

**94 DUNE ROAD HOLDING CORP.  
PROPOSED CONDOMINIUM/  
TOWNHOUSE DEVELOPMENT**

**ECOLOGICAL CONDITIONS  
AND IMPACT ANALYSIS-**

Prepared for

***94 DUNE ROAD HOLDING CORP &  
PW GROSSER CONSULTING INC***

Prepared by



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## 1. Existing Conditions

Ecological surveys were conducted at the 9.29-acre site at 94 Dune Road in East Quogue (SCTM # 900-385-1-37.3) on May 10, 2019, September 17, 2021, October 27, 2022, and November 9, 2023 by William P. Bowman, PhD of Land Use Ecological Services.

### 1.1. Ecological Communities

The 9.29-acre site features approximately 3.3 acres of uplands that were created in the mid-1960s (between 1962 and 1969) dredging of the site's canal and placement of the dredge spoil on tidal marshes (**Figure 1**). These dredge spoil uplands have largely been developed and now contain 36,850 SF of impervious surfaces including the 5,138 SF restaurant/bar with 5,023 SF of paved walks and decks, 26,689 SF tennis court, and 57,492 SF of stone/dirt parking areas. The boundaries of the existing ecological communities were mapped (**Figure 2 and Appendix A**) and calculations of the acreage of each ecological community type and the percentage of the total site area are provided in **Table 1**. Descriptions of the ecological communities observed are provided below along with the most pertinent New York Natural Heritage Program community descriptions from Edinger et al (2014).

**TABLE 1: ECOLOGICAL COMMUNITIES AT 94 DUNE ROAD SITE**

	Acres	Percent
DEVELOPED SURFACES (ROOFS, PARKING, GRAVEL DRIVEWAY, LANDSCAPING, WALKWAYS AND DECKS)	2.29	24.7 %
Maritime Shrubland	0.88	9.5 %
Maritime Dune	0.17	1.8 %
Japanese Knotweed Stand	0.04	0.4%
Salt Shrub	0.18	1.9%
High Salt Marsh	1.30	14.0%
Low Salt Marsh	2.18	23.5%
Marsh Panne	0.03	0.3%
Unvegetated Beach	0.06	0.6%
Open Water	2.16	23.3%
<b>Totals</b>	<b>9.29</b>	<b>100.0%</b>

**FIGURE I  
HISTORICAL AERIAL IMAGERY OF 94 DUNE ROAD SITE**

(a) 11/11/1959 USGS aerial



(b) 9/15/1969 USGS aerial

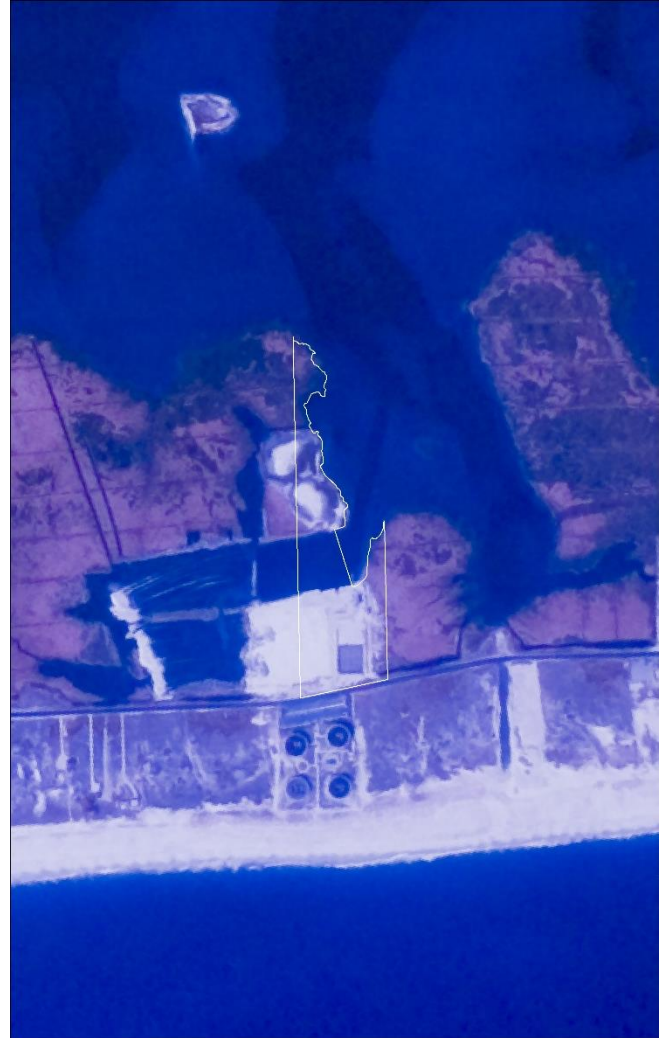
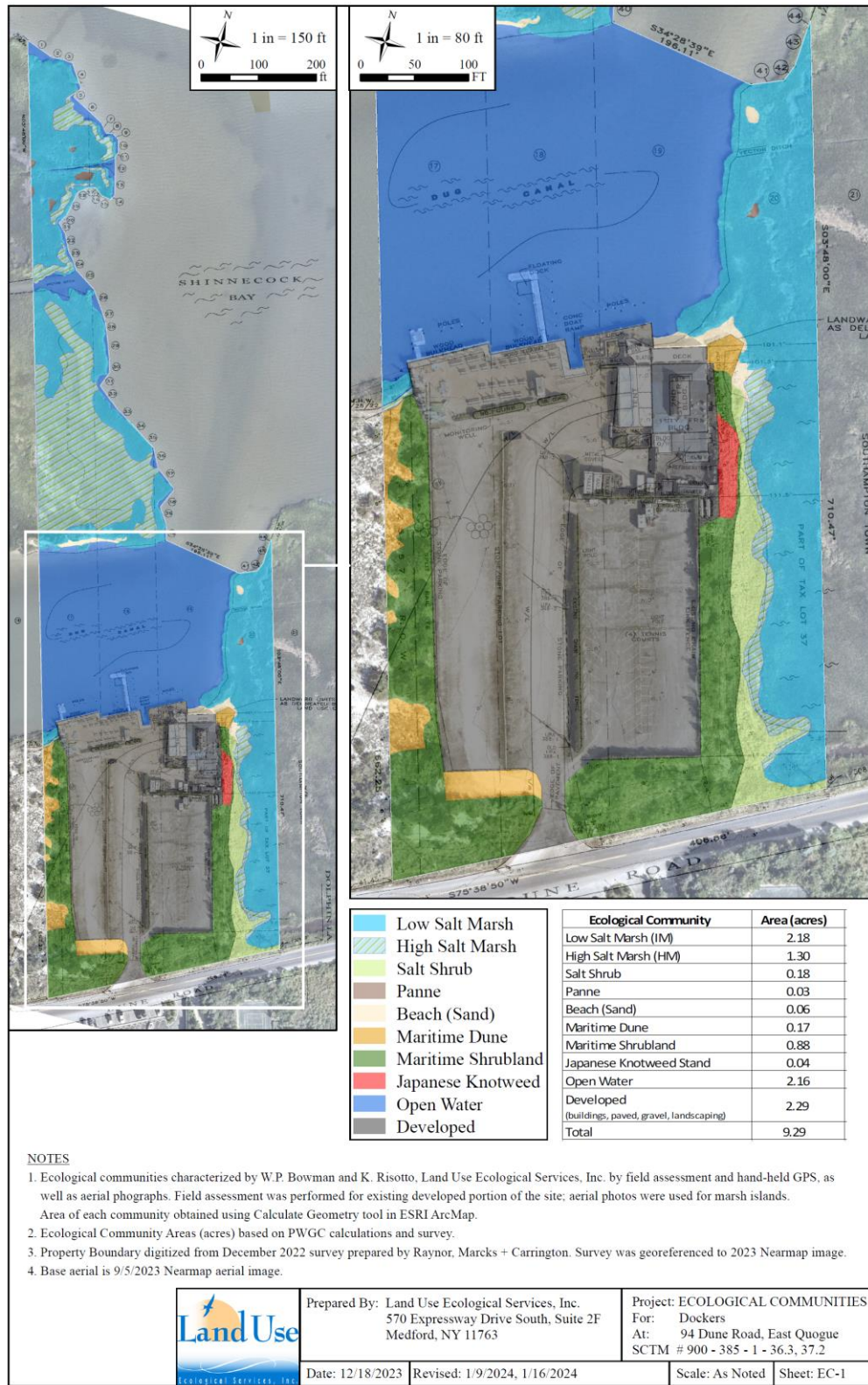


Figure 2. (a) 1959 and (b) 1969 USGS aerial photos depicting site conditions before and after the canal was dug. Site outlined in white. Photos from USGS Earth Explorer ([earthexplorer.usgs.gov](http://earthexplorer.usgs.gov)).

**FIGURE 2  
EXISTING ECOLOGICAL COMMUNITIES AT 94 DUNE ROAD SITE**



### Maritime Shrubland

Maritime shrubland and maritime dune (described below) habitats have developed on the sandy dredge spoils located at the margins of the site's parking areas. Maritime shrublands represent 0.88 acres, or 9.5%, of the site. The following definition of this ecological community is provided by Edinger et al (2014); however, the maritime shrublands present have a high proportion of invasive plants, specifically Japanese black pine (*Pinus thunbergia*), autumn olive (*Elaeagnus umbellata*), and Japanese knotweed (*Reynoutria japonica*), due to the past disturbance history of the site and existing impacts associated with the parking lot.

**“Maritime shrubland:** a shrubland community that occurs on dry seaside bluffs and sheltered back dunes that are exposed to onshore winds and salt spray. This community typically occurs as a tall shrubland (2-3 m), but may include areas with shrub canopy from 1 to 5 m tall. The community typically occurs on very gently rolling topography and may include moist shallow depressions. These low areas may imperceptibly grade into shrub swamp if soils are sufficiently wet. Trees are usually sparse or absent (ideally less than 25% cover). Characteristic shrubs and sapling trees include serviceberry (*Amelanchier canadensis*), bayberry (*Myrica pensylvanica*), black cherry (*Prunus serotina*), southern arrowwood (*Viburnum dentatum* var. *venosum*), and shining sumac (*Rhus copallinum*). Other shrubs and stunted trees include beach-plum (*Prunus maritima*), sand-rose (*Rosa rugosa*), wild rose (*R. virginiana*), eastern red cedar (*Juniperus virginiana*), American holly (*Ilex opaca*), black oak (*Quercus velutina*), and sassafras (*Sassafras albidum*). Small amounts of highbush blueberry (*Vaccinium corymbosum*), sweet pepperbush (*Clethra alnifolia*), red maple (*Acer rubrum*), and black chokeberry (*Aronia melanocarpa*) are found in moister low areas, often grading to small patches of shrub swamp. Morrow's honeysuckle (*Lonicera morrowii*) is a common invasive shrub in this community. Characteristic vines include poison ivy (*Toxicodendron radicans*), Virginia creeper (*Parthenocissus quiquefolia*), and common greenbrier (*Smilax rotundifolia*). Oriental bittersweet (*Celastrus orbiculatus*) and Japanese honeysuckle (*Lonicera japonica*) are common invasive vines in this community. The herb layer is very sparse and may contain a few scattered grass-leaved goldenrod (*Euthamia graminifolia*), wild indigo (*Baptisia tinctoria*), white-topped aster (*Sericocarpus asteroides*), and little bluestem (*Schizachyrium scoparium*).”

The maritime shrubland habitat at the site is dominated by Japanese black pine (*Pinus thunbergia*), autumn olive (*Elaeagnus umbellata*), eastern red cedar (*Juniperus virginiana*), and bayberry (*Morella pensylvanica*). Other common plant species include switch grass (*Panicum virgatum*), black cherry (*Prunus serotina*), Asiatic bittersweet (*Celastrus orbiculatus*), mugwort (*Artemisia vulgaris*), and

spotted knapweed (*Centaurea stoebe*). There is a 0.04-acre Japanese knotweed stand located in this community between the restaurant and the tidal wetlands, as shown in **Figure 2**. On the east side of the site, plant species such as bayberry (*Morella pensylvanica*), groundsel bush (*Baccharis halimifolia*), and common reed (*Phragmites australis*) become more abundant in the maritime shrubland along boundary of this community with the adjacent tidal wetlands. Edinger et al (2014) indicates that this ecological community has rarity rankings of G4 and S4 and characterizes maritime shrublands as “apparently secure” both globally and in New York State.

### Maritime Dunes

Maritime dune and maritime shrubland (described above) habitats have developed on the sandy dredge spoils located at the margins of the site’s parking areas. The maritime dune habitats represent 0.17 acres (1.8%) on the sandy dredge spoils on the western margin of the site and extend onto the adjacent property to the west. These habitats are dominated by beach heather (*Hudsonia tomentosa*), American beach grass (*Ammophila breviligulata*), and reindeer lichen (*Cladonia* sp.) with scattered bayberry (*Morella pensylvanica*), Japanese black pine (*Pinus thunbergii*), and beach plum (*Prunus maritima*). The following definition of this ecological community is provided by Edinger et al (2014):

**“Maritime dunes:** a community dominated by grasses and low shrubs that occurs on active and stabilized dunes along the Atlantic coast. This community consists of a mosaic of vegetation patches. This mosaic reflects past natural disturbances such as sand deposition, erosion, and dune migration. The composition and structure of the vegetation is variable depending on stability of the dunes, amounts of sand deposition and erosion, and distance from the ocean. Characteristic species of the active dunes, where sand movement is greatest, include beachgrass (*Ammophila breviligulata*), dusty-miller (*Artemisia stelleriana*), beach pea (*Lathyrus japonicus* var. *maritimus*), sedge (*Carex silicea*), seaside goldenrod (*Solidago sempervirens*), and sand-rose (*Rosa rugosa*). Characteristic species of stabilized dunes include beach heather (*Hudsonia tomentosa*), bearberry (*Arctostaphylos uva-ursi*), beachgrass (*Ammophila breviligulata*), cyperus (*Cyperus polystachyos* var. *macrostachyus*), seaside goldenrod, beach pinweed (*Lechea maritima*), jointweed (*Polygonella articulata*), common evening-primrose (*Oenothera biennis*), sand-rose (*Rosa rugosa*), bayberry (*Myrica pensylvanica*), beach-plum (*Prunus maritima*), poison ivy (*Toxicodendron radicans*), and the lichens (*Cladonia submitis* and *Cetraria arenaria*). Shrubs are typically under 1 m tall.

Edinger et al (2014) indicates that this ecological community has rarity rankings of G4 and S3 and characterizes maritime dunes as “apparently secure” globally and “vulnerable” in New York State,

i.e., vulnerable to disappearing from New York (but not currently imperiled) due to rarity or other factors.

### Tidal Wetlands

Approximately 3.7 acres of significant, high-quality tidal wetlands comprised predominately of low salt marsh, high salt marsh, and salt scrub communities are located immediately to the east of the restaurant and parking area and to the north of the man-made dug lagoon. There are small unvegetated areas including marsh pannes (totaling 0.03 acres) and unvegetated beaches (totaling 0.06 acres) within and along the margins of the site's marshes (**Figure 2**). The site's wetlands are part of the 993-acre Dune Road salt marsh complex comprised of undeveloped salt marshes, tidal mudflats, and dredged material island, located on the south shore of Shinnecock Bay and extending from Hampton Beach (in the west) to Shinnecock Inlet. The Dune Road salt marsh complex and Shinnecock Bay have been designated as a Significant Coastal Fish and Wildlife Habitats by the New York State Department of State Division of Coastal Resources due to the state-wide significance of the shellfish and finfish resources, submerged aquatic vegetation beds, and waterfowl and wading bird breeding and wintering habitat. Tidal wetland communities present on the site include low salt marsh (2.18 acres), high salt marsh (1.30 acres), and salt scrub (0.18 acres). The following definitions of these ecological communities are provided by Edinger et al (2014):

**“Low salt marsh:** a coastal marsh community that occurs in sheltered areas of the seacoast, in a zone extending from mean high tide down to mean sea level or to about 2 m (6 ft) below mean high tide. It is regularly flooded by semidiurnal tides. The mean tidal range of low salt marshes on Long Island is about 80 cm, and they often form in basins with a depth of 1.6 m or greater. The vegetation of the low salt marsh is a nearly monospecific stand of cordgrass (*Spartina alterniflora*), a coarse grass that grows up to about 3 m (10 ft) tall. Salt marshes with large tidal ranges are often dominated by the tall form of *Spartina alterniflora*, while those with more restricted tidal ranges will maintain a short form *Spartina alterniflora* zone and grade into high salt marsh (Niedowski 2000). A few species of marine algae can form dense mats on the surface sediments between the cordgrass stems, including knotted wrack (*Ascophyllum nodosum*) and rockweed (*Fucus vesiculosus*); sea lettuce (*Ulva* spp.) and hollow green weeds (*Enteromorpha* spp.) can be abundant, especially in early summer. Other plants that are present in very low numbers include glassworts (*Salicornia depressa*, *S. bigelovii*), salt marsh sand-spurry (*Spergularia marina*), and sea blites (*Suaeda* spp.).”

**“High salt marsh:** a coastal marsh community that occurs in sheltered areas of the seacoast, in a zone extending from mean high tide up to the limit of spring tides. It is periodically flooded by spring tides and flood tides. High salt marsh typically consists of a mosaic of patches that are mostly dominated by a single graminoid species. The dominant species in many large areas are either salt-meadow grass (*Spartina patens*) or a dwarf form (15 to 30 cm tall) of cordgrass (*Spartina alterniflora*); also common are large areas dominated by spikegrass (*Distichlis spicata*), black-grass (*Juncus gerardii*), and glassworts (*Salicornia* spp.), or a mixture of salt-meadow grass and cordgrass. Characteristic species of the upper slope of the high marsh (the area that grades into salt shrub) are blackgrass, switchgrass (*Panicum virgatum*), sea-lavender (*Limonium carolinianum*), seaside gerardia (*Agalinis maritima*), and slender perennial saltmarsh aster (*Symphyotrichum tenuifolium* var. *tenuifolium*).

**“Salt shrub:** a shrubland community that forms the ecotone between salt marsh and upland vegetation. Salinity levels are generally lower here than in the salt marsh (soil pore salinity ranges 7 ppt to 27 ppt) and thus technically brackish. Salt shrub areas are slightly higher in elevation than the salt marsh. Salt shrub does not usually develop on deep peat. More often, it occurs on a thin (0-10 cm) layer of peat, and soils share characteristics of both estuarine and maritime terrestrial settings. Periodic disturbance associated with storms causes die-back of shrubs. Characteristic shrubs are groundsel-tree (*Baccharis halimifolia*), saltmarsh-elder (*Iva frutescens*), and pasture rose (*Rosa carolina*); salt meadow grass (*Spartina patens*), black-grass (*Juncus gerardii*), and switchgrass (*Panicum virgatum*) are typical herbs. Salt shrub is almost always dominated by *Iva frutescens* on the marshward edge of the community, often forming a stunted leading edge of the community. *Baccharis halimifolia* becomes more dominant only in the older, more developed, landward side. The landward side of salt shrub is usually the most diverse. Salt shrub is usually present as a linear feature at the upper edge of a salt marsh marking the limit of the highest spring and storm tides within a given estuarine basin. In areas where the local topography is nearly level an extensive shrubland, or brackish meadow may occur. This community is often invaded by European common reed (*Phragmites australis*).

The *Spartina alterniflora*-dominated low salt marshes include various macroalgae such as rockwood (*Fucus* sp.), sea lettuce (*Ulva lactuca* and *Ulva intestinalis*), and graceful red weed (*Gracilaria* sp.). Other plants present in low densities in marsh pannes or the margins of the low salt marsh include glassworts (*Salicornia* sp.), sea-blite (*Suaeda maritima*), and seaside lavender (*Limonium carolinianum*). The low salt marshes on the site and in the Dune Road marsh complex are classified as a significant natural community by the New York Natural Heritage Program (NYNHP) as a high-quality example of an ecological community that is uncommon or rare in New York State.

The site's high marshes are dominated by salt hay (*Spartina patens*) and spike grass (*Distichlis spicata*) with occasional sea-blite (*Suaeda maritima*), seaside lavender (*Limonium carolinianum*) and marsh elder (*Iva frutescens*) present on the upper margin of the marsh. The upper margin of the high marsh and the adjacent salt shrub community is dominated by marsh elder (*Iva frutescens*), common reed (*Phragmites australis*), and groundsel bush (*Baccharis halimifolia*).

Edinger et al (2014) indicates that the salt shrub ecological community has rarity rankings of G5 and S4, characterizing this community type as “demonstrably secure” globally and “apparently secure” in New York State. Low salt marsh and high salt marsh communities are characterized as G4 and S4S3, indicating that they are “apparently secure” globally and “vulnerable” in New York State, i.e., vulnerable to disappearing from New York (but not currently imperiled) due to rarity or other factors.

## 1.2. Plants

A plant list for the 94 Dune Road site (**Table 2**) was prepared based on ecological surveys completed by William P. Bowman, PhD of Land Use Ecological Services on May 10, 2019, September 17, 2021, October 27, 2022, and November 9, 2023. A total of 79 vascular plant species were observed at the site, including 25 woody plants and 54 herbaceous plants and lichens. The observed plant species are characteristic of tidal wetland communities; stabilized dunes, back dunes, and sandy barrens; and disturbed habitats. No plant species listed as endangered, threatened, or rare in New York State were observed.

**TABLE 2: PLANT SPECIES LIST FOR 94 DUNE ROAD SITE**

<b>Common Name</b>	<b>Scientific Name</b>
<b>TREES, SHRUBS AND WOODY VINES</b>	
Groundsel Bush	<i>Baccharis halimifolia</i>
Boxwood	<i>Buxus sempervirens</i>
Asiatic Bittersweet	<i>Celastrus orbiculatus</i>
Russian Olive	<i>Elaeagnus angustifolia</i>
Autumn Olive	<i>Elaeagnus umbellate</i>
Beach Heather	<i>Hudsonia tomentosa</i>
Marsh Elder	<i>Iva frutescens</i>

**TABLE 2: PLANT SPECIES LIST FOR 94 DUNE ROAD SITE**

<b>Common Name</b>	<b>Scientific Name</b>
Eastern Red Cedar	<i>Juniperus virginiana</i>
Privet	<i>Ligustrum sp.</i>
Japanese Honeysuckle	<i>Lonicera japonica</i>
Shrub Honeysuckle	<i>Lonicera sp.</i>
Bayberry	<i>Morella pensylvanica</i>
Virginia Creeper	<i>Parthenocissus quinquefolia</i>
Blue Spruce	<i>Picea pungens</i>
Japanese Black Pine	<i>Pinus thunbergii</i>
Beach Plum	<i>Prunus maritima</i>
Black Cherry	<i>Prunus serotina</i>
Garden Rose	<i>Rosa sp.</i>
Multiflora Rose	<i>Rosa multiflora</i>
Rugosa Rose	<i>Rosa rugosa</i>
Northern Dewberry	<i>Rubus flagellaris</i>
Bittersweet Nightshade	<i>Solanum dulcamara</i>
Poison Ivy	<i>Toxicodendron radicans</i>
Curly-leaved Yucca	<i>Yucca filamentosa</i>

**HERBACEOUS PLANTS**

Yarrow	<i>Achillea millefolium</i>
Common Ragweed	<i>Ambrosia artemisiifolia</i>
American Beach Grass	<i>Ammophila breviligulata</i>
Pearly Everlasting	<i>Anaphalis margaritacea</i>
Broom Sedge	<i>Andropogon virginiana</i>
Sweet Vernal Grass	<i>Anthoxanthum odoratum</i>
Mugwort	<i>Artemisia vulgaris</i>
Downy Chess	<i>Bromus tectorum</i>
Hedge Bindweed	<i>Calystegia sepium</i>
Shepards Purse	<i>Capsella bursa-pastoris</i>
Pennsylvania Sedge	<i>Carex pensylvanica</i>
Sand Sedge	<i>Carex siliacea</i>
Spotted Knapweed	<i>Centaurea stoebe</i>
Chicory	<i>Cichorium intybus</i>
Reindeer Lichen	<i>Cladonia sp.</i>
Flat Sedge	<i>Cyperus sp.</i>
Yellow Nut Sedge	<i>Cyperus esculentus</i>
Jimsonweed	<i>Datura stramonium</i>
Wild Carrot	<i>Daucus corota</i>
Fall Witch Grass	<i>Digitaria cognata</i>
Crab Grass	<i>Digitaria sanguinalis</i>
Spike Grass	<i>Distichlis spicata</i>
Purple Love Grass	<i>Eragrostis spectabilis</i>
Hyssop-Leaved Thoroughwort	<i>Eupatorium hyssopifolium</i>

**TABLE 2: PLANT SPECIES LIST FOR 94 DUNE ROAD SITE**

<b>Common Name</b>	<b>Scientific Name</b>
Cypress Spurge	<i>Euphorbia cyparissias</i>
Slender Flat-topped Goldenrod	<i>Euthamia caroliniana</i>
Common Flat-topped Goldenrod	<i>Euthamia graminifolia</i>
Rough Buttonweed	<i>Hexasepalum teres</i>
Canada Hawkweed	<i>Hieracium canadense</i>
Hydrangea	<i>Hydrangea sp.</i>
Black Grass	<i>Juncus gerardii</i>
Secund Rush	<i>Juncus secundus</i>
Fountain Grass	<i>Miscanthus sp.</i>
Purple Dead Nettle	<i>Lamium purpureum</i>
Seaside Lavender	<i>Limonium carolinianum</i>
Blue Toadflax	<i>Nuttallanthus canadensis</i>
Common Evening Primrose	<i>Oenothera biennis</i>
Eastern Prickly Pear	<i>Opuntia humifusa</i>
Yellow Sorrel	<i>Oxalis stricta</i>
Switch Grass	<i>Panicum virgatum</i>
Sickle-leaved Golden Aster	<i>Pityopsis falcata</i>
Sheep Sorrel	<i>Rumex acetosella</i>
Bitter Dock	<i>Rumex obtusifolius</i>
Glasswort	<i>Salicornia sp.</i>
Little Bluestem	<i>Schizachyrium scoparium</i>
Crown Vetch	<i>Securigera varia</i>
Seaside Goldenrod	<i>Solidago sempervirens</i>
Common Sow Thistle	<i>Sonchus oleraceus</i>
Smooth Cordgrass	<i>Spartina alterniflora</i>
Salt Hay	<i>Spartina patens</i>
Sea Blite	<i>Suaeda maritima</i>
Common Dandelion	<i>Taraxacum officinale</i>
Common Mullein	<i>Verbascum thapsus</i>
Cocklebur	<i>Xanthium strumarium</i>

### 1.3. Wildlife

The birds, mammals, and herptiles observed or expected to occur on the site (presented in **Tables 3-5**) are based on field surveys by William P. Bowman, PhD in 2019, 2021, and 2023. The site provides habitats for a wide variety of wildlife species that inhabit maritime upland habitats, tidal wetlands, and developed neighborhoods near the coastline including waterfowl, waterbirds, songbirds, and raptors.

## Birds

Approximately one hundred twenty four (124) bird species are expected to utilize the site and its wetlands and surface waters based on direct observations and the maritime upland, tidal wetland, and estuarine habitats present. Approximately 70% of these birds (i.e., 55 species) may utilize the site for breeding habitat based on confirmed bird breeding activity documented in the 2008 New York Breeding Atlas in the vicinity of Quogue (McGowan and Corwin, 2008). Approximately 42% of these birds (i.e., 53 species ) can be found year round in appropriate habitats on Long Island. Approximately 57% of these birds (i.e., 71 species) are expected to be present at the site are migratory species that utilize the site seasonally such as the summer months only, only during spring and autumn migrations, or as overwintering habitat. Long Island's barrier islands are part of the Atlantic Flyway and provide habitat during migration periods for a wide diversity of bird species including songbirds and woodpeckers, raptors and owls, and waterfowl and shorebirds.

**TABLE 3**  
**BIRD SPECIES OBSERVED/EXPECTED ON 94 DUNE ROAD SITE**

Scientific Name	Common Name	Observed <sup>1</sup> /Expected (O/E)	Breeding Status (Y/N) <sup>2</sup>	Year Round/ Migrant/ Non-Breeding <sup>3</sup>
<i>Accipiter cooperii</i>	Cooper's Hawk	E	N	Y
<i>Accipiter striatus</i>	Sharp-shinned Hawk	E	N	Y
<i>Agelaius phoeniceus</i>	Red-winged Blackbird	O	Y	Y
<i>Ammodramus maritimus</i>	Seaside Sparrow	E	N	Y
<i>Ammodramus savannarum</i>	Grasshopper Sparrow	E	N	M
<i>Ammospiza caudacuta</i>	Saltmarsh Sparrow	E	N	Y
<i>Ammospiza nelsoni</i>	Nelson's Sparrow	E	N	M
<i>Ardea alba</i>	Great Egret	O	N	M
<i>Ardea herodias</i>	Great Blue Heron	O	N	Y
<i>Anas platyrhynchos</i>	Mallard	O	Y	Y
<i>Anas rubripes</i>	American Black Duck	O	Y	Y
<i>Arenaria interpres</i>	Ruddy Turnstone	E	N	M
<i>Baeolophus bicolor</i>	Tufted Titmouse	E	N	Y
<i>Botaurus lentiginosus</i>	American Bittern	E	N	Y
<i>Bombycilla cedrorum</i>	Cedar Waxwing	E	Y	Y
<i>Branta bernicla</i>	Brant	E	N	N
<i>Branta canadensis</i>	Canada Goose	O	Y	Y
<i>Bubo virginianus</i>	Great Horned Owl	E	N	Y
<i>Bucephala albeola</i>	Bufflehead	O	N	M
<i>Buteo jamaicensis</i>	Red-tailed Hawk	E	N	Y
<i>Butorides virescens</i>	Green Heron	E	N	M

**TABLE 3**  
**BIRD SPECIES OBSERVED/EXPECTED ON 94 DUNE ROAD SITE**

Scientific Name	Common Name	Observed <sup>1</sup> /Expected (O/E)	Breeding Status (Y/N) <sup>2</sup>	Year Round/ Migrant/ Non-Breeding <sup>3</sup>
<i>Calidris alba</i>	Sanderling	O	N	M
<i>Calidris minutilla</i>	Least Sandpiper	E	N	M
<i>Calidris melanotos</i>	Pectoral Sandpiper	E	N	M
<i>Calidris semipalmatus</i>	Semipalmated Sandpiper	O	N	M
<i>Cardinalis cardinalis</i>	Northern Cardinal	O	Y	Y
<i>Carduelis tristis</i>	American Goldfinch	E	N	Y
<i>Carpodacus mexicanus</i>	House Finch	O	Y	Y
<i>Carpodacus purpureus</i>	Purple Finch	O	N	Y
<i>Catharus fuscescens</i>	Veery	E	N	M
<i>Chaetura pelagica</i>	Chimney Swift	O	N	M
<i>Charadrius vociferus</i>	Killdeer	E	Y	M
<i>Charadrius melodus</i>	Piping Plover	E	N	M
<i>Charadrius semipalmatus</i>	Semipalmated Plover	O	N	M
<i>Circus hudsonius</i>	Northern Harrier	E	N	N
<i>Cistothorus palustris</i>	Marsh Wren	E	N	M
<i>Clangula hyemalis</i>	Long-tailed Duck	E	N	N
<i>Colaptes auratus</i>	Northern Flicker	E	N	Y
<i>Columba livia</i>	Rock Dove	E	N	Y
<i>Corvus brachyrhynchos</i>	American Crow	O	N	Y
<i>Corvus corax</i>	Common Raven	E	N	Y
<i>Corvus ossifragus</i>	Fish Crow	O	N	Y
<i>Cyanocitta cristata</i>	Blue Jay	O	N	Y
<i>Cygnus olor</i>	Mute Swan	O	Y	Y
<i>Dendroica coronata</i>	Yellow-rumped Warbler	O	N	N
<i>Dendroica palmarum</i>	Palm Warbler	E	N	M
<i>Dendroica petechia</i>	Yellow Warbler	E	N	M
<i>Dumetella carolinensis</i>	Gray Catbird	O	Y	Y
<i>Egretta thula</i>	Snowy Egret	O	N	M
<i>Empidonax traillii</i>	Willow Flycatcher	E	Y	M
<i>Falco columbarius</i>	Merlin	E	N	M
<i>Falco sparverius</i>	American Kestrel	E	N	N
<i>Gavia immer</i>	Common Loon	E	N	N
<i>Geothlypis trichas</i>	Common Yellowthroat	O	Y	M
<i>Haematopus palliatus</i>	American Oystercatcher	O	Y	M
<i>Hirundo rustica</i>	Barn Swallow	O	Y	M
<i>Icteria virens</i>	Yellow-breasted Chat	E	N	M
<i>Icterus galbula</i>	Baltimore Oriole	E	N	M
<i>Junco hyemalis</i>	Dark-eyed Junco	E	N	N
<i>Larus argentatus</i>	Herring Gull	O	Y	Y
<i>Larus delawarensis</i>	Ring-billed Gull	O	N	Y
<i>Laus maritima</i>	Great Black-backed Gull	O	Y	Y

**TABLE 3**  
**BIRD SPECIES OBSERVED/EXPECTED ON 94 DUNE ROAD SITE**

Scientific Name	Common Name	Observed <sup>1</sup> /Expected (O/E)	Breeding Status (Y/N) <sup>2</sup>	Year Round/ Migrant/ Non-Breeding <sup>3</sup>
<i>Leucophaeus atricilla</i>	Laughing Gull	E	N	M
<i>Limnodromous griseus</i>	Short-billed Dowitcher	E	N	M
<i>Lophodytes cucullatus</i>	Hooded Merganser	E	N	Y
<i>Melanerpes carolinus</i>	Red-bellied Woodpecker	O	N	Y
<i>Melospiza georgiana</i>	Swamp Sparrow	E	N	Y
<i>Melospiza lincolni</i>	Lincolns Sparrow	E	N	M
<i>Melospiza melodia</i>	Song Sparrow	O	Y	Y
<i>Mergus serrator</i>	Red-breasted Merganser	E	N	N
<i>Mimus polyglottos</i>	Northern Mockingbird	O	Y	Y
<i>Molothrus ater</i>	Brown-headed Cowbird	E	Y	Y
<i>Nannopterum auritum</i>	Double-crested Cormorant	O	N	N
<i>Nycticorax nycticorax</i>	Black-crowned Night Heron	E	N	Y
<i>Oxyura jamaicensis</i>	Ruddy Duck	E	N	Y
<i>Pandion haliaetus</i>	Osprey	O	Y	M
<i>Passer domesticus</i>	House Sparrow	E	N	Y
<i>Passerculus sandwichensis</i>	Savannah Sparrow	E	N	Y
<i>Passerella iliaca</i>	Fox Sparrow	E	N	N
<i>Picoides pubescens</i>	Downy Woodpecker	O	N	Y
<i>Picoides villosus</i>	Hairy Woodpecker	E	N	Y
<i>Pipilo erythrophthalmus</i>	Eastern Towhee	E	N	M
<i>Plegadis falcinellus</i>	Glossy Ibis	E	N	M
<i>Pluvialis squatarola</i>	Black-bellied Plover	E	N	M
<i>Poecile atricapillus</i>	Black-capped Chickadee	O	N	Y
<i>Quiscalus major</i>	Boat-tailed Grackle	E	Y	Y
<i>Quiscalus quiscula</i>	Common Grackle	O	Y	Y
<i>Rallus crepitans</i>	Clapper Rail	E	Y	M
<i>Regulus calendula</i>	Ruby-crowned Kinglet	E	N	N
<i>Regulus satrapa</i>	Golden-crowned Kinglet	O	N	N
<i>Sayornis phoebe</i>	Eastern Phoebe	E	N	M
<i>Setophaga discolor</i>	Prairie Warbler	E	N	M
<i>Setophaga petechia</i>	Yellow Warbler	E	N	M
<i>Setophaga pinus</i>	Pine Warbler	E	N	M
<i>Setophaga ruticilla</i>	American Redstart	E	N	M
<i>Sialia sialis</i>	Eastern Bluebird	O	N	M
<i>Sitta canadensis</i>	Red-Breasted Nuthatch	E	N	Y
<i>Sitta carolinensis</i>	White-breasted Nuthatch	E	N	Y
<i>Spizella passerine</i>	Chipping Sparrow	E	Y	M
<i>Spizella pusilla</i>	Field Sparrow	E	N	Y
<i>Spizelloides arborea</i>	American Tree Sparrow	E	N	N
<i>Sterna dougallii</i>	Roseate Tern	E	N	M
<i>Sterna forsteri</i>	Forster's Tern	E	N	M

**TABLE 3**  
**BIRD SPECIES OBSERVED/EXPECTED ON 94 DUNE ROAD SITE**

Scientific Name	Common Name	Observed <sup>1</sup> /Expected (O/E)	Breeding Status (Y/N) <sup>2</sup>	Year Round/ Migrant/ Non-Breeding <sup>3</sup>
<i>Sterna hirundo</i>	Common Tern	O	N	M
<i>Sternula antillarum</i>	Least Tern	O	N	M
<i>Sturnus vulgaris</i>	European Starling	O	Y	Y
<i>Tachycineta bicolor</i>	Tree Swallow	E	Y	M
<i>Thalasseus maximus</i>	Royal Tern	E	N	M
<i>Thyrothorus ludovicianus</i>	Carolina Wren	E	N	Y
<i>Toxostoma rufum</i>	Brown Thrasher	E	N	M
<i>Tringa flavipes</i>	Lesser Yellowlegs	O	N	M
<i>Tringa melanoleuca</i>	Greater Yellowlegs	E	N	M
<i>Tringa semipalmata</i>	Willet	O	Y	M
<i>Tringa solitaria</i>	Solitary Sandpiper	E	N	M
<i>Troglodytes aedon</i>	House Wren	E	N	M
<i>Troglodytes hiemalis</i>	Winter Wren	E	N	N
<i>Turdus migratorius</i>	American Robin	O	Y	Y
<i>Vermivora pinus</i>	Blue-winged Warbler	E	N	M
<i>Vireo gilvus</i>	Warbling Vireo	E	N	M
<i>Vireo griseus</i>	White-eyed Vireo	E	N	M
<i>Vireo solitarius</i>	Blue-headed Vireo	E	N	M
<i>Zenaida macroura</i>	Mourning Dove	O	N	Y
<i>Zonotrichia albicollis</i>	White-throated Sparrow	O	N	N

<sup>1</sup>Species Observed During Field Surveys between 2019 and 2023

<sup>2</sup>Based on New York State Breeding Bird Atlas (McGowan and Corwin, 2008); Y = Yes, Breeding is confirmed in local Breeding Bird Atlas Block (Block #7052C); N = No, Breeding is not confirmed to occur in local Breeding Bird Atlas Block.

<sup>3</sup>Y= Species can be found year round; M= Species can be found in summer months only (for breeding birds) or species can be found during spring or autumn migrations; N= Species are expected to occur only in non-breeding periods.

### Mammals

Three mammal species (or scat/sign of these species) were observed at or adjacent to the site including eastern cottontail (*Sylvilagus floridanus*), white-tailed deer (*Odocoileus virginianus*), and raccoon (*Procyon lotor*). **Table 4** provides a list of all mammal species observed or expected to occur on site based on habitat preferences (Connor, 1971) and the ecological communities present. All observed or expected mammals are common along the margins of tidal wetlands and in maritime dunes, grasslands, shrublands, and woodlands. The extensive backdunes and tidal marshes in this area are expected to provide habitat for several species of small mammals

including meadow vole (*Microtus pennsylvanicus*), short-tailed shrew (*Blarina brevicauda*), and masked shrew (*Sorex cinereus*). Raccoon sign is abundant at the site due to this species' preference for sheltered shoreline habitats and adaptability to human neighborhoods. Other species that are tolerant of or benefit from residential neighborhoods, such as white-tailed deer and opossum, were observed or are expected to be present. Several bat species are expected to forage over the site's marshes. However, due to the absence of trees, the site does not provide any natural day-time roosting habitat for bat species that roost in trees on Long Island including eastern red bat (*Lasiurus borealis*) and northern long-eared bat (*Myotis septentrionalis*).

**TABLE 4**  
**MAMMAL SPECIES**  
**OBSERVED OR EXPECTED ON SITE<sup>1</sup>**

<u>Scientific Name</u>	<u>Common Name</u>
<i>Blarina brevicauda</i>	Short-tailed Shrew
<i>Didelphis virginiana</i>	Virginia Opossum
<i>Eptesicus fuscus</i>	Big Brown Bat
<i>Lasiurus borealis</i>	Eastern Red Bat
<i>Microtus pennsylvanicus</i>	Meadow Vole
<i>Mus musculus</i>	House Mouse
<i>Myotis septentrionalis</i>	Northern Long-eared Bat
<i>Odocoileus virginianus</i> <sup>1</sup>	White-tailed Deer
<i>Ondatra zibethicus</i>	Muskrat
<i>Peromyscus leucopus</i>	White-footed Mouse
<i>Pitymys pinetorum</i>	Pine Mouse
<i>Procyon lotor</i> <sup>1</sup>	Raccoon
<i>Rattus norvegicus</i>	Norway Rat
<i>Sorex cinereus</i>	Masked Shrew
<i>Sylvilagus floridanus</i> <sup>1</sup>	Eastern Cottontail
<i>Vulpes vulpes</i>	Red Fox

<sup>1</sup>Indicates species or sign observed on-site.

### Reptiles and Amphibians

Few species of reptiles and amphibians are expected to occur on the site due to the absence of freshwater surface water and wetland habitats. The species that are expected to be present based on site observations, existing habitat types, and the New York State Herpetological Atlas (NYSDEC, 2009) are listed in **Table 5**. The New York State Herpetological Atlas provides known records of reptile and amphibian species from 1990-1998 for each 7.5-minute USGS topographic quadrangle within New York State. The expected reptile and amphibian species listed in **Table 5** are based on the Quogue, NY quadrangle. The common Fowler's toad (*Bufo*

*fowleri*) is found in dry sandy woodlands and barrens (Gibbs et al, 2007). The ubiquitous garter snake (*Thamnophis sirtalis*) can be found in various woodlands, fields, and suburban habitats. The black racer (*Coluber constrictor*) is a large snake of dry upland habitats including open woodlands, shrubby grasslands, dunes, and the edges of marshes (Gibbs et al, 2007). The Eastern hog-nosed snake is a New York State Species of Special Concern that is found in open pine or deciduous forests, old fields and beaches, and in and around marshes (Gibbs et al, 2007; Plummer and Mills 2000). The New York State Herpetological Atlas indicates that eastern hog-nosed snakes are known to occur in the Quogue quadrangle (NYSDEC, 2009). The sandy maritime upland habitats to the west of the site may provide suitable habitat for this species.

**TABLE 5**  
**REPTILE & AMPHIBIAN SPECIES**  
**OBSERVED OR EXPECTED ON SITE**

<i>Scientific Name</i>	Common Name
<i>Bufo fowleri</i>	Fowler's Toad
<i>Coluber constrictor</i>	Northern Black Racer
<i>Heterodon platirhinos</i>	Eastern Hog-Nosed Snake
<i>Thamnophis sirtalis</i>	Common Garter Snake

#### **1.4. Endangered, Threatened, and Rare Species**

New York Natural Heritage Program (NYNHP) correspondence from May 22, 2019 (**Appendix B**) indicates NYNHP records of the following threatened and endangered species occurring at or in the vicinity of the project site: (1) common tern (*Sterna hirundo*), NYS Threatened; (2) least tern (*Sternula antillarum*), NYS Threatened; (3) piping plover (*Charadrius melodus*), NYS Endangered and Federally Threatened; and (4) seabeach amaranth (*Amaranthis pumilis*), NYS and Federally Threatened. Additionally, the NYNHP denoted that black skimmer (*Rynchops niger*) and seaside sparrow (*Ammodramus maritimus*), both species of Special Concern, have been documented within 0.2 miles of the project site. Species of Special Concern are species which are not recognized as endangered or threatened, but for which documented evidence exists relating to their continued welfare in New York State. The Special Concern category exists within NYSDEC rules and regulations, but such designation does not provide any additional regulatory protection.

The protected shorebirds, i.e., piping plover, common and least terns, and black skimmer, nest on open, sparsely-vegetated ocean beaches and sandflats between the primary dune and high tide line. Nesting habitat for these protected shorebirds is not present on the site or adjacent shorelines of Shinnecock Bay. Piping plovers forage on beaches, dunes, in ephemeral pools, tidal flats, coastal plain pondshores, and high and low salt marshes (NYNHP, 2023a). Least tern, common tern, and black skimmer forage for small fish in estuarine and coastal waters. Therefore, the site's shoreline, marshes, and nearshore waters provide foraging habitat for these protected shorebirds. The Southampton Town Trustees Threatened and Endangered Species Management and Protection Program have documented piping plover and least tern nesting on Atlantic Ocean beaches between Rogers Beach and Shinnecock Inlet including within 750-1,200 feet of the site. Tiana Beach, the 1.8 mile reach of beach extending from 101 Dune Road (opposite of the site) to the Tiana Beach pavilion, has supported 4-8 pairs of piping plovers and 4-19 least tern pairs annually between 2019 and 2023 (Southampton Town Trustees, 2019, 2020, 2021, 2022, 2023), although shorebird nesting has been located more than 1,600 feet to the east of the site. Hampton Beach, the 3.7 mile reach of beach extending from 101 Dune Road to the Rogers Beach pavilion, has supported 6-11 pairs of piping plovers and 19-41 least tern pairs annually between 2019 and 2023 (Southampton Town Trustees, 2019, 2020, 2021, 2022, 2023), although plover nesting has typically been located more than 1.7 miles to the west of the site. In 2022 and 2023, piping plover nests occurred on the ocean beach approximately 750-1200 feet to the west of the site. Common tern and black skimmer have historically used these beaches for nesting, but have not been observed since at least 2008 per Southampton Town Trustees reports (Southampton Town Trustees, 2008-2023).

The seaside sparrow (*Ammodramus maritimus*) is a New York State Species of Special Concern that inhabits high and low salt marshes and nests in high marsh edges dominated by marsh elder (*Iva frutescens*) and patches of smooth cordgrass (*Spartina alterniflora*) in the low salt marsh (NYNHP, 2023b). Suitable habitat including nesting habitat for seaside sparrow is present on the eastern side of the site.

The tidal wetlands on and adjacent to the site provide foraging habitat and wintering habitat for various other protected wading birds and waterfowl including common loon (*Gavia immer*), NYS-Special Concern; pied-billed grebe (*Podilymbus podiceps*), NYS-Threatened; and American bittern (*Botarus lentiginosus*), NYS-Special Concern. These species are not confirmed to breed on eastern Long Island. The tidal wetlands and maritime grasslands and barrens along Dune Road between Hampton Beach and Shinnecock Inlet provide foraging habitat during the winter months for short-eared owl (*Asio flammeus*) and northern harrier (*Circus hudsonius*), both New York State-Threatened species. Cooper's hawk (*Accipiter cooperii*) and sharp-shinned hawk (*Accipiter striatus*), both New York State Species of Special Concern, may hunt for songbirds in the upland habitats on and adjacent to the site during any season and migrate along the barrier island during the spring and autumn. The maritime shrublands at the site are not suitable nesting habitat for Cooper's hawks, which prefer to nest in forests with a closed canopy, trees that are more than 30 years old, and have moderate to heavy shrub cover (Liguori, 2003). Sharp-shinned hawks are not documented to nest in Nassau or Suffolk Counties as per McGowan and Corwin (2008).

The northern long-eared bat (*Myotis septentrionalis*) was listed in 2016 as threatened and in 2023 as endangered by the US Fish and Wildlife Service and the New York State Department of Environmental Conservation. This species was not included in New York Natural Heritage Program (NYNHP) correspondence from May 22, 2019 (**Appendix B**); however, the NYSDEC EAF Mapper indicated that a known summer occurrence of northern long-eared bat has been documented within 1.5 miles of the site (NYSDEC, 2023). Due to their highly motile nature, northern long-eared bats could utilize the site for foraging habitat in the summer months and migration periods in the spring and autumn. Due to the absence of forest habitat, hardwood trees, and snags and cavity trees, the site does not provide daytime roosting habitat for northern long-eared bats.

Seabeach amaranth (*Amaranthus pumilus*), is a New York State and Federal Threatened plant species that is found on ocean beaches between the foredune and in overwash areas (NYNHP, 2023c). Suitable habitat for this species is not present at the site.

### 1.5 Significant Ecological Communities

New York Natural Heritage Program (NYNHP) correspondence from May 22, 2019 (**Appendix B**) indicates that the following significant natural communities have been documented at the project site or in its vicinity: (1) low salt marsh; (2) marine back-barrier lagoon; and (3) marine eelgrass meadow. These ecological communities are considered significant by the New York Natural Heritage Program as they are high-quality examples of ecological communities that are uncommon or rare in New York State. The proximity of these significant ecological communities to the project site is shown in **Figure 3**.

Low salt marsh habitats are located immediately adjacent to the site and are part of a large low marsh community (468 acres) within a 993-acre salt marsh complex. Low marshes are located between mean high tide and mean sea level, and therefore are regularly flooded by the semidiurnal tides. This habitat is characteristically dominated by cordgrass (*Spartina alterniflora*), however additional flora that may be present include glassworts (*Salicornia depressa*, *S. bigelovi*), salt marsh sand-spurry (*Spergularia marina*), and sea blites (*Suaeda* spp.). Few bird species utilize Low salt Marsh habitat for nesting, including marsh wren (*Cistothorus palustris*), saltmarsh sharp-tailed sparrow (*Ammodramus caudacutus*), red-winged blackbird (*Agelaius phoeniceus*), black-crowned night heron (*Nycticorax nycticorax*), Canada goose (*Branta Canadensis*), American black duck (*Anas rubripes*), and occasionally clapper rail (*Rallus longirostris*) and willet (*Catoptrophorus semipalmatus*) (Niedowski 2000). Many more bird species depend on low salt marsh communities for foraging habitat, including green heron (*Butorides stiatius*), great egret (*Ardea alba*), snowy egret (*Egretta thula*), glossy ibis (*Plegadis falcinellus*), tree swallow (*Tachycineta bicolor*), and various terns (Edinger et al, 2014).

**FIGURE 3**  
**SIGNIFICANT ECOLOGICAL COMMUNITIES AT/NEAR 94 DUNE ROAD SITE**



**NOTES**

1. Significant Natural Communities identified by NY Natural Heritage Program in their 5/22/2019 letter. Location(s) of 2018 Low Salt Marsh and Marine Eelgrass Meadow from LISS 2018 Biotic Survey shapefile. Location of 2007 Marine Eelgrass Bed from Eelgrass Bed shapefile. Shapefiles courtesy of NYS DOS from NYS Digital Information Gateway.
2. Property Boundary digitized from December 2022 survey prepared by Raynor, Marcks + Carrington. Survey was georeferenced to 2023 Nearmap image.
3. Base aerial courtesy of ESRI.



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Project: SIGNIFICANT NATURAL COMMUNITIES  
 For: Dockers  
 At: 94 Dune Road, East Quogue  
 SCTM # 900 - 385 - 1 - 36.3, 37.2

Date: 12/5/2023 Revised:

Scale: As Noted Sheet: NC-1

The marine back-barrier lagoon community is located ~200 feet to the northeast of the restaurant site and includes the large cove to the east of the low marshes on the site. The open water dug lagoon located to the north of the existing restaurant and marina is not considered part of the marine back-barrier lagoon, as these waters were created by dredging of the salt marshes in the mid-1960s. Back-barrier lagoons are bodies of water with reduced wave action as a result of protection by barrier islands from oceanic forces. The surface waters of Shinnecock Bay serve as a nursery and feeding area for bluefish, winter flounder, summer flounder, scup, weakfish, tomcod, and blue crab. Forage fish species are also abundant including Atlantic silversides, Atlantic menhaden, striped killifish, pipefish, American sandlance, American eel, alewife, blueback herring, Atlantic sturgeon, and sticklebacks. Shinnecock Bay is also inhabited by hard clams, soft clams, bay scallops, and bank mussels. Various marine and estuarine communities can be found within back-barrier lagoons and tidal bays, including marine eelgrass meadows, marine intertidal mudflats, and salt marshes.

Eelgrass meadows are located in Shinnecock Bay approximately 2,200 feet to the north of the restaurant site (NYSDOS and NOAA, 2018). Earlier surveys identified an eelgrass meadow located approximately 1,000 feet to the north of the restaurant site (NYSDOS, 2002). Review of aerial imagery and field investigations in 2021 by Land Use Ecological Services did not locate any eelgrass meadows in surface waters on the site and the portions of the marine back-barrier lagoon closest to the restaurant site. Marine eelgrass meadows are highly productive subtidal aquatic communities which are dominated by eelgrass (*Zostera marina*) found in shallow waters in tidal embayments with salinity ranging between 18 to 30 ppt. Characteristic fauna of eelgrass meadow include fourspine stickleback (*Apeltes quadracus*), mummichogs (*Fundulus heteroclitus*), northern pipefish (*Syngnathus fuscus*), silversides (*Menidia spp.*), naked goby (*Gobiosoma boscii*), menhaden (*Brevoortia tyrannus*) and winter flounder (*Pseudopleuronectes americanus*); mollusks, such as bay scallop (*Aequipecten irradians*), common Atlantic slippershell (*Crepidula fornicata*), and northern quahog (*Mercenaria mercenaria*); and crustaceans, such as spider crab (*Libinia emarginata*), mud crabs (*Panopeus sp.*), lady crab (*Ovalipes ocellatus*), and blue crab (*Callinectes sapidus*). Brant (*Branta bernicla*) and American black duck (*Anas rubripes*) feed on eelgrass.

All of these significant natural communities (low salt marsh, marine back-barrier lagoon, and low marine eelgrass meadows) are part of the Shinnecock Bay and Dune Road Marsh Significant Coastal Fish and Wildlife Habitats designated by the New York State Department of State Division of Coastal Resources due to the state-wide significance of the shellfish and finfish resources, submerged aquatic vegetation beds, and waterfowl and wading bird breeding and wintering habitat (NYSDOS, 2008a and 2008b).

## 2. Potential Impacts and Mitigation

### *2.1. Potential Impacts to Ecological Communities, Plants, and Wildlife*

The proposed action will construct 30,974 SF of residential buildings with 25 two- and three-bedroom condominium units; 8,715 SF of additional impervious area associated with accessory structures (swimming pool and decks), timber walkways, and paved surfaces; approximately 21,344 SF of gravel access roads and driveways; and a sanitary treatment plant and support structures. Under the proposed action, the existing floating dock (approximately 480 SF), sixteen (16) boat slips and ten (10) jet ski floats, approximately 230 linear feet of vinyl sheet bulkhead, and 1,480 SF of timber boardwalk located landward of the bulkhead will remain. The proposed construction activities are predominantly located within the footprint of the existing restaurant and parking areas. The limited area (0.57 acres) of proposed construction located in existing natural vegetation consists of 0.49 acres of maritime shrubland, 0.04 acres of maritime dune, and 0.04 acres of invasive Japanese knotweed within the maritime shrubland.

Under the proposed action, developed surfaces (i.e., buildings and decks, pervious and impervious roads and parking areas, and accessory structures) will decrease from 2.29 acres to 1.36 acres and natural ecological habitats will increase from 4.84 to 5.65 acres (**Table 6**). There will be no disturbance to existing vegetated tidal wetlands areas and approximately 0.02 acres of additional tidal wetlands will be constructed after the removal of the waterfront restaurant and decks. Under the proposed action, the acreage of the site consisting of natural ecological communities and native landscaping on the site will increase by 0.93 acres to approximately 80% of the site (excluding open water).

Under as-built conditions, the 5.65 acres of natural ecological communities on the site would be comprised of 1.19 acres of maritime shrubland (12.8%), 0.69 acres of maritime dune and grasslands, (7.4%), 1.32 acres of high salt marsh (14.2%), 0.18 acres of salt shrub (1.9%), and 2.18 acres of low salt marsh (23.5%) (**Figure 4**). It should be noted that 1.8 acres of the site's tidal wetlands (including both high and low salt marsh habitats) are located to the north of the dug canal. The proposed sanitary treatment plant will largely be planted with native grasses and wildflowers (i.e., American beach grass (*Ammophila breviligulata*), little bluestem (*Schizachyrium scoparium*), and seaside goldenrod (*Solidago sempervirens*)) and have been included in the 0.68 acres of maritime dune under proposed conditions. The limited landscaped areas (such as the narrow margins between proposed driveways and walks) will also be planted with native grasses and wildflowers; these areas are listed as proposed native landscaping (totaling 0.12 acres) in **Table 6**.

**TABLE 6: PROPOSED ECOLOGICAL COMMUNITIES  
AT 94 DUNE ROAD SITE**

	Existing (Acres)	Percent of Existing	Proposed (Acres)	Percent of Proposed	Change in Acres
Developed Surfaces (Roofs, Parking and Driveway, Pool and Decks, Non-Native Landscaping, and Walkways)	2.29	24.7	1.36	14.6	-0.93
Maritime Shrubland	0.88	9.5	1.19	12.8	+0.31
Maritime Dune	0.17	1.8	0.69	7.4	+0.52
Native Landscaping	0.00	0.0	0.12	1.3	+0.12
Japanese Knotweed Stand	0.04	0.4	0.00	0.0	-0.04
Low Salt Marsh	2.18	23.5	2.18	23.5	0.00
High Salt Marsh	1.30	14.0	1.32	14.2	+0.02
Salt Shrub	0.18	1.9	0.18	1.9	0.00
Marsh Panne	0.03	0.3	0.03	0.3	0.00
Unvegetated Beach	0.06	0.6	0.06	0.6	0.00
Open Water	2.16	23.3	2.16	23.3	0.00
<b>Total Site</b>	<b>9.29</b>	<b>100%</b>	<b>9.29</b>	<b>100%</b>	

The proposed action will establish a 75-ft wetland buffer along the majority of the site. The proposed condominium buildings will be setback a minimum of 75-ft from the tidal wetlands located to the east and northwest of the development. The proposed pool, native landscaping,

and gravel driveway on the northern end of the proposed development are located a minimum of 50-ft from the bulkheaded shoreline. The project will result in increased setbacks of the site's buildings to tidal wetlands from 0 feet under existing conditions (as existing restaurant and deck are adjacent to tidal wetlands in the northeast corner of the site) to between 50 and 83 feet under the proposed conditions. After removal of the existing restaurant, accessory decks, and parking areas, these new buffer areas will be planted with American beach grass (*Ammophila breviligulata*), little bluestem (*Schizachyrium scoparium*), seaside goldenrod (*Solidago sempervirens*), bayberry (*Morella pensylvanica*), beach plum (*Prunus maritima*), switch grass (*Panicum virgatum*), groundsel bush (*Baccharis halimifolia*), and salt hay (*Spartina patens*). The proposed sanitary treatment plant will also be planted with native herbaceous plants to provide additional ecological benefits, such as wildlife habitat and reduced fertilizer and irrigation demand, compared to turfgrass. These native plantings will result in an increase in 0.91 acres of maritime upland habitats and native landscaping and 0.02 acres of tidal wetlands habitats compared to existing conditions.

The proposed increase in 0.91 acres of maritime upland habitats and native landscaping and 0.02 acres of tidal wetlands compared to existing conditions will result in increased habitat availability for the plants, birds, and wildlife that currently utilize these habitats. In addition, the proposed action will result in an increase in habitat quality at the site as some areas that are dominated by invasive plants, such as Japanese black pine (*Pinus thunbergii*), autumn olive (*Eleaegnus umbellata*), Japanese knotweed (*Reynoutria japonica*) will be re-vegetated with the native maritime plants described above. The expanded wetland buffers and increased upland habitat will benefit wildlife by providing additional foraging and breeding habitat for coastal wildlife, better travel corridors with native vegetation for wildlife along the margins of the tidal wetlands, and better visual screening of human activity thereby increasing the quality of the nearby wetland habitats for wildlife breeding and foraging. In addition to these wildlife habitat benefits, the increased buffer area will provide other ecological benefits including increased soil stabilization and increased removal of nutrients and pollutants by buffer vegetation. These pollutant and sediment filtration functions will benefit the adjacent tidal wetlands including the significant low salt marsh, marine back barrier lagoon, and marine eelgrass meadow known to occur in proximity to the site.

**FIGURE 4**  
**ECOLOGICAL COMMUNITIES UNDER PROPOSED CONDITIONS AT 94 DUNE ROAD SITE**



A sanitary treatment plant (STP) located in the southwest corner of the site (approximately 265 feet landward of tidal wetlands) under the proposed conditions would replace an existing conventional sanitary system located 75 feet from tidal wetlands. The existing sanitary system would be removed as part of the proposed demolition. The subject site falls within the 0-2-year surface water contributing area to the Shinnecock Bay West subwatershed. The greater distance between the proposed STP and the tidal wetlands under the proposed conditions would allow nitrogen from the site's sanitary wastewater to be further reduced via natural means through its longer travel time to Shinnecock Bay. The sanitary wastewater generation of the existing restaurant use is approximately 3,360 gpd based on SCDHS design flow standards of 10 gallons per day (gpd)/seat (density load), 20 gpd/seat (kitchen load), 10 gpd/slip, and 100 gpd/tennis court. Nitrogen loading under these existing conditions is expected to be 185.99 lbs of nitrogen per year based on the BURBS model. Under the proposed action, the volume of sanitary waste generation would increase to 7,500 gpd (300 gpd per unit) and an on-site sewage treatment plant is proposed. Nitrogen loading under the proposed conditions is expected to be 124.15 lbs of nitrogen per year based on the BURBS model. The Shinnecock Bay West Subwatershed Plan encourages the use of I/A OWTS and STPs for future development (CDM Smith, 2020), and thus, the proposed action is consistent with this plan. Due to the landward relocation and increased nitrogen removal efficiency of the proposed sanitary treatment plant, the nitrogen contributions to Shinnecock Bay and its wetlands will be reduced under the proposed action.

The Proposed Action also provides stormwater management (both during construction and under future conditions) that will serve to minimize potential for degradation of the adjacent tidal wetlands and water quality through nutrient or sediment pollution due to stormwater runoff. The Proposed Action includes drainage infrastructure (196 shallow leaching pools and galleys) with capacity to collect and store the stormwater runoff generated by a 3-inch rainfall event and infiltrate the runoff into the ground. The proposed development shall be constructed under the requirements and specifications of a Stormwater Pollution Prevention Plan (SWPPP) prepared in accordance with the New York State Department of Environmental Conservation (NYSDEC) SPDES General Permit No. GP-0-20-001 and Chapter 285 "Stormwater Management and Erosion and Sediment Control" of the Town of Southampton Code.

Under the Proposed Action, the number of boat slips and jet ski floats (16 and 10, respectively) will be maintained; accordingly, potential environmental impacts associated with recreational boat usage including pollutant discharge to surface waters, disturbances to benthic substrate and organisms from propeller wash, and disturbance due to vessel noise and human activity will be similar to the existing conditions and no additional adverse impact will result from the Proposed Action.

Under the Proposed Action, the area of natural ecological communities and native landscaping on the site will increase by 0.93 acres (0.81 acres of natural habitats and 0.12 acres of native landscaping), stormwater runoff will be managed both during construction and under built conditions, and the nitrogen loading to Shinnecock Bay and its wetlands will decrease compared to existing conditions. Therefore, based on the above, the Proposed Action is not expected to have a significant adverse impact to the terrestrial and wetland communities on the site and in adjacent portions of Shinnecock Bay.

## ***2.2. Endangered, Threatened, and Rare Species***

New York Natural Heritage Program (NYNHP) correspondence from May 22, 2019 (**Appendix B**) indicates NYNHP records of the following threatened and endangered species occurring at or in the vicinity of the project site: (1) common tern (*Sterna hirundo*), NYS Threatened; (2) least tern (*Sternula antillarum*), NYS Threatened; (3) piping plover (*Charadrius melodus*), NYS Endangered and Federally Threatened; and (4) seabeach amaranth (*Amaranthis pumilis*), NYS and Federally Threatened. Additionally, the NYNHP denoted that black skimmer (*Rynchops niger*) and seaside sparrow (*Ammodramus maritimus*), both species of Special Concern, have been documented within 0.2 miles of the project site.

The protected shorebirds, i.e., piping plover, common and least terns, and black skimmer, nest on open, sparsely vegetated ocean beaches and sandflats between the primary dune and high tide line. The Southampton Town Trustees Threatened and Endangered Species Management and

Protection Program have documented piping plover and least tern nesting annually on Atlantic Ocean beaches between the Rogers Beach Pavilion and Shinnecock Inlet including within 750-1,200 feet of the site. Between 2019-2023, all shorebird nesting has been located more than 1,600 feet to the east of the project site. The NYSDEC typically imposes construction restrictions for projects within 1,000 feet of plover nests to reduce the risk of potential impacts to breeding plovers including 1) restriction of construction to outside of the breeding period (April 1 to August 31) or 2) completing construction under the supervision of a NYSDEC-approved shorebird monitor within the breeding period to ensure no disturbance to breeding birds occurs. Common tern and black skimmer have historically used these beaches for nesting, but have not been observed since at least 2008 per Southampton Town Trustees reports (Southampton Town Trustees, 2008-2023).

Nesting habitat for these protected shorebirds is not located on the site or reaches of Shinnecock Bay shoreline adjacent to the site. Piping plover and least tern nests on the Atlantic Ocean beaches on the opposite side of Dune Road have recently been located more than 1,600 feet to the east of the site, but have occurred at closer distances in the past. Conformance with NYSDEC permit conditions for any construction within 1000 feet of shorebird nests will ensure that the proposed action will have no adverse impacts on the nesting piping plovers or least terns. Piping plovers may forage in bayside tidal flats and the terns and skimmers forage for small fish in estuarine and coastal waters; thus, the improved wetland buffers, building setbacks, and sanitary system improvements may result in improvements to wetland habitat and minor indirect benefits to breeding shorebirds in the vicinity of the site. Accordingly, no adverse impacts to these endangered/threatened species, including these protected shorebirds, will result from the proposed action.

Seabeach amaranth (*Amaranthus pumilus*), New York State and Federal- Threatened, is found only on ocean beaches between the foredune and in overwash areas (NYNHP, 2023). This species is expected to be restricted to the Atlantic Ocean beaches located on the south side of the barrier island. Suitable habitat for this species is not present at the site; accordingly, no significant adverse impacts to this species will result from the proposed action.

The high-quality tidal wetlands and open maritime dune and grassland habitats located on and adjacent to the site are expected to be used as habitat for several protected wildlife species including seaside sparrow (*Ammodramus maritimus*), common loon (*Gavia immer*), pied-billed grebe (*Podilymbus podiceps*), American bittern (*Botarus lentiginosus*), short-eared owl (*Asio flammeus*), northern harrier (*Circus hudsonius*), Cooper's hawk (*Accipiter cooperii*), and sharp-shinned hawk (*Accipiter striatus*). The proposed action will 1) provide an increase in 0.79 acres of maritime upland habitats and 0.02 acres of tidal wetlands compared to existing conditions and 2) will increase wetland setbacks from 0 feet under existing conditions to between 50 and 83 feet under proposed conditions. Accordingly, the proposed action will result in increased habitat availability and quality for seaside sparrow, similar wetland-dependent wildlife, and other wildlife that utilize the marshes, dunelands, and grasslands along Dune Road. As a result, no significant adverse impacts to these endangered, threatened, or rare wildlife species will occur due to the proposed action.

The northern long-eared bat (*Myotis septentrionalis*) was listed in 2016 as threatened and in 2023 as endangered by the US Fish and Wildlife Service and the New York State Department of Environmental Conservation. A known summer occurrence of northern long-eared bat has been documented within 1.5 miles of the site (NYSDEC, 2023). Due to their highly motile nature, northern long-eared bats may utilize the site for foraging habitat in the summer months and migration periods in the spring and autumn. The trees present on the site are largely limited to small coniferous trees, such as Japanese black pine, that are not expected to provide roosting habitat for northern long-eared bat. Due to the absence of forest habitat, hardwood trees, and snags and cavity trees, the site does not provide daytime roosting habitat for northern long-eared bat. The availability of summer habitat is not limiting for northern long-eared bat and loss of summer habitat is not recognized as a threat to the conservation of this species (USFWS, 2016); rather, white-nose syndrome is the primary threat to northern long-eared bat within its summer habitats. While the site is not expected to provide suitable daytime roosting habitat for northern long-eared bat, the NYSDEC recommends that any cutting of trees occur during the winter months (between December 1 and February 28) to avoid a potential take of this protected

species. Any cutting of trees associated with this project would occur during this timeframe in accordance with NYSDEC recommendations and, accordingly, no adverse impacts to northern long-eared bat populations are expected to result from the proposed action.

## **2.2 Significant Natural Communities**

Several significant natural ecological communities have been documented to occur adjacent and in proximity to the site including low salt marsh, marine back-barrier lagoon, and marine eelgrass meadows (NYNHP, 2019; **Figure 3** and **Appendix B**). These ecological communities are considered significant by the New York Natural Heritage Program as they are high-quality examples of ecological communities that are uncommon or rare in New York State. These significant natural communities (low salt marsh, marine back-barrier lagoon, and marine eelgrass meadows) are part of the Shinnecock Bay and/or Dune Road Marsh Significant Coastal Fish and Wildlife Habitats designated by the New York State Department of State Division of Coastal Resources due to the state-wide significance of the shellfish and finfish resources, submerged aquatic vegetation beds, and waterfowl and wading bird breeding and wintering habitat (NYS DOS, 2008a and 2008b).

The Proposed Action will not have significant adverse impacts on these significant ecological resources as under the proposed conditions 1) developed surfaces (i.e., buildings and decks, pervious and impervious roads and parking areas, accessory structures, and non-native landscaping) will decrease from 2.29 acres to 1.36 acres, 2) naturally vegetated areas will increase from 4.84 to 5.65 acres (approximately 80% of the site excluding open water) by planting native vegetation in currently developed areas, 3) setbacks of the site's buildings to tidal wetlands will increase from 0 feet under existing conditions to between 50 and 83 feet under proposed conditions, and 4) nitrogen loading from sanitary wastewater will decrease from 185.99 lbs of nitrogen per year to 124.43 lbs of nitrogen per year due to the replacement of the existing conventional sanitary system (located 75 feet from wetlands) with a sanitary treatment plant (located 265 feet from wetlands). These environmental mitigation measures are expected to reduce nutrient and coliform pollution to the nearby significant ecological communities and

surface water resources compared to existing conditions and, accordingly, the proposed action is not expected to have a significant adverse impact to the significant ecological communities on the site or the Dune Road marshes and Shinnecock Bay.

### **2.3. Mitigation**

Potential mitigation measures to reduce environmental impacts associated with the proposed action include the following:

- The proposed action decreases the site's developed surfaces (i.e., buildings and decks, pervious and impervious roads and parking areas, and accessory structures) from 2.29 acres to 1.36 acres. The proposed action will create an additional 0.79 acres of maritime upland habitats, 0.12 acres of native landscaping, and 0.02 acres of tidal wetlands habitats in currently developed areas and will establish a 75-ft wetland buffer along the majority of the site. New restoration areas will be planted with American beach grass (*Ammophila breviligulata*), little bluestem (*Schizachyrium scoparium*), seaside goldenrod (*Solidago sempervirens*), bayberry (*Morella pensylvanica*), beach plum (*Prunus maritima*), switch grass (*Panicum virgatum*), groundsel bush (*Baccharis halimifolia*), and salt hay (*Spartina patens*), at appropriate elevations, after removal of the existing restaurant, accessory decks, and parking areas.
- Nutrient reduction measures included in the proposed action include removal and replacement of the existing conventional sanitary system that services the existing restaurant/bar with a sanitary treatment plant. The sanitary treatment plant will be located approximately 265 feet landward of tidal wetlands compared to the existing sanitary system located 75 feet from tidal wetlands. Due to the increased distance to the wetlands and increased efficiency of nitrogen removal from the sewage treatment plant compared to a conventional sanitary system, the nitrogen contributions to Shinnecock Bay and its wetlands under the proposed conditions is expected to be 124.15 lbs of nitrogen per year based on the BURBS model and represents an improvement compared

to nutrient loading (estimated at 185.99 lbs of nitrogen per year) under existing site conditions.

- The proposed landscaping will consist of native grasses and wildflowers including switch grass (*Panicum virgatum*), little bluestem (*Schizachyrium scoparium*), American beach grass (*Ammophila breviligulata*), and seaside goldenrod (*Solidago sempervirens*) and native woody shrubs, such as bayberry (*Morella pensylvanica*) and beach plum (*Prunus maritima*), to enhance wildlife habitat and minimize fertilizer and irrigation requirements.
- The expanded wetland buffers and increased upland habitat will have a resultant benefit to wildlife by providing: (1) additional foraging and breeding habitat for coastal wildlife; (2) better travel corridors with native vegetation for wildlife along the margins of the tidal wetlands; and (3) better visual screening of human activity thereby increasing the quality of the nearby wetland habitats for wildlife breeding and foraging.
- The increased buffer area will provide other ecological benefits, including increased soil stabilization as well as increased removal of nutrients and pollutants by buffer vegetation. These pollutant and sediment filtration functions would have a resultant benefit to the adjacent tidal wetlands, including the significant low salt marsh, marine back barrier lagoon, and marine eelgrass meadow known to occur proximate to the site.
- The proposed action includes construction of a stormwater management system that will collect and infiltrate stormwater generated from a 3-inch rainfall event over a 24-hour period and will be constructed under the requirements and specifications of a Stormwater Pollution Prevention Plan (SWPPP) prepared in accordance with the New York State Department of Environmental Conservation (NYSDEC) SPDES General Permit No. GP-0-20-001 and Chapter 285 "Stormwater Management and Erosion and Sediment Control" of the Town of Southampton Code.
- Conformance with NYSDEC permit conditions for any construction within 1000 feet of shorebird nests will ensure that the proposed action would have no adverse impacts on the nesting piping plovers or least terns.
- All tree clearing for the proposed action will occur during the winter months (between December 1 and February 28) in accordance with NYSDEC guidance to avoid potential impacts to the New York State-endangered northern long-eared bat (*Myotis*

*septentrionalis*), as the site is located within 1.5 miles of a known summer occurrence of this species.

### 3. Alternative Plans

#### ***Alternative Plan 1 (No Action)***

Under Alternative Plan 1 (No Action), the existing restaurant/bar and marina with decks and associated parking would continue to operate pursuant to its Certificate of Occupancy (No. C02194). Under the No Action alternative, the environmental benefits of the proposed action would not be realized including 1) the ecological benefits and increased wildlife habitat quality and availability associated with decreasing the site's developed areas from 2.29 acres to 1.36 acres, increasing natural ecological habitats and native landscaping by 0.93 acres (0.79 acres of maritime upland habitats, 0.12 acres of native landscaping, and 0.02 acres of tidal wetlands, and increasing habitat quality by replacing developed areas and areas dominated by invasive plant species with native coastal plant species; 2) the ecological benefits to wetlands, wetland-dependent wildlife, and surface waters associated with providing a 75-ft vegetated buffer on the eastern and northwestern portions of the site and increasing the wetland setbacks from 0 feet under existing conditions to between 50 and 83 feet under proposed conditions; and 3) the water quality benefits to wetlands and surface waters associated with removal and replacement of the existing conventional sanitary system on the site (located 75 feet from tidal wetlands) with a sanitary treatment plant located 265 feet landward of tidal wetlands.

#### ***Alternative Plan 2 (Develop Per Current Zoning)***

Alternative Plan 2 (Development per Current Zoning and Regulatory Controls) includes the as-of-right construction of an 8,960 SF 2-story single family residence (with no basement) with swimming pool, decks and pervious driveway, and sanitary system. Alternative Plan 2 provides similar benefits to ecological communities, wildlife, endangered/threatened species, and significant ecological communities to the proposed action described in Sections 2.1, 2.2, and 2.3, as both the Proposed Action and Alternative Plan 2 would remove the existing restaurant and parking areas and provide 50 to 75-ft wide vegetated buffers to the wetlands. Alternative Plan 2 includes

less impervious coverage than the proposed action (i.e., proposed 15,391 SF of coverage under Alternative Plan 2 compared to 37,897 SF under the Proposed Action) and increased landscaping and native vegetation. Accordingly, Alternative Plan 2 would likely provide additional environmental benefits compared to the Proposed Action such as additional wildlife habitats associated with greater native vegetation area and reduced stormwater generation due to the reduced development footprint and impervious surface area. However, Alternative Plan 2 is also likely to include fertilizer-dependent turf lawn and landscaping, whereas, the Proposed Action includes only native plants in proposed landscaping thereby minimizing potential fertilizer-related nutrient contributions to wetlands and surface waters. Under Alternative Plan 2, less sanitary wastewater would be generated due to the reduced residential density (1 single-family residence versus 25 condominium units) and, accordingly, would result in less potential nutrient and coliform pollution to nearby surface waters and wetlands. Lastly, under Alternative Plan 2, the environmental impacts associated with recreational boat usage including pollutant discharge to surface waters and disturbance due to vessel noise and human activity will be less than the Proposed Action due to the reduced number of vessels (1-2 boats and 1-2 jet skis under Alternative Plan 2 compared to 16 boat slips and 10 jet ski floats under the Proposed Action).

### ***Alternative Plan 3 (Reduced Development Alternative)***

Alternative Plan 3 (Reduced Development Alternative) includes the construction of 25,125 SF of residential buildings (supporting 20 two and three bedroom condominium units) including a 1,762 SF clubhouse with a swimming pool, 3,396 SF of decks, gravel access roads and driveways, and sanitary treatment plant and support structures. Under the Alternative Plan 3, the existing floating dock with 16 boat slips and 10 jet ski floats, approximately 230 linear feet of vinyl sheet bulkhead, and 1,480 SF of timber boardwalk will remain.

Alternative Plan 3 would provide similar benefits to ecological communities, wildlife, endangered/threatened species, and significant ecological communities to the proposed action described in Sections 2.1, 2.2, and 2.3, as both the Proposed Action and Alternative Plan 3 would remove the existing restaurant and parking areas, provide 50 to 75-ft wide vegetated buffers to

the wetlands, and replace the existing conventional sanitary system with a sewage treatment plant located farther from the wetlands. The area of native buffer restoration and native landscaping are expected to be slightly greater under Alternative Plan 3 compared to the Proposed Action and accordingly, the habitat benefits to ecological communities, wildlife, endangered/threatened species, and significant ecological communities may also be slightly greater than the Proposed Action.

Under Alternative Plan 3, the reduced residential density (20 versus 25 condominium units) will result in less sanitary wastewater and potential nutrient and coliform pollution to nearby surface waters and wetlands. Alternative Plan 3 includes a similar number of private boat slips and jet ski floats (16 slips and 10 floats) as the Proposed Action; accordingly, the environmental impacts associated with recreational boat usage, pollutant discharge to surface waters, and disturbance due to vessel noise and human activity, will be similar to the Proposed Action.

#### ***Alternative Plan 4 (Town Purchase of Subject Property)***

Under Alternative Plan 4 (Town Purchase of Subject Property), the existing restaurant/bar and marina with tennis courts, decks, and associated parking would continue to operate pursuant to Certificate of Occupancy (No. C02194) until the Town of Southampton's purchase of the property and the environmental benefits of the Proposed Action would not be realized during that time. There are no adverse environmental impacts associated with the ministerial action of the Town's purchase of the subject property. Over the long-term, the potential environmental benefits or adverse impacts associated with Alternative Plan 4 cannot be determined at this time, as the Town's plans for the use of the subject property subsequent to its purchase are not known.

#### ***Alternative Plan 5 (Private Yacht Club)***

Alternative Plan 5 would construct a private yacht club with 17,526 SF of proposed buildings including clubhouse building, restaurant, and waterfront pavilion; tennis court, swimming pool, and impervious walks; and gravel parking areas. The yacht club would have twenty four (24) boat

slips (total) on four T-docks. Under Alternative Plan 5, the existing restaurant building would be maintained and renovated in the northeast corner of the site and, therefore, would not provide the 50 to 83-ft wetland setbacks provided under the Proposed Action. The yacht club would not include any boat repair or maintenance facilities or services and would not provide on-land boat storage. The yacht club facilities would be serviced by a sanitary treatment plant, similar to the Proposed Action.

Alternative Plan 5 (Private Yacht Club) proposes more developed areas (including both buildings and accessory structures and pervious parking areas) than the Proposed Action. The proposed gravel parking area is located less than 5 feet from the tidal wetland boundary in the southeast corner of the site. The renovated restaurant and tennis court are located 22 feet and 26 feet, respectively, from the tidal wetland on the east side of the site.

Under Alternative Plan 5, the environmental benefits to ecological communities, wildlife, endangered/threatened species, and significant ecological communities of the proposed action described in Sections 2.1, 2.2, and 2.3 would not be realized including 1) increasing natural ecological habitats by 0.81 acres (0.79 acres of maritime upland habitats and 0.02 acres of tidal wetlands) to a total of 5.65 acres; 2) increasing habitat quality by replacing developed areas and areas dominated by invasive plant species with native coastal vegetation; 3) and increasing the wetland setbacks from 0 feet under existing conditions to between 50 and 83 feet under proposed conditions.

Alternative Plan 5 would result in the construction of more in-water structures (i.e., proposed docks totaling 3,656 SF) to provide 24 boat slips rather than the 1,874 SF of in-water structures associated with the 16 boat slips and 10 jet ski floats under the Proposed Action. In addition, the environmental impacts associated with recreational boat usage to the nearshore waters of the man-made dug canal and Shinnecock Bay, such as pollutant discharge to surface waters, benthic disturbance, and disturbance due to vessel noise and human activity, will likely be greater than the Proposed Action due to the larger number of boat slips. Similar to the Proposed Action, Alternative Plan 5 would include the construction of a sanitary treatment plant and would,

therefore, result in a reduction in nitrogen loading, despite an increase in sanitary waste generation, compared to the existing conditions. Alternative Plan 5 would result in less nutrient loading to the nearshore surface waters of Shinnecock Bay compared to the Proposed Action due to the reduced sanitary waste discharge of the yacht club facility compared to 25 residential condominium units.

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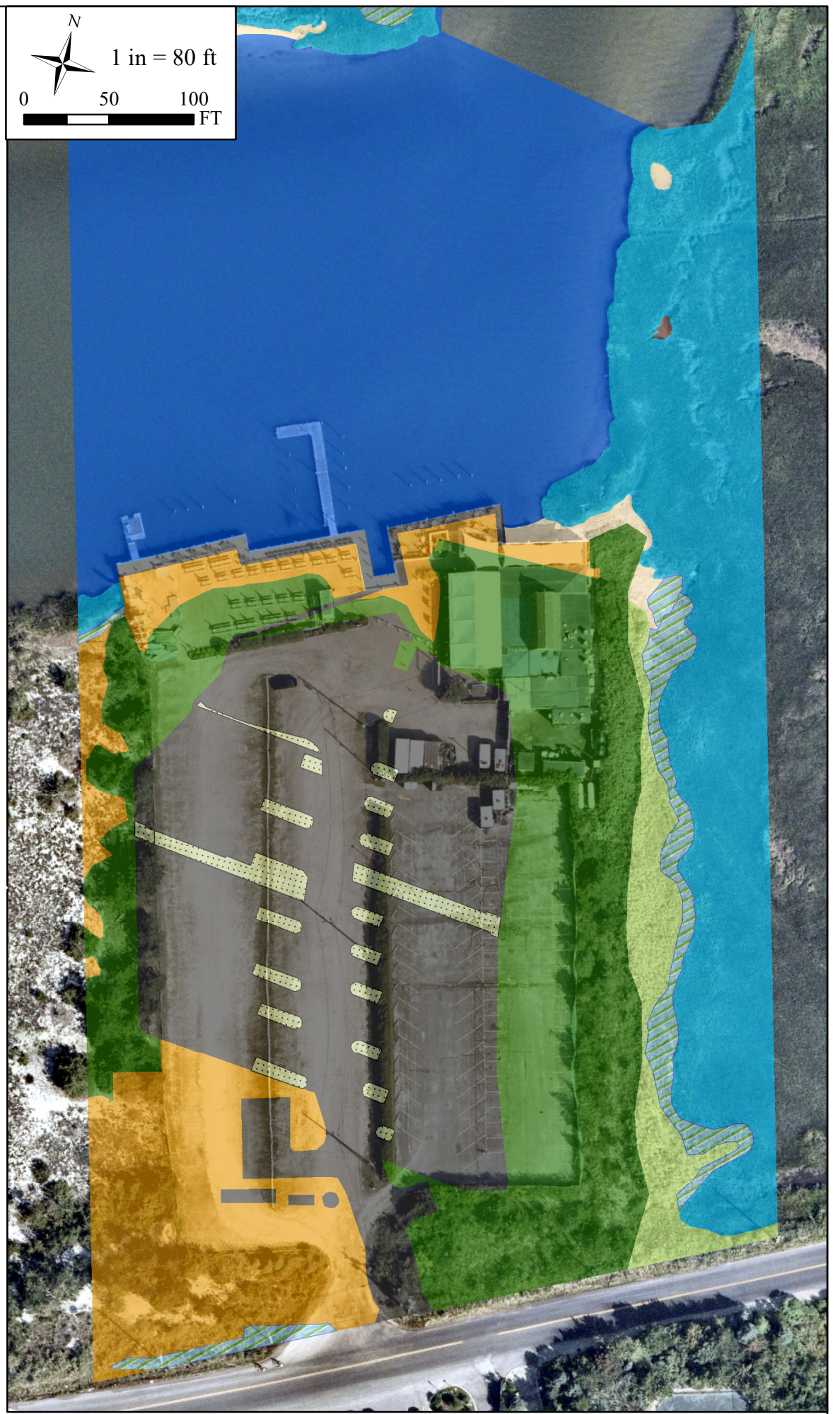
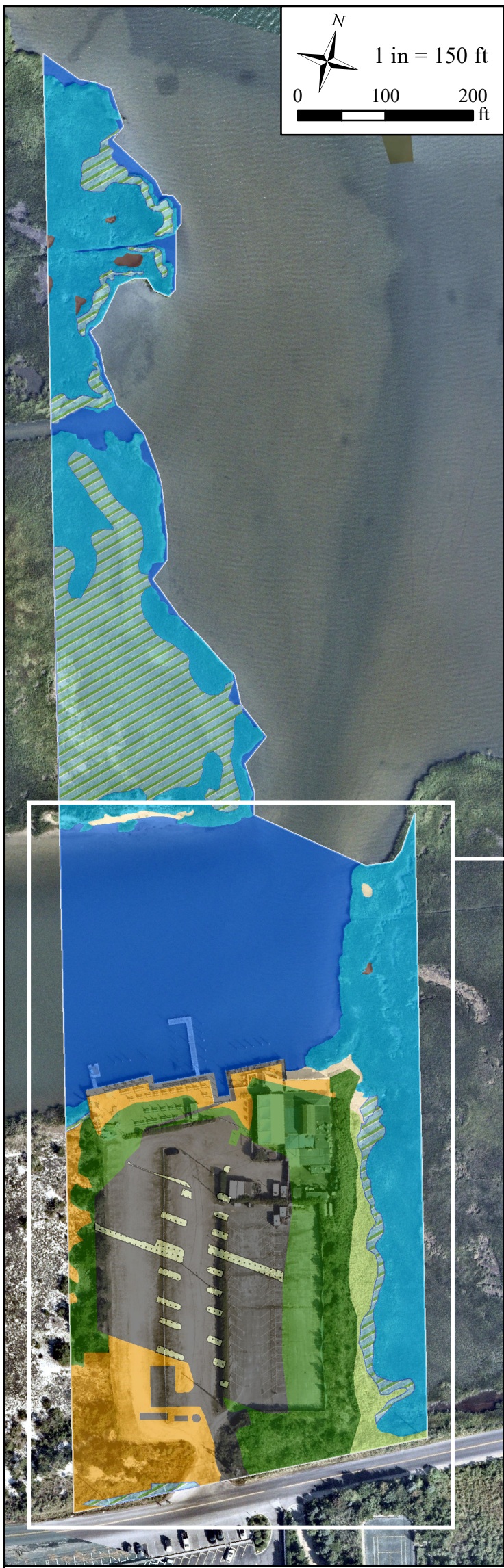
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# **APPENDIX A**







**PROPOSED ECOLOGICAL COMMUNITIES**

	Interidal Marsh
	High Marsh
	Salt Shrub
	Panne
	Beach (Sand)
	Maritime Dune
	Maritime Shrubland
	Native Landscaping
	Open Water
	Developed

Proposed Community	Area (acres)
Low Salt Marsh (IM)	2.18
High Salt Marsh (HM)	1.32
Salt Shrub	0.18
Panne	0.03
Beach (Sand)	0.06
Maritime Dune	0.69
Maritime Shrubland	1.19
Native Landscaping	0.12
Open Water	2.16
Developed	1.36
<b>Total</b>	<b>9.29</b>

**NOTES**

1. Ecological communities characterized by W.P. Bowman and K. Risotto, Land Use Ecological Services, Inc. by field assessment and hand-held GPS, as well as aerial photographs. Field assessment was performed for existing developed portion of the site; aerial photos were used for marsh islands. Area of each community obtained using Calculate Geometry tool in ESRI ArcMap.
2. Ecological Community Areas (acres) based on PWGC calculations and survey.
3. Property Boundary digitized from December 2022 survey prepared by Raynor, Marcks + Carrington. Survey was georeferenced to 2023 Nearmap image.
4. Base aerial is 9/5/2023 Nearmap aerial image.

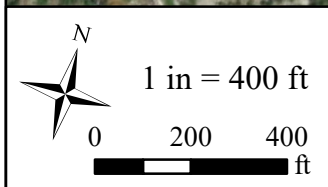
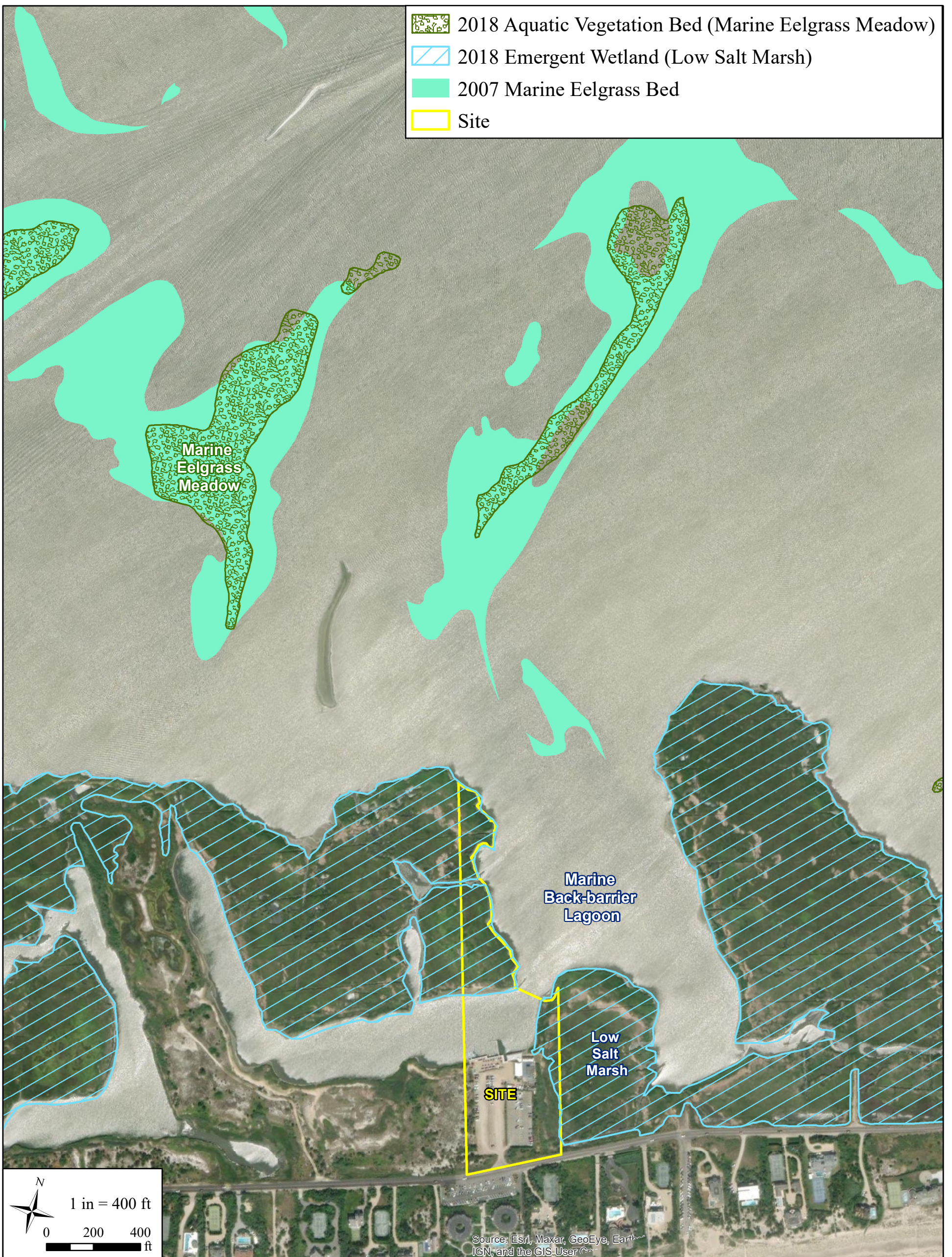


Prepared By: Land Use Ecological Services, Inc.  
570 Expressway Drive South, Suite 2F  
Medford, NY 11763

Project: PROPOSED ECOLOGICAL COMMUNITIES  
For: Dockers  
At: 94 Dune Road, East Quogue  
SCTM # 900 - 385 - 1 - 36.3, 37.2

Date: 12/18/2023 Revised: 1/16/2024

Scale: As Noted Sheet: EC-P



Source: Esri, Maxar, GeoEye, Earthstar, IGN, and the GIS User Community

**NOTES**

1. Significant Natural Communities identified by NY Natural Heritage Program in their 5/22/2019 letter. Location(s) of 2018 Low Salt Marsh and Marine Eelgrass Meadow from LISS 2018 Biotic Survey shapefile. Location of 2007 Marine Eelgrass Bed from Eelgrass Bed shapefile. Shapefiles courtesy of NYSDOS from NYS Digital Information Gateway.
2. Property Boundary digitized from December 2022 survey prepared by Raynor, Marcks + Carrington. Survey was georeferenced to 2023 Nearmap image.
3. Base aerial courtesy of ESRI.



Prepared By: Land Use Ecological Services, Inc.  
570 Expressway Drive South, Suite 2F  
Medford, NY 11763

Project: SIGNIFICANT NATURAL COMMUNITIES  
For: Dockers  
At: 94 Dune Road, East Quogue  
SCTM # 900 - 385 - 1 - 36.3, 37.2

Date: 12/5/2023

Revised:

Scale: As Noted

Sheet: NC-1

## **APPENDIX B**



## NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

Division of Fish and Wildlife, New York Natural Heritage Program

625 Broadway, Fifth Floor, Albany, NY 12233-4757

P: (518) 402-8935 | F: (518) 402-8925

www.dec.ny.gov

May 22, 2019

Lauren Sidor  
Land Use Ecological Services, Inc.  
570 Expressway Drive South, Suite 2F  
Medford, NY 11763

Re: 94 Dune Road - East Quogue  
County: Suffolk Town/City: Southampton

Dear Ms. Sidor:

In response to your recent request, we have reviewed the New York Natural Heritage Program database with respect to the above project.

Enclosed is a report of rare or state-listed animals and plants, and significant natural communities that our database indicates occur in the vicinity of the project site.

For most sites, comprehensive field surveys have not been conducted; the enclosed report only includes records from our database. We cannot provide a definitive statement as to the presence or absence of all rare or state-listed species or significant natural communities. Depending on the nature of the project and the conditions at the project site, further information from on-site surveys or other sources may be required to fully assess impacts on biological resources.

Our database is continually growing as records are added and updated. If this proposed project is still under development one year from now, we recommend that you contact us again so that we may update this response with the most current information.

The presence of the plants and animals identified in the enclosed report may result in this project requiring additional review or permit conditions. For further guidance, and for information regarding other permits that may be required under state law for regulated areas or activities (e.g., regulated wetlands), please contact the NYS DEC Region 1 Office, Division of Environmental Permits at [dep.r1@dec.ny.gov](mailto:dep.r1@dec.ny.gov), 631-444-0365.

Sincerely,



Heidi Krahlting  
Environmental Review Specialist  
New York Natural Heritage Program



**The following state-listed animals have been documented at or in the vicinity of the project site.**

The following list includes animals that are listed by NYS as Endangered, Threatened, or Special Concern; and/or that are federally listed or are candidates for federal listing.

For information about any permit considerations for the project, please contact the Permits staff at the NYSDEC Region 1 Office at [dep.r1@dec.ny.gov](mailto:dep.r1@dec.ny.gov), 631-444-0365.

<i>COMMON NAME</i>	<i>SCIENTIFIC NAME</i>	<i>NY STATE LISTING</i>	<i>FEDERAL LISTING</i>
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**The following species have been documented at the project site.**

<b>Common Tern</b> <i>Breeding</i>	<i>Sterna hirundo</i>	Threatened	7409
<b>Least Tern</b> <i>Breeding</i>	<i>Sternula antillarum</i>	Threatened	12348
<b>Piping Plover</b> <i>Breeding</i>	<i>Charadrius melodus</i>	Endangered	Threatened 12364

**The following species has been documented within 0.2 mile of the project site.**

<b>Black Skimmer</b> <i>Breeding</i>	<i>Rynchops niger</i>	Special Concern	10115
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This report only includes records from the NY Natural Heritage database.

If any rare plants or animals are documented during site visits, we request that information on the observations be provided to the New York Natural Heritage Program so that we may update our database.

Information about many of the listed animals in New York, including habitat, biology, identification, conservation, and management, are available online in Natural Heritage’s Conservation Guides at [www.guides.nynhp.org](http://www.guides.nynhp.org), and from NYSDEC at [www.dec.ny.gov/animals/7494.html](http://www.dec.ny.gov/animals/7494.html).



**The following rare plants, rare animals, and significant natural communities have been documented at the project site, or in its vicinity.**

We recommend that potential impacts of the proposed project on these species or communities be addressed as part of any environmental assessment or review conducted as part of the planning, permitting and approval process, such as reviews conducted under SEQRA. Field surveys of the project site may be necessary to determine the status of a species at the site, particularly for sites that are currently undeveloped and may still contain suitable habitat. Final requirements of the project to avoid, minimize, or mitigate potential impacts are determined by the lead permitting agency or the government body approving the project.

**The following animal, while not listed by New York State as Endangered or Threatened, is rare in New York and is of conservation concern.**

COMMON NAME	SCIENTIFIC NAME	NY STATE LISTING	HERITAGE CONSERVATION STATUS
<b>Birds</b>			
<b>Seaside Sparrow</b> <i>Breeding</i>	<i>Ammodramus maritimus</i>	Special Concern	Imperiled in NYS
Documented within 0.2 mile west of the project site. 2001-summer: The birds were found in an area of scrubby vegetation growing in dredge spoil. The area is part of a large salt marsh that lies along the northern shore of a barrier island and faces a large bay.			11171

**The following natural communities are considered significant from a statewide perspective by the NY Natural Heritage Program. Each community is either an example of a community type that is rare in the state, or a high-quality example of a more common community type. By meeting specific, documented criteria, the NY Natural Heritage Program considers these community occurrences to have high ecological and conservation value.**

COMMON NAME	SCIENTIFIC NAME	NY STATE LISTING	HERITAGE CONSERVATION STATUS
<b>Wetland/Aquatic Communities</b>			
<b>Low Salt Marsh</b>			High Quality Occurrence of Uncommon Community Type
<b>Documented at the project site.</b> This is a large community (468 acres) in a 993-acre salt marsh complex. Patches of marsh are best developed along the backbarrier fringe. The community is missing a large percentage of the mainland fringe marsh. The marsh is primarily formed on younger (post 1800) relict flood delta surfaces.			3291
<b>Marine Back-barrier Lagoon</b>			High Quality Occurrence of Rare Community Type
<b>Documented adjacent to the project site.</b> This is a very large marine back-barrier lagoon that is in good condition within a fair quality, but mostly developed landscape.			15455
<b>Marine Eelgrass Meadow</b>			High Quality Occurrence of Rare Community Type
<b>Documented within 100 yards north of the project site.</b> This large patch of eelgrass is in good condition within a fair quality landscape setting.			15041

The following plants are listed as Endangered or Threatened by New York State, and/or are rare in New York State, and so are a vulnerable natural resource of conservation concern.

COMMON NAME	SCIENTIFIC NAME	NY STATE LISTING	HERITAGE CONSERVATION STATUS	
<b>Vascular Plants</b>				
<b>Seabeach Amaranth</b>	<i>Amaranthus pumilus</i>	Threatened and Federally Listed as Threatened	Imperiled in NYS and Globally Rare	
Documented within 275 yards southeast of the project site. 2017-summer: A relatively narrow barrier beach strip terminating on the west side in dredge spoil and rip rap. This is a dynamic system of dunes with some dunes over 30 feet high.				4250
<b>Seabeach Knotweed</b>	<i>Polygonum glaucum</i>	Rare	Vulnerable in NYS and Globally Uncommon	
Documented within 0.25 mile southwest of the project site. 2003-08-05: The plants grow on a long stretch of maritime beach and dunes. There is very little habitat here with the high water reaching to the scarped dunes.				11332

This report only includes records from the NY Natural Heritage database. For most sites, comprehensive field surveys have not been conducted, and we cannot provide a definitive statement as to the presence or absence of all rare or state-listed species. Depending on the nature of the project and the conditions at the project site, further information from on-site surveys or other sources may be required to fully assess impacts on biological resources.

If any rare plants or animals are documented during site visits, we request that information on the observations be provided to the New York Natural Heritage Program so that we may update our database.

Information about many of the rare animals and plants in New York, including habitat, biology, identification, conservation, and management, are available online in Natural Heritage's Conservation Guides at [www.guides.nynhp.org](http://www.guides.nynhp.org), from NatureServe Explorer at [www.natureserve.org/explorer](http://www.natureserve.org/explorer), and from USDA's Plants Database at <http://plants.usda.gov/index.html> (for plants).

Information about many of the natural community types in New York, including identification, dominant and characteristic vegetation, distribution, conservation, and management, is available online in Natural Heritage's Conservation Guides at [www.guides.nynhp.org](http://www.guides.nynhp.org). For descriptions of all community types, go to [www.dec.ny.gov/animals/97703.html](http://www.dec.ny.gov/animals/97703.html) for Ecological Communities of New York State.