant Open Space Plan* and gave the Committee valuable guidance in preparing this new *Plan*.

Robert Wilson, the Nahant Town Webmaster, published the Open Space Plan on the Nahant Web site.

The draft *Plan* was submitted to the following for comment:

- Metropolitan Area Planning Council
- Board of Selectmen (also serving as the Board of Health)
- Planning Board
- Board of Appeals
- Conservation Commission
- SWIM
- Recreation Commission

Changes to the present *Plan* were made in response to the comments received. Upon endorsement by the official bodies required to review it, the draft *Plan* was then submitted to the Executive Office of Energy and Environmental Affairs on January 10, 2008. Additional changes were made in response to their input. Final approval was received from Melissa Cryan of the Massachusetts Executive Office of Energy and Environmental Affairs on August 15, 2008.

In acknowledging the valuable assistance and comments that have been received from the persons and many of the organizations mentioned above, the members of the Nahant Open Space Committee accept responsibility for any unintended errors in or omissions from this *Plan*.



## SECTION 3. COMMUNITY SETTING

### *A. Regional Context*

Nahant is a peninsula located to the north of Boston Harbor and connected to the mainland by a 1.5-mile-long causeway. It is known for its sandy beaches, rocky coastline, and scenic views. Included within the Town limits is an uninhabited island, Egg Rock, which sits 1.1 miles offshore. Historically, Egg Rock was used as the site for a lighthouse, erected in 1856. The two main sections of Nahant are connected by another causeway and are known as Big Nahant and Little Nahant. The smallest town in the Commonwealth of Massachusetts, Nahant is 1.04 square miles with a population of 3,632 (2000 U. S. Census). It is largely a bedroom community for Boston and other cities. There is convenient commuter rail service for the fourteen miles to Boston from the neighboring communities of Lynn and Swampscott. Logan Airport is twenty minutes by car to the south.

Historically, Big Nahant consisted of large estates in the eastern part of the peninsula, more modest homes in the center bordering a salt marsh, and a thickly settled resort area in the western part of the town. Little Nahant was developed in the early 1900s with small homes built close together. Today the homes with larger land areas still tend to be located on the eastern part of Big Nahant while both Little Nahant and the western part of Big Nahant are thickly settled.

Lobster trapping is the largest industry in town. The health of the ecosystem surrounding the waters of Nahant is a deeply felt concern in Nahant, and resolving the sewage-disposal issues discussed below is seen as vital to the industry's survival.

Nahant has 3,492 people per square mile. Nahant's closest neighbors, Lynn, Swampscott, Marblehead, and Salem, are also densely populated. The need for open space is therefore acute. Due to its location and spectacular natural beauty, Nahant historically has drawn thousands of visitors from other communities. By the middle of the eighteenth century, it was a major tourist resort and vacation spot for Bostonians escaping the summer heat. Today, the peninsula attracts people for beachgoing, jogging, sport fishing, kite flying, windsurfing, kayaking, nature study, and bicycling—to name just a few of the kinds of recreation enjoyed here. Since the peninsula is important as a feeding and resting spot for migratory songbirds and shorebirds, as well as a home to a number of nesting species, the conflicting needs between people and wildlife must also be considered.

Nahant has three State-designated Barrier Beaches, one of which is Nahant Beach (see **Appendix 3, Map 1**: “Coastal Zone Management Map of State-designated Barrier Beaches”). The Massachusetts Department of Conservation and Recreation manages a 3,202,000-square-foot reservation along the causeway connecting Nahant and Lynn, which includes Nahant Beach, a bike path, bathroom facilities, and public parking. Use by non-residents of the many other recreational resources, including Lodge Park, Tudor Wharf, Tudor Beach, Marjoram Park, Bailey's Hill, and Short Beach is permitted but as a practical matter is limited due to the lack of public parking. Because of its small size, the protection of its precious recreational resources is a crucial need in Nahant.

Nahant's Open Space Plan should consider the goals of its neighbors. Surrounded by ocean, Nahant borders Lynn on the mainland where Lynn Beach and Nahant Beach connect. The City of

Lynn, in its Open Space Plan, identified access to the shoreline as one of its most important open space needs (*City of Lynn Open Space and Recreation Plan Update III* [n.d.]: Sec. VII. A). As a result, a major renovation of Lynn Beach has been achieved, allowing pedestrian and passive-recreation uses. This large project resulted in a restored walkway, park benches, new lighting, grassy areas, and a new seawall—and it now offers the potential for linkage to the newly created Heritage Trail that extends from Little Nahant through the Lowlands and ends at Bailey’s Hill. This Nahant trail project will require the cooperation of Nahant, Lynn, and the Massachusetts Department of Conservation and Recreation, which manages Lynn Beach and Nahant Beach together as “Long Beach Reservation.” It will also complement similar regional outdoor recreational projects such as the East Boston Greenway.

The Town of Nahant participates in open space planning for the larger region, including meetings and activities of the Massachusetts Regional Open Space Association, The Massachusetts Department of Conservation and Recreation, the Essex National Heritage Foundation, and the Massachusetts Biodiversity Initiative. Also, Nahant is a member of the North Shore Task Force, one of eight Metropolitan Area Planning Council subregions, which provides a forum for the discussion of open space issues and opportunities.

Nahant’s neighbors also include those communities that share its coastline. SWIM (Safer Waters in Massachusetts) is a local advocacy group based in Nahant that works with the Town and the surrounding communities to protect wildlife resources and the marine environment.

## **B. History**

Native American artifacts have been found on Nahant, indicating at least a summer community here. The group that settled the peninsula probably belonged to the Naumkeags, part of the Pawtucket group (also known as Pennacook), who were known to have lived along the coast from Massachusetts Bay to York Village, Maine, and who hunted, fished, and collected plants and shellfish (see **Appendix 3, Map 2**: “Nahant as It May Have Been in the Seventeenth Century”).

Until 1853 Nahant was part of Lynn, which was settled by Puritan farmers in 1629 and incorporated as a town in 1631. While Salem to the north and Boston to the south became world trading centers, attracting wealthy merchants, Lynn was an agricultural town through the early 1800s. Lynn farmers used Nahant as a pasture for domestic animals. By the time of the American Revolution, there were three Quaker families living on Nahant, engaged in fishing, farming, and making shoes to sell. Since ownership required that lots were to be cleared of wood in six years, Nahant lost its woodlands at an early date.

Nahant’s natural beauty shaped its future. The beaches, rugged rocks, fishing, and tide pools, as well as the kind hospitality of the residents, began to attract visitors. Steamboat service from Boston started in 1817. By 1820, Bostonians and others began to summer in Nahant, and 1823 saw the opening of the Nahant Hotel at East Point. Stage service from the Nahant Hotel to Boston and Salem began in 1826. This was the beginning of the era of Nahant as a resort town, with resort facilities centered initially at East Point. The civic and commercial buildings were concentrated in the center of Big Nahant along with the homes of some of the permanent residents. The western part of Big Nahant remained mostly undeveloped.

The year-round population grew from 197 in 1847 to 270 in 1855. In 1865 there were 313

residents. Some residents farmed while others fished for cod, mackerel, haddock, and halibut. The lobster industry began in 1858, and survived after the fishing industry died out with the introduction of trawlers. Several ocean-going vessels were built in Nahant. The first, a schooner, was launched in 1858. A few Nahant families made shoes on consignment for Lynn manufacturers. The construction industry was an important source of income for Nahant residents from the 1860s to the early part of the twentieth century. The resort industry, however, was the most significant contributor to the Nahant economy.

When the growing temperance movement threatened the summer resort trade in 1853, Nahant became a separate town, leaving Lynn and its Temperance Society behind. By the 1860s the western part of Big Nahant became the center of a working-class entertainment area. Nahant was to grow into the most massive hotel complex on the Atlantic Coast.

The various districts in Nahant came to be clearly delineated. Toward the east was a Boston summer community of rich merchant families and intellectuals. There were several large estates, including the home of Senator Henry Cabot Lodge and his family at East Point, on the former site of the Nahant Hotel, which burned in 1861. The civic and commercial buildings were clustered on Nahant Road. There was a large saltwater marsh called The Meadows, which separated Bass Point from the main part of town. In the center of The Meadows was Bear Pond. The Bass Point area to the west of the marsh catered to working-class visitors. Bass Point contained several hotels, seafood restaurants, and entertainment facilities, including a roller-skating rink, bandstand, shooting gallery, bowling alley, theater, and roller coaster (also known as the “scenic railway”).

In 1880 the environmental pressures that resulted from the influx of people led to an outbreak of typhoid fever. As part of the remedy, the marshland was drained. In 1905 the Nahant and Lynn Street Railway broke ground, laying track alongside the causeway, with a trestle across what was left of the existing marsh to the intersection of Flash and Spring Roads. From there, one spur went on to the Relay Yard at Bass Point and another traveled to Tudor Wharf via Willow Road along Tudor Beach. There was probably extensive filling of The Meadows at this time (see **Appendix 3, Map 3**: “Nahant [ca. 1914]”). The resident population was 475 in 1870 but had increased by 192 percent to 1,387 in 1915. By the 1900s, Bass Point became the focus of visitors, with as many as 40,000 arriving on weekends to visit its entertainment facilities. In the western part of Big Nahant as well as Little Nahant there were small, tightly clustered cottages—the development pattern that remains today.

A combination of factors brought an end to the resort era in Nahant. When the United States entered World War I, the steamers bringing people to Nahant were taken over by the military, and this service stopped. Later, the Great Depression made the large estates impractical, and prohibition had a negative impact on the resort industry. The hotels and entertainment areas at Bass Point burned or were torn down, and the large estates in the eastern portion of the Town were sold off and subdivided.

Two large areas of open space in beautiful ocean settings, East Point and Bailey’s Hill, would have been developed were it not for the protection of these areas for their military value. Starting in 1886, portions of Nahant had been set aside for gun emplacements. The military drastically altered these landscapes to conceal the guns behind man-made hills. Although the military occupation ended in 1962, the Army remained involved in the maintenance of these areas, gradually removing some of the gear and hazardous materials.

East Point, first the site of the Nahant Hotel, then the estate of Henry Cabot Lodge, and then a military base, now belongs partly to Northeastern University and partly to the Town of Nahant. After the closing of the military base, the missile silos at East Point were gradually filled with a variety of materials and topped with landfill, including asphalt and cement, resulting in an unsightly public hazard. Immediately following its formation in 1988, the Open Space Committee sponsored the rehabilitation of this area, now known as Henry Cabot Lodge, Jr., Memorial Park. The rehabilitation process was completed in 1997. The Park is 361,548 square feet in area. Northeastern University owns 889,495 square feet at East Point, where it maintains a marine biology laboratory and research station.

Today, the Northern part of The Meadows, where the railroad once ran, contains a softball field (located across the main road from Short Beach), a filled area set aside for Town-generated compost and the storage of commercial lobster pots, and some undeveloped land. Wet “canals” run through this area. The southern side of The Meadows has more ball fields and a golf course, which was purchased by the Town in 1988. The golf course constitutes the largest single tract of land in Nahant. It is separated from the ocean by a dike, and, since the whole area is frequently flooded, there is a system of pumps to dry it out. Remnants of Bear Pond and the marsh can be seen on the golf course, and this habitat attracts herons, geese, and glossy ibis. The Heritage Trail, a new walking trail, meanders in part through this area.

The Nahant Country Club, originally the homestead of Frederic Tudor, occupies another large tract of land, which contains tennis courts, buildings, and open space. It is owned by stockholders and maintained as a private club.

### *C. Population Characteristics*

Nahant’s population increased 192 percent between 1870 and 1915. After this spurt, however, the pace began to slow down. The growth rate was 133 percent from 1915 to 1940, with an increase from 1,387 to 3,231 residents. Between 1940 and 1955, the population increased 76 percent. Between 1955 and 1970, the population continued to increase, reaching 4,119 in 1970.

Today, Nahant’s population is declining. It was 3,947 in 1980 and 3,828 in 1990—a loss of 3 percent. Between 1990 and 2000, Nahant’s population decreased by 5.12 percent.

The following data is from the 2000 U.S. Census:

The population of Nahant was 3,632. There was a small female majority of 1,900 females to 1,732 males. The breakdown of the population by age showed that 4.5 percent were under 5 years of age; 4.8 percent were between 5 and 9; 6.3 percent were between 10 and 14; 4.2 percent were between 15 and 19; 2.9 percent were between 20 and 24; 10.4 percent were between 25 and 34; 17.6 percent were between 35 and 44; 18.2 percent were between 45 and 54; 7.4 percent were between 55 and 59; 4.4 percent were between 60 and 64; 8.7 percent were between 66 and 74; 7.7 percent were between 75 and 84; and 3.1 percent were 85 and over.

The population of Nahant was 97.1 percent White, 0.4 percent Black or African American, 0.1 percent American Indian or Alaska Native, 1.1 percent Asian, 0.1 percent Native Hawaiian and Other Pacific Islander, and 0.8 percent two or more races. The Hispanic or Latino population was 1.1 percent.

The median household income was \$64,052. The per capita income was \$41,807. Only 2.6 percent of the population was below the poverty level, well below the 12.4 percent U.S. average. Of Nahant's labor force, 1 percent was unemployed.

Of the occupied housing units, 68 percent were owner-occupied and 32 percent were renter-occupied.

Nahant lobstermen and the Nahant businesses that depend on them, including Nahant Fish and Lobster, employ around 25 to 30 people. There are only a few other employers in Nahant. They include a function hall, the golf course, two restaurants, a bank, a car-repair garage, three convenience stores, a real-estate office, and the Town of Nahant.

#### *D. Growth and Development Patterns*

##### 1. Patterns and Trends

The overall growth pattern in Nahant is toward residential rather than commercial use. Some sections of the town are hilly, with complex street patterns and small lots. Other areas, mostly in the Eastern section of Big Nahant, have sizable homes on large lots. There are a few apartment buildings. The largest is the 128-unit Bass Point Apartments, built in 1973 (after a change in the zoning bylaws in 1969), with swimming pool and tennis court. The former J. T. Wilson School on Nahant Road was converted to elderly housing in 1983, and the former Valley Road School was recently acquired by the Nahant Preservation Trust (a nonprofit organization) and is currently used as a Community Center with business office space.

Even though the population is in decline, the number of dwelling units is increasing. In the 1960s, it was thought that only one hundred more houses could be built in Nahant, but at least 120 houses were built between then and 1989. Between 1970 and 1980, the number of dwelling units increased about 10 percent (from 1,397 to 1,547), while the population declined by about 5 percent. As pressure intensified, land once considered inadequate, unsuitable, or protected by State or Federal statute has been developed. This is plainly visible when looking at houses recently built on stilts or on rock ledges.

Approximately one third of Nahant is under public or institutional ownership. Land in this category includes the following: Egg Rock, Lodge Park, Greenlawn Cemetery, the Massachusetts Audubon sanctuary known as the "Thicket," the Johnson School, the former Valley Road School, the Library, the Town Hall, the Fire Station, the Police Station, the Public Works building, the Lowlands ball fields, the causeway, Tudor Wharf, Bailey's Hill, the Kelley Greens golf course, the Coast Guard Station, Marjoram Park, one parcel of conservation land, three parcels of the Nahant Housing Authority, playgrounds, Town beaches, churches, Northeastern University, and clubs.

##### 2. Infrastructure

**(a) *Transportation system.*** Access to Nahant by land is limited to a single road, maintained by the Massachusetts Department of Conservation and Recreation, formerly the Metropolitan District Commission, which runs the length of the causeway. This road connects Nahant to Lynn and Route 129 and 1A. Running along the edge of the road is a bicycle path and a public parking lot for beachgoers. There is very little public parking in Nahant after the Little Nahant end of the

causeway. Therefore there is normally very little congestion and no need for traffic lights and parking meters.

Massachusetts Bay Transportation Authority (MBTA) buses circle Nahant and provide connecting service to other MBTA buses in Lynn, to the commuter rail north to Rockport or south to Boston, and to the MBTA Blue Line Subway at Wonderland in Revere. The MBTA also provides The Ride, a service for the elderly and disabled.

**(b) *Water supply system.*** The source of Nahant's water is the Quabbin Reservoir. The water supply for Nahant is administered by the Massachusetts Water Resources Authority (MWRA).

**(c) *Sewer system.*** Until 1984, Nahant discharged untreated sewage into coastal waters at Broad Sound through a sewer outfall off Trimountain Road, through six other public sewer outlets, and through a number of private sewer outlets. Local concern over the quality of the Town's coastal waters, together with a directive from the Environmental Protection Agency to eliminate untreated discharges, prompted the Town to tie into the Lynn sewage treatment facility. Nahant's sewage is now being pumped to this regional plant, where it receives primary and secondary treatment. A sewer outfall discharges treated waste into Lynn Harbor. This outfall is 0.6 miles off Bass Point, in thirty feet of water.

Also affecting the quality of the Nahant coastal waters is the Greater Boston Sewage Treatment Plant at Deer Island administered by the MWRA. This plant, which began operations in the spring of 2000, is discharging secondary treated sewage from forty-two cities and towns through an outfall about 5.5 miles from Nahant.

### 3. Long-term Development Patterns

The Planning Board is in the process of updating the Master Plan for the Town which dates from 1986.

One component that needs to be updated is an affordable housing plan for the Town, which will be submitted to the Department of Housing and Community Development. The plan will show how the Town is planning to reach the 10 percent requirement for affordable housing. Recently the Town purchased the 3.35 acre military housing property located on Castle Road, Gardner Road, and Goddard Drive from the federal government. Planning consultants have been hired to determine the possible development options for the property. Affordable housing is likely to be a component of the final development proposal; this would help increase the amount of affordable housing in Nahant and help the Town work towards the 10 percent state requirement.

The Town of Nahant also owns the Nahant Life-Saving Station. The roof has been replaced with a new wooden-shingle roof and the exterior siding and trim have been repaired and repainted.

Presently, the central business district along Nahant Road across from Short Beach is experiencing difficulty maintaining the amount of leased space. The Islander Restaurant recently closed and remains vacant. Other centrally located retail space has been converted to office space.

The other business-zoned areas include two restaurants and a bank at the end of Nahant Beach in Little Nahant; a car repair garage on Spring Road; a commercial building next to Town Hall that contains the Post Office and a convenience store; a convenience store across from the Johnson

School; and the converted Valley Road School Building, which houses community space for the Council on Aging, the Boy Scouts, the Nahant Historical Society, and several private businesses.

Current zoning does not allow for future business development in Nahant. The new Master plan should specify that no further business development is planned for the Town.

Nahant does not have a maximum build-out plan. There are very few unbuildable lots in the Town for two primary reasons. First, houses can be built in flood zones and wetlands or on ledge as long as the building code and zoning bylaws are followed. Second, there is town-wide water and sewer distribution. Although current zoning does not allow for multi-family dwellings, a number of such buildings presently exist that have either been officially recognized or could be recognized in the future.

As of February 1, 2005, the Nahant Planning Board endorsed a new lot subdivision (2.6 acres) on Cary Street. The Cary Street subdivision includes a new building lot and one existing lot containing a single-family house. A second new three-lot subdivision (1.8 acres) was approved on Nahant Road by Forty Steps Beach. The Nahant Road subdivision includes two new building lots and one existing lot containing a single-family house. Given the continued real estate boom, the Nahant Planning Board expects future subdivisions to come before the Board. There are many other smaller lot subdivisions in Nahant that have been approved over the past few years that are being rapidly developed in Little and Big Nahant.

There are also many other larger lots around the Town that can be subdivided under the current Zoning Bylaws unless a moratorium is imposed by the Town. Presently the zoning law for some areas (R-2) permits subdivisions of existing lots into 10,000-square-foot lots, while the zoning law for other areas (R-1) permits subdivisions of existing lots into 30,000-square-foot lots (see **Appendix 3, Map 4:** “Official Zoning Map of the Town of Nahant”). There are a number of large new homes that have been built on small lots in the last five years, a pattern that increases concerns about density.

In addition to a moratorium, conservation restrictions would help to increase the protections for open space in Nahant and help with the problem of density. The Nahant Open Space Committee sponsored a conservation restriction workshop to acquaint town residents with the facts about conservation restrictions including tax advantages, the benefits to the town, and the benefits to the individual landowner. Of particular concern is the need for buffer areas for land that is already protected such as the areas surrounding East Point, Bailey’s Hill, the Heritage Trail, the Lowlands, the Thicket, and the golf course.

## SECTION 4. ENVIRONMENTAL INVENTORY AND ANALYSIS

### *A. Geology, Soils, and Topography*

#### 1. Geology

Long before Nahant as we know it today came into existence, its present site was covered by an ancient sea (Dennen 1969). The oldest rocks in Nahant are part of the Weymouth formation, deposited 600 million years ago in a shallow sea in the Olenellus Zone. This layer of sedimentary shale and limestone contains the oldest fossil-bearing rocks in eastern New England. An important example of this fascinating geological history is depicted in the cliffs at East Point, an area of continuing geological study. The fossil shells in these ancient sediments include two species of brachiopods and nine species of gastropods. Three of these species have not been identified elsewhere in eastern New England (Foerste 1889; Sears 1905; Grabau ———).

Most of the bedrock of Nahant consists of “Nahant Gabbro,” a younger igneous rock formed some 400 million years ago by the cooling and recrystallization of magma.

Nahant was raised from the depths 200 million years ago during the Paleozoic era. Blocks of bedrock were uplifted and separated from the mainland by a major fault. Three smaller faults divided Nahant into four sections that may have been individual islands. Early maps in fact show Nahant as three islands: Little Nahant, Bass Point, and the area east of the lowland meadows.

Advancing and retreating glaciers scoured and shaped the terrain until about fifteen thousand years ago. The retreating ice sheets deposited the cobbles and sand that make up the beaches and a mantle of glacial till soil over Nahant. The rising sea level inundated the land, depositing silts, sands, and clays. Coastal deposition helped to form the tombolos, one connecting the two main sections of Nahant to each other and the second connecting these sections to the mainland. The ongoing process of erosion and deposition by the ocean waves and currents continues to shape the shoreline.

#### 2. Soils

Nahant’s soils are derived mainly from glacial till, and much of the soil exhibits urban disturbance (Dennen 1969). Deep deposits of well-drained, loamy soils with areas of exposed bedrock occur in the higher areas, and highly drained loamy and sandy soils occur in outwash deposits. Nahant’s soil associations comprise four groups. The area around Nahant Road north of Little Nahant is characterized by a Udorthents-Urban land association that has been altered or obscured by development. East of Nahant Harbor, the wetlands in the central portion and the southeastern tip of Nahant belong to the Chatfield-Hollis Rock outcrop association. These are well-drained, loamy soils formed in glacial till containing areas of exposed bedrock. In the area north of Nahant Harbor the soils belong to the Merrimack-Hinckly-Urban land association, with deep deposits of extremely well-drained loamy and sandy soils formed in outwash deposits. Soils of the Paxton-Montank-Urban land association found in the area east of Nahant Harbor to a line between Bass Rock and Saunders Ledge are well-drained, loamy soils formed in glacial till.



### 3. Topography

Nahant lies within the Seaboard Lowlands, characteristic of Essex County, with scattered hills of less than one hundred feet (Nahant Conservation Commission 1969). Barrier beaches connect areas of higher elevation, and the varied coastline includes cliffs, coves, and tidal flats.

Relating to the three subsections above, see **Appendix 3, Map 5**: “Surficial Geology of Nahant” and **Map 6**: “Nahant Wetlands.”

### 4. Development Limitations

Most of Nahant has been developed as single-family housing units, including the slopes of several steep hills with elevations of one hundred to two hundred feet.

The low central portion of Nahant, fifty acres of lowland meadows, is a wetland (see **Appendix 3, Map 6**: “Nahant Wetlands”). The original form of this area is suggested by a chart drawn by Captain Callendar of the HMS Rodney, which shows this area as an open lagoon separated from the sea by a narrow bar. The area has been drained and filled to accommodate development and is presently maintained by a dike and a pumping system. A portion of this wetland is used as a golf course, which is owned by the Town of Nahant. Further development of this wetland may be controlled to some degree by the Wetlands Protection Act and by sewage regulations. However, the presence of the golf course and numerous houses encroaching on this area shows that such protection is not guaranteed.

Since Nahant is virtually an island, exposure to ocean storms and to flooding places the greatest restraint on development. Short Beach and Nahant Beach are Nahant’s largest barrier beaches. There is minimal development on these beaches: a Department of Conservation and Recreation (DCR) facility on Nahant Beach and a restored historic Life-Saving Station on Short Beach owned by the Town. However, housing has expanded in other exposed waterfront areas, and these are vulnerable to ocean storms. The north side of Nahant consists of high rocky cliffs, and homes there are generally built well above storm-damage level. The south side has mainly sandy shores and mudflats, as well as a sandy barrier beach and formerly marshy areas, and most of the severe storm damage to homes occurs on the south side.

The shoreline, wetlands, and other open spaces in Nahant provide passive and active recreational opportunities and support plant and animal life. These vital and fragile environments must be protected from further development.

### *B. Landscape Character*

Surrounded by the sea, Nahant has always been noted for its scenic beauty (see **Appendix 3, Map 7**: “Map of Nahant Past and Present”). The narrow causeway connecting Nahant to the mainland is bordered by a barrier beach to the east and a shallow bay to the west. After passing the rocky highland of Little Nahant and a second barrier beach, the main road reaches Big Nahant; here, winding drives offer a series of views alternately tranquil and dramatic as they follow the intricate coastline past rocky cliffs, sandy coves, and cobblestone beaches. Lobster boats anchor alongside recreational yachts in Nahant Harbor. Tidal mudflats stretch outward into Broad Sound on the

western side of the peninsula. The beaches, coves, and tidal flats are important recreational sites as well as vital areas for waterfowl, gulls, terns, and shorebirds.

The central lowland meadows are bordered by uplands, with scattered hills of less than one hundred feet in height. These include Little Nahant, Bass Point, Bailey's Hill, East Point, John's Peril, and the hillside overlooking Forty Steps Beach. Several of these hills have land sloping down to the sea.

The exposed cliffs at Little Nahant, John's Peril, Hood's Point, Castle Rock, East Point, Bailey's Hill, and other coastal sites present dramatic rock formations. East Point, one of the highest land elevations in Nahant, is a windswept grassy promontory offering an unrestricted view of the Boston skyline to the southwest and the expanse of open ocean to the east.

The island setting and its location on the Atlantic flyway for migrating birds make Nahant an important resting and feeding spot for landbirds, shorebirds, and waterfowl. The need to protect the shoreline and the remaining wooded thickets, fields, and wetlands is clear.

Although the Town is developed, there is very little commercial property, and housing consists primarily of single-family dwellings. There are no traffic lights in Nahant, and the Town Hall and Public Library constitute the "town center."

### *C. Water Resources*

#### 1. Watersheds and Drinking Water

Nahant is in the Boston Harbor Watershed, which includes 45 municipalities and over a million people. The water quality has dramatically improved in the past several years. Drainage occurs in subsurface patterns throughout the Town. Surface runoff and marshland drainage are present in the areas north and east of Nahant Harbor.

There are no aquifer recharge areas in Nahant. Nahant is part of the Massachusetts Water Resource Authority (MWRA) and receives its drinking water from Quabbin Reservoir.

#### 2. Freshwater Resources

There are no significant bodies of fresh water in Nahant. Bear Pond is located on the southern extreme of the central lowland meadows. Historically a coastal lagoon, it is now a series of small ponds within the Town-owned golf course. The ponds and surrounding lowlands are a significant recreational space and important to migrating birds as well. This area, which had already been radically altered through the years, was in danger of further destruction when it fell into the hands of a developer in 1988. Recognizing this area as an important resource, the citizens of Nahant had the foresight to purchase this property. This is the largest piece of open space in Nahant, and it includes fifty acres of wetlands (see **Appendix 3, Map 6: "Nahant Wetlands"**). The Open Space Committee and other conservation-minded citizens are committed to keeping as open space the remaining lowland meadows contiguous with the golf course.

Another significant wetland is located near the southwestern shore in the area of Willow Road and Wharf Street. Included in this wetland is the Massachusetts Audubon Wildlife Sanctuary, Nahant Thicket and other lands protected through conservation restrictions.

### 3. Saltwater Resources

The coastal waters of Nahant include Nahant Bay, Massachusetts Bay, and Broad Sound. These waters support commercial and recreational fishing and boating. Nahant Beach, Short Beach, and Tudor Beach as well as the many coves are used for bathing. The Massachusetts Department of Conservation and Recreation manages Nahant Beach. There is extensive public parking, and the beach is frequented by both local and regional visitors.

The highest standards of quality must be sought for the coastal waters, which are perhaps Nahant's most important resource. These waters have been subjected to contamination from commercial sources as well as sewage. The future quality of our shores will depend on vigilance and thoughtful planning.

#### *D. Vegetation*

##### 1. Historical Overview: Land Use and Vegetation Types

Today there are no forests, and there are no woodlands of significant size in Nahant, except perhaps for the overgrown tree-covered area atop and around the gun emplacements at the Bailey's Hill complex. The largest wetland area, extending from the Lowlands (the "Great Marsh," "The Meadows") ball fields to the southern extremity of the golf course, has been so altered over the past two centuries that it is difficult to visualize its original vegetative cover without recourse to historical documents and old pressed-plant collections. There are no "agricultural lands" unless one includes the lobster-harvesting grounds immediately offshore and the lobster-trap storage areas near the Lowlands ball fields. Nonetheless Nahant does contain within its small area a surprising variety of types of open space that are utilized as or suitable for conservation and/or active and passive recreation, including barrier beach, sandy shore, dunes, rocky shore, rocky highland, dry meadow, wet meadow, open and wooded wetland habitats, recreational parks and fields, and scenic landscapes. How the land has been settled and used has influenced the way it appears today.

In the early 1600s, Nahant was a heavily wooded peninsula connected to the mainland by an unstable sandy beach that itself may once have been part of an extensive, wooded wetland. A description of Nahant in *New England's Prospect*, a 1634 work by William Wood, hints at what the peninsula may have looked like in the early 1630s:

The next plantation is Saugus [i.e., Lynn],... This Towne is pleasant for situation, seated in the bottom of a Bay, which is made on one side with the surrounding shore, and on the other with a long, sandy Beach. This sandy beach is two miles long at the end, whereon is a necke of land called Nahant. It is sixe miles in circumference, well wooded with Oakes, Pines and Cedars. It is beside, well watered, having beside the fresh Springs, a great Pond in the middle, before which is a spacious Marsh. In this necke is store of good ground, fit for the Plow; but for the present it is only used for to put young Cattle in, and weather Goates, and Swine, to secure them from the Woolues.... (Lewis and Newhall [1890]:144)

Wood also enumerates—in the form of a short poem—the different species of trees found in the Lynn region, but does not differentiate between what is now modern Lynn and the surrounding areas that were originally a part of it. Alonzo Lewis, writing in the 1840s, further whets our interest in what once existed, and in what might have continued to be:

Most of the trees and plants common to New England, are found at Lynn, and some which are rare and valuable. The principal trees are white and pitch pine, white and red cedar, oak, walnut, maple, birch and hemlock. One of the most common shrubs is the barberry, the root of which is used in dyeing yellow, and the fruit is an excellent preserve. Many tons of sumach are annually gathered, and used in the manufacture of morocco leather. Whortleberries are very plenty in the pastures and many hundred bushels are annually gathered. Blueberries, raspberries, blackberries, and cranberries, are also common. The forests, fields, and meadows, are rich in the abundance and variety of medicinal plants, and the town [i.e., the greater Lynn area] presents a fine field for the botanist. (Lewis and Newhall [1890]:78-79)

After the arrival of European settlers, the trees on Nahant were virtually eliminated and the peninsula was used largely as pasture. In 1657, Lewis writes, an important decision was made at a town meeting in Lynn:

“It was voted that Nahant should be laid out in planting lotts, and every householder should have equal in the dividing of it ... and every person to clear his lot of wood in six years, and he or they that do not clear their lotts of the wood, shall pay fifty shillings for the towne’s use....”

This record is valuable.... [I]t furnishes an explanation of the cause and manner of Nahant being so entirely cleared of the beautiful wood which once grew upon it—and it shows that Nahant was early planted with English corn, that is, with wheat. (Lewis and Newhall [1890]:240-241)

The cutting of wood continued over the years. Finally, in 1698, after a “sore and long continued drought” in 1697 (and perhaps realizing the unfortunate consequence of cutting down too many trees?), the town of Lynn, in an ironic reversal of the 1657 decision, “ordered that no person should cut more than seven trees on Nahant, under a penalty of forty shillings for each tree exceeding that number” (Lewis and Newhall [1890]:298, 299).

In 1706, in a reorganization of the way in which property in Lynn was allocated, Nahant was officially divided into “ranges,” many of whose boundaries eventually became the streets that exist today (Lewis and Newhall [1890]:306-308; Wilson [1928] 1977:28-29; Paterson and Seaburg 1991:34-36). But Nahant remained largely unsettled until the early 1800s. By that time it had become a destination for short-term visitors, who were attracted by its scenery and recreational opportunities. As the number of visitors increased, boat landings were built, hotels and boarding houses went up, and homes were established by both summer and year-round residents. In 1823, the Nahant Hotel opened at East Point and operated until it was destroyed by fire in 1861; it was just one of many such establishments that existed in Nahant over the next century or more.

In 1825, after constructing his summer cottage in the center of town, Frederic Tudor began, with varying degrees of success, “what became a lifelong campaign to plant trees on treeless Nahant”:

Balm of Gilead trees were the first he planted, some 150 of them.... By 1832 he had 3,358 trees growing in his nursery.... Within two years he had some 4,000 trees in cultivation....

In the fall of 1834 he wrote a number of summer residents offering them these young trees ... for free if they would plant them on their properties.... Some did.... Soon he began to hope he would have all 4,000 set out. (Paterson and Seaburg 1991:131-132)

Fred A. Wilson, citing E. J. Johnson, describes this replanting of Nahant as follows:

Tudor's first effort in public improvement was to plant a row of Balm of Gilead Trees on each side of the main road from the hill near Short Beach to Summer Street. Prior to this William Wood and Thomas H. Perkins had planted elms from Summer Street to the Breed house, now the Whitney Homestead, along the main road. There are many trees, like the row of maples on Spring Road, planted by Mrs. J. P. Putnam, which were established in later years, but it may be said that the street trees of Nahant that are as old as Tudor's work here are the results of his efforts. This is especially true of the magnificent elms on Nahant Road. (Wilson [1928] 1977:61)

The "magnificent elms" were all destroyed by Dutch elm disease in the next century.

Tudor acquired and developed extensive properties to the west of his cottage:

[H]e owned a large portion of the western half of Great Nahant, and Fox Hill ... and other considerable areas on Bass Point. Among his holdings was the Great Marsh ... reaching from Short Beach out across what is now the Town Play Ground and Bear Pond.... Tudor built ditches through these marshes and made them largely usable. (Wilson [1928] 1977:63)

Here, and elsewhere, he planted several orchards, and the many apple trees that continue to sprout and grow throughout the Town could be part of this legacy. And in 1859 he began construction of an amusement park, the Maolis Gardens, which for a few years was a part of the tradition of entertaining visitors who came to admire the beautiful scenery.

As the Town's population grew and the land was bought up and developed, a debate evolved over access to the Town shoreline. Wilson cites a printed report of 1856 by a three-man committee appointed "to make investigations in relation to the rights of the town in the undivided and unimproved lands within its corporate limits" (Wilson [1928] 1977:205). Then, in 1859, at its annual meeting, the Town passed the following resolution:

Whereas the ownership and fee of the beaches, shore and strand surrounding the town, and also of the ground over which the highways were laid out ... are claimed as the property of the town, and whereas divers persons owning land abutting ... have obstructed the access thereto...;

Voted, That this town claims to be the owner in fee of the said beaches, shore and strand, and of the soil on which the said highways are laid out, subject always to the public rights....

That the town disputes and denies the right of any person or persons to the exclusive use of the said beaches, shore or strand [etc.] ... and also the right of any person or persons to exclude the public therefrom or from the use and enjoyment thereof.... (Wilson [1928] 1977:207-208)

Concerning the "Perimeter Path" (or "Cliff Path") on the northeast shore, Wilson says:

At the March town meeting in 1874 it was voted to build a plank walk around Mifflin's Point [probably Hood's Point, to the left/north of Bass or Forty Steps Beach] to connect with the one built by George P. Upham. Since that time the town has maintained this plank path and its protecting guard rails or fences. It has been suggested that the town lay out a town footway the entire length of this path as it now runs, from Bass Beach around to Stony Beach at the northeastern end of Summer Street, and thus insure it remaining a public path such as it has been for so long a time. The path long antedates the building of the plank walk, and reaches back so far that no one can discover a time when it was not used by the public.... (Wilson [1928] 1977:208)

(This "Perimeter Path" is the first of *two* such paths; "no. 2" traditionally runs between Swallow's Cave and Curlew Beach on the south coast.) A public path to and around East Point had also long been the subject of debate:

In 1865, on a petition of residents, including some summer residents, a road one rod wide was laid out all around the shore at East Point. At once arose a discussion as to the location and difficulties of building, which delayed construction so long that ... laying out was to be done over again. John E. Lodge [the owner of the property at East Point] died in 1862, but compromise overtures were made by his heirs.... [T]he town did not really want a road around the point but only a footpath access to it. It was proposed to cede a right of way between the two parts of the estate ... together with an adequately long path around the cliffs. This arrangement seems to have pleased everybody and was accepted. It was some time later that it was discovered that the town ... had given up a permanent way for a way existing only at the will of the owners.... A cure now, as for the path around Mifflin's Point, is to lay out a town footway, and again damages would appear to be simple, because no person has ever lived there without the existence of this public privilege.... (Wilson [1928] 1977:209)

In 1905 the Town purchased “the low land behind Short Beach for a public playground,” and, in 1906, “Marjoram Hill, near Tudor Wharf, for a park” (Wilson [1928] 1977:209). (Branches of the railway constructed in 1905 ran from the Lowlands to Bass Point and to Tudor Wharf; see also **Section 3B** above.)

As seen in the activities of Frederic Tudor, how the land was perceived and used has had a profound effect on the vegetation that has been established in a given area:

Tudor built ditches through the marshes he owned, both this playground and the marsh north of Bear Pond.... The land company [i.e., the organization set up to handle Tudor's estate] deeds for sales near these ditches have stipulated that the drainage is not to be hindered. The ditches still function, but need clearing occasionally. They accomplished their purpose, and both pieces of low ground are dry enough most of the time, though often holding a very wet condition late into the springtime. (Wilson [1928] 1977:210)

The establishment of nursery and estate gardens also may have had an influence on the character of the Town's vegetation. Paterson and Seaburg detail the activities of professional nurserymen at the turn of the nineteenth century to the twentieth, including Thomas Roland, who is said to have had twenty greenhouses in Nahant. Roland collected acacia trees as a hobby and grew them “in one of his Nahant greenhouses for fifteen years.” Many estates had private professional gardeners (Paterson and Seaburg 1991:339-340).

In walks around the Town through the seasons, one can see the legacy of earlier landscaping everywhere in the flowering shrubs and vines alone: Amur ampelopsis, Japanese barberry, bridal wreath, Deutzia, Forsythia, honeysuckle, lilac, matrimony vine, mock orange, privet, horticultural roses, multiflora rose, rugose rose (beach rose), rose of Sharon, Scotch broom, and Weigelia—to name a few.

It is clear that sightseeing, “passive recreation,” and the establishment of large estates have played important roles in how public and private lands in Nahant have been perceived and used. Something should also be said about the influence of organized outdoor athletic activity. The Nahant Golf Club “dates back to the early [18]90's”:

This [the Club's course] was laid out on the “Great Marsh,” starting from Emerald Street and continuing toward Bear Pond and westerly to Mitchell's Corner. After a few years the course was extended across Spring Road and up the hill west of the Maolis Club House. This was before this latter land was developed into house lots with the roads built as they now run. Still later, perhaps around 1910, this newer part was given up and the course continued for a while as it was originally. It was always a short course.... (Wilson [1928] 1977:355)

A golf club was reintroduced in August 1929, through the sale of bonds. Despite the Great Depression, the golf course continued in use to 1940, when military barracks were constructed on the “first hole of the Nahant Golf Club” (Paterson and Seaburg 1991:381-382, 398).

The first organized lawn tennis tournaments began in Nahant in 1874. In subsequent years, organized tennis, lacrosse, and baseball became popular pastimes. In the 1880s tennis courts and a baseball diamond were set up for the benefit of summer residents in the field in front of the Tudor house, and athletic activities became regular events there, involving both summer and year-round residents (Wilson [1928] 1977:360-362; Paterson and Seaburg 1991:185-195).

Thus, a pattern of land use can be seen to have evolved, and this has influenced the character of the Town’s vegetation: (1) The inland portions of the Town have been developed into residential areas and largely kept planted with lawns, shade trees, hedges, and flowering shrubs and vines. (2) Wetlands were largely drained and adapted to agricultural and then residential and recreational uses. (3) East Point and Bass Point, among other locations, were for many decades the sites of hotels and public amusements; long after the decline of the tourist industry, portions of these areas—namely Lodge Memorial Park and Bailey’s Hill—have remained as open space for passive recreational use by the public. (4) The construction of houses close to the ocean and the gradual natural deterioration of the high ground along the coast have made access difficult in places, but the less-frequented beaches and rocky coastline for the most part remain legally accessible by the public (via the “Perimeter Paths” and some streets that follow the old “range” boundaries). With the exception of very limited public facilities, a hotel on Nahant Beach, and the Coast Guard Station, there has never been permanent housing directly on the public beaches, although there is a long history of debate over public rights of way through private property to the ocean, and this debate continues today. (5) There is a long history of outdoor recreational activities, which have come to include boating, bathing, SCUBA diving, surfing, wind surfing, picnicking, fishing, tennis, baseball/softball, golf, birdwatching, walking, jogging, and general passive enjoyment of the natural surroundings.

## 2. Inventory of Plants and Plant Communities of Nahant Today

Few historical sources are known to this Committee specifically on the botany of Nahant and its environs. Two works by Cyrus Mason Tracy were consulted: “Noticeable Traits of the Flora of Nahant,” a very brief journal article published in 1858, and *Studies of the Essex Flora: An Enumeration of All Plants Found Growing Naturally within the Limits of Lynn, Mass., and Towns Adjoining...*, a monograph published in 1858 and updated in 1892. (See References, 4D.) There are also a few known pressed-plant collections containing specimens purportedly collected in Nahant (personal herbarium collections were once a widespread popular pastime). Many of the species in these collections exist in Nahant today, but a good number of beautiful or unusual ones also cannot be found—for example rhodora (*Rhododendron canadense*), pink lady’s-slipper (*Cypripedium acaule*), and possibly several other orchid species. If it can be properly documented that these specimens were collected *only* at Nahant, then in these collections we have a unique record of what the Town may have looked like and of all that has been lost in the course of the substantial human activity in Nahant over the past four centuries.

What follows is a description of sites thought to be of the greatest interest, selected from the “Inventory of Lands of Conservation and Recreation Interest” (see **Appendix 4**), with an emphasis on “natural” areas or public open spaces.

The plant listings below are of course incomplete, and are to be understood as a “serious amateur” effort. Most of the identifications are offered with confidence, but some are tentative—especially where some trees, shrubs, and vines are concerned. Where exact species were difficult to determine, only a general category is given (e.g., “aster,” “honeysuckle,” “maple,” “oak,” “pine,” “native wild rose”).

Most of the “central” portions of the Town (i.e., away from the coastal periphery) are developed as residential homes and Town and commercial buildings. The vegetation of these areas consists typically of lawns often bordered by or interspersed with common shrubs (e.g., barberry, Deutzia, Forsythia, privet), planted “street” trees (e.g., ash; beech; white birch; horticultural cherries; European chestnut; elm; hawthorn; linden; Norway, sugar, silver, and sycamore maples; oaks; pines), and native or introduced trees that are more-or-less “naturalized” throughout the Town (black/rum cherry, crabapple, black locust, red maple, and poplars).

**(a) Nahant Beach or Long Beach** (site no. **16**) is a sixty-six-acre stretch of barrier beach, managed by the Massachusetts Division of Conservation and Recreation (DCR), located between Little Nahant and the traffic rotary on the Lynn-Nahant boundary. It is used as a public recreational resource throughout the year, but especially during the summer. The beach itself is bordered all along its western side by a parking lot and causeway, and the causeway is separated from the tidal flats of Lynn Harbor by a retaining wall. The dominant species on the beach is American beach grass (*Ammophila breviligulata*), which helps to hold together the low sand-dune structure that runs the full length of the beach. Other notable species include seaside goldenrod (*Solidago sempervirens*); beach pea (*Lathyrus japonicus [maritimus?]*); white poplar (*Populus alba*); rugose or beach rose (*Rosa rugosa*); yellow goatsbeard (*Tragopogon pratensis*) (blossoming in early summer, at sunrise), and wormwoods, including the nonnative dusty miller (*Artemisia stelleriana*) (low, spreading, with pale, downy leaves). The first specimen of the latter to be “noted in eastern America was at Nahant ... in 1877” (Fernald 1900).

Of special interest in this location is the frequent year-round appearance of a locally abundant but globally very rare mutant algal species, *Pilayella littoralis*, which may at times cover large portions of the beach with a thick brown mat. Unsightly when it occurs in large blooms close to shore, and foul-smelling when it is buried in the sand and decomposes, it is otherwise apparently not harmful to humans and may possibly benefit some species of birds that frequent the seashore by containing small organisms that the birds feed upon.

The vegetation of Nahant Beach is generally a combination of native and introduced species acclimatized to a seashore environment, and there are a number of adventitious species that one can expect to find in places that have been disturbed or where the soil is poor. (“Disturbed” here is intended as a botanical term that means significantly altered from the original natural state.)

Nahant Beach is extremely important as a recreational resource for bathing and sunbathing in summer, and walking, jogging, kite flying, surfing, wind surfing, and occasionally clam digging (for which a permit is required) throughout the year.

**(b) Short Beach** (site no. **25**) is a six-acre sandy beach facing east between Little and Big Nahant. The Life-Saving Station (former U.S. Coast Guard Station and U.S. military recreational facility) (1.4 acres) stands about midway along the beach. The vegetation is predominantly grasses and adventitious herbaceous plants, interspersed with a few planted or naturalized trees, shrubs, and



vines such as Asiatic/Oriental bittersweet, bayberry, pine, beach plum (*Prunus maritima*), white poplar, rugose rose, and staghorn sumac. A few of the same sea-beach plants that are found along Nahant Beach (such as beach pea) and the beach at Lynn Harbor (see item **k** below) can be found along the stony margin between the sand and the high ground, and typically several kinds of adventitious plants along the beach at all levels (such as wild radish [*Raphanus raphanistrum*]). Of interest here in the spring is mossy stonecrop (*Sedum acre*) (yellow), growing in small mats on the cobblestones on the Little Nahant side; also, until they were effectively eliminated by regular mowing over the past decade, the colorful yellow dyer's greenweed (*Genista tinctoria*) and Deptford pink (*Dianthus armeria*) used to be seen throughout the high ground toward Big Nahant. The same *Pilayella littoralis* that periodically covers large portions of Nahant and Lynn Beaches also occurs at Short Beach in large quantity in the shallows and on the beach, mostly on the Little Nahant side. Downy Hudsonia (*Hudsonia tomentosa*), for which there is historical mention (e.g., by Tracy [1858] and by Wilson [1928/1977]), has not been seen at this site in recent years (but may possibly exist at Bailey's Hill).

Short Beach is heavily used in summer for bathing, sunbathing, and recreational boating. It is also a prime location for viewing migrating seabirds.

(c) The **Lowlands** (the "Great Marsh," "The Meadows") (not to be confused with an estate known by that name that once existed at East Point) is an extensive area of largely drained and filled wetland, located roughly between Short Beach to the north and Bailey's Hill to the south, and between the Johnson School to the west and Emerald Road to the east. Occupying some 59.31 acres, it is divided into the following sites: the Golf Course (site no. **4**) (27 acres), Flash Road Playground (site no. **5**) (1.4 acres), Lowlands Playground (site no. **7**) (0.5 acres), Lowlands Ball Fields (site no. **9**) (4 acres), Lowlands Open Space (site no. **10**) (25 acres), and Spring Road Basketball Court (site no. **13**) (1.41 acres). At the annual Town Meeting in April 2004, the townspeople approved the construction of a walking trail, a portion of which was to pass through this site. This section of the trail is now open to the public.

The Lowlands could be cited as a case study in the spread of invasive exotic plants: abundant here are Asiatic/Oriental bittersweet, Japanese knotweed, the tall *Phragmites* grass, and multiflora rose. (Purple loosestrife is also present, but only marginally.) The proliferation of these premier invasives may have some relation to the fact that a portion of the Lowlands was in decades past used as the Town Dump and is now set aside as a composting area for plant rubbish collected from around the Town. The dominant plant is the ubiquitously invasive *Phragmites*, which might not flourish as well as it does if the Lowlands had remained an undrained wetland. Trees here that have been identified (two or three of these somewhat tentatively) include black/rum cherry (*Prunus serotina*), chokecherry, cottonwood (*Populus deltoides*), black locust (*Robinia pseudoacacia*), pine, sycamore maple, tree of heaven (*Ailanthus*), and Bebb willow (*Salix bebbiana* Sarg.). Flowering herbaceous plants include many typical adventitious "weeds," such as burdock, rough-fruited cinquefoil (*Potentilla recta*), red and white clover, oxeye daisy (*Chrysanthemum leucanthemum*), gill-over-the-ground, Japanese knotweed, jewelweed (*Impatiens capensis*), purple loosestrife, garlic mustard, wild evening primrose, Queen Anne's lace, wild radish, ragweed, and multiflora rose. The nonnative yellow iris has been seen on the edge of the Lowlands ball fields. Among the natives, duckweed grows in the sluggish drainage ditches; groundnut (*Apios americana*), with its strange, hood-like blossoms, was observed along the rear access road to the Department of Public Works facility; and the late-summer Jerusalem artichoke

(*Helianthus tuberosus*), with its tall stalks and brilliant yellow flowers, has in recent years been seen in the area that, at this writing, is used for lobster-trap storage.

Rewarding discoveries of interesting plants and birds await the visitor to this newly accessible wetland resource.

(d) The ***northeast coast***, which includes the area running from John's Peril to Stony Beach (site no. 26), is characterized by rugged, difficult terrain and spectacular scenic views. Cobblestone beaches are nestled in small coves at the foot of cliffs, ledges, and, occasionally, retaining walls. Along the upper margins, grassy lawns and tangled underbrush meet bare rock ledge. Increasing vegetation combined with occasional erosion make the area from John's Peril to Ocean Street difficult of access. Much of the old stone wall below Marginal Road between Ocean and Hood Streets, built by Frederic Tudor in the last century, has deteriorated and in recent years has been amended with rock fill (the most recent work having been done in 1998).

Among the plants found here: Amur ampelopsis (*Ampelopsis brevipedunculata*) (grape-like, with clusters of waxy blue berries), asters, Canada Mayflower (*Maianthemum canadense*), blackberry/dewberry, crabapple (*Malus* sp.), seaside goldenrod, huckleberry (?) (*Vaccinium* sp.), beach pea (*Lathyrus japonicus* [*maritimus*?]), poison ivy, blunt-leaved sandwort (*Arenaria arteriflora*), Scotch lovage (*Ligusticum scoticum*), woodbine/Virginia creeper (*Parthenocissus quinquefolia*), and yarrow (*Achillea millefolium*). At the foot of the old seawall between Hood and Summer Streets is an intriguing little stretch of saltwater marsh, dominated by salt-marsh grass (*Spartina* sp.), with a number of interesting coastal marine plants such as glasswort (*Salicornia* sp.), seaside plantain (*Plantago juncooides*), silverweed (*Potentilla anserina*), seaweeds, and sedges (and one purple loosestrife, which has persisted for years).

This area, especially the portion bounded by Ocean Street to the west and Summer Street to the east, overlooks a part of Massachusetts Bay that is a significant resting and feeding area for migratory waterfowl, including Brandt (geese), loons, and a wide variety of sea ducks.

(e) The remnant of the ***Perimeter Path No. 1*** (site no. 28) runs along the coast from the north end of Summer Street to Forty Steps Beach. There used to be a well-defined footpath from beginning to end, but only vestiges of it remain, principally from Summer Street to where the path would intersect with Pleasant Street, if the latter were to continue through to the coastal rock ledge. Portions of this path have badly deteriorated; one former section, which used to run through a wooded hillside above the cobblestone beach facing Saunder's Ledge, was completely eroded away by the 1980s, leaving a huge bare slide that was finally amended with sculptured landfill in 1998. Plants in this area include asters, dwarf cinquefoil (*Potentilla canadensis*), seaside goldenrod, water horehound (*Lycopus americanus*), beach pea, *Phragmites*, beach plum (a large stand at Hood's Point), native wild rose, and yarrow.

Historically, and up until the generation that came of age in the 1960s and 1970s, this path was well used and was an important area for recreational walking and sightseeing.

(f) ***Forty Steps Beach***, historically known as Bass Beach (1.4 acres) (site no. 23), is a sand and cobblestone beach at the foot of a steep hill, between Hood's Point and Castle Rock. The periodically repaired wooden stairs that lead down to the beach from Nahant Road are all that remain of a stairway and boardwalk, the latter having once extended out to Hood's Point. A

number of severe storms since the 1950s have necessitated the construction of a jersey barrier at the upper margin of the cobblestones and extensive filling and resculpting of the hillside above.

There is a stand of *Phragmites* at one corner of the beach, but the dominant vegetation is short grass, on the hillside, which is being overtaken by small trees and shrubs, especially staghorn sumac. Plants here in recent years have included asters, hedge bindweed (*Convolvulus sepium*), crabapple, coltsfoot, oxeye daisy, euonymus, Jerusalem artichoke, hawkweed, black knapweed, motherwort, common mullein, oak, beach pea, *Phragmites*, beach plum, pokeweed, privet, and staghorn sumac. Once present but not confirmed since the storms of the early 1990s: common elder (*Sambucus canadensis*), water horehound, horsetail (*Equisetum* sp.), soapwort/bouncing bet (*Saponaria officinalis*), and swamp candles (*Lysimachia terrestris*)—most of these located near the *Phragmites* in a “miniature wetland” below the intersection of Nahant Road and Cliff Street.

Forty Steps Beach has been historically, and is today, a well-used bathing and sunbathing beach in summer, and is popular for viewing the scenery year-round.

**(g)** The area from **Castle Rock to Canoe Beach** (site no. **21**), along the seaward edge of Nahant Road, was amended with rock fill in 1998, and some of the plants that had been encroaching on the roadside have been cleared back, but in recent years, on or about the fences that have lined the road, there have been (and in some cases still persist) dyer’s greenweed, matrimony vine (*Lycium* sp.), poison ivy, native wild rose, rugose rose, staghorn sumac, the native trumpet creeper (*Campsis radicans*), and willow. On or about Canoe Beach itself have been seen seaside goldenrod (which does *not* cause the allergy known as “hay fever”), ragweed (which can), and wild radish.

**(h)** **East Point** (8.3 acres) (site no. **3**) could, all by itself, be the subject of an interesting historical study. Since the nineteenth century it has been the site of a major resort hotel, summer “cottages” and estates (including the estate of the senior Henry Cabot Lodge), and a U.S. Army Nike missile base, complete with underground bunkers and missile launching silos. Today, a good portion of East Point (including some of the underground bunkers) is occupied by the Northeastern University Marine Science Center (site no. **12**), which maintains much of the land as an undeveloped ecological study area. A winding, paved right-of-way leads up a hill to the Henry Cabot Lodge, Jr., Memorial Park, which occupies the former site of the Nike missile launching pad. A small section of this public park is reserved for formal monuments to Ambassador Lodge and to former Governor of Massachusetts and Ambassador to Italy John A. Volpe, who resided in Nahant during his last years. In the mid-1990s this section was transformed from a deteriorating paved “flattop” into a sculpted rolling meadow utilizing glacial till from the Deer Island outfall pipe construction project and covered with loam. Outside the path and fence circling the meadow, the hillside descends to rugged and picturesque rock ledges.

Residents and visitors come to the site regularly for walking, jogging, birdwatching, bass fishing, and viewing the magnificent scenery—the “passive recreation” for which this area is now being maintained, and for which a specific *Management Plan* was created by the Open Space Committee in 1998 (see **Appendix 1**).

In botanical terms, East Point could be described as typical of a “disturbed area”—an area where much of the natural vegetation has long since given way to human intrusions and then to the adventitious plants that typically arrive when formal human intervention wanes. Northeastern University maintains a spacious, well-kept lawn around its buildings, but from the lawn to the top

of the hills covering the old bunkers, the land has become a “battleground” where introduced locust trees and native staghorn sumac compete for supremacy with exotic shrubs like Asiatic/Oriental bittersweet and multiflora rose; this competition is beginning to engulf what may be the remaining legacy of the old estate gardeners: some of the black locust trees, two rows of rose acacia bushes on the access road, and at least two kinds of cultivated rose.

A variety of trees and shrubs can be found on the westerly (more-or-less inland) portions of the hillsides here, including black/rum cherry, crabapple, elm, oleaster/autumn olive (*Elaeagnus umbellata*), and pine. Circling the boundary of Lodge Park at the top one can find in abundance poison ivy, a native wild rose, rugose rose, staghorn sumac, and, tucked among the rock crevices overlooking the ocean, a few hardy stands of bayberry. Scarlet pimpernel (mentioned by Tracy in 1858) also flourishes in the rocks.

In the 1980s and 1990s, many herbaceous plants were seen along the public access road, at the top, and on the ocean-facing periphery of East Point, including *Antennarias*, asters (among them New England aster), black-eyed Susan, chickweed, several kinds of clover, wild cucumber, dock, dyer’s greenweed, daisy fleabane, goldenrods (including seaside goldenrod), hawkweed, everlasting pea, common milkweed, common mullein, Deptford pink, pokeweed, Queen Anne’s lace, yellow rocket, common St. John’swort, snapdragon (“butter-and-eggs”), yellow stonecrop, tansy, (bull) thistle, toadflax, wormwoods (*Artemisia* spp.), and yarrow. Some species, especially the succession-type “weeds,” have declined or not been seen since the installation of the new meadow. But there are also plants in the vicinity that manage to maintain a tenuous hold—for example, a small but tenacious stand of narrow-leaved cattail (*Typha angustifolia*) growing in puddles in the rock ledges.

East Point is a vital resource, both as a natural habitat for wild plants and migrating birds and as a passive recreational area for all the townspeople. A continuing problem here is the recurrence of sinkholes in the newly created meadow at the top, where the old missile silos were filled in.

(i) The **Massachusetts Audubon Sanctuary** (4 acres) (site no. 32) was originally established by the Audubon Society as the “Maple Swamp Wildlife Sanctuary” but is popularly known today as “the Sanctuary” or the “Thicket.” It occupies a tiny wetland area facing Willow Road at Curlew Beach. The red or swamp maple trees on the inland side give way to an open portion dominated now by *Phragmites*. (Some Townspeople over age sixty as of this writing may remember when the open portions in this general area used to be more wooded, containing a pond—and, before that, a time when some of the land was devoted to market gardening.) A scattering of native wild rose still grows in the tangled open space beyond the tall grass. Between the red maple woods and the tall grass is a line of shadbush/Juneberry (*Amelanchier* sp.), which becomes quite visible in early spring when their white blossoms appear against the leafless background. Other trees include elm, other species of maple and oak, euonymus (*E. europaeus* or European spindlebush), and at least one magnolia. The understory at this writing also includes greenbriar, matrimony vine, poison ivy, and possibly still some sweet pepperbush and highbush blueberry. Prominent herbaceous species include asters, blackberry/dewberry, goldenrod, Jerusalem artichoke, jewelweed, and stinging nettle.

The Sanctuary is a valuable resource for viewing birds, especially migrating songbirds, and it also includes a small but notable variety of native North American plant species. This might suggest that that the Sanctuary is one part of the Town that has retained some native-species

integrity, but plans at the Sanctuary's establishment included "initial work" consisting of "the cutting of trails, the removal of the storm-felled trees, and the planting of additional maples and of berry-bearing trees and shrubs" (Kelly 1949:[383]). In any case, the integrity that existed at the time of its designation as an Audubon sanctuary came to be compromised by interference with the historical drainage patterns, as evidenced by the dramatic increase over the years of *Phragmites*, which has become seriously invasive throughout. Within the past five years, the Sanctuary, bisected by a large drainage ditch, has become more accessible with the construction of a boardwalk and bridge, and the problem of pollution from stormwater runoff was addressed in a special project in which the Town, the Massachusetts Audubon Society, and Nahant SWIM (Safer Waters in Massachusetts) participated.

(j) **Bailey's Hill** (4.6 acres) (site no. 1) is a prominent south-facing rocky hill surrounded by ocean on three sides. Below it, to the north, is a flat, lowland park consisting largely of a mowed lawn, and, behind that, ensconced in the opposite hillside, are two sealed concrete military gun emplacements (only one easily visible) overgrown with locust trees. The prominent trees on Bailey's Hill proper include aspen/poplar, black/rum cherry, and pine. And there are still one or two beautiful specimens of flowering crabapple in the more formal park below. Shrubs include bayberry, Asiatic/Oriental bittersweet, native wild rose, rugose rose, and staghorn sumac. (Beach plum was once observed to attempt a foothold as well.) Herbaceous plants on either or both hills include asters, blackberry, chicory, rough-fruited cinquefoil, clovers, dyer's greenweed, goldenrod, hawkweed, wild evening primrose, Queen Anne's lace, common St. John'swort, snapdragon, a type of spurge (*Euphorbia* sp.), wormwood, and yarrow. At least one species of fern abounds in the rocks all around the eastern side of Bailey's Hill. And a strange herbaceous plant with pinkish blossoms suggesting a mutant soapwort has flourished in recent years at the foot of the hillside below the gun emplacement, facing the mowed lawn. Also, a plant that may possibly be downy Hudsonia (*Hudsonia tomentosa*), mentioned in Tracy 1858 and Wilson 1928/1977, was seen on the rock ledges in the summer of 2003.

Bailey's Hill commands spectacular views of Nahant Harbor, the Town Wharf, Lynn Harbor, and the Boston skyline. It is a popular area for walking, scenery viewing, and bass fishing. Within the past five years, the Open Space Committee and the Town have worked to resolve a number of problems such as graffiti on the gun emplacements, unauthorized clearing of trees and shrubs on the hillsides, gully erosion, and unauthorized entry by vehicles onto the narrow paved path to the summit. A *Management Plan* for Bailey's Hill was completed by the Committee and subsequently accepted by the Board of Selectmen (see Appendix 1).

(k) The sandy beach at **Lynn Harborside** (3.2 acres) (site no. 24), facing Lynn Harbor and running from Black Rock Beach to Little Nahant, is a virtual "botanical garden" for adventitious plants of seaside and disturbed places, especially clotburs, jimsonweed, saltwort and other goosefoots (*Chenopodiaceae*), and wormwoods, which flourish at this site. Possibly because of its deep sand and relatively protected western exposure, it seems to be ideal for producing remarkably healthy specimens of these species. Above this margin is a low-lying dune habitat covered by American beach grass; other species include barberry, Asiatic/Oriental bittersweet, crabapple, pine, poison ivy, rugose rose, and staghorn sumac. Noteworthy offshore here is eelgrass (*Zostera marina*), a flowering plant that grows submerged in salt water. It is in evidence when it washes up on the beach, sometimes in large clumps, but another indication of its abundance is the presence in this area, during fall and winter, of flocks of Brandt, which feed especially on eelgrass. Also, in the

early fall a few years ago, monarch butterflies were observed clinging to the branches of pine trees close to the nearby roads.

There are also, in various parts of the Town, common wayside plants and old, persistent backyard garden ornamentals that have escaped to the roadsides and open spaces and become naturalized, including asters of several kinds, bellflowers (*Campanula rapunculoides* and/or *C. americana*), bladder campion (*Silene cucubalus*), white campion (*Lychnis alba*), native wild columbine (*Aquilegia canadensis*) Asiatic dayflower, dock (*Rumex* sp.), various knotweeds or smartweeds (*Polygonum* spp.), garden loosestrife (*Lysimachia vulgaris*) (yellow), wild radish, dame's rocket, and cow vetch (*Vicia cracca*)—to give a small sampling. Then there are the fleeting “visitors” that have been seen briefly and photographed in isolated sites over the past twenty or more years, often as only one or a very few individuals, before they disappeared, such as blue-eyed grass (*Sisyrinchium* sp.), native wild geranium (*Geranium maculatum*), spiderwort (*Tradescantia virginiana*), native blue vervain (*Verbena hastata*), and viper's bugloss (*Echium vulgare*).

Nahant abounds in grasses, sedges, rushes, and lichens, but these (along with ferns and other non-flowering plants) are beyond the limited expertise of this Committee. The *Nahant Conservation Commission's Nahant Natural History Notes* (1969) contains some relevant discussions on mushrooms (Barbara Paine), lichens (I. Mackenzie Lamb), and benthic marine algae (I. Mackenzie Lamb and Martin H. Zimmermann).

### 3. Endangered Species / Species of Special Concern

In 1988 the Open Space Committee received a letter from the Massachusetts Natural Heritage Program concerning the possibility that historical records may indicate the existence in Nahant at some time of two very rare plants that were State-listed as “Species of Special Concern”: **seabeach dock** (*Rumex pallidus*) and **knotted pearlwort** (*Sagina nodosa*). Further investigation is needed to confirm the historical and current presence of these species; to date they have not been identified here by the present Committee. (For a copy of this letter, see **Section 10**. Public Comments.)

## E. *Fisheries and Wildlife*

### 1. Fisheries

The offshore waters of Nahant support fisheries of commercial and recreational importance. Lobster fleets recently recorded catches of more than 30 million pounds per year from Cape Ann to Plymouth. The finfish populations in Nahant waters include striped bass, bluefish, cod, flounder, mackerel, and pollack.

The tidal flats in Broad Sound are closed to clamming; however, the cleanup of Boston Harbor may some day make it possible for shellfish to be harvested. Sea urchins found in the offshore waters of Nahant are harvested commercially.

### 2. Birds of Nahant

Birds constitute the most significant wildlife of Nahant. The beaches and mudflats are a critical habitat for thousands of gulls and other shorebirds. In winter, the waters surrounding Nahant support most of the species common to New England waters including gulls, loons, grebes,

cormorants, geese, and large flocks of ducks. Many of the common breeding birds of Massachusetts nest in Nahant, and it is an important location for migrating birds. Known as a “migrant trap” due to its strategic insular location on the Atlantic flyway, Nahant is an important resting and staging area (Drury 1969). During the spring and fall large fallouts of migrants occur. The variety and number of passerines is impressive, and the number of shorebirds can be in the thousands. During the spring of 1983, for example, a research effort conducted by two nonprofit organizations, the Massachusetts Audubon Society and Bird Observer of Eastern Massachusetts, recorded seventy-six species of migratory landbirds in Nahant including twenty-two species of warblers. This plentiful and diverse birdlife constitutes an important dimension of the natural environment in Nahant. (See **Appendix 5**, “Birds of Nahant” and “List of Endangered, Threatened, and Special Concern Bird Species Occurring in Nahant.”)

In 2002 Nahant was designated an Important Bird Area (IBA) by the Massachusetts Audubon Society (Massachusetts Audubon Society 2000). This is a statewide initiative to identify and protect sites that contain essential habitat for one or more bird species. Nahant qualified on two criteria: a site regularly holding significant numbers of endangered/vulnerable species and a site where birds concentrate in significant numbers. The IBA concept was developed in 1985 as a model for international bird conservation and now involves over one hundred countries and thirty-two states.

In addition, Nahant has been included in the International Shorebird Survey (ISS), an international effort to monitor shorebird populations, which have been dramatically declining in recent years (Manomet Center for Conservation Science 2005). Nahant was chosen because of the thousands of shorebirds that depend on Nahant for food and rest during their dramatic migration between northern breeding territories and the far reaches of South America.

### 3. Endangered, Threatened, and Special Concern Bird Species

Nahant is an importance resource for many conservation priority species listed by the State of Massachusetts. (See **Appendix 5**, “Birds of Nahant” and “List of Endangered, Threatened, and Special Concern Bird Species Occurring in Nahant.”) Some of the high priority birds included in this list are species that may be familiar to the casual observer in Nahant such as Common Tern, Parula Warbler, and Blackpoll Warbler. Another bird found in Nahant, the Roseate Tern, is at the highest level of concern and listed as endangered at both the state and federal levels.

### 4. Non-avian Wildlife

Harbor seals can sometimes be seen swimming along Nahant shores, and at low tide the seals crowd each other on exposed rocks. Muskrats inhabit the extensive wetlands, and although most of the land in Nahant is developed, typical suburban wildlife is present. Along with an abundance of gray squirrels there are also skunks, opossums, woodchucks, raccoons, red foxes, rats, mice, garden snakes, salamanders, and skinks. The rocky and sandy shores, mudflats, salt marshes, and eelgrass beds support a variety of crustaceans, sea worms, and larvae of marine organisms. This Committee has not fully investigated non-avian wildlife species that may be listed by the state as conservation priority species.

## 5. Biodiversity

Under the guidance of the Nahant Open Space Committee, the Town has participated in the Massachusetts Biodiversity Survey, and Nahant's data is now part of the state's biodiversity "Biomap" (Massachusetts Association of Conservation Commissions 2005). Although Nahant is small and heavily populated, the abundance of birdlife and the richness of its shoreline contribute significantly to its biodiversity.

### *F. Scenic Resources and Unique Environments*

#### 1. Scenic Landscapes

Under the leadership of the Open Space Committee, during 2005 Nahant participated in a statewide program conducted by the Department of Conservation and Recreation and the Essex National Heritage Foundation to identify the community's "Heritage Landscapes." With public participation the landscapes important to our community were identified and surveyed. Methods to protect and preserve these landscapes were published in a book that is available at the Nahant Public Library, and electronically on the Town of Nahant Web site.

Despite its small size, Nahant is blessed with abundant scenic resources and unique environments (see **Appendix 3, Map 7: "Map of Nahant Past and Present"**). **East Point**, at the eastern extremity of the peninsula, is, despite its small area, a scenic gem with its steep cliffs and its spectacular view north to Marblehead and Cape Ann and south to Boston, Hull, and beyond. At **Bailey's Hill**, another prominent high point of land overlooking the ocean, vegetation has been allowed to revert to a more natural state, except for a paved path to the top of the hill. In the open field at the base of the hill is a gazebo, the Sears Pavilion, which is used for summer concerts.

The small and picturesque **Nahant Harbor** is ideally situated in a sheltered cove. The harbor supports a fleet of sailboats and a program of instruction in the art of sailing for Nahant youth and adults. Yacht racing has a long tradition in Nahant, with regattas sponsored by the Nahant Dory Club having been established around 1894.

The two largest barrier beaches in Nahant, **Long Beach** and **Short Beach**, are spectacular flat sandy beaches enjoyed by beachgoers and are an important resource for birds.

With enthusiastic support from citizens and Town officials, the Nahant Open Space Committee is developing **Heritage Trail**, a passive recreational trail from Little Nahant through the central lowland meadows to Bailey's Hill. Expansion of this trail is being planned, so that additional walks will take in sites of cultural, historical, and architectural interest (see **Section 4F3** below).

The Town-owned **Kelley Greens golf course** provides a more directed recreational opportunity. The largest inland open space in Nahant, the golf course represents a successful effort by Nahant citizens and officials to save this wetland from further development.

Nahant is fortunate to be the home of the **Northeastern University Marine Science Center**, located at East Point. Through their research on the surrounding ocean and the life that it supports, the scientists working at the Center have made the offshore waters of Nahant one of the most thoroughly studied marine environments in Massachusetts. The Center's laboratory is a local, regional, and national asset.



## 2. Geologic Features

### **Appendix 3, Map 5: Surficial Geology of Nahant**

Almost an island, Nahant is connected to the mainland at Lynn only by its causeway, a natural tombolo or sand spit. Tombolos are relatively rare in nature (another famous example is found in Hong Kong). During severe storms, the causeway tombolo is sometimes flooded, cutting off transportation to the mainland and making Nahant virtually an island. During storms of even greater severity, Nahant may for a time become two “islands,” divided at its second tombolo connecting “Big Nahant” and “Little Nahant” (Dennen 1969).

Nahant is situated on the dividing line between the predominantly rocky northern shore and the predominantly sandy southern shore of New England. Because of its unique location and despite its small land area of little more than one square mile (above the high-water mark), Nahant either includes or is bounded by all the major marine coastal habitats: sandy beach, rocky shore, saltwater marsh, marine mudflat, and eelgrass bed.

Nahant Beach and Short Beach are broad, sandy, barrier beaches with Broad Sound on the western side and the open ocean of Massachusetts Bay on the eastern side. At Forty Steps Beach, the view in the wake of ocean storms is one of surf pounding against the impressive rock formations at Hood’s Point and Castle Rock.

The Precambrian fossils found at East Point in the vicinity of Lodge Park are extremely rare (described in **Section 4A**). The Cambrian era, some 570 million years ago, was originally considered the first geological era in which life existed. After further exploration and research, it was discovered that some fossils appeared to predate this period—before life was supposed to have existed—so there was nothing left to do but label these fossils as “Precambrian.”

## 3. Cultural, Ecological, and Historic Areas

Throughout its history, people have been attracted to Nahant by its stunning geography—cliffs and beaches, hills and lowlands, all surrounded by the sea.

For millennia, Nahant was appreciated by Native Americans, who fished and summered here. It was possibly Nahant where a Norseman named Thorwald came ashore in A.D.1004, saying, “Here it is beautiful and here I should like to fix my dwelling” (Wilson [1928] 1977:16). By the early 1600s European settlers were grazing their livestock and fishing in Nahant, and later in the same century they erected dwellings here and began mining gabbro from “Black Mine” (near the northeastern end of Summer Street). This rock was used as flux at the Saugus Iron Works. In the 1700s Nahant was inhabited by a small number of colonists, hosting visitors who came to enjoy the natural beauty of the island, especially during the summer. Hotels and summer cottages flourished in the 1800s as more people came here to refresh themselves by, and in, the sea. Poets (Henry Wadsworth Longfellow), naturalists (Louis Agassiz), and statesmen (Henry Cabot Lodge, Sr. and Jr.) strolled the beaches, hills, and Cliff Path, studying or writing about the natural wonders of Nahant.

The twentieth century brought tremendous growth in the number of year-round residents; most of the townspeople now have their principal or only residence here. Residents appreciate Nahant for its beaches, parks, fields, the Town Wharf, Bailey’s Hill, Swallow’s Cave, East Point, the

Thicket, and the town's historic buildings and sites. The Post Office, Town Hall, Public Library, Henry Cabot Lodge Villa, Ellingwood Chapel, and Greenlawn Cemetery are on the National Register of Historic Places.

A Heritage Trail, currently being developed by the Nahant Open Space Committee, will eventually include both a nature trail and a village trail highlighting our heritage landscapes and our historic landmarks. The publication "Heritage Landscape Reconnaissance Report," available at the Nahant Public Library, identifies those landscapes deemed important to the character of our community by the citizens of Nahant.

#### 4. Areas of Environmental Concern

Nahant has no state-listed Areas of Critical Environmental Concern. However, the Committee is reviewing criteria for this status. Nahant is an important site for migrating birds, and for the monarch butterfly. The Massachusetts Audubon Society recognized this fact when it established the Maple Swamp Wildlife Sanctuary, now known as the "Thicket." In 2002 Nahant was designated an Important Bird Area (IBA) by the Massachusetts Audubon Society (Massachusetts Audubon Society 2000). This is a statewide initiative to identify and protect sites that contain essential habitat for birds. Nahant qualified on more than one criterion: as a site regularly holding significant numbers of endangered/vulnerable species and as a site where birds concentrate in significant numbers. The IBA concept was developed in 1985 as a model for international bird conservation and now involves over one hundred countries and thirty-two states (see **Appendix 5**: "Birds of Nahant" and "List of Endangered, Threatened, and Special Concern Species Occurring in Nahant").

### *G. Environmental Problems*

#### 1. Hazardous Waste Sites

There are no documented hazardous waste sites in the Town of Nahant.

#### 2. Landfills

An old, inactive landfill site located off Spring Road is currently used as the Town composting area.

#### 3. Erosion

Erosion is an ongoing process in Nahant. The Town is built on a group of three large masses of bedrock called Nahant Gabbro, connected originally by sand spits and natural marshland, much of which is now filled or otherwise altered. The topography has sometimes changed during storms, and this is a problem in locations where houses have been built in the "soft" areas between the gabbro hills. Some portions along the northern coast between John's Peril and Forty Steps Beach have seen considerable erosion. This has been a problem especially along the "Perimeter Path" between the eastern end of Summer Street and Forty Steps Beach, and where roads or paths follow close to the ocean (e.g., Marginal Road between Ocean and Hood Streets, and Nahant Road between Cliff Street and Swallow's Cave Road). The south side of the Town is also subject to erosion in low-lying areas.

#### 4. Chronic Flooding (Appendix 3, Map 11. Flood Hazard Zones)

There is a pond at the southern end of the Kelley Greens golf course, beyond which is a barrier beach and a breakwater, constructed by the U.S. Army Corps of Engineers, protecting low-lying land from the ocean. During severe windstorms, water flows over the barrier beach and breakwater, causing flooding not only of the golf course but also of residential houses built on the low-lying adjacent land. The houses along lower Willow Road bordering the barrier beach and those along Bass Point Road frequently sustain severe damage during ocean storms. Another area of frequent storm damage is along Castle Road, lower Fox Hill Road, and Ward Road where houses have been built in what was originally marshland (see **Appendix 3, Map 6**: “Nahant Wetlands”). Much hardship and expense could have been avoided if houses had not been built in these areas.

#### 5. Sedimentation

Much sedimentation takes place in Lynn Harbor, and the channels to Lynn Harbor and to the Saugus River (e.g., the western channel) are periodically dredged.

#### 6. Impact of Development

One of the challenges that Nahant faces is to keep the number of residents and residential structures at a level that does not overwhelm its resources. Nahant, with an area of a little over one square mile, has a population of almost four thousand while nearby Winthrop, with one and a half square miles, has a population of seventeen thousand people. This kind of overcrowding could happen to Nahant. A related challenge for Nahant is the preservation of open space as the density of structures increases. Conservation restrictions are needed to help with the issue of density. Of particular importance are the areas around East Point, Bailey’s Hill, the lowlands, the Thicket, and the golf course.

Fortunately, the Townspeople of Nahant have been vigilant in preventing multiple-unit housing. Over the years, proposals for the construction of multiple-unit housing have been so frequently defeated at Town Meetings that few such proposals are offered any more. The Town has not been as successful in preventing overdevelopment, however. Without the imposition of a moratorium, many more lot subdivisions will occur (see **Section 3D**: “Growth and Development Patterns”).

Storm damage is a perennial problem facing Nahant. The seawalls along Willow Road at Tudor and Pond Beaches were built to protect the homes in this flood zone. It is questionable, however, if they will be effective for this purpose in the long run because the seawalls interfere with the natural barrier-beach environment. During major storms many rocks are forced up to the walls and remain there, covering the sandy beach. Under natural conditions, these rocks would pile up beyond the area occupied by the seawalls, leaving the beach intact and forming a barrier to storm damage as they do at Short Beach (see **Appendix 3, Map 1**: “Coastal Zone Management—State-designated Barrier Beaches”).

#### 7. Ground and Surface-water Pollution (Point and Nonpoint)

The thirty-odd private (home) sewage outfalls that used to exist in Nahant were closed years ago, and today all Town sewerage is sent under the causeway to Lynn, where the Lynn-Nahant-Saugus-

Swampscott sewerage treatment plant gives secondary treatment to Town wastewater (see **Section 3D(2)(c)** above).

Stormwater runoff, however, is a continuing problem. The catch basins that exist in some areas are not sufficient to control the volume of water. As a result, runoff from the streets goes directly onto Tudor Beach, other beaches, and surrounding areas. Part of this problem involves dog waste: although there is a “pooper-scooper” ordinance requiring that dog owners clean up after their pets on the public ways, it is not always obeyed.

One area in particular where storm runoff had been a problem is the Massachusetts Audubon sanctuary, the “Thicket,” which was polluted by water from Wharf Street and other adjacent ways. With the cooperative efforts of the Town and the Massachusetts Audubon Society, which owns the Thicket, this problem was solved after a grant was obtained and a joint project addressing the problem was completed.

## 8. Ocean Water Pollution

Because Nahant is a peninsula that extends more than two miles out into the ocean, it is particularly vulnerable to pollution from surrounding sources. The creation of Safer Waters in Massachusetts (SWIM) in 1984 was sparked by the discovery that Lynn had a tentative waiver to release inadequately treated sewage into Broad Sound, south of Nahant. As a result of vigorous campaigning, the Secondary Sewage Treatment Plant was activated in 1991 to treat wastewater from Lynn, Nahant, Swampscott, and Saugus. To complete this process and to ensure that our waters remained clean, SWIM fought for Secondary Treatment and effective cleanup plans for Greater Boston and Salem.

In April 1998, at an EPA-sponsored public hearing at the Nahant Town Hall, vigilant Townspeople rejected a proposal to take contaminated dredging spoils from Boston Harbor and dump them between the Boston sewage outfall site and East Point, Nahant. (The proposal was subsequently tabled; a similar hearing was conducted in Salem in July 1999, with a similar outspoken citizen response.) The Town of Nahant and SWIM continue to work to protect the ecology of Nahant Bay, Lynn Harbor, Boston Harbor, and Massachusetts Bay.

The effective monitoring of the various sewage outfalls and of the quality of the waters around Nahant is a continuing concern. Data relating to the effects of the Greater Boston sewage treatment plant located at Deer Island and the sewage outfall are collected and published by the Massachusetts Water Resource Authority (MWRA). Additionally, the Outfall Monitoring Science Advisory Panel (OMSAP) (<http://www.epa.gov/ne/omsap/2006>) has a big role in the monitoring process, as does the Public Interest Advisory Committee (PIAC), which is also listed on the Town’s Web site. Fortunately, with Northeastern University Marine Science Center located in Nahant, we are learning more about the ecology of our marine environment, giving our attempts to protect Nahant from pollution a scientific foundation.

A recent proposal to open the coastal flats in Lynn Harbor to clam digging is being investigated by the Town and the Massachusetts Bays Program of the Massachusetts Office of Coastal Zone Management. Monitoring done on a regular basis by the Town suggests that it might be possible to open the flats. Although the Commonwealth regularly tests clam-digging flats that are already open, to see if they have been contaminated, it does not have the funding to test closed

flats that potentially could be opened. Therefore, in order to open the flats, the Commonwealth will have to be persuaded to change this self-defeating policy.

Nahant is vulnerable to small oil spills that come from boats and from the illegal dumping of crankcase oil into street drains. Boat owners are supposed to empty sewerage from their holding tanks at designated pump-out stations, but they do not always comply with the law. More careful observance of the law would help ameliorate Nahant's water pollution problems.

Oil spills are a potentially serious problem for Nahant because of its proximity to major channels of delivery of oil into Boston, Lynn, and Salem. Nahant is working to set up an Oil Spill Contingency Team with the assistance of the U.S. Coast Guard, so that the Town would be prepared in the event of an oil-spill emergency.

Liquefied natural gas (LNG) is transported in tankers along ocean routes that are all too near Nahant, and should there be a spill from one of these tankers—or, for that matter, a rupture of the liquefied natural gas storage tank adjacent to the Nahant causeway—the escaped liquefied natural gas, which is heavier than air, could spread out over a large enough area to blow up the entire square mile occupied by the Town of Nahant. Very few people seem to be concerned about—or even aware of—this potentially very serious problem. Currently there is increasing concern about several LNG terminals proposed for location in this region. At least two proposals involve offshore LNG off-loading sites near Gloucester. Hearings were held in the fall of 2006 to consider the authorization of these projects, with the permitting process to be completed by January 2007. The projects would entail the digging of trenches just outside the western boundary of the Stellwagen Bank national marine sanctuary—in an area known to contain a considerable number of half-century-old containers of toxic, including radioactive, waste. Moreover, increased traffic of huge LNG tankers in this vicinity poses a very real danger to a number of species of whales that regularly navigate through this coastal region, including the highly endangered right whale. The Nahant Open Space Committee, SWIM, and other groups have joined forces to oppose these proposals.

Working toward a regional policy as well as local initiatives to ensure that gas and oil are transported safely is important to the protection of Nahant's environment. Development of alternative sources of energy is a long-term solution to this serious environmental issue.

## 9. Air Pollution

Air pollution is a serious problem, not only for the ambient air in Nahant but also for the waters surrounding Nahant. Approximately a third of the pollution in the ocean comes from pollution in the air (roughly another third comes from point sources and another third from rivers and nonpoint sources). Most of the air pollution problems in our area could be characterized as energy problems. There are efforts under way to clean up the coal-fired power plants that are one of the major sources of air pollution. The old power plants were grandfathered when the Clean Air Act was written in 1970, so that only new power plants were required to make use of the latest technology. The assumption was that in thirty years these power plants would be cleaned up, but they remain a serious threat to air quality. The most significant source of air pollution is motor-vehicle exhaust. Any effort to encourage alternative energy sources, either for electric power or for automobiles, would help alleviate both air and water pollution.

## 10. Noise Pollution

Nahant is subjected to excessive noise from aircraft taking off from Logan Airport in East Boston. Massachusetts Port Authority (MassPort) noise-abatement rules require planes to maintain a runway heading until they reach Revere Beach, then turn to the right and head over the middle of the Nahant Causeway. From there they are supposed to continue well past Nahant before turning south. This plan prevents aircraft from flying directly over any populated area in Nahant. Unfortunately, many planes take a shortcut, often causing them to fly right over the Town at low altitudes, thereby reducing their flight time by a few seconds but also creating frequent severe noise pollution for Nahant residents. If the airlines obeyed existing regulations, the Town would not have a noise pollution problem.

The Nahant Airport Noise Abatement Committee has met with Massport, the FAA, pilots, and the Logan Airport control-tower staff to encourage them to comply with the rules. Although that committee has been somewhat successful in helping airport officials to recognize, and in some instances reduce, this serious problem, airplane noise continues to be a problem at certain times of day. Since MassPort is still unable or unwilling to enforce its own noise abatement rules, the new runway at Logan Airport is cause for increased concern.

Recently, especially during the summer season, the very loud noise of speedboats off local beaches has become a considerable annoyance to many beachgoers and to residents throughout Nahant. The Town should consider ways to impose restrictions to minimize this unnecessary disturbance.

## 11. Other

Development has brought with it population pressures on local wildlife, especially birds. Recreational use of our beaches is a constant threat to the survival of shorebirds, especially terns. The Committee will pursue an educational program with the Massachusetts Audubon Society, including signage to inform beachgoers about the sensitive times of the year when disturbance should be kept to a minimum. It is possible for beachgoers and birds to share the beach. Birds as well as other beach denizens can enrich our experience of the shore. Jet skiers and speedboat operators should be educated concerning the impact of careless driving through flocks of seabirds. Some of these flocks contain young chicks, which cannot avoid deadly impacts.

Nahant has a large population of outdoor and feral cats that kill numerous birds during migration. The Town program to control the feral cat population through capture and neutering is no longer in place. This program should be reinstated since without some control the population will increase exponentially, resulting in starvation and suffering for these poor animals and the deaths of many birds. In addition, an educational outreach program may be useful to encourage responsible pet ownership.

## SECTION 5. INVENTORY OF LANDS OF CONSERVATION AND RECREATION INTEREST

An investment in the protection of these resources improves the quality of life of all who use them. It is important that Nahant's unique quality as a small-town place of seaside beauty and recreational opportunity for residents and visitors be preserved.

Utilizing the "Open Space Inventory" that was included in its 2001 Plan, the Open Space Committee conducted a reappraisal of the Town's open space, recreation land, Town-owned land, and privately owned land in a natural state. The results of this reappraisal may be found in **Appendix 4** in an "Inventory of Lands of Conservation and Recreation Interest: Matrix," along with a detailed "Description of Sites" (describing suitable activities, location, access, and condition) and a "Map of Sites."

In addition to the offshore island Egg Rock, there are currently only three areas in Nahant that are protected in perpetuity: Nahant Beach, the Mass Audubon Thicket, and the Bangs Trust on Summer St. A fourth parcel, the Lodge Grant, a triangle of land at the entrance to East Point, is possibly protected. Other areas, including Lodge Park and the golf course, are used for open space / recreational purposes. These areas do not benefit from legal protection such as a conservation restriction; however, they are afforded limited protection through zoning (see **Appendix 3, Map 8: "Open Space by Ownership"** and **Map 9: "Open Space by Level of Protection"**).

In addition, there are a few privately owned parcels in a natural state that may be appropriate for permanent protection as open space. The Open Space Committee intends to explore the options for protection and discuss them with landowners.

The following excerpt from *The Open Space Planner's Workbook*, prepared by the Executive Office of Environmental Affairs, describes types of protection:

Land is considered protected if it is owned by the town's Conservation Commission or Water Department, one of the state's conservation agencies (thereby covered by Article 97), a nonprofit land trust, or if the town received state or federal funds for the purchase or improvement of the property. Private land is considered protected if it has a deed restriction in perpetuity, if an Agricultural Preservation Restriction has been placed on it, or if DEP has placed a conservation restriction on it as part of the Wetlands Conservancy Program.... Land owned by other agencies (local school department, Department of Defense, Department of Corrections, etc.) is not protected; it can be sold for development with ease. (Executive Office of Environmental Affairs 1993:16)

Based on the description of levels of protection in the paragraph above, the Open Space Committee has developed the following categories for its "Inventory of Lands of Conservation and Recreation Interest: Matrix" (see **Appendix 4**):

1. Perpetuity: Public or private land that by law cannot be sold or converted to uses inconsistent with keeping the land in a natural state.
2. Limited: Public or private land zoned "natural resource." This land is somewhat protected by zoning law, but, since the Town could change the zoning designation, the legal protection cannot be considered complete. This category also includes lands protected by conservation laws.
3. None: Public or private land that has no protection from development.

The Open Space Committee has written *Management Plans* for Lodge Park and Bailey's Hill (see **Appendix 1**) to ensure a unity of purpose among this Committee, the Board of Selectmen, the Town Administrator, the Department of Public Works, and other official Town bodies concerning the future of these open spaces. Other open space areas in Nahant, such as the Lowlands, would also benefit from similar Management Plans, and this Committee intends to work to move this project forward.

***Handicap Accessibility.*** In 1986, the Town's Handicapped Access Study Committee completed a survey of handicap accessibility to public buildings, and it was found that the Town's public buildings were in compliance with the Americans with Disabilities Act. A compliance program was instituted for playgrounds and playing fields, and curb cuts were installed as street repairs were made.

**Appendix 6** contains a handicap-accessibility evaluation, updated November 2007, for all Town-owned and Town-managed recreation and conservation land that is open to the public (A. Section 504 Self-Evaluation). This includes a description of handicap access to Nahant's recreation programs and a list of selected recreation and open-space sites, stating the changes planned so that disabled individuals can be better accommodated. Appendix 6 also contains important related documents: an official statement that the Town of Nahant is in compliance with applicable accessibility laws and regulations (B. Compliance Statement), an official grievance procedure (C. Town of Nahant, For the General Public, Equal Access to Facilities and Activities), and an official statement on nondiscriminatory employment practices (D. Town of Nahant, Notice of Non-Discrimination).



## SECTION 6. COMMUNITY VISION

### *A. Description of the Process*

The Committee has found the process of updating the Open Space Plan to be rewarding and informative. It was through research in the preparation of the 2000 *Plan* that the Committee recognized that the Heritage Trail could be built entirely on Town-owned land.

The committee started this 2007 update by reviewing the goals from the 2000 *Plan* and discussing the current relevance of each one. This was an opportunity to recognize the Town's accomplishments as well as the areas where more effort is needed. The statement of what the Nahant community should be, in both ideal and practical terms, was derived (a) from existing development policies, (b) from the 1999 "Open Space Survey of the Townspeople of Nahant," and other more recent public input, and (c) from observations by this Committee. The Committee considered all these factors in its review of community goals.

After this review, the Committee established priorities for future goals.

#### 1. Development Policy

In 1986, the Nahant Planning Board identified those parcels of land owned by the Town of Nahant, the Department of Conservation and Recreation (DCR), Northeastern University, the U.S. Government, the Massachusetts Audubon Society, and other private institutions that were "committed to open space use" (Nahant Planning Board 1986:13-15). It was noted that any new residential or commercial development that might take place "should preserve or enhance those things which form the unique character of the Town," since "Little land is left in the Town to support new development" (p. 24). In its guidelines for any new development, the Board stated:

The local "quality of life" appears to be rated quite highly by Nahant residents. New development should preserve and strengthen those qualities that make Nahant an attractive place to live. New development should maintain traditional public access to or along the shoreline. Development which increases and encourages coastal access will best serve local objectives. Scenic views from public ways and existing developments should be treated considerably in the location and design of new development. The environmental impacts of new development should be positive, not negative. *Wetlands, open areas important for wildlife habitat, valuable trees, unusual geologic features, and other natural assets should be preserved.* (p. 25; emphasis added)

The most recent *Zoning Bylaws* of the Town of Nahant, specifically Section 4.10, "Uses Permitted in a Natural Resource District," specifies the purposes, uses, and prohibited uses of a Natural Resource District. In the explicit enumeration of the "uses" of such a district, the recognition of the fundamental value of open space is implicit:

1. The preservation and maintenance of protected wildlife and wetlands resource areas and habitats.
2. The protection of the Town against the costs which may be incurred when unsuitable development occurs in swamps, marshes, along water courses, in areas of high impact due to overcrowding of land and undue concentration of population, or on slopes subject to erosion.
3. To preserve and increase the amenities of the Town and foster enjoyment of its remaining natural resources as recreational values.

4. To conserve natural conditions, wildlife and open space for the education, passive and active recreation and general welfare of the public.

## **2. Public Participation**

### **(a) 1999 Community Survey**

The results of the Open Space Survey conducted by the Open Space Committee initiated in January 1999 are listed in **Appendix 2**. Out of the 1,800 Survey forms distributed, 258 were returned. There were specific questions and an area for comments. Most of the people who responded were homeowners (82 percent), and most had lived in the Town for more than twenty years (60 percent). In the section where people were asked to “circle the appropriate response,” an overwhelming appreciation of the value of open space was apparent:

- Ninety-two percent recognized the importance of open space for the protection of flood plains and wetlands and the enhancement of environmental quality through the conservation of plants and wildlife.
- Five areas were the most frequently visited: Short Beach; Henry Cabot Lodge, Jr., Memorial Park / East Point; Forty Steps Beach; Bailey’s Hill; and Marjoram Park. (The reasons are not specified, but these areas can all be characterized as spacious, accessible to the public, and offering spectacular scenery.)
- The activities most often engaged in included walking, ocean watching, swimming, bicycling, using playgrounds, and picnicking. Items given high or medium priority for improvement included walking paths in natural areas; conservation areas; playgrounds; places for swimming, birdwatching, and nature study; jogging and bike paths; ball fields; and picnic areas.
- Ninety-five percent or more wanted to see at least some emphasis on the protection of open space and general aesthetic quality; on environmental conservation (e.g., of wetlands, wildlife, and natural areas); on the management of existing open space and recreational areas; and on public access to the shoreline or to natural areas. Eighty-five percent wanted to see more emphasis on public rights of way.

### **(b) Public Meetings, Walks**

**Bailey’s Hill.** The Committee met with the Friends of Bailey’s Hill, a community group, and discussed with them the Committee’s Plan for the management of Bailey’s Hill. The ideas of the group were incorporated into the Plan. The “Management Plan for Bailey’s Hill” was approved by the Nahant Board of Selectmen.

**Heritage Trail.** The Committee met with the Nahant Golf Course Committee, the Nahant Planning Board, the Nahant Recreation Commission, the abutters to the Heritage Trail, members

of the Nahant Preservation Trust, and members of the Little League program and obtained their input regarding the Heritage Trail. Town officials, including the Town Manager, the Selectmen, and the Superintendent of Public Works, were invited to walk the Trail with the Committee. The Heritage Trail was funded in part by the Town by a popular vote at Town Meeting in 2004 and again in 2007.

**Heritage Landscape Inventory.** The Committee sponsored a public meeting in January 2005 where citizens participated in identifying Nahant's Heritage Landscapes.

**Outreach.** The Committee led community walks to Nahant Open Space areas including East Point, Short Beach, Bailey's Hill, and Heritage Trail.

**Massachusetts Biodiversity Days.** The Committee conducted a biodiversity field trip in June 2002.

**Community Preservation Act.** The Town Administration conducted several public meetings to explain the Community Preservation Act to Nahant's residents. The Act was approved by popular vote at a special Town Meeting in 2004.

**The Living Lawn.** The Committee and the Nahant Garden Club sponsored "The Living Lawn," a workshop on lawn care without the use of pesticides and harmful chemicals, in September 2003.

**Storm Water Management.** A presentation was given to the town on Nahant's storm-water management program in August 2003.

### 3. Observations by This Committee

Throughout the year, the beaches, streets, and byways of Nahant are frequented by people of all ages walking, jogging, bicycling, or skateboarding. In the summer there is much organized activity by youth and young adults on the ball fields (especially in the evening), while the beaches are enjoyed by bathers, and recreational boats ply the offshore waters. SCUBA divers use Canoe Beach at East Point, while seniors and children socialize at Marjoram Park opposite the Town Wharf, as well as Bailey's Hill. Lobster buoys ring the rocky portions of the shoreline during the trapping season.

To the careful observer, there is a surprising variety of interesting plant life throughout the Town, and birders know that Nahant is a prime location for observing songbirds, shorebirds, and seabirds, especially during the spring and fall migrations.

#### *B. Statement of Open Space and Recreation Goals*

Nahant is a very small and very beautiful place that serves as a residential area for a fairly dense population. The town is a destination for visitors seeking recreation and is also an important feeding and resting place for migrating birds and marine mammals. The open space and recreation goals for this community should include maintaining, preserving, and enhancing the town's open space.

One of Nahant's prime assets is its physical situation and the small-town life that derives partly from it: it is a rugged, hilly peninsula jutting out into the Atlantic Ocean, near to but separate from major urban centers. One characteristic that unites the residents of this Town is that so many people here cherish and make substantial use of the recreational opportunities that are available in the town's open spaces, including its sandy beaches, rocky coastline, fields and parks maintained for organized athletic and social activity, and passive recreational areas such as East Point, Bailey's Hill, and the Heritage Trail.

Nahant has surviving fresh-water wetlands, primarily the various parcels collectively known today as the Lowlands. All of these wetlands have been subjected to much alteration, due to a variety of human activities, but significant portions still offer the possibility of further restoration as a network of natural areas connected to the Heritage Trail, where appropriate improvements may be made for the purposes of passive recreation and wildlife habitat. The town's surviving wetlands should be protected as natural habitat areas and enhanced with passive recreational/educational opportunities.

There are no forests or significant woodlands in Nahant, and there is no "agricultural land" per se—but there is a significant lobstering industry based in Nahant. The quality and health of the surrounding waters are of great importance to this industry as well as to the population at large. The Town should continue to work with regional and national groups to protect the area from degradation and to restore, where possible, the health of our environment, in particular the watershed, wetland, and surrounding waters.

If the current population density is not exceeded and its open spaces are left open and natural, then Nahant can retain its special quality as a community with a generally peaceful, relaxed, small-town atmosphere. With this in mind, the open space and recreation goals for this community shall be: (1) to maintain, preserve, and enhance the town's open space and the quality of life that this open space fosters, and (2) to act on this vision so that this community can retain control over its own destiny and preserve what it values most.

## SECTION 7. ANALYSIS OF NEEDS

### *A. Summary of Resource Protection Needs*

An alarming trend documented in this report is the increasing number of dwelling units even though the population of Nahant is declining. There is serious concern about the proliferation of conflicting uses for public open space as well as the accelerated pace of private residential development. A new Master Plan to replace the outdated 1986 plan is a priority for the Town and the Planning Board, and will be a much-needed tool to address these issues. As the smallest town in the Commonwealth, with an area of little more than one square mile, Nahant can ill afford to miss any further opportunities to protect open space. This is why the protection of existing resources is the single most compelling issue facing open space planning.

Although about one third of the Town is in public or institutional ownership, it is still not known exactly how much of this area can legally be developed. Encroachment on “unbuildable” land in Nahant has continuously been taking place. The Metropolitan Area Planning Council’s “MetroPlan 2000: The Regional Development Plan for Metropolitan Boston” includes a “Land Resources Matrix,” which provides an exhaustive listing of specific programs, funding resources, and regulatory/legislative mechanisms that can be utilized for the protection of several designated kinds of conservation areas relevant to Nahant including the following: flood plains, shellfish beds, dunes, historic resources, archaeological resources, coastal areas, scenic landscapes, wetlands, barrier beaches, wetland habitats, rights of way, and lands of conservation and recreational interest. The Metropolitan Area Planning Council has prepared and recently adopted a new plan called “MetroFuture”. Using these resources as a guide, appropriate strategies for the protection of these resources have been and continue to be explored. To date, a number of deeds to important open space areas have been examined to determine if they contain any legal protection. It is essential that the Town continue to increase its knowledge about protections that exist and protections that are needed.

Privately held land should also figure into the planning process. During 2005, developers took advantage of current laws to build six large homes, replacing two small ones on very small lots at the edge of Short Beach. Where before this land had supported numerous large trees and open space, the property is now congested with large houses. A moratorium on subdivisions could be considered by the Town as there are still large lots that can be subdivided under the current Zoning Bylaws. Private owners could be approached to explore the possibility of agreeing to conservation restrictions and to discuss other methods to protect their land from future development. Identifying appropriate private parcels of open space that might be available for acquisition and finding potential sources of funds for purchasing private land should also be examined.

As a peninsula surrounded by the waters of Massachusetts Bay and Nahant Bay, Nahant faces unique environmental challenges from activities in these waters. Historically, the citizens of Nahant have taken an active role in shaping policies that would have an impact on our shores. Through efforts by Safer Waters In Massachusetts (SWIM) and other local organizations, secondary sewage treatment was implemented at the Lynn Sewage Treatment Plant, and the specifications for the Deer Island Sewage Treatment Facility and its outfall pipe were optimized to reduce the impact on the waters surrounding Nahant. Nahant must continue this tradition of awareness and vigilance and support SWIM and similar organizations such as “Save the Harbor,

Save the Bay.” Presently, there are proposals to locate Liquefied Natural Gas Terminals in the waters around Nahant. (For details of this and other environmental challenges see **Section 4.G.**)

It is important for the Town to participate in plans for the larger region. Continued involvement with the Massachusetts Regional Open Space Association, the Massachusetts Department of Conservation and Recreation, the Essex National Heritage Foundation, and the Massachusetts Biodiversity Initiative will assure that Nahant can benefit from regional programs and grants. The town should also continue its partnership with the Massachusetts Audubon Society to maintain the Nahant Thicket and to implement an educational program concerning Nahant’s designation as an Important Bird Area.

The Community Preservation Act, which added a 3 percent surcharge to town property taxes above the first \$100,000 of assessed value, was adopted by the Town on April 24, 2004. The Community Preservation Committee (CPC) is a town committee created to guide the use of this fund to protect and enhance Nahant’s unique character as a coastal residential community. This fund is intended to facilitate efforts to preserve historic places and structures, to retain and protect open spaces, to increase and / or develop lands available for recreational use, and to seek creative solutions to the problem of affordable housing in Nahant. Yearly, 10 percent of the annual revenues in the Community Preservation Fund are set aside for open space. The CPC, however, can recommend larger allocations of resources for specific projects. This resource offers an unprecedented opportunity for open space initiatives in Nahant.

As noted in the Massachusetts Statewide Comprehensive Outdoor Recreation Plan (SCORP), the five top reported recreational activities are walking, sightseeing, swimming, golfing, and picnicking. Nahant offers all of these recreational opportunities, and all but golfing were mentioned in the 1999 survey as the most popular activities.

Because of Nahant’s small size, the town’s important natural, cultural, and historic resources are closely intertwined and are not easily defined as separate entities. Over the past several years, private as well as public groups have contributed significantly to the restoration and protection of significant Town resources and have been committed to the protection of open space in the future. The Nahant Preservation Trust, a private entity incorporated in 1997 to acquire and preserve the Valley Road School building, has as one of its missions to promote the preservation of open space by holding conservation restrictions on donated or purchased properties. The Open Space Committee hosted a conservation restriction workshop for the town to help residents learn about this important conservation tool. Of special concern is protection of the “buffer” areas around East Point, Bailey’s Hill, Heritage Trail, the Lowlands, the Thicket, and the golf course. The Nahant Life-Saving Station Committee along with its ad hoc fundraising group have begun restoring this Historic building, which will enhance the open space and recreation experience of Short Beach users. Careful planning for the disposition of parcels of land owned by the Town will continue to be a challenge in the future. An opportunity for the Town to expand its open space was created by the Town’s foresighted purchase in 2005 of the three-acre military housing tract contiguous with Bailey’s Hill and the Golf Course. A portion of the land has already been incorporated into the Heritage Trail. Planning for this area will continue to be an important issue for the Town. In 2004 and 2005, the Town participated in the Essex Heritage Landscape Inventory Program, which will further inform open space planning. It is important for the Town that this energy and momentum continue.

## *B. Summary of the Community's Needs*

In response to requests from elderly residents for level walking trails, a level route for nature trails will be provided where possible. Several grammar school teachers have requested maps and brochures, which describe open space in Nahant for children in their classes. Also, the Open Space Committee is in the process of constructing a butterfly garden for the Heritage Trail, which will provide nature education for children.

Although Nahant Beach, Short Beach, Bailey's Hill, Forty Steps Beach, and Lodge Park are all heavily used for recreation, there are some parts of Nahant with rich potential that are currently underused. One of these is the area originally known as the Meadows (now, more commonly, the Lowlands). Originally a wetland habitat, the Meadows has been drained and filled over the years to accommodate a variety of uses. Historically, trolley tracks ran through this area, and later it was used as a dump. Currently, a ball field, a beach parking lot, the town composting area, and a lobster trap storage area are all located in the Lowlands. Nevertheless, it is an important habitat for birds since it has wet ditches, thick cover, and food sources. At the 2004 Annual Town Meeting, the Town voted to appropriate funds for the construction of a recreational walking trail, which passes through the Lowlands. Now known as Heritage Trail, this project links Little Nahant with Bailey's Hill. In addition the Town received a grant for the purpose of implementing this project. New rules for composting and for lobster trap storage were put in place in 2004, compost already existing was used to regrade the Cemetery annex, and the beach parking lot was resurfaced with porous material to restore the free flow of water into the ground. Construction began in the summer of 2005 on the section of the Trail that passes through that portion of the Meadows where culverts now bridge the wetland ditches. Much work remains to be done, but with the establishment of the Trail this area is closer to being reclaimed as a beautiful and accessible natural open space.

Another underused and very valuable recreational resource in Nahant is the Massachusetts Audubon Society Wildlife Sanctuary, popularly known today as the "Thicket," which provides an important habitat for birds. In the spring of 2005 Mass Audubon, helped by local volunteers, completed long-needed trail improvements, including the replacement of the bridge. A parcel of land at 69 Wharf Street, across the street from the Thicket, was donated to the Nahant Preservation Trust. A thirty-year conservation restriction held by the Trust, and restoration of natural habitat is planned for this area. As always, ongoing maintenance will be necessary, and it is hoped that the improved access to the Thicket and the new parcel will help to raise and sustain volunteer interest.

## *C. Management Needs and Potential Change of Use*

A *Management Plan* for Lodge Park is included in this *Plan* (**Appendix 1**). Since 1999, the Department of Public Works has been refining their practice of meadow management. The results have been increasingly attractive to the park's many regular and casual visitors. A *Management Plan* for Bailey's Hill was written in 2001 by the Open Space Committee, with input from the Friends of Bailey's Hill and others. It was accepted by the Board of Selectmen in January 2003, and is also included in this *Plan* (**Appendix 1**).

A management plan for the maintenance of the Heritage Trail will be needed, with particular emphasis, if possible, on the development of a volunteer system. This will offer an opportunity for Scout groups and others for Community Service projects.

Continued reevaluation and implementation of the existing and additional management plans will be a concern in future open space planning.

#### *D. Communication Needs*

It is believed that when residents see nature trails being built and recreational areas being improved, and when they can participate in volunteer work, they will become more invested in preserving Nahant's open space. Creating and maintaining these areas thus provides the additional benefit of increased awareness and appreciation. Improving access to the Thicket and the Lowlands has already created volunteer opportunities and has made educational visits possible for school children and their guides. Kiosks, educational signage, and a butterfly garden are planned for Heritage Trail. Beach cleanups, nature walks, and community outreach are all ongoing and will continue to increase awareness of Nahant's beautiful open spaces.

The Nahant Town Web site provides an excellent forum for nature photography and open space documents such as plans and maps. One need identified in the Open Space Survey is for maps of Nahant's recreational areas. An open space brochure containing maps of recreational areas could be designed and made available to the public in print as well as on the Town Web site. It might be appropriate to combine significant historical/cultural and natural sites in a series of self-guided tours.



## SECTION 8. GOALS AND OBJECTIVES

### GOAL 1. *Protect existing open space and special plant and animal habitats.*

#### Objectives:

- A. Identify parcels of land that may qualify as open space, either as recreational areas or habitats for plant and animal conservation.
- B. Inform landowners of the advantages of a conservation restriction, and explore ways of achieving this objective for the landowners and the Town.
- C. Review with the Board of Selectmen the inventory of Town-owned land that may be appropriate for conservation restrictions
- D. Investigate special zoning measures to protect open space.
- E. Recommend sites for acquisition and apply for funding. Special attention will be given to the important “buffer” areas around East Point, Bailey’s Hill, the Lowlands, the Thicket, and the golf course.
- F. Develop specific plans for problems with plant and animal habitats such as controlling feral cats, restoring dune grass, and informing beachgoers about the need to avoid disturbing shore birds.

### GOAL 2. *Integrate cultural, recreational and conservation activities.*

#### Objectives:

- A. Work with Town departments, boards, committees, and other concerned groups to complete construction, planting, and signage for the Heritage Trail, the walking nature trail connecting Little Nahant to Bailey’s Hill.
- B. Establish village walking tours through the marking of Town sites of historical and cultural interest, as an extension of Heritage Trail.
- C. Work with Massachusetts Audubon and other concerned groups in Nahant to maintain improved access to the Thicket (the Massachusetts Audubon Society Sanctuary) and maintain its integrity and quality as an important wildlife habitat. In addition, work to restore as wildlife habitat open space newly acquired by the Town adjacent to the Thicket.

### GOAL 3. *Improve opportunities for open space recreation.*

#### Objectives:

- A. Assess the needs of physically challenged persons and senior citizens and the potential for improving access to open space areas.
- B. Assess the potential for improving and maintaining the Perimeter Path, making

it generally accessible to the Townspeople while addressing the legitimate concerns of abutting property owners.

- C. Assess, as an “open space” issue, the legal access to, and the improvement and management of, traditional rights of way to the ocean.

*GOAL 4. Develop procedures for further evaluation of open space issues.*

Objectives:

- A. Develop open space management plans for specific areas (e.g., the Heritage Trail), on the model of the existing Open Space Management Plans for Lodge Park and Bailey’s Hill.
- B. Communicate and coordinate activities with Town departments, boards, committees, and other groups concerned with open space / recreation issues.
- C. Create a forum for the people of Nahant to voice their concerns on open space issues.
- D. Encourage the people of Nahant to become involved in open space issues.

*GOAL 5. Protect the quality of our beaches, surrounding waters, and skies.*

Objectives:

- A. Work with Town departments, boards, committees, and other groups concerned with encouraging the vigorous enforcement of the Wetlands Protection Act.
- B. Work with the Department of Public Works to protect the quality of our surrounding waters and the safety of our beaches.
- C. Support SWIM (Safer Waters in Massachusetts) and other organizations in their efforts to protect the quality of both our surrounding waters and our beaches.
- D. Support those organizations and individuals who are working to resolve the problem of serious daily noise pollution caused by unauthorized flight patterns over Nahant of air traffic out of Logan Airport in Boston.

*GOAL 6. Increase the appreciation of Nahant’s open space.*

Objectives:

- A. Develop a map of the Town open space network and make it available on the Town Web site.
- B. Continue guided nature walks and discussions.
- C. Develop informational signage for the Heritage Trail and other open space sites such as East Point.
- D. Through formal and informal communication, encourage the Townspeople to look at local open space issues as part of a larger regional context:

- (1) Open space is vital to human physical, emotional, and spiritual well-being.
- (2) Open space is vital to the preservation and continuation of the complex and fragile natural world to which we belong.
- (3) The continued health and existence of open space is always contingent upon the larger economic, political, and social forces of the region in which we live—and we must constantly be aware of how these forces may be working to shape our lives and our future.

## SECTION 9. FIVE-YEAR ACTION PLAN

(Please Refer to **Appendix 3, Map 10: “Action Plan Map”**)

### *Ongoing Work:*

- A. Review the level of protection that exists for Town-owned land (Open Space Committee (OSC)).
- B. Review rights of way and open them up as necessary and appropriate. Identify Rights of Way with on-site markers (Town of Nahant).
- C. Identify and research sites for acquisition as the opportunity arises, with special attention to protection of the “buffer” areas around East Point, Bailey’s Hill, the Lowlands, the Thicket, and the golf course (OSC, Nahant Preservation Trust (NPT)).
- D. Research and apply for Federal and State funding for Open Space Acquisition and Management as the opportunity arises (OSC, Town of Nahant).

### *I. Year One: 2008-2009*

- A. Inform landowners of the advantages of preserving the natural character of their property through conservation restrictions (OSC, Community Preservation Committee (CPC)).
- B. Inform landowners of the advantages of preserving or restoring the natural character of their property via ecologically friendly management practices (e.g., organic lawn care, planting for wildlife) (Nahant Garden Club, OSC).
- C. Complete the construction of the Heritage Trail, the recreational walking trail connecting Little Nahant to Bailey’s Hill (OSC, Town of Nahant). Funding: Community Preservation Act (CPA).
- D. Work with Massachusetts Audubon to develop and install signage to educate beachgoers about Nahant’s designated Important Bird Areas and to reduce disturbance of resting and feeding shorebirds and terns (OSC). Funding: Massachusetts Audubon Society
- E. Complete a Town-wide Inventory of Heritage Trees (Town of Nahant). Funding: CPA.
- F. Revive the Town program to control the feral cat population (Town of Nahant). Funding: Town Meeting Article.

### *II. Year Two: 2009-2010*

- A. Develop a management plan for the Heritage Trail (OSC).
- B. Develop a printable map of the Heritage Trail (OSC and Town of Nahant).

- C. Refurbish coastal areas with dune grass (Town of Nahant). Funding: Coastal Zone Management Grant.
- D. Complete Audubon Certification of Kelly Greens Golf Course (OSC and Golf Course Management).

***III. Year Three: 2010-2011***

- A. Develop a plan for the Village Walk Trail (Historical Society). Funding: CPA.
- B. Make the printable map of the Heritage Trail available on the Town Web site (OSC, Town of Nahant).
- C. Continue dune grass restoration project (see above).
- D. Develop a plan for environmentally sensitive use of Lowlands area (OSC, Town of Nahant). Funding: CPA.

***IV. Year Four: 2011-2012***

- A. Review *Open Space and Recreation Plan* and revise goals and objectives (OSC).

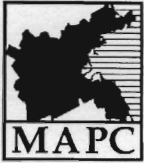
***V. Year Five: 2012-2013***

- A. Update Open Space and Recreation Plan (OSC). Funding: CPA.

## SECTION 10. PUBLIC COMMENTS

As mentioned in section 2, a Draft Version of this *Open Space and Recreation Plan 2008* was submitted to seven local and regional organizations in the summer and fall of 2007 for formal review and comment. All seven organizations responded and their letters are included in this section.

The 2008 Plan was submitted to the Executive Office of Environmental Affairs on January 10, 2008. Final approval was issued on August 15, 2008. The letter from the Executive Office of Environmental Affairs giving their approval for the *2008 Plan* is also included in this section.



# Metropolitan Area Planning Council

60 Temple Place, Boston, Massachusetts 02111 617-451-2770 fax 617-482-7185 [www.mapc.org](http://www.mapc.org)

*Serving 101 cities and towns in metropolitan Boston*

November 30, 2007

Linda Pivacek, Chair  
Nahant Open Space Management and Land Acquisition Committee  
Nahant Town Hall  
334 Nahant Road  
Nahant, MA 01908

Dear Ms. Pivacek:

The Metropolitan Area Planning Council has reviewed the Town of Nahant's Open Space and Recreation Plan Draft dated June 3, 2007. The plan appears to cover the Division of Conservation Services guidelines. It adequately addresses regional issues. The plan is well-written and contains a well-thought out Five Year Action Plan.

Thank you for the opportunity to review this plan.

Sincerely,

Marc D. Draisen  
Executive Director

Cc: Melissa Cryan, Division of Conservation Services

Richard A. Dimino, *President*

Gordon Feltman, *Vice President*

Grace S. Shepard, *Treasurer*

Jay Ash, *Secretary*

Marc D. Draisen, *Executive Director*

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*Town of Nahant*  
**334 Nahant Road, Nahant, MA 01908**  
Telephone: 781-581-0088 FAX 781-593-0340

October 30, 2007

Ms. Linda Pivacek, Chairman  
Nahant Open Space Committee  
41 Little Nahant Road  
Nahant, MA 01908

Dear Ms. Pivacek:

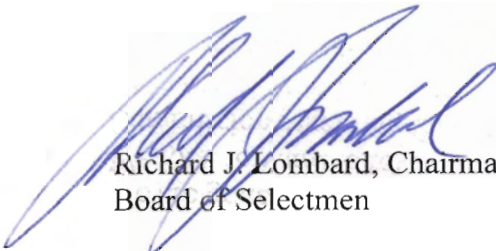
RE: 2007 NAHANT OPEN SPACE PLAN

Please be advised the Board of Selectmen has received and reviewed the proposed 2007 Open Space Plan prepared by your Committee.

We are grateful for the work your committee has performed preparing this document. We look forward to reviewing comments from the Planning Board and the Conservation Commission regarding this document. Once we receive all comments, we will sponsor a warrant article to be presented at this year's Annual Town Meeting. The goals and objectives outlined in the Open Space plan seem well conceived, and would go a long way in improving and guiding the Town's management of open space.

Thanks again for your efforts. The Board of Selectmen looks forward to working with both your committee and the other boards in town to accomplish the many actions of the plan.

Sincerely,



Richard J. Lombard, Chairman  
Board of Selectmen

CC: Town Administrator



**OFFICE OF THE TOWN OF NAHANT PLANNING BOARD**  
**334 Nahant Road**  
**Nahant, MA 01908**

October 25, 2007

Ms. Linda Pivacek, Chair  
Open Space Committee  
41 Little Nahant Road  
Nahant, MA 01908

Dear Ms. Pivacek:

The Planning Board would like to thank you and your committee for its significant effort in writing the Open Space Plan for the Town. It is evident by the depth of research and thoughtful analysis that your committee has taken its role very seriously. The Town is, once again, fortunate to have such volunteers looking out for its future.

The Planning Board would like to express its strong support for the report's stated objectives and overall conclusions. In a relatively densely populated town like Nahant, where the existing build out on average exceeds current zoning, open space represents an extremely critical feature contributing to the Town's character and quality of life. The importance of protecting and appropriately utilizing the Town's remaining open spaces should not be underestimated.

Thanks again to you and our committee. We look forward to working with you on this most worthy effort.

Sincerely,

Richard J. Snyder  
Chair

cc: Board of Selectmen  
Conservation Commission  
Board of Appeals



***Town of Nahant***

***334 Nahant Road, Nahant, MA 01908***

***Telephone: 781-581-0088 FAX 781-593-0340***

September 10, 2007

Ms. Linda Pivacek, Chair  
Open Space Committee  
41 Little Nahant Road  
Nahant, MA 01908

Dear Linda:

RE: 2007 Nahant Open Space Plan

As Chairman of the Board of Appeals, I wish to thank you and your committee for all of your efforts in creating the Town's updated Open Space Plan. I understand that the Commonwealth's requirements for these plans have become more complex, and that updating the plan required a significant amount of work on the part of the Open Space Committee.

You committee's draft document is concise and extremely well written. It is clear that the production of this document was a difficult and complicated task and that it required a great amount of volunteer effort.

The Board of Appeals is pleased to endorse this plan since we recognize the significance of preserving open space, particularly ocean vistas and wetlands. These features are critically important to the character of Nahant and to its residents.

Once again, thank you for your committee's tireless efforts on behalf of the Town. Your work will be appreciated for many years to come.

Very truly yours,

*William Crawford*  
(SJB)

William Crawford, Chairman  
Board of Appeals

CC: Board of Selectmen  
Conservation Commission  
Planning Board



September 23, 2007

Ms. Sherry V. Smith  
Open Space Committee  
90 Bass Point Road  
Nahant, Ma 01908

Dear Ms. Smith

The Nahant Conservation Commission would like to thank you and the members of the Open Space Committee for the work you have done on the preliminary draft of the Open Space Plan.

The members of the Commission and I would like to express its strong support for the final draft of the Open Space Committee. Nahant is a unique place, and preserving the open space especially in the areas mapped out is imperative to the Town.

The report you submitted was very informative and provided us with useful information we can also use on our committee. I would also like to take this time to say using the town's web site for the completed plan is a tremendous idea.

In conclusion we would like to thank all who worked so hard on this plan to make Nahant an even better place.

Sincerely,



Francis J. Barile

Chairman

Nahant Conservation Commission



**Nahant SWIM, Inc.**

**Safer Waters in Massachusetts**

November 12, 2007

Mrs. Linda Pivacek, Chair  
Nahant Open Space Committee  
Nahant Town Hall  
Nahant, Massachusetts 01908

Dear Mrs. Pivacek:

Safer Waters in Massachusetts (SWIM) enthusiastically endorses the new 2007 Open Space Plan and thanks you and the Open Space Committee for the outstanding work you have done in completing the current Open Space Plan.

You accomplished all the work planned, including the protection of the wetland property at Walton and Wharf streets and construction of the Heritage Trail that stretches across the peninsula of Nahant from Bailey's Hill Park to the new Veteran's Park. Your most recent achievement, done just last week by the Town of Nahant, is the planting of beach grass on Short Beach to prevent erosion of sand in this area much used by migratory birds especially in spring and fall, hikers and runners all year round, and swimmers in the summertime and on New Year's Day. Nahant is a more beautiful place because of your work, and its wildlife habitat is very much enhanced.

SWIM has confidence that the Open Space Committee will do equally well on the next five-year Open Space Plan.

Sincerely yours,

Polly Bradley  
Safer Waters in Massachusetts (SWIM)

Safer Waters in Massachusetts (Nahant SWIM, Inc.), c/o Northeastern University Marine Science Center  
East Point, Nahant, MA 01908 - 781-581-0075 -- [nahantswim@comcast.net](mailto:nahantswim@comcast.net)

Since 1984, SWIM has worked to protect the ocean around Nahant and beyond.

## Recreation Commission

September 24, 2007

Ms. Sherry Smith  
Open Space Committee  
90 Bass Point Road  
Nahant, MA 01908

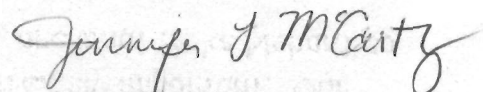
Dear Ms. Smith:

The Recreation Commission would like to express its strong support for the new Open Space Plan for the Town of Nahant. We feel that the stated objectives and overall conclusions have the best interest of the town at heart. The report has clearly mapped out the committee's vision for the Town of Nahant. In a town that is densely settled, open space that allows for recreational activities for our citizens is extremely important. Our parks, beaches and walking paths, to name a few, are what make Nahant so unique.

The Recreation Commission would like to thank the Open Space Committee for their dedication to the town. It is evident by the depth of the report, that your committee has taken its role very seriously. Our town is very fortunate to have such committed members on the Open Space Committee looking out for its future.

Please let us know if the Recreation Commission can assist you in anyway. Thank you again for your committee's devotion.

Sincerely,



Jennifer McCarthy  
Member



*The Commonwealth of Massachusetts*  
*Executive Office of Energy and Environmental Affairs*  
*100 Cambridge Street, Suite 900*  
*Boston, MA 02114*

Deval Patrick  
GOVERNOR

Timothy Murray  
LIEUTENANT GOVERNOR

Ian Bowles  
SECRETARY

Tel: (617) 626-1000  
Fax: (617) 626-1181

August 15, 2008

Sherry V. Smith

Re: Open Space and Recreation Plan

Dear Ms. Smith:

Thank you for submitting Nahant's Open Space and Recreation Plan to this office for review for compliance with the current Open Space and Recreation Plan Requirements. I am pleased to write that the plan is approved. This final approval will allow Nahant to participate in DCS grant rounds through February 2013.

Congratulations on a great job. Please call me at (617) 626-1171 if you have any questions or concerns about the plan.

Sincerely,

A handwritten signature in cursive script that reads "Melissa Cryan".

Melissa Cryan  
Grants Manager

cc: Board of Selectmen  
Recreation Department  
Conservation Commission

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## APPENDICES

Appendix 1

- A. Management Plan for Henry Cabot Lodge, Jr., Memorial Park, East Point, Nahant, Massachusetts
- B. Management Plan for Bailey's Hill, Nahant, Massachusetts

MANAGEMENT PLAN  
FOR  
HENRY CABOT LODGE, JR., MEMORIAL PARK,  
EAST POINT, NAHANT, MASSACHUSETTS

Prepared by the  
Nahant Open Space Management and Land Acquisition Committee

Linda Pivacek, Chair

Deborah Aliff

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Nahant, Massachusetts

Nahant Open Space Management and Land Acquisition Committee

1999

## STATEMENT OF PURPOSE

The natural beauty of East Point, with its commanding ocean view, enhances the quality of life for the residents of the Town of Nahant while providing a habitat for wildlife. In writing this Management Plan for Henry Cabot Lodge, Jr., Memorial Park, the goal of the Nahant Open Space Management and Land Acquisition Committee (the "Open Space Committee") is to create a working document to ensure a unity of purpose among the members of the Open Space Committee, the Board of Selectmen, the Town Administrator, the Department of Public Works, and other official Town bodies for the future of this park. The rehabilitation of this area was the result of the efforts of many contributors, including volunteers and Town bodies and officials. The Open Space Committee spearheaded many of these efforts and continues its stewardship of the park today. The committee anticipates that it will continue to play a key role in the management of Lodge Park.

## HISTORY

In 1986 an article was passed at the annual Town Meeting to create Henry Cabot Lodge, Jr., Memorial Park.

The Open Space Committee and the Conservation Commission of the Town of Nahant worked with Moriece and Gary Landscape Architects to design a landscaping plan for Lodge Park. This plan was accepted at Town Meeting in 1990, establishing Lodge Park as a passive recreation area. The goal of the plan was to restore East Point to a

place of natural beauty and at the same time to preserve it as a historical landmark. The unsightly and hazardous silos of the former U.S. Army missile base were filled, and the hilltop where the silos had been located was contoured and planted to blend with the natural topography.

The initial major phase of reclamation was completed, and a rededication of the Lodge Memorial took place in July 1994. Afterwards, a landscaping plan for the more formal area around the Memorial stone was implemented, and in the summer of 1997 the Open Space Committee held a ceremony to dedicate a granite compass rose Memorial to the late Governor of Massachusetts and Ambassador to Italy John A. Volpe, a close friend of Ambassador Lodge. The compass rose is seated atop the grassy knoll behind the Lodge Memorial stone and orients visitors as they enjoy the magnificent views from this vantage point.

## OVERVIEW

This Management Plan outlines a calendar for the maintenance of both the natural and the more formal areas of the park as well as ways to address safety and accessibility concerns.

A natural grassland setting with paths will be maintained in keeping with the goal of creating a passive recreation area. To ascertain the management criteria for the park, the Open Space Committee has consulted with the Soil Management Division of the

U.S. Department of Agriculture and the Ecological Management Division of the Massachusetts Audubon Society.

#### LEVELS OF USE

Lodge Park is composed of two grassy knolls, which include the formal Lodge and Volpe Memorials and a natural meadow, and the stone-dust paths that surround and traverse this area.

The natural grassy area is intended for passive recreation such as walking, painting, photography, birdwatching, and simply enjoying the view. The area will be maintained as a natural open meadow. This Plan includes the provision for occasional small, low-growing "islands" of natural vegetation such as bayberry or wild rose that will enhance the site and provide cover and forage for birds.

A more formal setting surrounds the Lodge and Volpe Memorial area located on the western end of the park. A higher level of maintenance will be required to keep this area mowed and weeded around the plantings.

The stone-dust paths are intended for low-level recreational activity such as walking, jogging, and (non-motorized) bicycling.



## PARK MAINTENANCE

The following regime is subject to change after inspection annually in early spring. However, the basic approach will remain the same.

### 1. Site of the Lodge Memorial and the Volpe Memorial

The Memorials constitute a more formal area of the park. The area of grass adjacent to the Lodge Memorial and connecting to the Volpe Memorial will be kept relatively short and will require mowing at least twice during the annual growing season. The Open Space Committee may enlist the assistance of volunteers to help with the weeding of planting beds and with the planting of bulbs and annuals in keeping with the aims of the committee and this Management Plan.

### 2. Natural Grassy Meadow

The approach to the mowing regime will be to maintain the park as an open natural grassland. This may require the cutting of woody plants before their stems become over one inch in diameter. The use of a brush cutter or similar machine produces the optimal grass height. It is anticipated that mowing will take place in the fall, once every two or three years. In any event, any work should begin after mid-September and be completed before mid-April to prevent the disturbing of nesting birds and to allow wildflowers to bloom and set seed. The maintenance area can be split into two smaller sections, with each section mowed in alternate years to ensure that some cover and forage is always present. This regime will provide

diversity of habitat for birds and for invertebrates such as butterflies and other pollinating insects. For example, Nahant's dwindling pheasant population is still present at East Point.

#### SITE INSPECTION

Routine inspection of the site will be required to determine the yearly mowing requirements, to allow monitoring of invasive plant species, and to determine the functionality of the drainage ditches. It is suggested that a representative of the Open Space Committee, the Superintendent of the Department of Public Works, and/or the Town Administrator inspect the site in early spring. Ideally, any changes to the park should be communicated among the said representatives at this time. Alternatively, a meeting can be organized at any time to review the need for unforeseen work at the park. The Open Space Committee has been consulting with the Department of Ecological Management of the Massachusetts Audubon Society on the restoration of Lodge Park and will be available to help with any questions raised.

#### PUBLIC SAFETY

There has always been a concern for public safety at East Point. Occasionally visitors will venture too close to the edge of the rocky headland. The dilemma for Town officials is balancing the desire of visitors for the freedom to enjoy the park fully and the need to keep them safe.

There is a guardrail that partially encloses the park, and although for most visitors it does act as a barrier or as the delimiter of a safety zone, it is in some need of repair.

While there can be no plan that guarantees complete safety, there are steps that can be implemented to reduce the risk of accident or injury: (1) Additional signs have already been posted warning of hazards. (2) The guardrail can be repaired. A higher fence is not recommended because it may simply invite children to climb over it and may thus increase the danger of falling. (3) An effective measure highly recommended by this committee to prevent people from venturing into dangerous areas is to use natural barriers such as plantings of thick, thorny shrubs. The cost and the amount of labor involved in this option will have to be investigated and reviewed with Town officials, however.

There are four or five "sinkholes" that appeared two years after the final contouring of the park. These are the result of the slow silting of the glacial-till filler into the old silos, creating air pockets well below ground level. Over time the soil has gradually sunk into the pockets. The sinkholes have been periodically compressed with water and filled, with a gradual reduction in the rate of sink. However, continued monitoring is required.

#### ACCESS BY THE ELDERLY AND HANDICAPPED

Currently there is a restriction on what vehicles may be allowed into the park. Motor-vehicle access by the elderly and handicapped requires a permit from Public Safety which allows driving to and parking near the Lodge Memorial.

MEMORIAL BENCHES

The Open Space Committee has received requests to place memorial benches and trees at Lodge Park. There is clearly a limit to the number of requests of this kind that can be accommodated. Therefore, any requests will have to be handled on an individual basis. Benches should conform to the style selected for Greenlawn Cemetery. Due to the open exposure and the shallow depth of the soil at Lodge Park, the committee does not recommend the planting of trees at the site.

\*

*[Note: A Draft of this Management Plan was presented to the Board of Selectmen, the Town Administrator, and the Superintendent of the Department of Public Works of the Town of Nahant on January 8, 1999. The present document is essentially the same as that document, with stylistic revisions.]*

MANAGEMENT PLAN  
FOR  
BAILEY'S HILL,  
NAHANT, MASSACHUSETTS

Prepared by the  
Nahant Open Space Management and Land Acquisition Committee  
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Nahant, Massachusetts  
Nahant Open Space Management and Land Acquisition Committee  
January 2003

## **I. STATEMENT OF PURPOSE**

As with its Management Plan for Henry Cabot Lodge, Jr., Memorial Park, in writing the present Management Plan for Bailey's Hill it is the goal of the Nahant Open Space Management and Land Acquisition Committee (the "Open Space Committee") to create a working document to ensure a unity of purpose for the future of Bailey's Hill among the members of the Open Space Committee, the Board of Selectmen, the Town Administrator, the Department of Public Works, other official Town bodies, and concerned Townspeople.

## **II. SOURCES FOR THIS DOCUMENT**

In developing this Management Plan for Bailey's Hill, the Open Space Committee relied on the following sources: (A) the development policy in the 1986 Master Plan of the Planning Board of the Town of Nahant; (B) the most recent Zoning Bylaws (as of 17 August 1999); and (C) the results of a 1999 Nahant Open Space Committee Survey. Also, the Open Space Committee has followed (D) the "Statement of Open Space and Recreation Goals" set forth in the Nahant Open Space and Recreation Plan 2000.

### **A. The 1986 Master Plan**

Citing the importance to local residents of Nahant's special "quality of life," the Nahant Planning Board, in its Planning for Nahant: 1986 & Beyond (Boston: Prepared by Philip B. Herr &

Associates, Planning Consultants, April 1986), stated that "Wetlands, open areas important for wildlife habitat, valuable trees, unusual geologic features, and other natural assets should be preserved."

#### **B. The Zoning Bylaws**

In the Zoning Bylaws, under "Uses Permitted in a Natural Resource District" (Sec. 4.10), the following values are recognized as important: "To preserve and increase the amenities of the Town and foster enjoyment of its remaining natural resources as recreational values" and "To conserve natural conditions, wildlife and open space for the education, passive and active recreation and general welfare of the public."

#### **C. The 1999 Nahant Open Space Committee Survey**

In the 1999 Nahant Open Space Committee Survey, it was found that "Ninety-two percent [of respondents] recognized the importance of open space ... for the enhancement of environmental quality"; the "five areas most frequently visited" included Bailey's Hill; "the activities most often engaged in included walking [and] ocean watching"; "Items given high or medium priority for improvement" included "walking paths in natural areas," "conservation areas," "birdwatching and nature study," and "jogging and bike paths." Also "Ninety-five percent or more wanted to see at least some emphasis on

the protection of open space and general aesthetic quality; on environmental conservation...; on the management of existing open space and recreational areas; and on public access to the shoreline or to natural areas."

**D. Statement of Open Space and Recreation Goals**

The Nahant Open Space and Recreation Plan 2000, which was officially adopted by the Town of Nahant in 2000, contains a "Statement of Open Space and Recreation Goals" for the Town. This statement recognizes that "One characteristic that unites the residents of this Town is that so many people here cherish and make substantial use of the recreational opportunities that are available in the Town's open spaces, including ... passive recreational areas such as East Point and Bailey's Hill." In accordance with this statement, one of the Plan's goals is to make "practical suggestions for maintaining, preserving, and enhancing our open space and the quality of life that it fosters" (see Nahant Open Space and Recreation Plan 2000, Sec. 6.B.1-2).

Finally, the members of the Open Space Committee have observed that Bailey's Hill is well used by the Townspeople and outside visitors for walking, jogging, scenery viewing, and sport fishing.



### **III. DESCRIPTION OF SITE**

For the purposes of this Plan, the entire area under consideration will be referred to as the "Bailey's Hill Complex." This consists of 4.6 acres that can readily be seen as divided into three distinct parts: (A) "Bailey's Hill," (B) the "Flatland," and (C) the "Bunkers."

The Bailey's Hill Complex is bounded by the ocean on the west (Lewis Cove), south (Broad Sound), and east (Nahant Harbor and the western end of Pond Beach); at the northeast corner it abuts the parking lot of the Oceanview function hall at the end of Willow Road; on the northern boundary is the first tee of the Kelley Greens golf course and Goddard Road; and on the west the Complex runs the length of Trimountain Road. The main entrance to the Complex is at the intersection of Trimountain and Bass Point Roads, where there is a very small parking area.

#### **A. Bailey's Hill**

Bailey's Hill is a rocky promontory that is surrounded on three sides by ocean: Lewis Cove to the west, Broad Sound to the south, and Nahant Harbor and the western extremity of Pond Beach to the east. To the north, it abuts the Flatland portion of the Bailey's Hill Complex. From the top, there are spectacular views of Lynn Harbor and the Boston skyline to the south and west, of Nahant Harbor and the Town Wharf area to the east, and, looking across the golf course to the north, of the Town generally.

A layer of soil, broken here and there by rock, covers the top and the north side of the Hill, while the three sides that overlook the ocean all consist of picturesque bare ledges. Since the departure of the U.S. military installation in the 1960s, the Hill has become overgrown with natural vegetation, except for a relatively open area at the very top. The trees consist mainly of pines, black (rum) cherry, and aspen; the predominant shrubs and vines are sumac, a type of (native) wild rose, black-berry, bayberry, poison ivy, and Asiatic (Oriental) bittersweet.

A narrow blacktop path starting from the foot of the Hill, near the main entrance, winds its way up to the top of the Hill, to the site of the former military observation station, and continues on southward for a short distance. This path and the sealed entrance to the old searchlight shelter on the eastern side of the hill are all that appear to remain of military construction on Bailey's Hill itself. In addition to this path there are other, informal paths on the hill, totaling perhaps just under half a mile.

#### **B. The Flatland**

The Flatland is a level, low-lying area bounded by Bailey's Hill to the south, by the western end of Pond Beach to the east, by Gun Emplacement No. 1 in the Bunkers to the north, and by the main entrance to the Complex at Bass Point and Trimountain Roads to the west. It consists of a lawn with a roughly circular blacktop drive in the center and a gazebo/bandstand on the south side next to Bailey's Hill. Along the blacktop drive there are clusters of marked

parking spaces, some with military designations still visible. In the center are a few mature crabapple trees.

### **C. The Bunkers**

The Bunkers is a heavily wooded ridge formed by two Gun Emplacements (of the former Gardner Battery) and the earthworks that have been constructed around and over them. This area is bounded by Trimountain Road to the west, the Flatland to the south, the Oceanview parking lot to the east, and Goddard Road and the first tee of the golf course to the north. Gun No. 1 faces the Flatland and is fronted by a steep, fairly open meadow. Except for an occasional clearing at the tops of the gun emplacements, the rest of the Bunkers is overgrown with a woods dominated by black (honey) locust and Norway maple, with an understory including black cherry, sumac, Asiatic bittersweet, multiflora rose, and some blackberry, bayberry, and poison ivy.

## **IV. HISTORY AND LEVELS OF USE**

Until the 1960s, the Bailey's Hill Complex was occupied by Fort Ruckman, the site of Battery Augustus P. Gardner; this battery consisted of two Gun Emplacements and their ancillary under-ground chambers and passageways. The U.S. military ceased its active presence in Nahant by 1962, but it remained involved in the efforts to remove military hardware and clean up the areas that it had occupied. By the time the Complex was transferred to the Town, it

had started to become "naturalized" with a cover of mixed native and exotic plants, providing habitat for wild animals and birds.

After the military base was shut down, vandalism became a problem at the Bunkers, and the abandoned site became a potentially dangerous attraction to young people. The central Flatland, however, has been kept mowed and has been the site of occasional public events centering on the gazebo/bandstand.

Today the Complex is heavily used by walkers, joggers, and scenery viewers, and by dog owners to exercise their dogs. In season it is a common destination for sport fishermen. It remains one of the most important sites in the Town for passive recreation and especially for the unparalleled scenery viewing from its heights.

#### **V. DESCRIPTION OF USE**

**A.** In accordance with the general sentiment of the Townspeople (as determined from the 1999 Open Space Committee Survey), the Bailey's Hill Complex is to be maintained in perpetuity as natural open space for the purpose of predominantly passive recreation. The Flatland is to be used for personal recreation, for appropriate public entertainments (such as listening to local bands performing light popular music at the gazebo), and for non-organized sports such as Frisbee throwing and informal ball playing.

**B.** In accordance with the stated goal of the Open Space Committee to "create a network of paths extending from Little Nahant through Short Beach, The Meadows, and the golf course to Bailey's Hill"

(Plan 2000, Sec. 8, Goal 2), a footpath will be maintained in appropriate places on Bailey's Hill.

C. To insure the continuity of the peaceful character of the Complex and the integrity of its natural state, no roadway and no amendment to the existing blacktop drive will be constructed or allowed to run through the Flatland so as to connect Bass Point and Trimountain Roads to Willow Road or Goddard Road.

D. If the Town is approached by residents of the Town to accommodate special requests that involve alteration of the landscape, such as plantings for beautification, such special uses will conform to the following guidelines:

1. Beautification (i.e., special plantings for improving general appearance) will be limited to an area designated by the Town in the vicinity of the main entrance at the corner of Trimountain and Bass Point Roads.

2. For any activity involving alteration of public land there must be a general consensus by the Townspeople that such an activity is appropriate. Before any such activity is undertaken by, or expressly for, any private party, permission must be obtained from the Town according to a formally established, written procedure that is to be developed by the Town. A request will be overseen or granted by the proper Town authority (e.g., the Town Administrator or the Townspeople at Town Meeting).

## **VI. MANAGEMENT**

The management of the Bailey's Hill Complex is a dynamic process. Regular inspections are to be conducted by the appropriate Town personnel. Following an annual inspection, recommendations by the Department of Public Works, the Open Space Committee, and any concerned Townspeople will be reviewed by the Town Administrator.

The management of the entire Complex involves specific maintenance regimes for each of the three areas within the Complex, and these can be dealt with separately. For all three areas, however, there can be seen to be two basic categories of maintenance: routine and special.

### **A. Bailey's Hill**

1. ***Routine Maintenance***. The purpose of the maintenance program for Bailey's Hill is to ensure:

- that the integrity of the Hill as an evolving natural area is not compromised by construction or unnecessary groundskeeping,
- that the public has unobstructed access by foot to the top of the Hill, and

- that periodic inspection be done to determine if there are any public-safety issues that need to be addressed.

The maintenance regime is as follows:

(a) The blacktop path that starts from the bottom of the northwest corner of the Hill will be kept clear of creeping vines and shrubs that encroach upon the path, and clear of protruding branches that pose an obvious hazard to people--but removal will be done only to the edge of the blacktop and only when necessary.

(b) The fencing that runs along the top edge of the Hill--especially on the eastern side overlooking Nahant Harbor--will be kept in good repair or removed altogether.

(c) Periodic inspection will be done for any new erosion of topsoil on the Hill--especially on the northern, downward side of the blacktop path, facing the Flatland.

**2. Special Maintenance.** Beyond routine maintenance, there are special problems that may need to be dealt with. These may require more extensive "one-time" intervention:

(a) As this Plan was written, there were at least five gullies running down from the blacktop path to the Flatland--three of them showing serious erosion. These were probably caused, and are certainly aggravated, by foot and bicycle traffic down a slope that is too steeply graded to accommodate such traffic. The placing of boulders in these gullies has been discussed as an immediate

solution. It is also recommended that these gullies be filled in with natural, uncontaminated soil and planted with native shrubs or vines that will be sufficiently vigorous to resist and deter

trampling. These plantings may include native blackberry, which is hardy and flourishes in this area. If planting does not solve the problem, then other means may have to be explored, so long as they do not work against the original intent for this entire area: to keep it as "natural" as possible.

(b) Poison ivy flourishes throughout the Town. This is a native species, and it is thus a "part of the ecology"; but if it becomes a problem in areas where there is heavy foot traffic, occasional (and environmentally appropriate) methods may be implemented to keep it under control in these areas of the Hill.

(c) Asiatic (or Oriental) bittersweet is becoming invasive along the upland side of the lower part of the blacktop path. This exotic species is attractive to people for aesthetic reasons. But if it threatens to overwhelm the other vegetation on the Hill, a plan may have to be devised to keep it under control.

(d) Here and there around the top of the Hill are chain-link fences in hazardous areas. One such area in particular is the edge of the precipice on the eastern side, overlooking Nahant Harbor, especially where an extremely narrow seventeen-step stone stairway leads down to the old searchlight shelter. The fencing here has been broken through; it should be repaired or removed altogether. In any case, signage should be installed warning people of the hazard.



**B. The Flatland**

**1. Routine Maintenance.** This area is already maintained by regular mowing and occasional pruning. The maintenance regime is as follows:

(a) Continue to mow the area that is currently being maintained in this manner.

(b) The flowering crabapple trees that stand in the center of the Flatland are a most attractive sight in spring; an effort should be made to maintain these trees in the best condition.

(c) To the east, along the border with Pond Beach (i.e., parallel to the beach) there is a section that has naturally reverted to grasses, wildflowers, and shrubs, including wild roses. This section is quite attractive in late spring through the summer when the roses bloom, and it forms a pleasing natural border that is to remain undisturbed. The existing blacktop drive and old military parking spaces along the eastern perimeter constitute a natural edge for this border.

(d) The main entrance to the Complex is at the western end of the Flatland, at the intersection of Bass Point and Trimountain Roads. The old "turnstile" gate with post and latch must be restored here and kept closed; it should be constructed so that there will always be open access for wheel chairs, baby strollers, and golf carts. The immediate vicinity is to be maintained the same as other more formal public areas about Town, i.e., through routine mowing and pruning of obtrusive or dead branches and underbrush. (Note: see

under section IX. Public Safety, below, concerning access by emergency vehicles.)

**2. *Special Maintenance.*** Unlawful and inappropriate vehicular traffic can lead to erosion below the blacktop path to the top of Bailey's Hill, damage to the path and the surrounding terrain, possible injury to pedestrians along the path as well as in the Flatland area, and the disturbance of the passive recreational experience for which the entire Complex is being maintained. There are therefore at least two locations in the Flatland to be secured against unauthorized vehicular access:

(a) The main entrance, at the intersection of Trimountain and Bass Point Roads, is to be secured by restoring the existing turnstile gate and keeping it latched. Signage will be prominently displayed forbidding access by any unauthorized vehicles. This is especially necessary to prevent immediate access by unauthorized vehicles to the entrance to the blacktop path that runs to the top of Bailey's Hill. (For entry by public-safety vehicles in an emergency, see below, section IX. Public Safety, subsection A).

(b) At the northeast corner of the Flatland, there is the wide pebble path connecting the blacktop drive to the Oceanview parking lot. Ideally this access point should be secured by installing, e.g., either boulders or a latched gate at the entrance from the Oceanview parking lot. In any case, signage will be installed forbidding access by any unauthorized vehicle.

### **C. The Bunkers**

**1. Routine Maintenance.** The purpose of the maintenance program for the Bunkers is to ensure:

- that the integrity of the Bunkers as an evolving natural area is not compromised by construction or unnecessary groundskeeping, and
- that periodic inspection be done to determine if there are any public safety issues that need to be addressed.

This area will be maintained in its natural state. Periodic inspection will take place to identify hazardous conditions.

**2. Special Maintenance.** The presence of the Gun Emplacements and the grade of the slope all along the southern and eastern faces of the ridge present special challenges:

(a) After the military presence at Fort Ruckman came to an end, the entrances to the two Gun Emplacements and other points of access into the Bunker system were sealed, and soil was piled up against the Gun Emplacements. However, this means of preventing access to the system has over the years been compromised; people are drawn by the obvious enticement offered by an abandoned military base. As of this writing a small crawl space has been opened through the concrete wall covering the entrance to each Gun Emplacement. Also, another hole has been opened up through a pile of boulders covering an obscure entrance on a wooded hillside overlooking Trimountain Road. And, although it is covered, at least one air

ventilation shaft, which still protrudes above the ground, is another item of concern.

People will attempt to enter this network of tunnels and chambers as long as access is reasonably attainable. The personal danger to these people and to the public-safety personnel who may have to go in after them--not to mention the potential for lawsuits against the Town--are problems that will have to be addressed until access is permanently blocked.

It is recommended that the Town develop a plan to add uncontaminated soil to cover completely any remaining access points, especially the entrances to the two Gun Emplacements.

(b) Heavy foot traffic around the entrances to the two Gun Emplacements has created a serious erosion problem, especially along the steep slope running down the western side of Gun Emplacement No. 1 and into the vicinity of the main entrance to the Complex. This particular area has been hidden from the view of nearby residents by the installation of a wooden fence, but this will not stop the erosion. Other potential erosion problems exist wherever there is substantial foot traffic in areas where the slope is of a steep grade.

This problem will probably not be resolved until the Gun Emplacements are fully covered over. In the meantime, possible remediation may include placing boulders in the presently or potentially eroded areas or planting "deterrent" plants such as blackberry.

## **VII. THE TRAIL SYSTEM**

After the adoption of the Nahant Open Space and Recreation Plan 2000, the Town began to implement the stated goal of a "network of paths extending from Little Nahant through Short Beach, The Meadows, and the golf course to Bailey's Hill." At this writing, funding was being sought for this project.

The "network of paths" enters the Bailey's Hill Complex from the wide pebble path connecting the Oceanview parking lot with the northeast corner of the Flatland portion of the Complex.

**1. Routine Maintenance.** Once this path is created, routine maintenance will consist of a regime of minimum clearing and pruning sufficient to keep the path open and well defined.

**2. Special Maintenance.** Bicycle traffic presents a special problem. As can readily be seen in places like Lynn Woods, "mountain biking," when permitted, can lead to major erosion problems where it is not properly directed, regulated, or supervised. It is recommended that bicycle riding be restricted to pathways that are reinforced with a blacktop, gravel, or pebble surface. A route that starts from the boundary with the Oceanview parking lot and ends at the top of Bailey's Hill should be sufficient to meet the needs of a recreational bicyclist within the Bailey's Hill Complex. Considering the route of the network of paths that has been proposed by this Committee, a bicyclist should be able to "enter the system" at the Lynn end of Nahant Beach and ride all the way to the top of Bailey's Hill.

### **VIII. HANDICAPPED ACCESS**

The Flatland affords recreational opportunity to a person who is physically challenged. The entire Flatland area is accessible by wheelchair, and there are impressive views of Gun Emplacement No. 1 to the north and Nahant Harbor to the east. With appropriate assistance, some physically challenged persons could gain access to the top of Bailey's Hill via the blacktop path. The principal concern, however, is the availability of parking, which is severely limited. Recently, in conjunction with a handicapped accessibility evaluation (see Nahant Open Space and Recreation Plan 2000, Appendix 4, "Section 504 Self-Evaluation..."), each Town-owned open-space site open to the public was visited by the Town Administrator and the Americans with Disabilities Act Coordinator for the Town of Nahant. After the Bailey's Hill area was evaluated, it was suggested that one handicapped parking space be designated at the Bass Point Road and Trimountain Road entrance.

### **IX. PUBLIC SAFETY**

There are a number of public-safety issues to be addressed concerning the Bailey's Hill Complex, beyond the usual concern for adequate policing.

**A.** In the event of an emergency involving actual or potential personal injury, there must be rapid and assured access by an emergency vehicle such as a police cruiser or ambulance. This will include some arrangement with all Public Safety personnel that easily enables these personnel to unlatch and pass through any and all gates to the Complex.

**B.** Eventually, all entrances to the underground tunnels and chambers of the Bunker system should be completely covered with uncontaminated soil to prevent unauthorized access--especially by young people. Efforts to solve this problem up to now have not been entirely successful.

**C.** Fencing that has been established in potentially hazardous areas, such as the steps leading down the precipice to the old searchlight shelter on Bailey's Hill, will be periodically inspected. Decisions about the repair or removal of existing fences must be made. The entire Complex will be inspected to determine areas where appropriate signage should be installed to warn visitors of potential hazards.

\* \* \*

Appendix 2

Nahant Open Space Committee Survey and Results



## NAHANT OPEN SPACE COMMITTEE SURVEY

The Nahant Open Space Committee is currently revising the Open Space Plan. We are once again studying the needs and concerns of the citizens of Nahant. This survey is an integral part of the plan and will give the committee direction in providing recommendations for open space and recreation opportunities. Furthermore, this type of input is necessary to qualify for state reimbursement programs for acquisition and protection of important town resources. With your help, the Open Space Committee will determine priorities in developing future open space planning and at the same time maintain the character of the town.

Please answer all of the applicable questions. If you wish to comment on any questions or qualify your answers please feel free to use the space on the back of this survey. Thank you for your help.

PLEASE CIRCLE THE APPROPRIATE RESPONSE

1. How often do you or any member of you family visit the following areas in Nahant?

	NEVER	RARELY	SOMETIMES	OFTEN
Audubon Thicket	X	X	X	X
Bailey's Hill	X	X	X	X
Blackrock Beach (across from Life-Saving Station)	X	X	X	X
Canoe Beach	X	X	X	X
Forty Steps Beach	X	X	X	X
Henry Cabot Lodge Park East Point	X	X	X	X
Marjoram Park	X	X	X	X
Short Beach	X	X	X	X
Swallow's Cave	X	X	X	X
Tudor Beach	X	X	X	X
Other _____				

2. Which of the following are important reasons to keep land as open space?

	YES	NO	DON'T KNOW
Protect flood plains and wetlands	X	X	X
Maintain scenic areas	X	X	X
Provide areas for recreation	X	X	X
Conserve EMS, plants and wildlife to enhance quality of environment	X	X	X
Other _____			

3. How well are your needs for open space in Nahant met?

EXCELLENT      GOOD      FAIR      POOR

4. Please comment on any unique problems that hinder your opportunities to enjoy open space in Nahant

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5. How often do you or any member of your family participate in the following activities?

	NEVER	RARELY	SOMETIMES	OFTEN
Jogging	X	X	X	X
Walking	X	X	X	X
Playgrounds	X	X	X	X
Cross Country Skiing	X	X	X	X
Picnicking	X	X	X	X
Birdwatching/Nature Study	X	X	X	X
Ocean watching	X	X	X	X
Swimming	X	X	X	X
Windsurfing	X	X	X	X
Bicycling	X	X	X	X
Golfing	X	X	X	X
Tennis	X	X	X	X
Fishing	X	X	X	X
Softball	X	X	X	X
Rollerblading	X	X	X	X
Soccer	X	X	X	X
Basketball	X	X	X	X
Other: _____	X	X	X	X

6. Please indicate the priority the town should give to **improving** the following recreation opportunities

	HIGH	MEDIUM	LOW	NONE
Playgrounds	X	X	X	X
Ball Fields	X	X	X	X
Basketball Courts	X	X	X	X
Tennis Courts	X	X	X	X
Cross Country Skiing	X	X	X	X
Picnic Areas	X	X	X	X
Conservation Areas	X	X	X	X
Birdwatching/Nature Study	X	X	X	X
Fishing	X	X	X	X
Swimming	X	X	X	X
Windsurfing	X	X	X	X
Golf Course	X	X	X	X
Jogging Bike Paths.	X	X	X	X
Walking Paths in Natural Areas	X	X	X	X
Other:	X	X	X	X

7. How much emphasis should be placed on each of the following in future plans for Nahant?

	MORE	SOME	LESS	NONE
Protection of open space	X	X	X	X
Protection of aesthetic quality	X	X	X	X
Environmental conservation- (wetlands, wildlife, natural areas, etc.)	X	X	X	X
Management of existing open space and recreation areas	X	X	X	X
Access to water/shoreline/natural areas	X	X	X	X
Rights of way/Public ways	X	X	X	X
Other: _____	X	X	X	X

8. How satisfied are you with the  
Places for children and youth to  
play and recreate in town?

5 – very satisfied  
4 – satisfied  
3 – neutral

5                      4                      3                      2                      1

9. How satisfied are you with the  
places available in town for recreational  
use by adults?

5                      4                      3                      2                      1

10. What do you like **best** about living in Nahant?

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11. What do you like **least** about living in Nahant?

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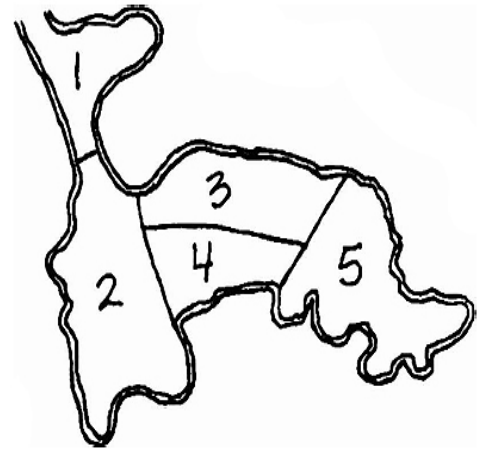
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12. How long have you been a resident of Nahant?

- ☐ less than 5 years  
☐ 5 to 10 years  
☐ 10 to 20 years  
☐ more than 20 years

13. Do you or anyone in your household own property in town?

- ☐ Yes  
☐ No



14. Where in Nahant do you reside? 1 2 3 4 5  
(circle numbered area from map on right)

\_\_\_\_\_

Please return completed survey before February 15, 1999. It can be dropped off or mailed to:  
**Nahant Open Space Committee, Nahant Town Hall, 334 Nahant Rd., Nahant, MA 01908**

It can also be dropped off at the following locations:

**Nahant Liquors & Variety Store** 2-A Wilson Rd., **Nahant Variety (Logue's)** 271-A Castle Rd.

**Seaside Pizza** 149 Nahant Rd., **Richland** 332 Nahant Rd., **Nahant Library** 340 Nahant Road

Thank you for participating with our survey. With your help we can identify the town's open Space concerns and priorities so that we can develop an action plan.

## **Nahant Open Space Committee**

### **Survey Results**

The Nahant Open Space Committee sent out a survey to the households in town to ask the residents of their concerns of open space and recreational needs. The town printed 2200 surveys. The majority of them (1800) were enclosed in the January issue of the Harbor Review. Others were available at the drop off locations. We received back 258 completed surveys.

The findings showed that 82 percent of respondents owned property in town and 60 percent had resided here for more than twenty years. (15 percent had lived here for less than five years, 11 percent from five to ten years and 14 percent from ten to twenty years.) Areas of residence from the respondents included 13 percent for Little Nahant, 34 percent for the Bass Point area, 16 percent south of Nahant Road, 16 percent north of Nahant Road and 21 percent for the East Point area.

Children and youth recreation and play areas were very satisfactory or satisfactory for 58 percent of the respondents, while 12 percent were dissatisfied, 30 percent were neutral. In regard to adult recreational areas - 59 percent were satisfied or very satisfied while 13 percent were dissatisfied or very dissatisfied and 28 percent were neutral - essentially the same findings for children, adults and youths.

In regard to open space - 80 percent of respondents felt that their needs were met “excellent” and “good,” while 20 percent indicated “fair” and “poor.”

The importance of open space for protection of flood plains and wetlands; the maintenance of scenic areas; recreation areas; and conservation of trees, plants and wildlife for the enhancement of environmental quality was noted by 92 percent or more of respondents in each of the above categories.

The five areas most visited “sometimes” or “often” were Short Beach, Henry Cabot Lodge Park / East Point, Forty Steps Beach, Bailey’s Hill and Marjoram Park. Those visited “never” or “rarely” were the Audubon Thicket, Swallows Cave, Blackrock Beach, Canoe Beach and Tudor Beach.

Activities most often engaged in included walking, ocean watching, swimming, bicycling, using playgrounds and picnicking. Those never or rarely engaged in by respondents included windsurfing, softball, soccer, basketball, cross-country skiing, golfing and tennis. In keeping with the above, priorities which were seen as high or medium for improvement included walking paths

in natural areas, conservation areas, playgrounds, swimming, bird watching / nature study, jogging / bike paths, ball fields and picnic areas. Priorities seen as low or none were assigned to cross-country skiing, windsurfing and basketball courts.

In regard to future plans for Nahant - 95 percent or more of all respondents felt that more or some emphasis should be placed on protection of open space; protection of aesthetic quality; environmental conservation (wetlands, wildlife, natural areas, etc.); management of existing open space and recreational areas; and access to water / shore line / natural areas. In regard to rights of way / public ways, 85 percent wanted more or some emphasis placed, while 15 percent wanted less or none.

When asking people to comment on any unique problems that hinder their opportunities to enjoy the open space in Nahant the answers came back varied and interesting.

The most consistent and by far the most strongly slated problem is dog feces that is not picked up around town (22 mentions). Dogs, in general, were mentioned often. Dogs unleashed (8) hindered people's enjoyment. The dog officer (4) was mentioned as a hindrance. The loss of Black Rock Beach to the dogs (4) was lamented and the need to have more areas for unleashed dogs (4) was considered a problem.

The litter and garbage (19), the lack of parking (12), the blocked rights of way (14) and the restricted access to the towns perimeter (11) also received more comments than any other problems. Over- development of Nahant (9) and not upholding the zoning by-laws (2). "The threat of over expansion and development within town which will hinder opportunities to enjoy open spaces in the future" were mentioned as unique problems.

The non-maintenance of the town (8), the need to upgrade the "downtown," the playgrounds, the tennis courts, the soccer fields 1 ball fields are considered in "deplorable condition" as well as the abandoned Coast Guard Station was mentioned with two people commenting that the Coast Guard Station looked "impoverished" and we should consider making it taxable.

The golf course should be made into passive open space (3) and the Audubon Sanctuary is too wet, has poor paths and is dangerous (3) were comments on the unique problems. Other comments were to flood the lowlands in the winter for skating (2) and to do more plantings up at Lodge Park. As well as an organized van tour of Nahant for the seniors on a regular basis.

The mention of lack of time (2) as a hindrance to enjoy the open space is most likely a thought that would receive the most votes if we all had more time to have thought of that!

When asked “What do you like best about living in Nahant?” the not surprising reply was the ocean, the sea (112 mentions). Sea breezes, cool temperature (2) and the air (12) were noted. The beauty, scenic / natural beauty (70) of Nahant and the feeling of being safe (66) received by far the most mentions. Sunsets, sunrises (4). full moons (2). The birds (3), the light / reflection off the water and rocks were also mentioned.

The police / fire departments (5), police (3) and Chief Manley all were commended. The quiet (48) small town atmosphere (37) and the people (34) were all considered the best things about Nahant. Close community (3), community atmosphere (5), the community spirit (2) and involvement were thought of as the best. Neighborliness (3), Friendliness (10) and considerate neighbors (2) all were mentioned as well as “the people who are dedicated to preserving open space and recreational areas.” The beaches (31), the open space to play (23) and open space in general (16) were on some peoples best list. Along with the environment (2), the isolation (9) and our location (5).

The proximity to Boston (23) (and airport) and the location to other points of interests were some of the best points of Nahant. The peacefulness (20), the privacy (6) “knowing my rights will not be infringed on.”

Some people think that the best of Nahant is that it’s clean (6). There’s no traffic (7), no traffic lights (2), lack of commercial businesses (6) with no industry and the “available stores to meet many needs.”

As far as places, the library (5), the golf course (4), the school (2) were the best to some. The post office, Lodge Park, Seaside Pizza , Charlie at Seaside , breakfast at Seaside and Marilyn’s Fish Store were all singularly mentioned. The Swallow Cave Singers, the Village Church and historical reasons (2) were the best response from some.

Coastal living (5) and living in a small seaside town (2) with good sailing (2), access to boats with swimming / boating in a low key living sheltered, stable community are considered the best. People stay for life (3) in a not densely populated, slow paced (3) affordable community. Friendly town officials, sensible government and open town meeting were considered the best.

The leash law, resident only parking, the kids recreational programs and the diversity of the people were mentioned as the best. The pride people take in their property (2), no room for development



and no church or political problems were also considered the best. Some think the best thing about Nahant is summer (2). Everything, almost everything and love it! (3) were the final comments of some.

When asked “What do you like least about living in Nahant?” the responses were extremely diversified but with the overwhelming percentage expressing the need for more commercial establishments.

Lack of a drug store, gas station (6), downtown (2), fresh food (4), pharmacy (4), shops (2), bakery, downtown space, stores (4), parking, grocery (3), gym / health club, decent breakfast place, coffee shop, homey restaurant, commercial establishments (2), hotels, bed and breakfast (2), hardware, butcher, cafe, business (2), inn, activity center or quaint stores all totaled (46 mentions) more responses than any other mention.

The disrepair (15) of the town was the second largest comment of what people like least about Nahant. The mention of benches, cracked sidewalks, roads (2), ball fields, playgrounds, crumbling sidewalks and curbs, parks (2), public facilities and the general over all look of the town.

The town politics (14), “small town” politics (3) and corrupt town officials were some of the least likable things about Nahant for some people. The “lack of individual pride in community: i.e. vandalism” was mentioned. The town’s zoning by-laws not being enforced (12), the blocked rights of way (2), persistent development (3), over crowding (2) and the limited access to all beaches in town were written about. The “lack of concern and planning for environmental issues” and “uncontrolled development on vacant land in town” show the concern of some.

The litter (11) around town and the inadequate trash can pick ups (4) are some of the least like things. Lack of ticketing (3) “in parks and on sidewalks” and at Tudor Beach and Forty Steps, illegal parked cars (4) and the parking in general are mentioned as things least liked. The ugliness of the causeway (3), neglected Short Beach, the lack of open space (2), not enough trees and “the need for effective conservation” as well as “too many chain saw massacres” all were mentioned.

The respondents were very adamant about speeding cars (9) especially down Castle Road, “mothers from hell going to pick up their children from school.” As much as some people think the best thing about Nahant is the remoteness, being isolated (9) is the least liked by some. The lack of racial diversity (6) and the small mindedness (6) were mentioned. Along with the “lack of funds to make the town more recreational friendly.” No older children non-sport activities (7) were mentioned by some people.

The noise from the airplanes (6) are the least liked thing about Nahant for some. The dog feces (5) that is not picked up, loose dogs (2), dogs (4), crows (2) and pigeons are also least liked. The current leash law (4) was mentioned as least liked while one person wrote “wish they would enforce the leash law” and one person wrote the “overzealous dog law enforcement actions” are their least likable things.

The smell at the entrance to town (5), being too close to Lynn (5), the high taxes (4), the wasted tax dollars, the water and sewer costs (2) and lack of dependable transportation (4) were also mentioned. Some people dislike the lack of fire protection (3), no good access to medical facilities (2) and the slow ambulance.

Leaving Nahant to go to work (3) is considered the least likable thing. The unneighborliness (2) especially to non-residents (2) along with the sightseeing traffic and tourists are disliked along with the small mindedness (2), the cliqueness (2) and agendas of special interest groups (2). Some people cite the school committee (2) and the lack of progress on education.

The least liked is the golf course (2), the lack of amenities (2) i.e. public toilets, “no public facilities at the ball fields that’s maintained,” lack of signage at the parks and open space areas (2). Some dislike ocean storms and the cold wind and the new residents trying to do away with old traditions (2). Sport fanatics, yuppies, interfering people, other people, busy bodies, people who criticize were singularly mentioned as what some people like least about Nahant.

Other least liked things are too many cars at the 4th of July, too many police, petty and rude police officers, too noisy, too dark and too many negative signs when entering town.

Lack of interaction with other residents, social life, lack of turnover of affordable real estate and lack of access to Boston “the Blue Line should be extended” are expressed. Least liked is the sewer outfall, overhead wires, trash service, illegal apartments, expensive stores and the Lynn Item. Others mentioned very restricted, hostility, town gossip and fighting among interest groups and holding grudges. The running buses on Relay Road, the audio on cable are the least liked things to some people here in Nahant. Nothing (18) was the response from a good percentage of residents. And one person’s response as the least liked thing about Nahant is surveys!

Appendix 3

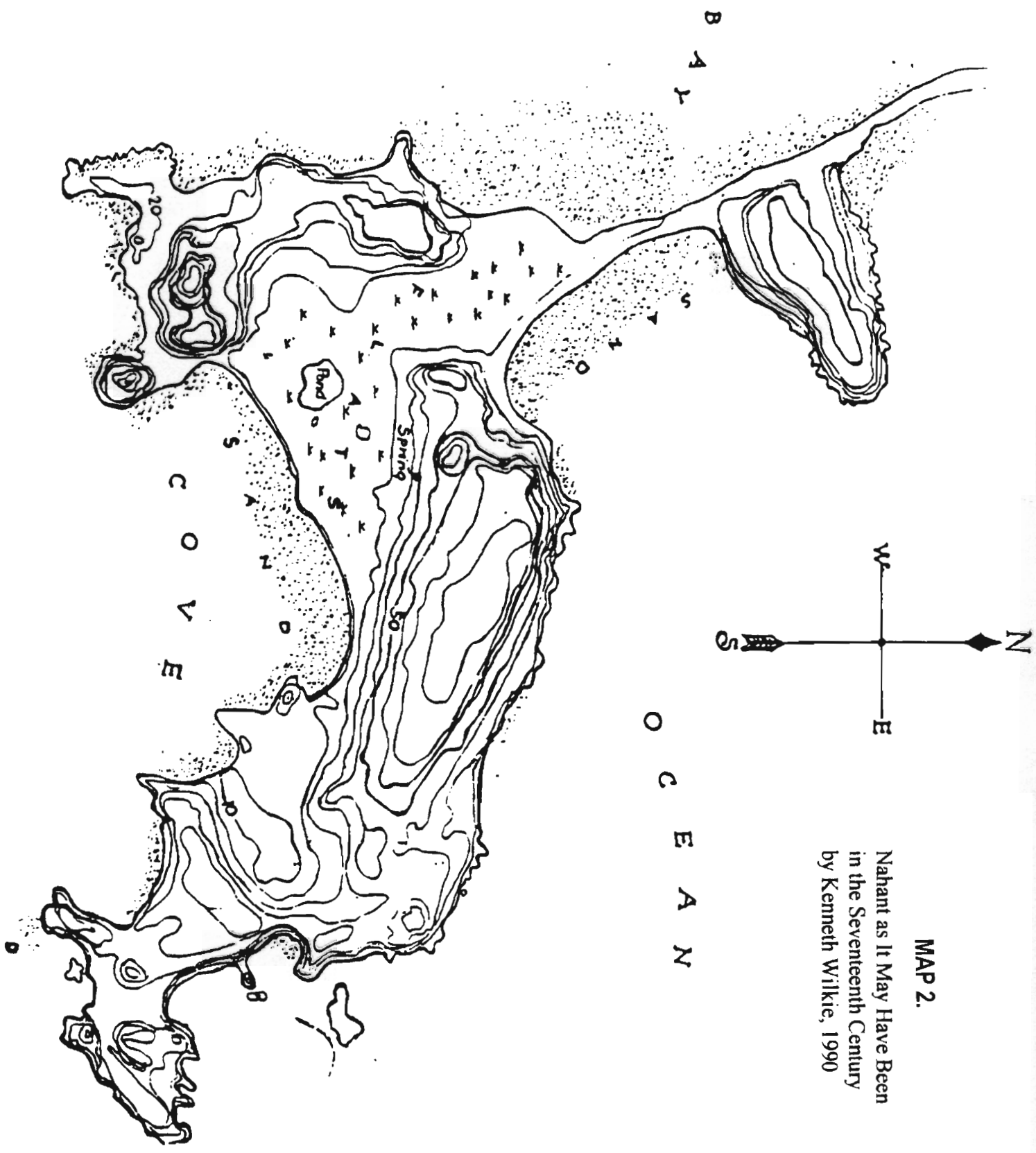
Maps:

1. Coastal Zone Management Map of State-designated Barrier Beaches
2. Nahant as It May Have Been in the Seventeenth Century
3. Nahant (ca. 1914)
4. Official Zoning Map of the Town of Nahant
5. Surficial Geology of Nahant
6. Nahant Wetlands
7. Map of Nahant Past and Present
8. Open Space by Ownership
9. Open Space by Level of Protection
10. Action Plan Map
11. Flood Hazard Zone Map

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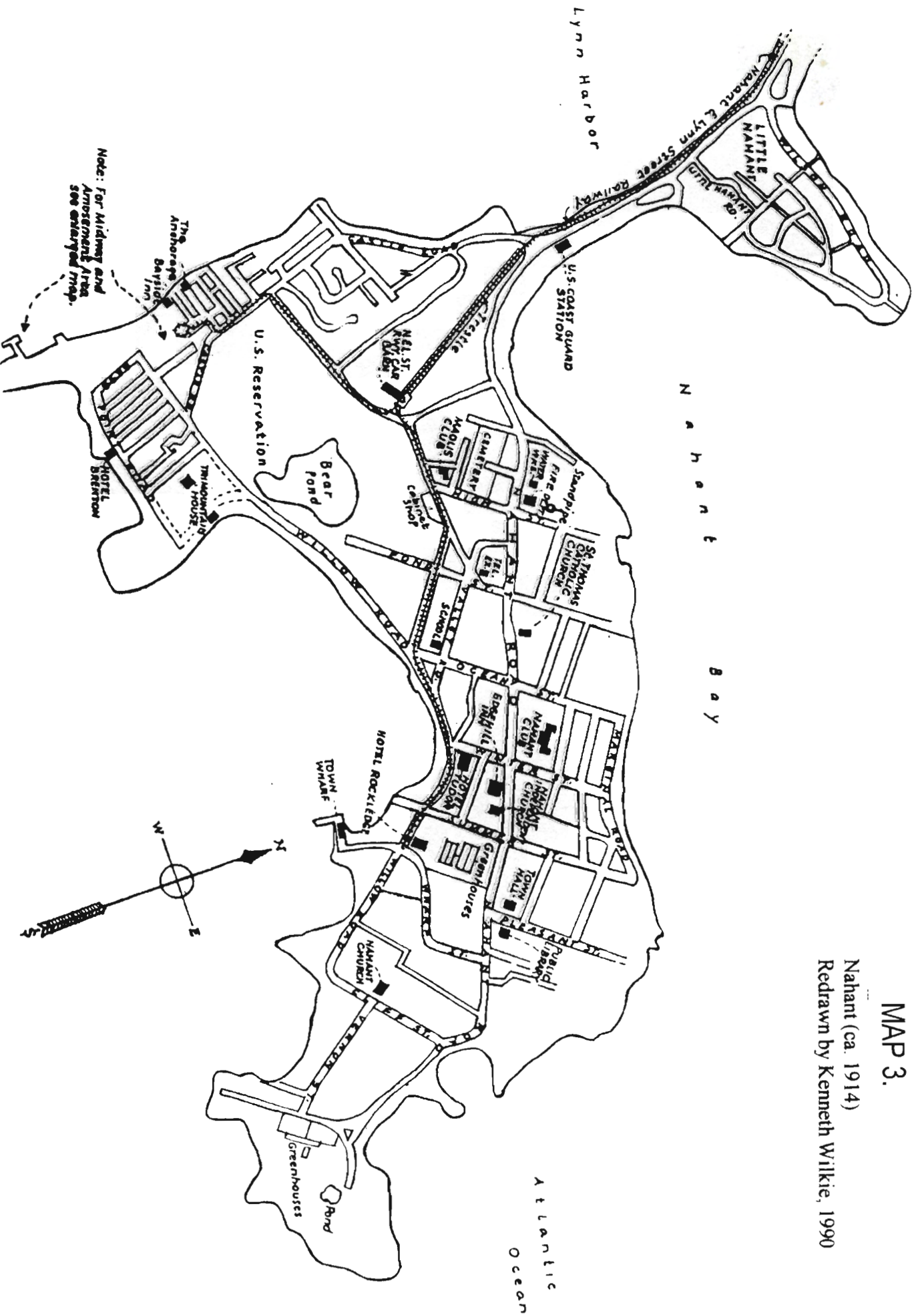


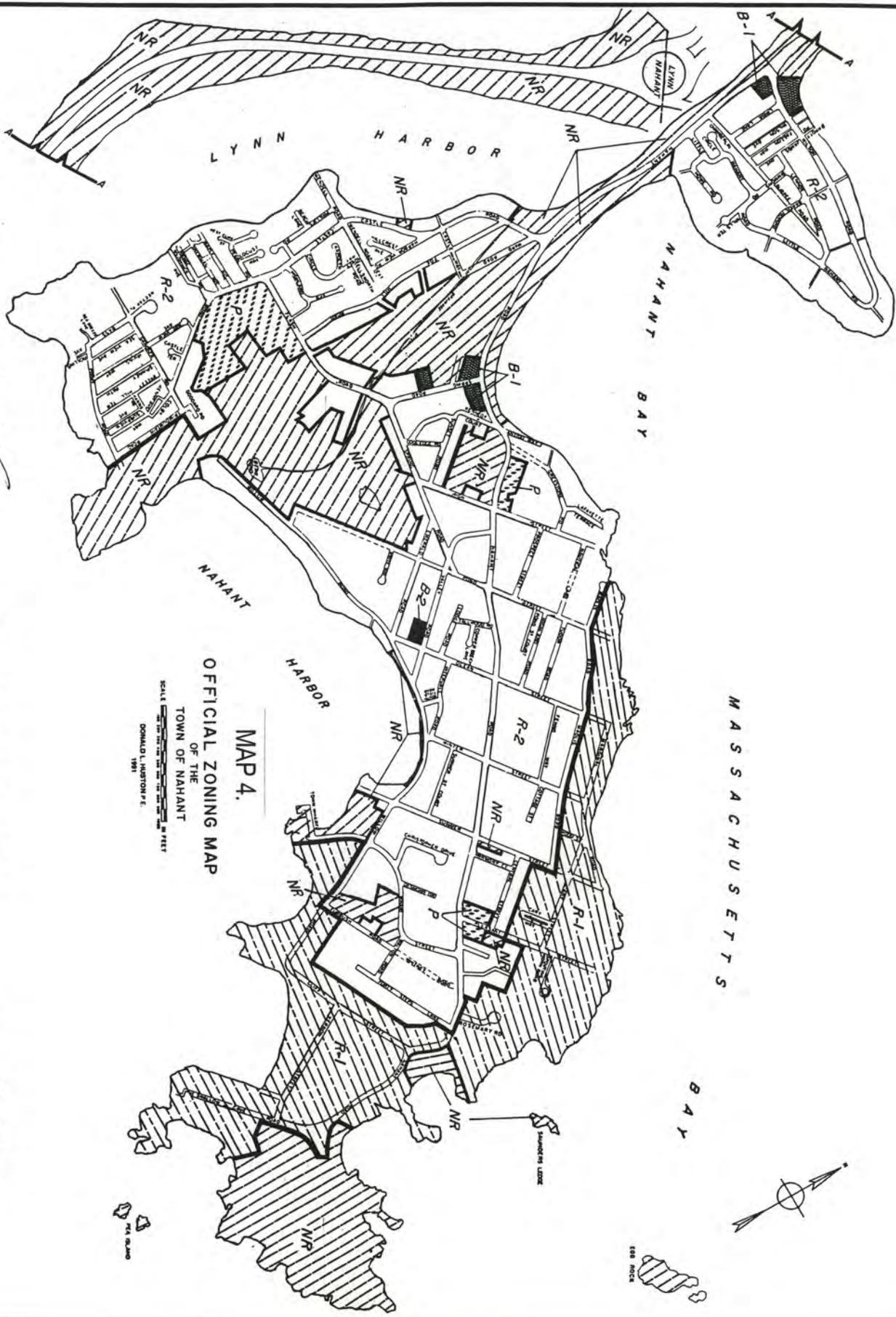
MAP 2.

Nahant as It May Have Been  
in the Seventeenth Century  
by Kenneth Wilkie, 1990

# MAP 3.

Nahant (ca. 1914)  
Redrawn by Kenneth Wilkie, 1990





**MAP 4.**  
**OFFICIAL ZONING MAP**  
**OF THE**  
**TOWN OF NAHANT**

SCALE  
 0 100 200 300 400 500 600 700 800 900 1000 FEET  
 DONALD L. HUSTON P.E.  
 1981

NAHANT PLANNING BOARD 1991  
 Chairman  
 Secretary

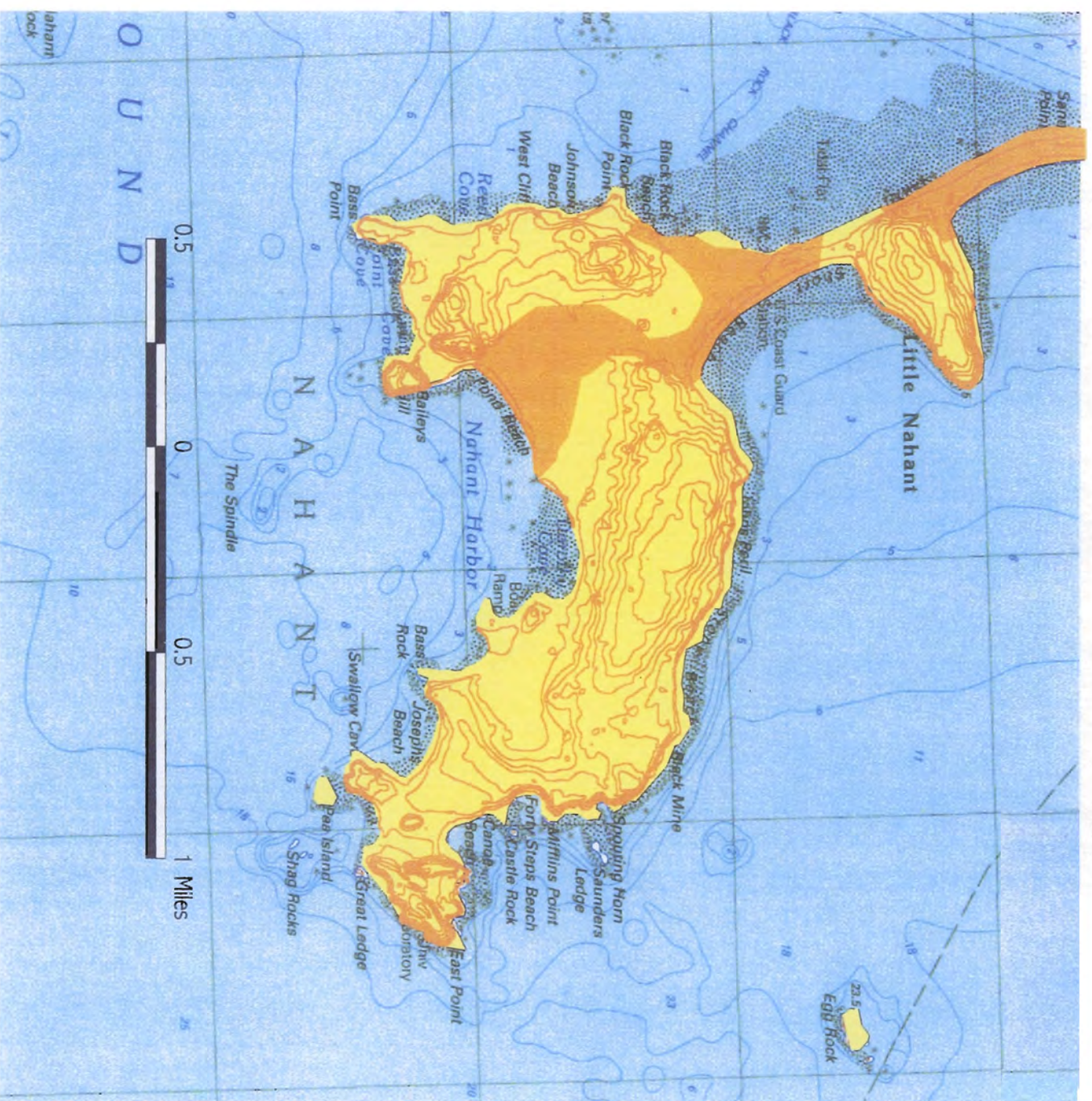
BOARD OF SELECTMEN 1991  
 Chairman  
 Secretary

THIS IS TO CERTIFY THAT THIS IS THE OFFICIAL ZONING MAP  
 REFERRED TO IN SECTION 30A OF THE ZONING BYLAW OF THE  
 TOWN OF NAHANT, MASSACHUSETTS DUELY ADOPTED ON APRIL 20,  
 1991, AS AMENDED TO DATE.  
 Donald L. Huston  
 TOWN CLERK

- DISTRICTS**
- R-1 RESIDENTIAL
  - R-2 RESIDENTIAL
  - B-1 BUSINESS
  - B-2 RESTRICTED BUSINESS
  - NR NATURAL RESOURCE
  - P PUBLIC



# MAP 5. Surficial Geology of Nahant



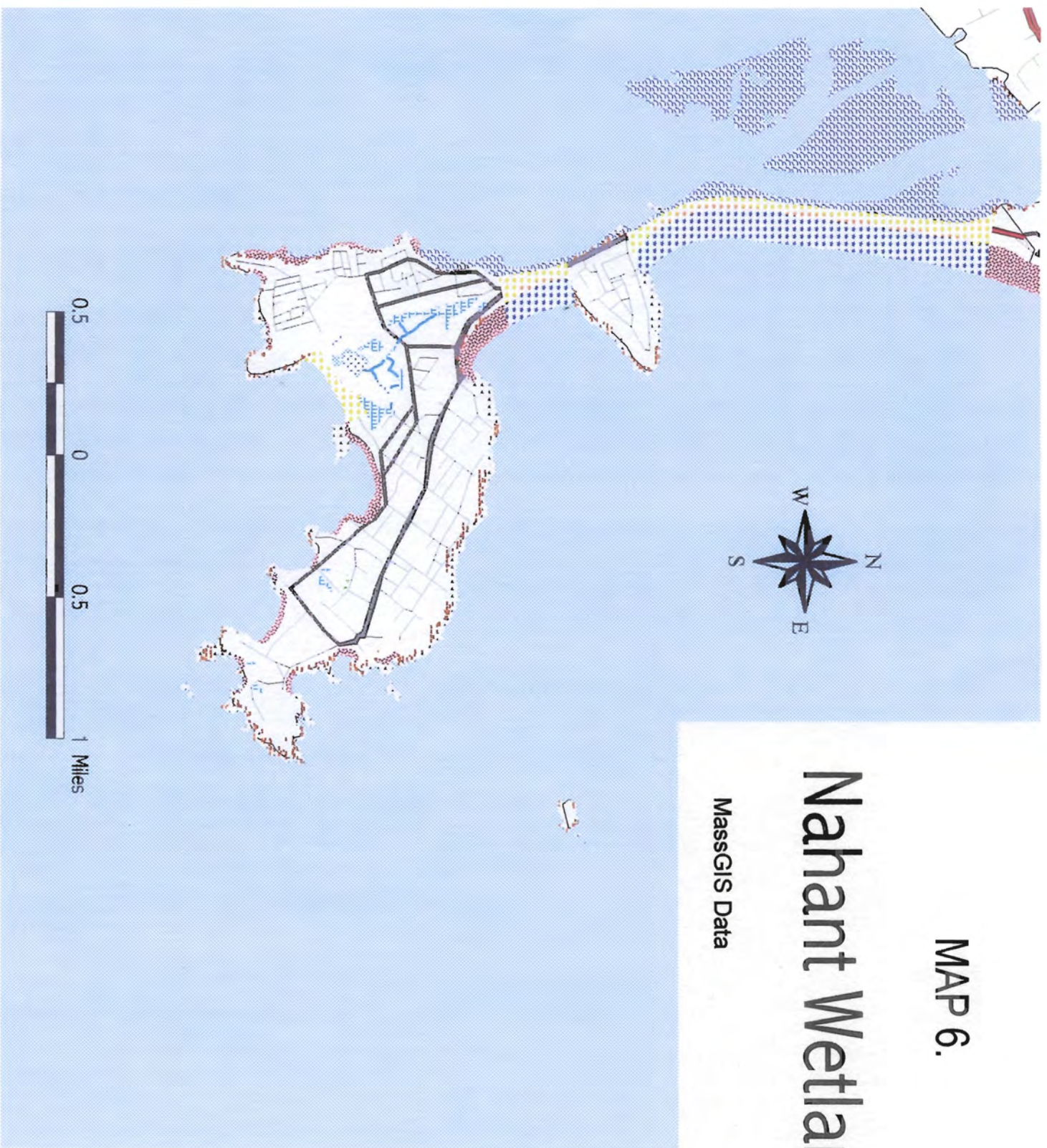
-  3 Meter Contours
-  Surficial Geology
-  Sand & Gravel
-  Till or Bedrock



MAP 6.

# Nahant Wetlands

MassGIS Data



- Wetland Types (SK)
- Barrier Beach System
  - Barrier Beach-Coastal Beach
  - Barrier Beach-Coastal Dune
  - Coastal Bank Bluff or Sea Cliff
  - Coastal Beach
  - Deep Marsh
  - Open Water
  - Rocky Intertidal Shore
  - Salt Marsh
  - Shallow Marsh Meadow or Fen
  - Tidal Flat
  - Wooded Swamp Deciduous



This map is based on one by Alonzo Lewis amended by John Q. Hammond in 1871 and on histories of Nahant by James J. Deveney, as well as on townscapes, suggestions and personal observations.

† This symbol means a structure which was built before 1853 and is still standing.

— Leg. H. Deane, Napier, N.Y.



The fabled Sea Serpent seen off Nahant in 1819.

ELLINGWOOD CHAPEL 1920  
Built by Joseph and Louisa Johnson, Nahant's first Catholics.

LYNN

HARBOR

BLACK Lobster Rocks

RELAY HOUSE, once a good place for lobster dinner.

OLD BEAR POND where the golf links are now.

# A MAP of NAHANT

## PAST and PRESENT

### MADE FOR the BICENTENNIAL CELEBRATION 1976



MAP 7.



1. WITCH HOUSE  
2. MAJORS CLUB, NOW THE MAJORS GARDENS  
3. AMERICAN LEGION HALL  
4. MAJORS CLUB, NOW THE MAJORS GARDENS

5. MAJORS CLUB, NOW THE MAJORS GARDENS  
6. MAJORS CLUB, NOW THE MAJORS GARDENS

7. POLICE STATION  
8. MAJORS CLUB, NOW THE MAJORS GARDENS

9. MAJORS CLUB, NOW THE MAJORS GARDENS  
10. MAJORS CLUB, NOW THE MAJORS GARDENS

11. MAJORS CLUB, NOW THE MAJORS GARDENS  
12. MAJORS CLUB, NOW THE MAJORS GARDENS

13. MAJORS CLUB, NOW THE MAJORS GARDENS  
14. MAJORS CLUB, NOW THE MAJORS GARDENS

15. Nahant Steamer "NELLY" of the 1850's  
16. Nahant Steamer "NELLY" of the 1850's

17. Nahant Steamer "NELLY" of the 1850's  
18. Nahant Steamer "NELLY" of the 1850's

19. Nahant Steamer "NELLY" of the 1850's  
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28. Nahant Steamer "NELLY" of the 1850's

29. Nahant Steamer "NELLY" of the 1850's  
30. Nahant Steamer "NELLY" of the 1850's



Map 8. Open space by ownership

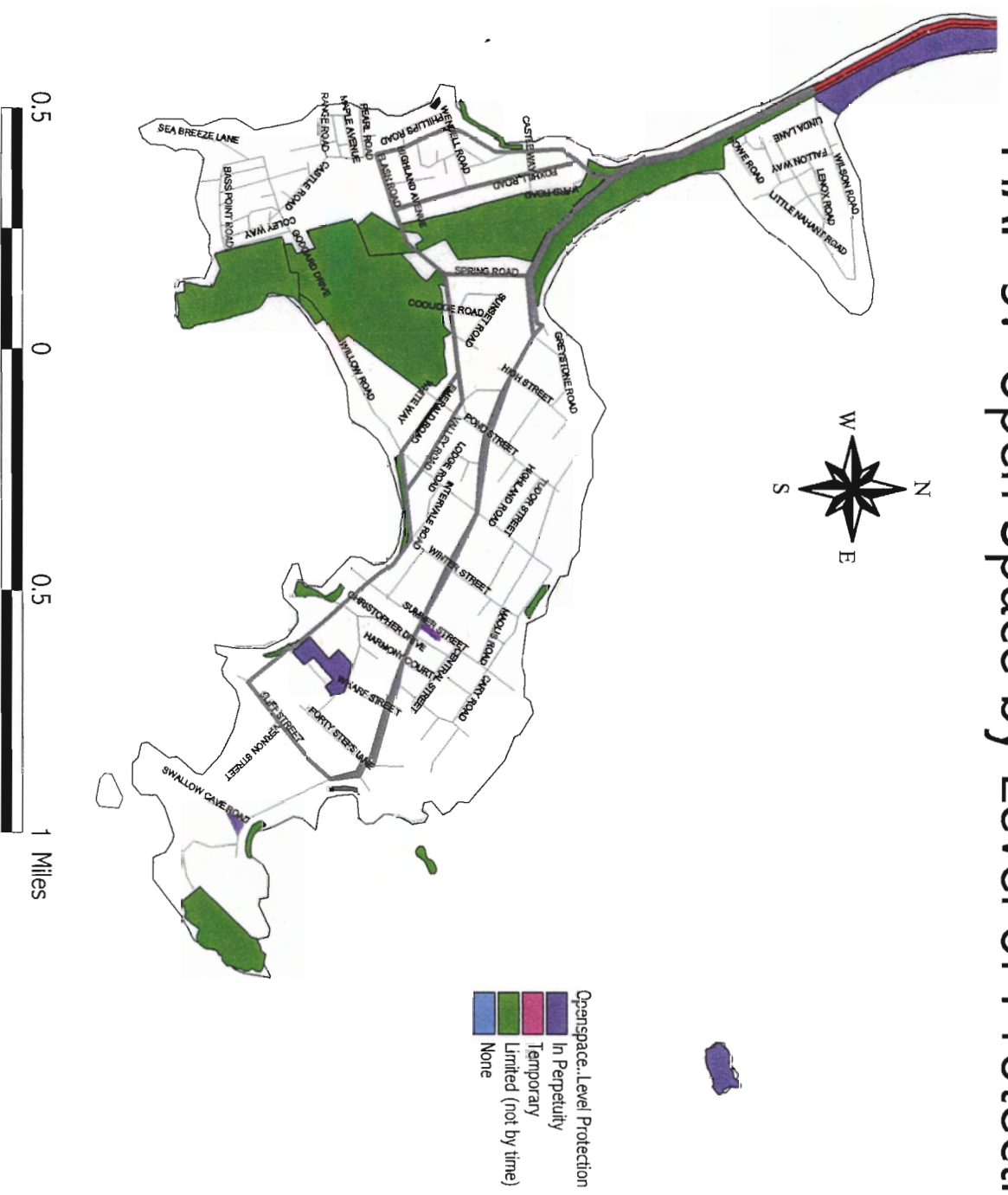
Legend:

- DPWELE
- MDC
- MUNICIPAL
- PRIVATE NON-PROFIT

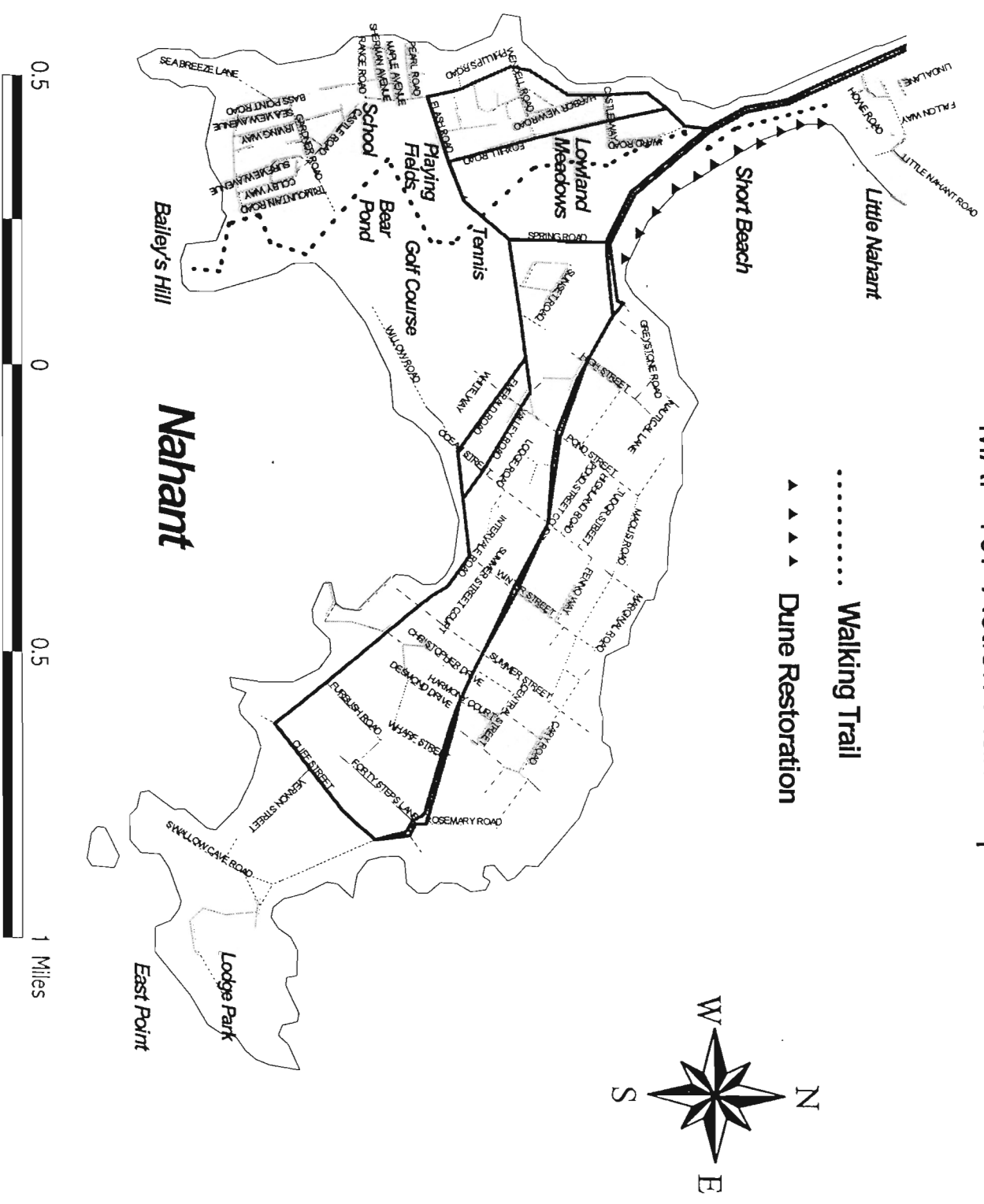
Map 8. Open space by ownership



# MAP 9. Open Space by Level of Protection



# MAP 10. Action Plan Map

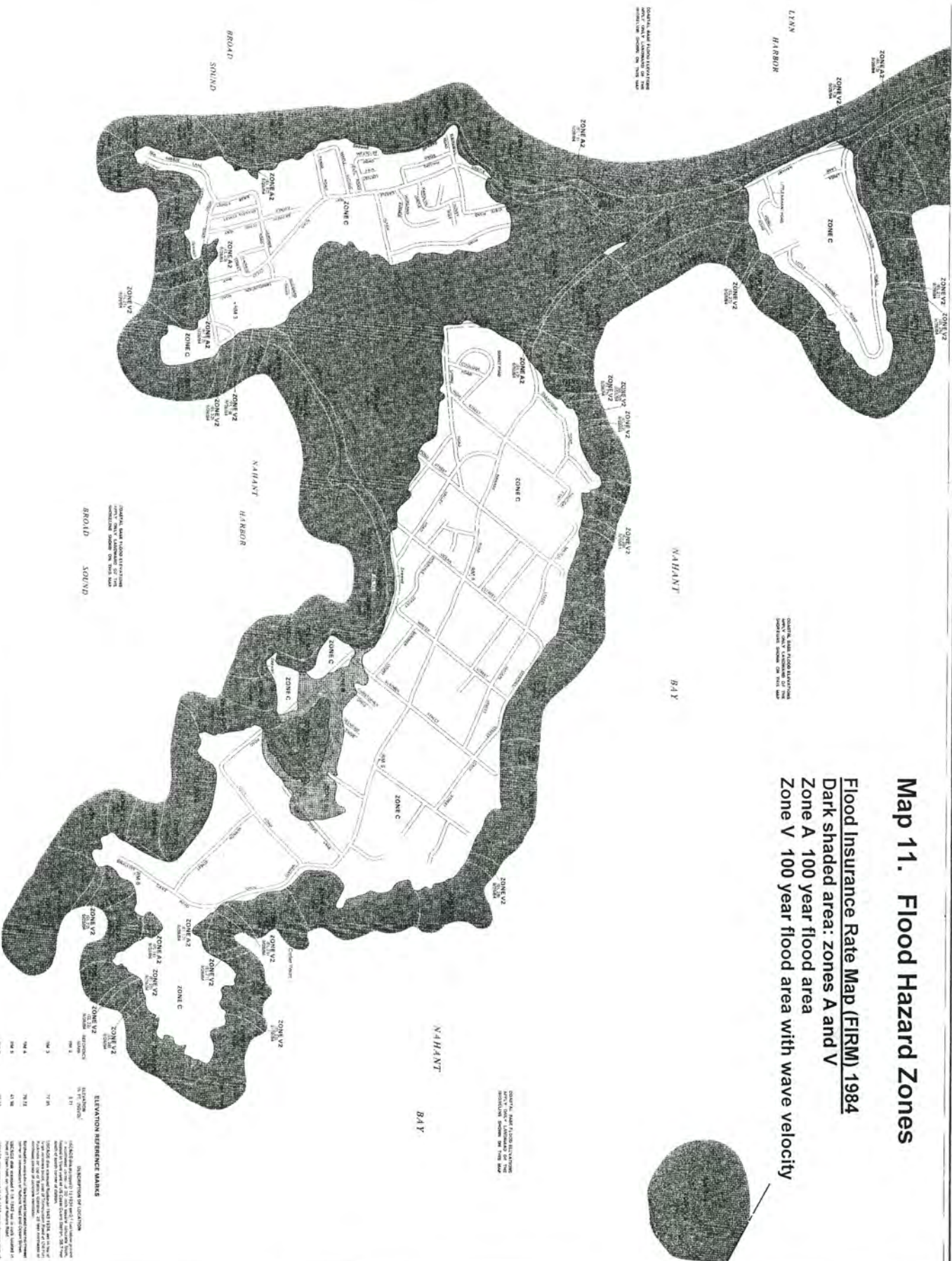




# Map 11. Flood Hazard Zones

Flood Insurance Rate Map (FIRM) 1984

Dark shaded area: zones A and V  
Zone A 100 year flood area  
Zone V 100 year flood area with wave velocity



## KEY TO MAP



100 Year Flood Hazard Zone  
100 Year Flood Hazard Zone with Wave Velocity  
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**FIRM**  
FLOOD INSURANCE RATE MAP  
NAHANT, MASSACHUSETTS  
ESSEX COUNTY  
FIRM 1 OF 5  
COMMUNITY PANEL NUMBER  
25000 000 5  
SEPTEMBER 20, 1984  
MAP REVISION  
Flood Insurance Rate Map

Appendix 4

Inventory of Lands of Conservation and Recreation Interest:

- A. Matrix
- B. Description of Sites
- C. Map of Sites

# Inventory of Lands of Conservation and Recreation Interest

## A. Matrix

### Private Lands

Site No.	Site	Owner	Manager	Use	Funds Used	Condition	Recreational Potential	Public Access	Zoning	Degree of Protection*
12	Northeastern University	Northeastern University	Northeastern University	Education, Research, Recreation	Private	NA	Medium	Free	Natural Resource	Limited
18	Cary Street Club	Cary Street Club	Cary Street Club	Recreation	Private	NA	Medium	Paid	Residential	None
19	Nahant Country Club	NN Land Co.	NN Land Co.	Recreation	Private	NA	Medium	Paid	Residential	None
21	Canoe Beach (south end)	Northeastern University	Northeastern University	Recreation	Private	NA	High	Unofficial	Natural Resource	Limited
22	Curlew Beach	Private	Private	Recreation	Private	NA	Low	None	Residential	None
28	Perimeter Path No. 1	Multiple	Multiple	Recreation, Trails	Private	NA	Low	Unofficial	Residential, Natural Resource	None, Limited
29	Perimeter Path No. 2	Multiple	Multiple	Recreation, Trails	Private	NA	Low	Unofficial	Residential, Natural Resource	None, Limited
30	Boardwalk: No longer exists	NA	NA	NA	NA	NA	NA	NA	NA	NA

\*Degree of Protection = category of protection from development (for a full discussion of the categories given here, see Section 5, page 32):

1. Perpetuity: Permanent protection.
2. Limited: Somewhat protected, e.g., by zoning or conservation laws.
3. None: No protection.



## Public and Nonprofit Lands

Site No.	Site	Owner	Manager	Use	Funds Used	Condition	Recreational Potential	Public Access	Zoning	Degree of Protection
1	Bailey's Hill	Town	Board of Selectmen	Recreation	None	Good	High	Free	Natural Resource	Limited
2	Greenlawn Cemetery	Town	Board of Selectmen	Cemetery	None	Excellent	Low	Free	Natural Resource	Limited
3	East Point / Lodge Park	Town	Board of Selectmen	Recreation	Town	Excellent	High	Free	Natural Resource	Limited
4	Golf Course	Town	Birdie Golf Management	Recreation	Town	Good	High	Paid/Free	Natural Resource	Limited
5	Flash Road Playground	Town	Board of Selectmen	Recreation	None	Good	High	Free	Natural Resource	Limited
6	Little Nahant Playground	Town	Board of Selectmen	Recreation	None	Good	High	Free	Natural Resource	None
7	Lowlands Playground	Town	Board of Selectmen	Recreation	None	Good	High	Free	Natural Resource	Limited
8	Pleasant Street Playground	Town	Board of Selectmen	Recreation	None	Good	High	Free	Natural Resource	Limited
9	Lowlands Ballfields	Town	Board of Selectmen	Recreation	None	Good	High	Free	Natural Resource	Limited
10	Lowlands / Meadows Open Space	Town	Board of Selectmen	Conservation, Trails	None	Poor	Medium	Free	Natural Resource	Limited
11	Marjoram Park	Town	Board of Selectmen	Recreation	None	Excellent	Medium	Free	Natural Resource	Limited
13	Spring Road Basketball Court	Town	Board of Selectmen	Recreation	None	Good	High	Free	Natural Resource	Limited
14	Swallow Cave	Town	Board of Selectmen	Recreation	None	Good	Low	Free	Residential	None
15	Tudor Wharf	Town	Board of Selectmen	Recreation, Business	None	Good	High	Free	Natural Resource	Limited
16	Nahant/Long Beach	Dept. of Conservation & Recreation	Dept. of Conservation & Recreation	Recreation	None	Good	High	Paid/Free	Natural Resource	Perpetuity













## Public and Nonprofit Lands (continued)

Site No.	Site	Owner	Manager	Use	Funds Used	Condition	Recreational Potential	Public Access	Zoning	Degree of Protection
17	Life Saving Station	Town	Board of Selectmen	To be determined	None	Good	High	Free	Residential	None
20	Black Rock Beach	Town	Board of Selectmen	Recreation	None	Good	Low	Free	Natural Resource	Limited
23	Forty Steps Beach	Town	Board of Selectmen	Recreation	None	Excellent	Medium	Free	Natural Resource	Limited
24	Lynn Harborside	Department of Conservation & Recreation	Department of Conservation & Recreation	Recreation	None	Good	Low	Free	Natural Resource	Limited
25	Short Beach	Town	Board of Selectmen	Recreation	None	Good	High	Free	Natural Resource	Limited
26	Stony Beach	Town	Board of Selectmen	Scenic	None	Good	Low	Free	Residential	None
27	Tudor Beach	Town	Board of Selectmen	Recreation	None	Good	High	Free	Natural Resource	Limited
31	16 James Avenue Steps	Town	Board of Selectmen	Recreation	None	Good	Low	Free	Residential	None
32	Audubon Sanctuary (The Thicket)	Massachusetts Audubon	Massachusetts Audubon	Recreation	Private	Good	Medium	Free	Natural Resource	Perpetuity
33	Bangs Trust	Town	Conservation Commission	Buffer Zone	Gift	Good	None	Free	Residential	Perpetuity
34	Egg Rock	Town	Dept. of Fish and Wildlife	Not suitable for public use	State	Good	None	NA	Natural Resource	Perpetuity
35	Canoe Beach (north end) / Lodge Grant	Town	Board of Selectmen	Recreation	Gift	Good	Medium	Free	Residential	Perpetuity Possible
36	Johnson School	Town	Board of Selectmen, Nahant School Committee	Public School	None	Good	Medium	Free	Public	None
37	Veterans Park	Town	Board of Selectmen	Recreation	None	Excellent	Low	Free	Natural Resource	Limited
38	69 Wharf St/Walton	Nahant Preservation Trust	Nahant Preservation Trust	Open Space Conservation	None	Good	Low	Free	Residential	Limited

## Inventory of Lands of Conservation and Recreation Interest

### B. Description of Sites

#### Per Assessor's Land Book or Coastal Property Inventory

~ KEY ~					
	Walking Jogging		Sitting Sunning		Town Events
	Swimming		Boating Shallow draft		Nature Study
	Fishing		Boating Trailer size		Games
	Parking		Access on foot		Hazardous in places

*The following is an alphabetical listing: the number after the name of each site corresponds to the number on the "Inventory of Lands of Conservation and Recreation Interest: Map of Sites".*

#### BAILEY'S HILL - 1



*Location -* Along Trimountain Road in Bass Point (Fort Ruckman) area

*Access -* Park entrance at Trimountain and Bass Point Roads

Trimountain and Goddard Roads; Willow Road and Ocean View parking lot

*Condition -* Low, flat area between two hills including end of Pond Beach; blacktop and natural paths; grassy green; bench and gazebo; hills built over bunkers



#### BANG'S TRUST – 33

*Location -* Narrow strip along Town Hall side of Summer Street at Nahant Road

*Access -* From Summer Street

*Condition -* "Natural" area serving as buffer zone

## BLACKROCK BEACH - 20



*Location* - On Castle Road  
*Access* - Right of way on north end (at intersection with Nahant Road)  
*Condition* - Stony with sand; street level; shallow water



## CANOE BEACH - 21



*Location* - Along entrance to East Point, Nahant Road  
*Access* - At intersection of Nahant Road and Swallow Cave Road  
*Condition* - Stony with some sand in a cove



## CURLEW BEACH - 22



*Location* - Willow Road at intersection with Furbush Road  
*Access* - No public access (chain link fence)  
*Condition* - Stony



## DCR RESERVATION / LONG BEACH - 16



*Location* - Entrance to Nahant and Lynn end of rotary  
*Access* - Nahant end of causeway and Lynn side before causeway  
*Condition* - Sandy beach; playground at Lynn end; ball courts; boat ramp on western side, Lynn end  
 (Note: Nahant does not lease this land; it was taken by eminent domain in 1967 with easements granted for underground pipes and a calgon station on rotary island)

## EGG ROCK - 34

*Location* - One mile northeast of Nahant, in Nahant Bay  
*Access* - No docking facilities  
*Condition* - Bare rock; bird nesting area, not suitable for public use

**EAST POINT / HENRY CABOT LODGE, JR., MEMORIAL PARK - 3**



- Location* - Nahant Road at its easterly terminus  
*Access* - Through gate in fence beyond public parking area  
*Condition* - Blacktop road (for official vehicles only) passes through Northeastern University's Marine Center property to Lodge Park at top; hills built over bunkers with meadow, paths, benches



**FORTY STEPS BEACH - 23**



- Location* - Nahant Road  
*Access* - Long flight of stairs descending from road level  
*Condition* - Rocky beach in a protected cove



**GOLF COURSE - 4**



- Location* - Southwestern section of Big Nahant, bordered by Willow and Flash Roads  
*Access* - West end of Willow Road  
*Condition* - Nine hole public course with many ponds in fairways; often swampy turf

**GREENLAWN CEMETERY - 2**

- Location* - Nahant Road  
*Access* - Enter from Nahant Road or end of High Street  
*Condition* - Gravel roads; benches



**LIVE-SAVING STATION - 17**



- Location* - Nahant Road at Castle Road, abutting Short Beach  
*Access* - From Nahant Road or Short Beach  
*Condition* - Historical Life Saving Station with accompanying facilities (use to be determined); expanse of sandy Town beach



## LODGE GRANT - 35



*Location* - End of Nahant Road, start of Swallow Cave Road  
*Access* - Triangular park on road side abutting parking area to Northeastern and East Point  
*Condition* - Grassy; benches

## LOWLANDS - 7 & 10



*Location* - Between Ward, Spring, Nahant Roads and a “paper” road paralleling Fox Hill Road  
*Access* - Nahant Road (Town parking lot); Spring Road; Ward Road  
*Condition* - Partially developed for recreation; mostly wetlands with one major drainage ditch; trail. Former site of Town dump, now composting area for yard waste; southerly portion undeveloped and over grown except for portion leased for lobster trap storage

## LYNN HARBORSIDE - 24



*Location* - Nahant Road between Wilson and Castle Roads  
*Access* - Opposite Wilson Road and also at Castle Road  
*Condition* - Sandy beach blending to dunes with some rock riprap; narrow turf strip below road between Wilson and Little Nahant Roads; shallow water; dogs allowed on beach year round



## MARJORAM PARK - 11



*Location* - Willow Road and Wharf Street  
*Access* - From either Willow Road or Wharf Street  
*Condition* - Mostly gentle hill with trees and ledge; flat grassy areas; benches

## NORTHEASTERN UNIVERSITY MARINE SCIENCE CENTER - 12



*Location* - Nahant Road at its eastern terminus, at intersection with Swallow Cave Road  
*Access* - Through gate  
*Condition* - Blacktop road

**SHORT BEACH - 25**



*Location* - Along Nahant Road between Little Nahant Road and Antigo Way  
*Access* - At any point along beach; Town parking lot across Nahant Road  
*Condition* - Sandy beach; gradual drop to deep water

**16 JAMES AVENUE STEPS - 31**

*Location* - Little Nahant; staircase connecting Lennox Road to Wilson Road  
*Access* - Steps  
*Condition* - Fair; railing



**STONY BEACH - 26**



*Location* - From intersection of Ocean Street and Marginal Road to Pleasant Street  
*Access* - Virtually none; rock barrier at roadside  
*Condition* - All ledge and rocks; strip of salt-marsh-grass meadow between Hood and Summer Streets; considerable scenic value only

**SWALLOW CAVE - 14**



*Location* - Southern terminus of Swallow Cave Road  
*Access* - Path from road  
*Condition* - A natural bridge in the rocky coastal bank, discernible at low tide only

**THE THICKET (Audubon Sanctuary) - 32**



*Location* - Bordered by Wharf Street and Willow, Furbush and Walton Roads (also added tracts on Furbush Road)  
*Access* - Path or natural openings on all sides; main path from Wharf Street  
*Condition* - Swampy, overgrown natural area; main path interrupted by ditch



## TUDOR BEACH - 27



*Location* - Willow Road between Valley Road and Summer Street  
*Access* - Steps, and concrete ramp at Summer Street end at low tide  
*Condition* - Sandy beach with some rocky spots; below street level



## TUDOR WHARF - 15



*Location* - Willow Road at Wharf Street  
*Access* - From street or water  
*Condition* - Launching ramp; pram racks; floats; loading piers; moorings or boat storage; benches



## VETERANS PARK - 37



*Location* - Intersection of Nahant and Castle Roads  
*Access* - At any point  
*Condition* - Grassy; blacktop path; benches



## WHARF STREET - 38



*Location* - Corner of Wharf and Walton Streets  
*Access* - From street  
*Condition* - "Natural" area serving as buffer zone





**PLAYGROUNDS** (Under management of Recreation Commission, except for the Johnson School)



**FLASH ROAD - 5**

*Location* - Behind Fire Station and DPW building  
*Contains* - Little League field; soccer and Babe Ruth field; playground; tennis and basketball courts



**JOHNSON SCHOOL - 36**

*Location* - Corner of Flash and Castle Roads  
*Contains* - To be determined; under construction at this time

**LITTLE NAHANT - 6**

*Location* - Nahant Road at Little Nahant corner of Short Beach  
*Contains* - Swings; basketball court; table shelter

**LOWLANDS - 9**

*Location* - Nahant Road opposite Short Beach  
*Contains* - Two softball fields; playground; Town parking lot

**PLEASANT STREET - 8**

*Location* - Behind Public Library, at intersection of Pleasant and Central Streets  
*Contains* - Playground

**SPRING ROAD - 13**

*Location* - Entrance to Town composting area  
*Contains* - Basketball court

**CLUBS** (Listed for Open Space aspects only)

**CARY STREET (closed membership) - 18**

*Location* - Cary Street at Summer Street  
*Contains* - Outdoor pool; tennis courts



**DORY CLUB (open membership) - 15**

*Location* - Town Wharf  
*Contains* - Sailboat activities center; (Public use by arrangement)



**NAHANT COUNTRY CLUB (open membership) - 19**

*Location* - Nahant Road between Ocean and Winter Streets  
*Contains* - Tennis courts; grassy green; (Some public use by arrangement)



## **PATHS**



### **SHORT BEACH BLACKTOP PATH - 25**

*Location* - Along Nahant Road running the length of Short Beach  
*Access* - Nahant Road; Town parking lot opposite Short Beach  
*Condition* - Three-foot-side path continuing length of Short Beach



### **BOARDWALK - 30**

*Location* - Little Nahant, between Howe Road and Mills Terrace  
*Access* - Right of way from both streets  
*Condition* - Nonexistent except on paper

## **UNOFFICIAL OPEN SPACE SITES**

### **PATHS:**



#### **PERIPHERAL PATH 1 - 28**

*Location* - From Summer Street at Marginal Road to Forty Steps Beach  
*Access* - Summer Street at Marginal Road; right of way from northern end of Pleasant Street; Forty Steps Beach  
*Condition* - Traversable in its entirety by walking the remnant of the original path (mainly from Summer Street to the extension of Pleasant Street, or by descending from eroded ledges or banks to the high-water mark at low to mid-tide; in most areas neither genteel nor safe)



#### **PERIPHERAL PATH 2 - 29**

*Location* - Between Swallow Cave and (approximately) Curlew Beach  
*Access* - Swallow Cave and Joseph's Beach  
*Condition* - Sandy beach and rock ledges; difficult because of property-rights issues; not genteel

The following have historic and scenic value and virtually no public access except by beach or water:

**“BLACK MINES”**

**“POOL OF MAOLIS”**

**BASS POINT COVE**

**CASTLE ROCK**

**JOHN'S PERIL**

**JOSEPH'S BEACH**

**MARY'S GROTTO**

**MIFFLIN'S POINT**

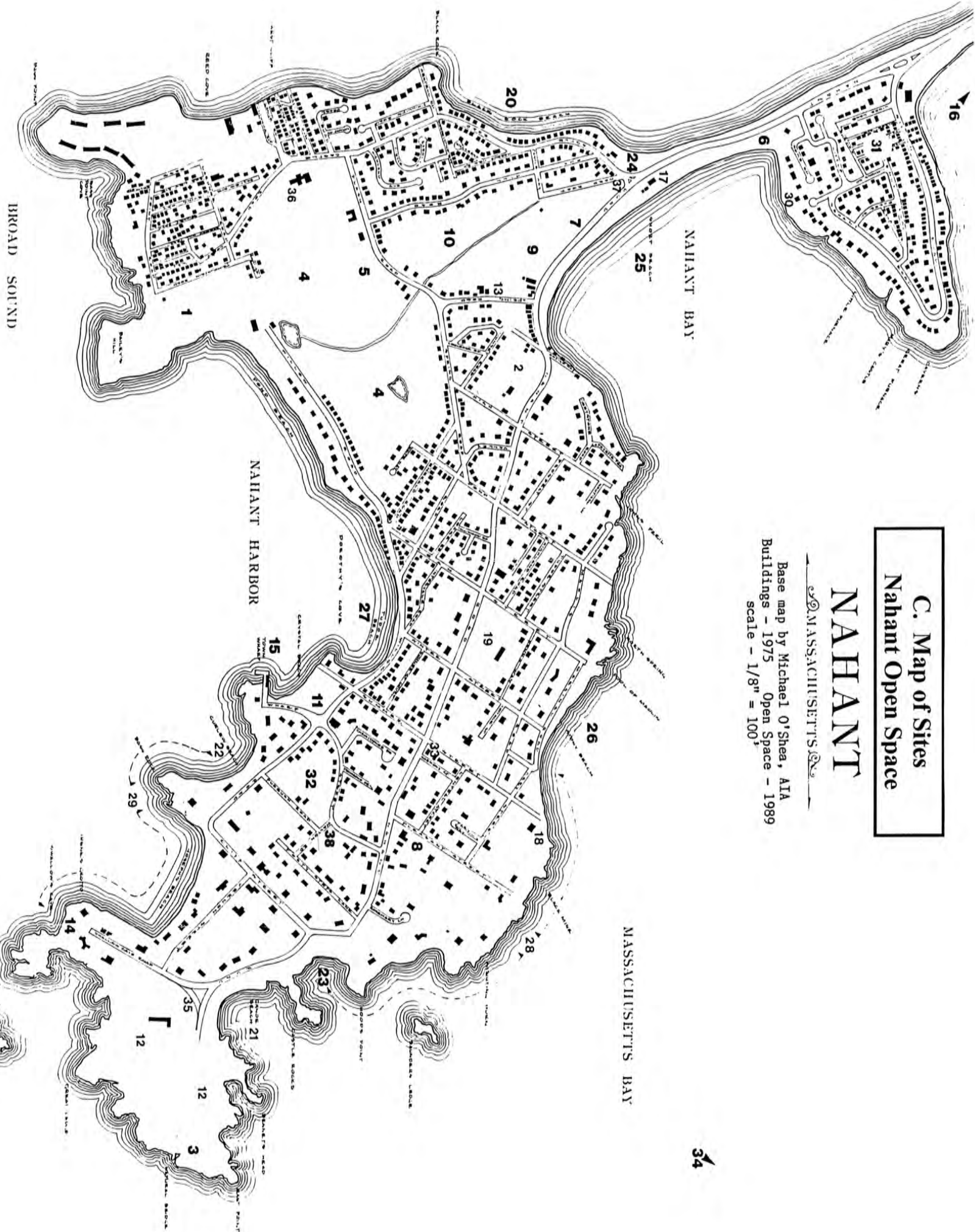
**NORTH SPRING**

**SPOUTING HORN**

### C. Map of Sites Nahant Open Space

MASSACHUSETTS

Base map by Michael O'Shea, AIA  
Buildings - 1975    Open Space - 1989  
scale - 1/8" = 100'



Appendix 5

- A. Birds of Nahant
- B. List of Endangered, Threatened, and Special Bird Species  
Occurring in Nahant

## Appendix 5A. Birds of Nahant

258 Species Compiled by Linda Pivacek, October 2006

Species seen annually in suitable habitat and season unless noted as follows:

\* Uncommon      A: Accidental, rare vagrant

\*\* Rare      H: Historical, not recorded for more than 20 years

Sequence follows AOU Checklist, 8<sup>th</sup> edition.

### LOONS

Red-throated Loon  
*Gavia stellata*  
Common Loon  
*Gavia immer*

### GREBES

Pied-billed Grebe \*\*  
*Podilymbus podiceps*  
Red-necked Grebe  
*Podiceps grisegena*  
Horned Grebe  
*Podiceps auritus*  
Western Grebe A  
*Aechmophorus occidentalis*

### ALBATROSSES

Albatross (Yellow-nosed) A  
*Thalassarche sp*

### SHEARWATERS AND STORM-PETRELS

Greater Shearwater  
*Puffinus gravis*  
Manx Shearwater \*\*  
*Puffinus puffinus*  
Wilson's Storm-Petrel  
*Oceanites oceanicus*

### GANNETS

Northern Gannet  
*Morus bassanus*

### CORMORANTS, ANHINGAS AND FRIGATEBIRDS

Double-crested Cormorant  
*Phalacrocorax auritus*  
Great Cormorant  
*Phalacrocorax carbo*  
Anhinga A  
*Anhinga anhinga*  
Magnificent Frigatebird A  
*Fregata magnificens*

### HERONS, EGRETS, BITTERNS AND IBIS

Great Blue Heron  
*Ardea herodias*  
Great Egret  
*Ardea alba*  
Snowy Egret  
*Egretta thula*  
Cattle Egret H  
*Bubulcus ibis*  
Green Heron  
*Butorides virescens*  
Black-crowned Night-Heron  
*Nycticorax nycticorax*  
Yellow-crowned Night-Heron  
\*  
*Nyctanassa violacea*  
American Bittern  
*Botaurus lentiginosus*  
Glossy Ibis \*  
*Plegadis falcinellus*

### DUCKS, GEESE AND SWANS

Mute Swan  
*Cygnus olor*  
Snow Goose \*  
*Chen caerulescens*  
Canada Goose  
*Branta canadensis*  
Brant  
*Branta bernicla*  
Wood Duck  
*Aix sponsa*  
American Wigeon \*  
*Anas americana*  
Gadwall \*  
*Anas strepera*  
Green-winged Teal  
*Anas carolinensis*  
Mallard  
*Anas platyrhynchos*  
American Black Duck  
*Anas rubripes*  
Northern Pintail \*  
*Anas acuta*  
Northern Shoveler \*  
*Anas clypeata*  
Ring-necked Duck \*  
*Aythya collaris*  
Greater Scaup  
*Aythya marila*  
Lesser Scaup  
*Aythya affinis*  
Common Eider  
*Somateria mollissima*  
King Eider \*  
*Somateria spectabilis*

<p>Harlequin Duck *</p> <p><i>Histrionicus histrionicus</i></p> <p>Long-tailed Duck</p> <p><i>Clangula hyemalis</i></p> <p>Black Scoter</p> <p><i>Melanitta nigra</i></p> <p>Surf Scoter</p> <p><i>Melanitta perspicillata</i></p> <p>White-winged Scoter</p> <p><i>Melanitta fusca</i></p> <p>Common Goldeneye</p> <p><i>Bucephala clangula</i></p> <p>Barrow's Goldeneye *</p> <p><i>Bucephala islandica</i></p> <p>Bufflehead</p> <p><i>Bucephala albeola</i></p> <p>Hooded Merganser **</p> <p><i>Lophodytes cucullatus</i></p> <p>Red-breasted Merganser</p> <p><i>Mergus serrator</i></p> <p>Ruddy Duck</p> <p><i>Oxyura jamaicensis</i></p> <p><b>VULTURES, HAWKS, EAGLES AND KITES</b></p> <p>Turkey Vulture **</p> <p><i>Cathartes aura</i></p> <p>Osprey</p> <p><i>Pandion haliaetus</i></p> <p>Bald Eagle **</p> <p><i>Haliaeetus leucocephalus</i></p> <p>Northern Harrier *</p> <p><i>Circus cyaneus</i></p> <p>Sharp-shinned Hawk</p> <p><i>Accipiter striatus</i></p> <p>Cooper's Hawk</p> <p><i>Accipiter cooperii</i></p> <p>Northern Goshawk **</p> <p><i>Accipiter gentilis</i></p> <p>Broad-winged Hawk **</p> <p><i>Buteo platypterus</i></p> <p>Red-tailed Hawk</p> <p><i>Buteo jamaicensis</i></p> <p>Rough-legged Hawk **</p> <p><i>Buteo lagopus</i></p> <p><b>FALCONS</b></p> <p>American Kestrel</p> <p><i>Falco sparverius</i></p>	<p>Merlin</p> <p><i>Falco columbarius</i></p> <p>Gyr Falcon **</p> <p><i>Falco rusticolus</i></p> <p>Peregrine Falcon</p> <p><i>Falco peregrinus</i></p> <p><b>PHEASANTS AND CRANES</b></p> <p>Ring-necked Pheasant</p> <p><i>Phasianus colchicus</i></p> <p>Sandhill Crane A</p> <p><i>Grus canadensis</i></p> <p><b>RAILS AND COOTS</b></p> <p>Sora H</p> <p><i>Porzana carolina</i></p> <p>American Coot **</p> <p><i>Fulica Americana</i></p> <p><b>OYSTERCATCHERS AND PLOVERS</b></p> <p>American Oystercatcher **</p> <p><i>Haematopus palliatus</i></p> <p>Black-bellied Plover</p> <p><i>Pluvialis squatarola</i></p> <p>Semipalmated Plover</p> <p><i>Charadrius semipalmatus</i></p> <p>Killdeer *</p> <p><i>Charadrius vociferus</i></p> <p>Piping Plover *</p> <p><i>Charadrius melodus</i></p> <p><b>SANDPIPERS</b></p> <p>American Woodcock</p> <p><i>Scolopax minor</i></p> <p>Wilson's Snipe *</p> <p><i>Gallinago delicata</i></p> <p>Short-billed Dowitcher</p> <p><i>Limnodromus griseus</i></p> <p>Greater Yellowlegs</p> <p><i>Tringa melanoleuca</i></p> <p>Upland Sandpiper **</p> <p><i>Bartramia longicauda</i></p> <p>Solitary Sandpiper</p> <p><i>Tringa solitaria</i></p> <p>Spotted Sandpiper</p> <p><i>Actitis macularia</i></p>	<p>Willet **</p> <p><i>Catoptrophorus semipalmatus</i></p> <p>Ruddy Turnstone</p> <p><i>Arenaria interpres</i></p> <p>Sanderling</p> <p><i>Calidris alba</i></p> <p>Semipalmated Sandpiper</p> <p><i>Calidris pusilla</i></p> <p>Western Sandpiper</p> <p><i>Calidris mauri</i></p> <p>Least Sandpiper</p> <p><i>Calidris minutilla</i></p> <p>White-rumped Sandpiper</p> <p><i>Calidris fuscicollis</i></p> <p>Baird's Sandpiper **</p> <p><i>Calidris bairdii</i></p> <p>Pectoral Sandpiper</p> <p><i>Calidris melanotos</i></p> <p>Dunlin</p> <p><i>Calidris alpina</i></p> <p>Purple Sandpiper</p> <p><i>Calidris maritima</i></p> <p>Buff-breasted Sandpiper **</p> <p><i>Tryngites subruficollis</i></p> <p><b>GULLS</b></p> <p>Ring-billed Gull</p> <p><i>Larus delawarensis</i></p> <p>California Gull A</p> <p><i>Larus californicus</i></p> <p>Great Black-backed Gull</p> <p><i>Larus marinus</i></p> <p>American Herring Gull</p> <p><i>Larus smithsonianus</i></p> <p>Iceland Gull *</p> <p><i>Larus Glaucoides</i></p> <p>Lesser Black-backed Gull **</p> <p><i>Larus fuscus</i></p> <p>Black-headed Gull *</p> <p><i>Larus ridibundus</i></p> <p>Bonaparte's Gull</p> <p><i>Larus philadelphia</i></p> <p>Laughing Gull</p> <p><i>Larus atricilla</i></p> <p>Little Gull *</p> <p><i>Larus minutus</i></p>
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## TERNS AND SKIMMERS

Caspian Tern \*  
*Sterna caspia*  
 Roseate Tern \*  
*Sterna dougallii*  
 Common Tern  
*Sterna hirundo*  
 Forster's Tern \*\*  
*Sterna forsteri*  
 Black Skimmer A  
*Rynchops niger*

## AUKS, MURRES AND PUFFINS

Thick-billed Murre \*  
*Uria lomvia*  
 Razorbill  
*Alca torda*  
 Black Guillemot  
*Cephus grylle*  
 Atlantic Puffin \*\*  
*Fratercula arctica*

## PIGEONS AND DOVES

Rock Pigeon  
*Columba livia*  
 Mourning Dove  
*Zenaida macroura*

## CUCKOOS

Black-billed Cuckoo  
*Coccyzus erythrophthalmus*  
 Yellow-billed Cuckoo \*  
*Coccyzus americanus*

## BARN-OWLS AND OWLS

Barn Owl \*\*  
*Tyto alba*  
 Great Horned Owl  
*Bubo virginianus*  
 Snowy Owl  
*Bubo scandiacus*  
 Barred Owl  
*Strix varia*  
 Northern Saw-whet Owl \*\*  
*Aegolius acadicus*  
 Northern Long-eared Owl \*\*  
*Asio otus*

Short-eared Owl \*  
*Asio flammeus*

## NIGHTJARS

Common Nighthawk \*  
*Chordeiles minor*  
 Whip-poor-will \*\*  
*Caprimulgus vociferus*

## SWIFTS

Chimney Swift  
*Chaetura pelagica*

## HUMMINGBIRDS

Ruby-throated Hummingbird  
*Archilochus colubris*

## KINGFISHERS

Belted Kingfisher  
*Ceryle alcyon*

## WOODPECKERS

Red-bellied Woodpecker \*  
*Melanerpes carolinus*  
 Yellow-bellied Sapsucker \*  
*Sphyrapicus varius*  
 Downy Woodpecker  
*Picoides pubescens*  
 Hairy Woodpecker \*  
*Picoides villosus*  
 Northern Flicker  
*Colaptes auratus*

## TYRANT FLYCATCHERS

Eastern Wood-Pewee  
*Contopus virens*  
 Yellow-bellied Flycatcher \*  
*Empidonax flaviventris*  
 Alder Flycatcher \*  
*Empidonax alnorum*  
 Willow Flycatcher  
*Empidonax traillii*  
 Least Flycatcher  
*Empidonax minimus*  
 Eastern Phoebe  
*Sayornis phoebe*  
 Great Crested Flycatcher  
*Myiarchus crinitus*

Eastern Kingbird  
*Tyrannus tyrannus*

## SWALLOWS

Purple Martin  
*Progne subis*  
 Tree Swallow  
*Tachycineta bicolor*  
 Northern Rough-winged Swallow  
*Stelgidopteryx serripennis*  
 Cave Swallow \*\*  
*Petrochelidon fulva*  
 Barn Swallow  
*Hirundo rustica*

## LARKS AND PIPITS

Horned Lark \*  
*Eremophila alpestris*  
 American Pipit \*\*  
*Anthus rubescens*

## KINGLETS

Golden-crowned Kinglet  
*Regulus satrapa*  
 Ruby-crowned Kinglet  
*Regulus calendula*

## WAXWINGS

Cedar Waxwing  
*Bombycilla cedrorum*

## WRENS

Carolina Wren  
*Thryothorus ludovicianus*  
 Winter Wren  
*Troglodytes troglodytes*  
 House Wren  
*Troglodytes aedon*

## MOCKINGBIRDS AND THRASHERS

Northern Mockingbird  
*Mimus polyglottus*  
 Brown Thrasher  
*Toxostoma rufum*

## THRUSHES

Veery  
*Catharus fuscescens*  
 Gray-cheeked/Bicknell's  
 Thrush \*  
*Catharus minimus/bicknelli*  
 Swainson's Thrush  
*Catharus ustulatus*  
 Hermit Thrush  
*Catharus guttatus*  
 Wood Thrush  
*Hylocichla mustelina*  
 American Robin  
*Turdus migratorius*

## GNATCATCHERS

Blue-gray Gnatcatcher  
*Polioptila caerulea*

## CHICKADEES AND TITS

Black-capped Chickadee  
*Poecile atricapilla*  
 Tufted Titmouse \*  
*Baeolophus bicolor*

## NUTHATCHES AND CREEPERS

Red-breasted Nuthatch  
*Sitta canadensis*  
 White-breasted Nuthatch  
*Sitta carolinensis*  
 Brown Creeper  
*Certhia Americana*

## SHRIKES

Northern Shrike \*  
*Lanius excubitor*

## CROWS AND JAYS

Blue Jay  
*Cyanocitta cristata*  
 American Crow  
*Corvus brachyrhynchos*  
 Fish Crow \*  
*Corvus ossifragus*

## STARLINGS AND OLD WORLD SPARROWS

European Starling  
*Sturnus vulgaris*  
 House Sparrow  
*Passer domesticus*

## VIREOS AND ALLIES

White-eyed Vireo  
*Vireo griseus*  
 Blue-headed Vireo  
*Vireo solitarius*  
 Warbling Vireo  
*Vireo gilvus*  
 Philadelphia Vireo \*  
*Vireo philadelphicus*  
 Red-eyed Vireo  
*Vireo olivaceus*

## FINCHES, SISKINS, CROSSBILLS

Purple Finch \*  
*Carpodacus purpureus*  
 House Finch  
*Carpodacus mexicanus*  
 Red Crossbill \*\*  
*Loxia curvirostra*  
 White-winged Crossbill \*  
*Loxia leucoptera*  
 Common Redpoll \*  
*Carduelis flammea*  
 Pine Siskin \*  
*Carduelis pinus*  
 American Goldfinch  
*Carduelis tristis*  
 Evening Grosbeak **H**  
*Coccothraustes vespertinus*

## WOOD WARBLERS

Blue-winged Warbler \*  
*Vermivora pinus*  
 Golden-winged Warbler \*\*  
*Vermivora chrysoptera*  
 Tennessee Warbler \*  
*Vermivora peregrina*  
 Orange-crowned Warbler  
*Vermivora celata*  
 Nashville Warbler  
*Vermivora ruficapilla*

Northern Parula  
*Parula americana*  
 Yellow Warbler  
*Dendroica petechia*  
 Chestnut-sided Warbler  
*Dendroica pensylvanica*  
 Magnolia Warbler  
*Dendroica magnolia*  
 Cape May Warbler \*  
*Dendroica tigrina*  
 Black-throated Blue Warbler  
*Dendroica caerulescens*  
 Yellow-rumped Warbler  
*Dendroica coronata*  
 Black-throated Gray  
 Warbler A  
*Dendroica nigrescens*  
 Black-throated Green  
 Warbler  
*Dendroica virens*  
 Blackburnian Warbler  
*Dendroica fusca*  
 Yellow-throated Warbler \*\*  
*Dendroica dominica*  
 Pine Warbler  
*Dendroica pinus*  
 Prairie Warbler  
*Dendroica discolor*  
 Palm Warbler  
*Dendroica palmarum*  
 Bay-breasted Warbler  
*Dendroica castanea*  
 Blackpoll Warbler  
*Dendroica striata*  
 Cerulean Warbler \*\*  
*Dendroica cerulea*  
 Black-and-white Warbler  
*Mniotilta varia*  
 American Redstart  
*Setophaga ruticilla*  
 Worm-eating Warbler \*\*  
*Helmitheros vermivorus*  
 Ovenbird  
*Seiurus aurocapilla*  
 Northern Waterthrush  
*Seiurus noveboracensis*  
 Louisiana Waterthrush  
*Seiurus motacilla*



Kentucky Warbler \*\*  
*Oporornis formosus*  
 Connecticut Warbler \*  
*Oporornis agilis*  
 Mourning Warbler  
*Oporornis philadelphia*  
 MacGillivray's Warbler \*\*  
*Oporornis tolmiei*  
 Common Yellowthroat  
*Geothlypis trichas*  
 Hooded Warbler \*  
*Wilsonia citrina*  
 Wilson's Warbler  
*Wilsonia pusilla*  
 Canada Warbler  
*Wilsonia canadensis*  
 Yellow-breasted Chat  
*Icteria virens*

#### TANAGERS

Scarlet Tanager  
*Piranga olivacea*  
 Summer Tanager \*\*  
*Piranga rubra*

#### SPARROWS, TOWHEES, JUNCOS

Eastern Towhee  
*Pipilo erythrophthalmus*  
 American Tree Sparrow  
*Spizella arborea*

Chipping Sparrow  
*Spizella passerina*  
 Clay-colored Sparrow \*\*  
*Spizella pallida*  
 Field Sparrow  
*Spizella pusilla*  
 Lark Sparrow \*\*  
*Chondestes grammacus*  
 Savannah Sparrow  
*Passerculus sandwichensis*  
 Seaside Sparrow \*\*  
*Ammodramus maritimus*  
 Grasshopper Sparrow \*\*  
*Ammodramus savannarum*  
 Fox Sparrow  
*Passerella iliaca*  
 Song Sparrow  
*Melospiza melodia*  
 Lincoln's Sparrow  
*Melospiza lincolnii*  
 Swamp Sparrow  
*Melospiza georgiana*  
 White-crowned Sparrow  
*Zonotrichia leucophrys*  
 White-throated Sparrow  
*Zonotrichia albicollis*  
 Dark-eyed Junco  
*Junco hyemalis*  
 Lapland Longspur  
*Calcarius lapponicus*  
 Snow Bunting  
*Plectrophenax nivalis*

#### CARDINALS AND ALLIES

Northern Cardinal  
*Cardinalis cardinalis*  
 Rose-breasted Grosbeak  
*Pheucticus ludovicianus*  
 Blue Grosbeak \*  
*Passerina caerulea*  
 Indigo Bunting  
*Passerina cyanea*  
 Painted Bunting A  
*Passerina ciris*  
 Dickcissel  
*Spiza Americana*

#### BLACKBIRDS, ORIOLES, GRACKLES

Bobolink \*  
*Dolichonyx oryzivorus*  
 Red-winged Blackbird  
*Agelaius phoeniceus*  
 Eastern Meadowlark \*\*  
*Sturnella magna*  
 Rusty Blackbird \*  
*Euphagus carolinus*  
 Common Grackle  
*Quiscalus quiscula*  
 Baltimore Oriole  
*Icterus galbula*  
 Orchard Oriole \*\*  
*Icterus spurius*

## Appendix 5B. List of Endangered, Threatened and Special Concern Bird Species Occurring Annually in Nahant

COMMON NAME	SCIENTIFIC NAME	MASSACHUSETTS STATUS	FEDERAL STATUS
Common Loon	<i>Gravia immer</i>	Special Concern	
American Bittern	<i>Botaurus lentiginosus</i>	Endangered	
Sharp-shinned Hawk	<i>Accipiter striatus</i>	Special Concern	
Peregrine Falcon	<i>Falco peregrinus</i>	Endangered	Threatened
Common Tern	<i>Sterna hirundo</i>	Special Concern	
Short-eared Owl	<i>Asio flammeus</i>	Endangered	
Northern Parula	<i>Parula Americana</i>	Threatened	
Blackpoll Warbler	<i>Dendroica striata</i>	Special Concern	
Mourning Warbler	<i>Oporornis Philadelphia</i>	Special Concern	

**In addition, Nahant hosts significant populations of bird species of conservation priority in Massachusetts such as: Sanderling, Chimney Swift, Black-throated Blue Warbler, Black-throated Green Warbler, and Black and White Warbler.**

- Linda Pivacek, Nahant, MA. 2006

Appendix 6

A. Section 504 Self-Evaluation

A Report of Access to Open Space and to Recreation Programs for People with Disabilities, Program Accessibility / Amelioration and Employment

B. Compliance Statement

C. Town of Nahant, For the General Public, Equal Access to Facilities and Activities

D. Town of Nahant Notice of Non-Discrimination

## **A. Section 504 Self-Evaluation**

Town of Nahant, Massachusetts

Open Space Plan / Section 504 Self-Evaluation

A Report of Access to Open Space and to Recreation Programs for People with Disabilities, Program Accessibility / Amelioration and Employment

### **1. Administrative Responsibilities:**

A. Designation of ADA Coordinator: On 21 September 2000, Paul English was appointed by Mark Cullinan, Town Manager, as the Americans with Disabilities Act (ADA) Coordinator for the Town of Nahant. As part of his duties, Mr. English also serves as the Town's Section 504 Coordinator [per 43 CFR 17.206(a)].

B. Grievance Procedure: The Grievance Procedure, a one-page document, was adopted on 17 August 2000 and issued to all Department Heads for the Town. The Grievance Procedure has three steps as follows: **1.** Complaint forwarded to appropriate Town agency. **2.** Town Administrator responds within ten days. **3.** Final appeal is to Board of Selectmen.

C. Input from a Person with a Disability in the Compliance Process: The Town of Nahant ADA Coordinator, Mr. Paul English, who has Multiple Sclerosis, helped with the site evaluations and has approved the Self-Evaluation.

### **2. Employment Practices for the Town:**

The attached page is a letter by our ADA Coordinator indicating that the Town is in compliance with employment practices that require nondiscrimination to people with disabilities, minorities, and women.

### **3. Town-Sponsored Recreation Programs and Inventory of Parks and Buildings at Park Sites:**

A. Town-Sponsored Recreation Programs: It is the policy of the Recreation Commission to be inclusive in all its programming.

- **Sailing program**: The sailing program will attempt to accommodate persons with disabilities on an individual basis. In the past, several handicapped individuals have been able to participate. These included two adults who were hearing and speech impaired and a child with a developmental disability. In each case the program provided an additional staff person to help.

**Town of Nahant, Massachusetts**  
**Open Space Plan / Section 504 Self-Evaluation**

The following programs also offered by the Recreation Commission can potentially be modified to accommodate persons with special needs:

- Tot-lot: a seven-week program where children are involved in craft projects.
- Flash Road Playground sports program (kickball, hockey, or basketball).
- Flash Road Playground Tennis program.
- Johnson School Adult and Children's basketball.
- Johnson School Children's Gymnastics.

B. Site Evaluations: Most Town-owned sites that are open to the public were visited in November 2007 and evaluated using a site-evaluation survey sheet, which includes the following information: purpose of the site; the site description; whether or not there are buildings, handicap-accessibility parking, sidewalks, or curb cuts; the condition of paths; steps, slope, picnic tables; and suggested improvements.

Site 1     Bailey's Hill:

Accessibility: Lower area accessible, but upper area is too steep. Handicap parking, enlarged gate entrance.

Amelioration: Handicap picnic benches.

Site 2     Greenlawn Cemetery:

Accessibility: Accessible.

Amelioration: None.

Site 3     Lodge Park at East Point:

Accessibility: Some paths accessible; access to upper parking lot by prearrangement.

Amelioration: Handicap parking in lower lot, signage below for upper lot.

Site 4     Golf Course:

Accessibility: Accessible. Handicap bathroom, front entrance, parking.

Amelioration: None.

Site 5     Flash Playground:

Accessibility: Accessible. Handicap bathroom.

Amelioration: Handicap parking and picnic benches.

Site 6     Little Nahant Playground:

Accessibility: Accessible.

Amelioration: Handicap picnic bench.

Sites 7 and 9

Lowlands Playground and Ballfield:

Accessibility: Accessible. Handicap parking.

Amelioration: Handicap picnic benches.

Site 8     Pleasant Street Playground:

Accessibility: Limited access. Handicap parking at Town Hall.

Amelioration: Handicap picnic benches.

Site 10    Lowlands / Heritage Trail:

Accessibility: Accessible. Handicap parking.

Amelioration: None.

Site 11    Marjoram Park:

Accessibility: Level area along road accessible; beach and wooded hilltop not accessible.  
Handicap parking.

Amelioration: Ramp to beach and picnic benches.

Site 13    Spring Road Basketball:

Accessibility: Accessible.

Amelioration: None.

Site 14    Swallow Cave:

Accessibility: Unimproved

Amelioration: None.

Site 15    Tudor Wharf:

Accessibility: Accessible. Handicap parking.

Amelioration: None.

**Town of Nahant, Massachusetts**  
**Open Space Plan / Section 504 Self-Evaluation**

- Site 17    Life Saving Station (Former Coast Guard Station):  
Accessibility: Not presently open to the public.  
Amelioration: Under study.
- Site 20    Black Rock Beach:  
Accessibility: Unimproved.  
Amelioration: None.
- Site 23    Forty Steps Beach:  
Accessibility: Deck at top of steps and sidewalk are accessible; beach is not. Handicap parking.  
Amelioration: None.
- Site 25    Short Beach:  
Accessibility: Accessible. Handicap parking at Lowlands parking lot.  
Amelioration: None.
- Site 26    Stony Beach:  
Accessibility: Unimproved.  
Amelioration: None.
- Site 27    Tudor Beach:  
Accessibility: Handicap-accessible ramp at the eastern end of the beach.  
Amelioration: Handicap parking.
- Site 31    16 James Avenue Steps:  
Accessibility: Public right of way.  
Amelioration: None.
- Site 33    Bangs Trust:  
Accessibility: Unimproved conservation land.  
Amelioration: None.

**Town of Nahant, Massachusetts**  
**Open Space Plan / Section 504 Self-Evaluation**

Site 35    Canoe Beach / Park:

Accessibility: Park area is accessible; beach is not.

Amelioration: Handicap parking.

Site 37    Veteran's Park:

Accessibility: Accessible. Handicap parking.

Amelioration: None.

Site 38    69 Wharf Street:

Project not completed.





***Town of Nahant***  
***334 Nahant Road, Nahant, MA 01908***  
*Telephone: 781-581-0088    FAX 781-593-0340*

December 4, 2007

To Whom It May Concern:

**COMPLIANCE STATEMENT**

I have reviewed the Town of Nahant's hiring and grievance policy and find this document to be in compliance with applicable laws and regulations. If you have any questions, I can be reached through the Nahant Town Hall at 781-581-9927.

Sincerely,

Paul English, ADA Coordinator

CC:    Open Space Committee  
      Town Administrator  
      Board of Selectmen

## C. Town of Nahant

### For the General Public

### Equal Access to Facilities and Activities

Maximum opportunity will be made available to receive citizen comments, complaints, and/or to resolve grievances or inquiries.

#### STEP 1:

The Town Administrator will be available to meet with citizens and employees during business hours.

When a complaint, grievance, request for program policy interpretation or clarification is received either in writing or through a meeting or telephone call, every effort will be made to create a record regarding the name, address, and telephone number of the person making the complaint, grievance, program policy interpretation or clarification. If the person desires to remain anonymous, he or she may.

A complaint, grievance, request for program policy interpretation or clarification will be responded to within ten working days (if the person making the complaint is identified) in a format that is sensitive to the needs of the recipient (i.e. verbally, enlarged type face, etc.).

Copies of the complaint, grievance, request for program policy interpretation or clarification and response will be forwarded to the appropriate town agency (i.e. park commission, conservation commission). If the grievance is not resolved at this level it will be progressed to the next level.

#### STEP 2:

A written grievance will be submitted to the Town Administrator. Assistance in writing the grievance will be available to all individuals. All written grievances will be responded to within ten working days by the Town Administrator in a format that is sensitive to the needs of the recipient (i.e. verbally, enlarged type face, etc.). If the grievance is not resolved at this level it will be progressed to the next level.

#### STEP 3:

If the grievance is not satisfactorily resolved, citizens will be informed of the opportunity to meet and speak with the Board of Selectmen, with whom local authority for final grievance resolution lies.

## **D. TOWN OF NAHANT**

### **NOTICE OF NON-DISCRIMINATION**

IT IS THE POLICY OF THE TOWN OF NAHANT NOT TO DISCRIMINATE ON THE BASIS OF AGE, COLOR, HANDICAP OR DISABILITY, ANCESTRY, NATIONAL ORIGIN, MARITAL STATUS, RACE, RELIGION, SEX, VETERAN STATUS, OR POLITICAL AFFILIATION IN ITS EMPLOYMENT AND MUNICIPAL ACTIVITIES.

THIS IS IN ACCORDANCE WITH ALL APPLICABLE FEDERAL AND STATE LAW, INCLUDING, BUT NOT LIMITED TO, SECTION 504 OF THE REHABILITATION ACT OF 1973, AS AMENDED, THE AMERICANS WITH DISABILITIES ACT, AS AMENDED, THE CIVIL RIGHTS ACT OF 1964 AS AMENDED, ARTICLE 114 OF THE MASSACHUSETTS CONSTITUTION, CHAPTER 151B AND 272, SECTIONS 92, 98 AND 98A, OF THE MASSACHUSETTS GENERAL LAWS AND EXECUTIVE ORDERS 227, 245 AND 253.

TOWN ADMINISTRATOR MARK P. CULLINAN IS DESIGNATED TO ADMINISTER COMPLIANCE WITH THE LAWS AND REGULATIONS.

TOWN OF NAHANT

334 NAHANT ROAD

NAHANT, MASSACHUSETTS

781-581-9927

LITTLE NAHANT  
HOWE WALKING  
ROAD TRAIL



# Heritage Trail

NAHANT, MASSACHUSETTS  
Nahant Open Space Committee



SHORT  
BEACH



INFO  
KIOSK



LOWLAND  
MEADOWS



BALL  
FIELDS

GOLF  
COURSE



BAILEY'S  
HILL