



PHASE IA DOCUMENTARY STUDY

**CITY ISLAND DEVELOPMENT PROJECT SITE
BLOCK 5643, LOT 235
BOUNDED BY FORDHAM STREET, FORDHAM PLACE,
AND THE LONG ISLAND SOUND**

CITY ISLAND, BRONX COUNTY, NEW YORK

PHASE IA DOCUMENTARY STUDY

CITY ISLAND DEVELOPMENT PROJECT SITE
BLOCK 5643, LOT 235
BOUNDED BY FORDHAM STREET, FORDHAM PLACE AND THE LONG
ISLAND SOUND

CITY ISLAND, BRONX COUNTY, NEW YORK

Prepared For:

AKRF, Inc.
117 East 29th Street
New York, NY 10016

Prepared By:

Historical Perspectives, Inc.
P.O. Box 3037
Westport, CT 06880

Primary Author: Christine E. Flaherty, M.A, M.Phil.

September 2005

EXECUTIVE SUMMARY

Pulte Home Corporation has proposed construction of a residential development on City Island, in the Borough of the Bronx, New York. The proposed project is planned to have 22 two-family houses, accessory parking, and a waterfront seating area (AKRF 2005). The project site occupies Lot 235 on Block 5643, bounded by Fordham Street to the north, Fordham Place to the west, Banta (Windward) Lane to the south, and the Long Island Sound to the east (Figures 1 and 2). The property consists of approximately 235,000 square feet, and currently contains four structures. One is a residential building, built c. 1870, at 222 Fordham Street (also formerly known as 226 Fordham Street and 118 Fordham Avenue), and until recently used as offices for International Underwater Contractors. Two of the remaining buildings are 20th century industrial sheds. The remaining building is of indeterminate age, but could possibly date from the late 19th century, based on an assessment of historic maps. Lot 235 historically comprised Lot 235, covering the north half of the project site, Lot 225, covering much of the south half of the project site, and Lot 295, which bordered Banta Lane. Former Lot 296, immediately to the west of Lot 295, is not part of the project site.

In accordance with New York City Environmental Quality Review (CEQR) regulations and procedures, Landmarks Preservation Commission (LPC) has required a Phase IA Documentary Study for this undertaking. The structure at 222 Fordham Street is being evaluated for eligibility in the National Register of Historic Places (NRHP) by AKRF, Inc., in a separate report. This report complies with the guidelines of the LPC (CEQR 2001; LPC 2002).

The present Phase IA Documentary Study, prepared by Historical Perspectives, Inc. (HPI) under contract to AKRF, Inc., describes conditions on the project site (including soil and geological boring data and known disturbances to the property), previous cultural resources investigations undertaken adjacent to the project site, the history of the property, and based upon the preceding sections, the site's sensitivity for the recovery of archaeological resources. The Area of Potential Effect (APE) will be referred to throughout this report, and constitutes the footprint of planned construction and disturbance on the site. It is assumed for the purposes of this survey that the footprint of proposed development, or APE, will cover the entire project site.

The Phase IA study concluded that despite the presence of previously recorded precontact archaeological sites in the general vicinity, there is a low potential for the recovery of precontact period archaeological resources within the City Island development project site APE. No archaeological field testing is recommended for precontact period resources.

Archival research documented that the site has been occupied since at least the 1860s by a series of shipyards including a blacksmith shop, a general store and post office, an extant dwelling that dates from c. 1870 which was the family residence of one of the shipyard owners, John P. Hawkins, and two other late 19th century dwellings. The site of the dwellings, the store, and a blacksmith shop on the shipyard are archaeologically sensitive for subsurface shaft features such as privies, wells, and cisterns. These potential shaft features, which would have predated the introduction of public water and sewers,

may survive at discrete locations within the project site. Due to their fragility, there is a lesser chance that other historic period archaeological resources have survived, such as fence lines, paths, traces of landscaping and sheet midden scatter, but if disturbance is minimal (such as in former open yard areas that were never built over), these resources could still be present. No additional shipyard-related archaeological resources appear to have significant research potential.

Shaft features could be present even under areas subjected to later construction and demolition episodes, and no industrial buildings on the site are known to have had basements or more than one story. Those areas within the APE that either were never built over, or had only one-story buildings on them have been assigned a high sensitivity for the recovery of historic period archaeological resources.

Based upon these conclusions, it is recommended that Phase IB archaeological testing be undertaken within the project site, at locations identified as archaeologically sensitive, but chosen by the archaeological consultant in consultation with the LPC. The sampling protocol might include a series of backhoe trenches at selected locations, and depending on the results of the trenching, supplemented with archaeological monitoring during construction. All archaeological testing should be conducted according to applicable archaeological standards (LPC 2002), and in consultation with the LPC. RPA-certified professional archaeologists, with an understanding of and experience in urban archaeological excavation techniques, would be required to be part of the archaeological team.

TABLE OF CONTENTS

EXECUTIVE SUMMARY	i
TABLE OF CONTENTS	iii
I. INTRODUCTION	1
II. METHODOLOGY	1
III. CURRENT CONDITIONS AND ENVIRONMENTAL SETTING	2
A. CURRENT CONDITIONS	2
B. PHYSIOGRAPHIC SETTING AND GEOLOGY	2
C. TOPOGRAPHY AND HYDROLOGY	3
D. SOILS	4
IV. BACKGROUND RESEARCH/HISTORICAL OVERVIEW	4
A. PREVIOUSLY RECORDED ARCHAEOLOGICAL SITES	4
B. SITE HISTORY	6
1. PRECONTACT PERIOD	6
2. HISTORIC PERIOD	9
3. HISTORY OF THE PROJECT SITE	11
4. DISTURBANCE RECORD	20
5. PRECONTACT ARCHAEOLOGICAL SENSITIVITY	21
6. HISTORICAL ARCHAEOLOGICAL SENSITIVITY	22
V. CONCLUSIONS AND RECOMMENDATIONS	23
A. PRECONTACT PERIOD RESOURCES	23
B. HISTORIC PERIOD RESOURCES	24
VI. REFERENCES	25

FIGURES

PHOTOGRAPHS

APPENDIX A CITY ISLAND MEMOIR (ROSENFELD 1996)

FIGURES

1. City Island Development Site APE, USGS.
2. City Island Site APE. Sanborn 1995.
3. *Atlas of Westchester County*. Beers 1868.
4. *Atlas of Westchester County*. Beers 1872.
5. *Historical Photos*. Nye collection
6. *Historical Photos*. Nye collection
7. *Insurance Maps of the Borough of the Bronx*. Sanborn 1893.
8. *Atlas of the Borough of the Bronx*. Bromley 1913.
9. *Insurance Maps of the Borough of the Bronx*. Sanborn 1918.
10. *Atlas of the Borough of the Bronx*. Bromley 1927.
11. *Insurance Maps of the Borough of the Bronx*. Sanborn 1935.
12. *Historical Photos*. Nye collection
13. *Insurance Maps of the Borough of the Bronx*. Sanborn 1951.
14. City Island Development Site APE with archaeological sensitivity areas. Sanborn 1997.

PHOTOGRAPHS

1. Looking east-southeast from the intersection of Fordham Street and Fordham Place. Hawkins house is at left.
2. Looking east from western edge of APE at Fordham Place, showing rear yard of Hawkins house.
3. Looking east from central portion of APE.
4. Looking west from east central portion of APE.
5. Looking east from Fordham Place.
6. Center of APE looking west; note above-ground storage tanks at left.
7. Looking east-southeast from western edge of APE; former Lot 296 is to the right.
8. Looking west from Windward Lane at the Boatyard Condominiums (formerly Banta Lane); APE is to the right of chain-link fence.
9. Hawkins house (222 Fordham Street), looking west-southwest from the bottom of Fordham Street
10. Northeast shoreline, looking southwest from Hart Island pier.
11. Southeast shoreline, looking northwest from Boatyard Condominiums pier. Note barges on shoreline.
12. Eastern end of shoreline, looking north from Boatyard Condominiums.
13. Looking south from bottom of Fordham Street, just west of the Hart Island pier.
14. Looking northwest from northern portion of APE at eastern yard of Hawkins house. Fordham Street is in the rear.
15. Front of Hawkins house looking southwest from Fordham Street.
16. Brown-shingled structure on Fordham Place; white shed not in APE.

I. INTRODUCTION

Pulte Home Corporation has proposed construction of a residential development on City Island, in the Borough of the Bronx, New York. The proposed project is planned to have 22 two-family houses, accessory parking, and a waterfront seating area (AKRF 2005). The project site occupies Lot 235 on Block 5643, bounded by Fordham Street to the north, Fordham Place to the west, Banta (Windward) Lane to the south, and the Long Island Sound to the east (Figures 1 and 2). The property consists of approximately 235,000 square feet, and currently contains four structures. One is a residential building, built c. 1870, at 222 Fordham Street (also formerly known as 226 Fordham Street and 118 Fordham Avenue), and until recently used as offices for International Underwater Contractors. Two of the remaining buildings are 20th century industrial sheds. The remaining building is of indeterminate age, but could possibly date from the late 19th century, based on an assessment of historic maps. Lot 235 historically comprised Lot 235, covering the north half of the project site, Lot 225, covering much of the south half of the project site, and Lot 295, which bordered Banta Lane. Former Lot 296, immediately to the west of Lot 295, is not part of the project site.

In accordance with New York City Environmental Quality Review (CEQR) regulations and procedures, Landmarks Preservation Commission (LPC) has required a Phase IA Documentary Study for this undertaking. The structure at 222 Fordham Street is being evaluated for eligibility in the National Register of Historic Places (NRHP) by AKRF, Inc., in a separate report. This report complies with the guidelines of the LPC (CEQR 2001; LPC 2002).

The present Phase IA Documentary Study, prepared by Historical Perspectives, Inc. (HPI) under contract to AKRF, Inc., describes conditions on the project site (including soil and geological boring data and known disturbances to the property), previous cultural resources investigations undertaken adjacent to the project site, the history of the property, and based upon the preceding sections, the site's sensitivity for the recovery of archaeological resources. The Area of Potential Effect (APE) will be referred to throughout this report, and constitutes the footprint of planned construction and disturbance on the site. It is assumed for the purposes of this survey that the footprint of proposed development, or APE, will cover the entire project site.

The HPI project team consisted of Christine Flaherty, M.A., who conducted the project research and wrote this report; Julie Abell Horn, M.A., R.P.A., who provided editorial assistance; and Cece Saunders, M.A., R.P.A., who provided interpretive and editorial assistance.

II. METHODOLOGY

Preparation of this archaeological study involved using documentary, cartographic, and archival resources. Repositories visited (either in person or by using their on-line electronic resources) or contacted included the Bronx County City Register; the Bronx County Department of Buildings; the Bronx County Historical Society; the City Island Historical Society; the New York Public Library; Avery Library at Columbia University; federal census records; the LPC; and the New York State Office of Parks, Recreation, and

Historic Preservation (NYSOPRHP). Tom Nye, City Island historian, provided documents and photographs, and was an invaluable source of information on the shipyards of City Island. The New York Department of City Planning (DCP) published a multi-volume maritime heritage preservation study in 2001 (DCP 2001a, 2001b). AKRF provided copies of Phase I and II Environmental Site Assessments undertaken by Geo-Technology Associates (GTA) (GTA 2003a, 2003b).

A site walkover was undertaken on June 8, 2005. Conditions were warm and dry; notes were made and photographs taken of buildings, structures, and existing ground conditions.

III. CURRENT CONDITIONS AND ENVIRONMENTAL SETTING

A. Current Conditions

The APE is currently in use, with offices housed in one structure, storage in others, and heavy equipment and other items stored in open areas (Photographs 1-16). The APE is mostly level with a slight slope eastwards toward the water. Fordham Street is located approximately three feet below the level of the APE at the eastern end (Photographs 13 and 14). Although much of the APE is open, there are several structures on the property. There is a c. 1870 house along Fordham Street and two large 20th century industrial sheds and a small house of indeterminate date in the southwestern corner of the APE, along Fordham Place (Photographs 1-16). At the time of the field survey there were also a number of vehicles, several pieces of heavy construction machinery, several above-ground storage tanks, and a number of dumpsters on the property (Photographs 2-7).

Open areas are grassy or weed-covered, with a small section of trees near the southeastern bank of the APE, and the western and southern borders of the site. There is a short stretch of paved driveway from Fordham Place in the northwest corner of the APE that continues lightly graveled behind the main house (Photographs 2-3). There is also a concrete ramp leading up from Fordham Street, just to the east of the main house. Fordham Place is mainly level with the western edge of the APE, while Banta (Windward) Lane ranges from 5-10 feet below the level of the APE. The shoreline is fairly steep with a bank of boulders shoring the edge (Photographs 10-12). On the southeastern edge can be seen the skeletons of boats that were presumably used for shoring the fill that was added. There is also a derelict boat and other items of nautical use in the water along the shoreline; these appear to fall within the APE (Photograph 12).

B. Physiographic Setting and Geology

The project area is located in Bronx County, New York, on an island approximately a half-mile across and 1.5 miles long, just east of the mainland portion of the Bronx and to the south of Pelham Bay Park. The majority of the Bronx is part of the coastal lowland section of the Manhattan Prong, which is a subprovince of the New England Uplands physiographic province, a northern extension of the Great Appalachian Valley (Boesch 1996, Schuberth 1968:74). Bedrock in this area consists of white calcite-dolomite marble (also known as Inwood Marble) interlayered with Fordham Gneiss, which exhibits a dark gray to black banded appearance. Surface geology in the Bronx was affected by late

Pleistocene glaciers, which advanced and receded over the area at least three times during the last million years. Glacial activity stripped off native soils from the underlying rock surface, and left glacial till in its place. The coast lowland in New York State runs along the East River and Long Island Sound in a narrow band, with an elevation ranging from 20-250 feet above mean sea level (Boesch 1996). In the eastern portion of the Bronx, including City Island, the Hutchinson River Group consists of metabasalt and feldspathic gneiss; this geologic composition extends northeastward into Connecticut, where it is known as the Hartland Formation (Mergurian 2002).

C. Topography and Hydrology

Only the western half of the APE was originally located on fast land; the remainder of the APE was formerly under the water of the Long Island Sound. The shoreline is depicted as a sloping sandy beach throughout most of the eastern edge of the APE in photographs from the late 19th century. A large infilling episode occurred during the 1970s, when steel barges were stripped, then sunk, to provide a supporting structure for fill brought from construction projects in the New York area. The elevation of the APE in the eastern half has thus been raised from 1-20 feet.

A topographical map from 1905 shows that the lowest elevation within the APE was nearest the water, and ranged from 3.3 to 7.5 feet; this concurs with photographs showing a gently sloping sandy beach next to the water (New York Commissioner of Street Improvements 1905; Figures 6, 12). In the northern midsection the elevation was 12.2 feet, and 5.8 feet in the southern midsection. On the western portion of the APE, the elevation was 18.5 feet in the northern section, and 8.5 feet in the southern section. Elevations for Fordham Street show that it was below the level of the northern edge of the APE, with elevations for the APE recorded as 16.2 feet, 11.4 feet, and 7.7 feet from west to east, while street elevations were 15.5 feet, 9.8 feet, and 7.5 feet in the middle of the road, and slightly lower on the northern edge of the road. Along Fordham Place, elevations for the western edge of the APE and streetbed elevations were within one foot of each other, ranging from 13.4 feet at the southern end to 20.4 feet at the northern end. The corner of Fordham Street and Fordham Place is the highest point of elevation for the APE.

Current elevations for Fordham Street range from 9.18 feet to 20.4 feet, while those for Fordham Place range from 14.3 feet near Banta Lane, to 21.06 feet near Fordham Street (Lessard Group 2005). Elevations across the APE range from 10.32 to 20.19 feet, with the midsection of the APE averaging around 15 feet.

In summary, comparison of the historic versus modern topographic maps reveals a history of filling throughout the entire property, with the largest amount of fill placed along the waterfront to create additional property, and the least amount along the periphery of the APE to the north, south, and west.

D. Soils

The most recent information about soils within the APE comes from soil borings that were undertaken as part of the environmental site assessments for the site. Although no data were collected on the composition of the soils, a general note indicated that the fill was "...generally composed of silty sand and gravel soils intermixed in a cobble and boulder (and cobble/boulder-sized concrete) matrix. Cinders, wood, brick, steel, asphalt, and rubber were also encountered" (GTA 2003a:13). Borings were taken from both the areas of fast land and shore fill. However, it was noted that because of boulders and other fill materials, the direct push sampler was only able to extend a few feet in depth, with the exception of one boring (B-2) which extended to seven feet below ground, which was a boring on the filled area of the APE. Six test pits were completed over the APE as well, but again, soil data other than that relating directly to environmental conditions were not collected. Petroleum odors were noted, along with soil staining. Fill was noted in both the borings and test pits, but the depths to which the fill extended is not known.

IV. BACKGROUND RESEARCH/HISTORICAL OVERVIEW

A. Previously Recorded Archaeological Sites and Surveys

Records available at the LPC and the NYSOPRHP reveal that the project site is in close proximity to several previously recorded precontact period archaeological sites. No historic period archaeological sites have been documented within a one mile radius.

A study commissioned by the LPC summarizes much of the precontact period data into one source. In this comprehensive work, Eugene Boesch evaluates the archaeological sensitivity for all of the Bronx, based on previous research by earlier scholars, and identifies documented precontact sites, some more precisely than others (Boesch 1996). Boesch rates all of the northern half of City Island, including the APE, as highly sensitive for the recovery of precontact sites, based on the identification of various precontact sites in the area. Boesch does not pinpoint exact locations of precontact sites in his study, but rather uses his own numbering system to map general areas where precontact sites have been recorded.

The following table summarizes all of the precontact archaeological sites that have been documented by the New York State Museum (NYSM), the NYSOPRHP, and by Boesch (1996) within a one mile radius of the project site. In some cases, the sites appear to have been recorded duplicate times, often obtaining several different site number designations. The majority of the sites originally were recorded by Parker (1922). Where the duplication is obvious, the sites and their attributes are combined into one listing in the table. Of note, NYSM site locations and descriptions often are vague, due to the fact that many of these sites were documented based on non-professional records (such as information from local landowners, avocational collectors, or historic accounts); descriptions and distances of these sites from the project site are given based on available mapping and other data, but should not be considered definitive. Although some of Boesch's site location data appear to be more precise (splitting sites recorded by Parker

(1922) into several discrete locations), it should be noted that in many cases he appears to have extrapolated site locations from very imprecise maps by Parker (1922).

NYSM Site # and Site Name	Other Site # and Site Name	Location and Distance from project site	Time Period	Site Type
2826	Boesch 114 (City Island I), 115 (City Island II), 116 (City Island III)	Located on much of the central part of City Island; may overlap APE	Unknown precontact	Extensive shell middens
5323	Boesch 105, Rodman's Neck III	Large portion of Rodman's Neck, in Pelham Bay Park, c. 0.75 mile northwest of APE	Unknown precontact	Shell middens
	Boesch 117, High Island	High Island, c. 0.75 mile north of APE	Unknown precontact	Unknown

It appears that only one modern archaeological survey has been conducted on City Island, c. 0.5 mile south of the APE along the island's southeastern shore (Geismar 1989). That study recommended that additional investigations be conducted to document any potential buried precontact resources. It seems, though, that this additional testing was never completed.

Unfortunately, because the map that identifies all archaeological surveys for the Bronx at the NYSOPRHP was missing at the time of research in July 2005; it is possible that other surveys may have been completed. However, as no additional archaeological sites were recorded on City Island, it must be assumed that if any other surveys had been completed, they did not document any new archaeological sites.

Anecdotal evidence indicates that precontact remains were once plentiful on the island. An article on reminiscences of City Island life, written in the 1950s, describes how as a child William Fordham, a resident, "...dug in Indian campsites...for Siwanoy relics. William still owns some 1500 pieces, including tomahawks, arrowheads, discoloids, mortars, pestles, potter, needles, and the like. The island, he explains was a great Indian trading center, a favorite spot for catching and drying fish" (Berger c.1956-57).

Public School 17, which is a half block west of the APE, was built in the late 1890s. There are accounts of the school being built on the site of a former Indian burial ground, and the burials removed prior to construction of the school (Rosenfeld 1996 [Appendix A], Nye 2005). The school was built on one of the high points of the island; the flat terrain would have been an ideal burial location. Because the natural landform of the APE was sloping, however, there is very little chance that any associated burials would have been located within the APE (see discussion to follow below).

B. Site History

1. Precontact Overview

For this report, the word precontact is used to describe the period prior to the use of formal written records. In the western hemisphere, the precontact period also refers to the time before European exploration and settlement of the New World. Archaeologists and historians gain their knowledge and understanding of precontact Native Americans from three sources: ethnographic reports, Native American artifact collections, and archaeological investigations.

The Paleo Indian Period (c. 10,500 B.C. - c. 8000 B.C.) represents the earliest known human occupation of the Bronx. Approximately 14,000 years ago the Wisconsin Glacier retreated from the area leading to the emergence of a cold dry tundra environment. Sea levels were considerably lower than modern levels during this period (they did not reach current levels until circa 5,000 B.C., in the Early to Middle Archaic Period). As such, City Island was situated much further inland from the Long Island shore than today. The material remains of the Paleo Indians include lithic tools such as Clovis-type fluted projectile points, bifacial knives, drills, graters burins, scrapers, flake cores, and flake tools, although sites generally are represented by limited small surface finds. The highly mobile nomadic bands of this period specialized in hunting large game animals such as mammoth, moose-elk, bison, and caribou and gathering plant foods. It has been theorized that the end of the Paleo-Indian Period arose from the failure of over-specialized, big-game hunting (Snow 1980). Based on excavated Paleo-Indian sites in the Northeast, there was a preference for high, well-drained areas in the vicinity of streams or wetlands (Boesch 1996). Sites have also been found near lithic sources, rock shelters and lower river terraces (Ritchie 1980). No Paleo-Indian materials have been recovered in the project site vicinity, although several sites have been recorded on Staten Island including Port Mobil, the Cutting site, Smoking Point and along the beach in the Kreischerville area.

During the Archaic Period (c. 8000 B.C. - 1000 B.C.) a major shift occurred in the subsistence and settlement patterns of Native Americans. Archaic period peoples still relied on hunting and gathering for subsistence, but the emphasis shifted from hunting large animal species, which were becoming unavailable, to smaller game and collecting plants in a deciduous forest. The settlement pattern of the Archaic people consisted of small bands that occupied larger and relatively more permanent habitations sites along coastlines, estuaries and streams and inland areas (Boesch 1996). Typically such sites are located on high ground overlooking water courses. This large period has been divided up into four smaller periods, the Early, Middle, Late and Terminal Archaic.

The environment during the Early Archaic (c. 8000 B.C. - 6000 B.C.) displayed a trend toward a milder climate and the gradual emergence of a deciduous-coniferous forest with a smaller carrying capacity for the large game animals of the previous period. The large Pleistocene fauna of the previous period were gradually replaced by modern species such as elk, moose, bear, beaver, and deer. New species of plant material suitable for human consumption also became abundant. The increasing diversification of utilized food

sources is further demonstrated by a more complex tool kit. The tool kit of the Early Archaic people included bifurcated or basally notched projectile points generally made of high quality stone. Tool kits were more generalized than during the Paleo-Indian period, showing a wider array of plant processing equipment such as grinding stones, mortars and pestles.

The archaeological record suggests that a population increase took place during the Middle Archaic Period (c. 6000 - c. 4000 B.C.). This period is characterized by a moister and warmer climate and the emergence of an oak-hickory forest. The settlement pattern during this period displays specialized sites and increasing cultural complexity. The exploitation of the diverse range of animal and plant resources continued with an increasing importance of aquatic resources such as mollusks and fish (Snow 1980). In addition to projectile points, the tool kits of Middle Archaic peoples included grinding stones, mortars, and pestles.

Late Archaic people (c. 4000 - c. 1000 B.C.) were specialized hunter-gatherers who exploited a variety of upland and lowland settings in a well-defined and scheduled seasonal round. The period reflects an increasingly expanded economic base, in which groups exploited the richness of the now established oak-dominant forests of the region. It is characterized by a series of adaptations to the newly emerged, full Holocene environments. As the period progressed, the dwindling melt waters from disappearing glaciers and the reduced flow of streams and rivers promoted the formation of swamps and mudflats, congenial environments for migratory waterfowl, edible plants and shellfish. The new mixed hardwood forests of oak, hickory, chestnut, beech and elm attracted white-tailed deer, wild turkey, moose and beaver. The large herbivores of the Pleistocene were rapidly becoming extinct and the Archaic Indians depended increasingly on smaller game and the plants of the deciduous forest. The projectile point types attributed to this period include the Lamoka, Brewerton, Normanskill, Lackawaxen, Bare Island, and Poplar Island. The tool kit of these peoples also included milling equipment, stone axes, and adzes.

During the Terminal Archaic Period (c. 1700 B.C. - c. 1000 B.C.), native peoples developed new and radically different broad bladed projectile points, including Susquehanna, Perkiomen and Orient Fishtail types. The use of steatite or stone bowls is a hallmark of the Terminal Archaic Period

While no large Archaic settlement has been recovered in the New York City area, several small multicomponent sites have been identified. To the north, in Westchester County, a series of rockshelters, camp sites, and shell middens have been investigated by local archaeologists during the 20th century. In the Bronx, however, only a few isolated finds dating to the Archaic Period have been recorded. At the Clason's Point Site on the East River two Archaic projectile points were recovered, and an archaic workshop was excavated in the 1970s along Pugsley's Creek near the Shorehaven neighborhood.

The Woodland Period (c. 1000 B.C. - 1600 A.D.) is generally divided into Early, Middle and Late Woodland on the basis of cultural materials and settlement-subsistence patterns. Settlement pattern information suggests that the broad based strategies of earlier periods continued with a possibly more extensive use of coastal resources. The Early Woodland was essentially a continuation of the tool design traditions of the Late Archaic. However,

several important changes took place. Clay pottery vessels gradually replaced the soapstone bowls during the Early Woodland Period (c. 1000 B.C. to A.D. 1). An early ceramic type is called Vinette 1, an interior-exterior cordmarked, sand tempered vessel. The Meadowood-type projectile point is a chronological indicator of the Early Woodland Period (Ritchie 1980).

Cord marked vessels became common during the Middle Woodland Period (c. A.D. 1 to c. 1000 A.D.). Jacks Reef and Fox Creek-type projectile points are diagnostic of the Middle Woodland. Another characteristic projectile point of the early to Middle Woodland Period is the Rossville type, named for the site at Rossville where it predominated. It is believed to have originated in the Chesapeake Bay area and is found in New Jersey, southeastern New York and southern New England. The Early and Middle Woodland periods display significant evidence for a change in settlement patterns toward a more sedentary lifestyle. The discovery of large storage pits and larger sites in general has fueled this theory. Some horticulture may have been utilized at this point but not to the extent that it was in the Late Woodland period (Ritchie 1980).

In the Late Woodland period (c. 1000 A.D. - 1600 A.D.), triangular projectile points such as the Levanna and Madison types, were common throughout the Northeast. Made both of local and non-local stones, brought from as far afield as the northern Hudson and Delaware River Valleys, these artifacts bear witness to the broad sphere of interaction between groups of native peoples in the Northeast. Additionally, during this period collared ceramic vessels, many with decorations, made their appearance (Ritchie 1980).

Woodland Period Native Americans shared common attributes. The period saw the advent of horticulture and with it, the appearance of large, permanent or semi-permanent villages. Plant and processing tools became increasingly common, suggesting an extensive harvesting of wild plant foods. Maize cultivation may have begun as early as 800 years ago. The bow and arrow, replacing the spear and javelin, pottery vessels instead of soap stone ones, and pipe smoking, were all introduced at this time. A semi-sedentary culture, the Woodland Indians moved seasonally between villages within palisaded enclosures and campsites, hunting deer, turkey, raccoon, muskrat, ducks and other game and fishing with dug-out boats, bone hooks, harpoons and nets with pebble sinkers. Their shellfish refuse heaps, called "middens," sometimes reached immense proportions of as much as three acres (Ritchie 1980:80, 267). Habitation sites of the Woodland Period Indians increased in size and permanence.

Along the southern shoreline of the Bronx, several large native villages have been identified including Castle Hill, where historical records indicate a large Native American settlement was located. The village, or "stockade," on Castle Hill was documented in historical records but has not been recovered archaeologically. Grumet (1981) attributes this to the rapid urbanization of this area of the Bronx during the 19th and 20th centuries. In contrast, the native village of Snakapins was found and investigated by Alanson Skinner in 1918. The information gathered at this site, approximately 0.5 mile north of Clason's Point, and just over six miles south of the project area, provided much that is now known about the coastal inhabitants during the Late Woodland and Contact periods (Skinner 1919).

During the early Contact period (1500 to 1700 A.D.) there was a continuation of the Late Woodland settlement patterns of the coastal Algonquians. At the time of European contact, Native American groups known as the Siwanoy occupied the northern coastline of Long Island Sound from Norwalk, Connecticut to what is now known as the south Bronx. Along the East River and the Long Island Sound shoreline there were habitation sites, camps, and shellfish processing stations (Grumet 1981; Boesch 1996). By 1650, only 700-900 Siwanoy remained, and by the early eighteenth century, even fewer could be documented, most of them in North Castle. The last known Siwanoy settlement in the Bronx, occupied until 1782, was near Bear Swamp in the Morris Park section of the city (Boesch 1996).

2. Historic Period

As described above, City Island, along with much of the eastern Bronx, was originally occupied by the Siwanoy branch of the Algonquians. The first European contact was when Adriaen Block, a Dutchman, sailed the Long Island Sound in 1614 (DCP 2001a:1). City Island was then known as Minnewits or Minifers Island. It is not clear whether this was named after Peter Minuit or a native name. Magnets and Great Minnefords Island were also variations on the name (LPC 2002).

Although the Indian occupants generally retained ownership of the lands in the eastern Bronx, by 1638 the Dutch were buying more and more land as they increased their colonization efforts. In 1640 Kieft, the Dutch governor, obtained the title to much of today's Westchester County, including City Island and the Pelham Bay area directly to the north. In 1642 Anne Hutchinson settled in Pelham Bay Park, in the area that is currently a golf course, with her cohort of "Puritan dissidents." As land and resources for the Indian groups became rarer, relationships with the Dutch grew bitter, and rivalries among the native tribes increased. Mohawks attacked Algonquians with guns bought from the Dutch (DCP 2001a:2). Weckqaesgeeks from Westchester were massacred in a raid in 1643, and Algonquians united to raid European settlements, including that of Anne Hutchinson's, who was killed along with 15 others.

In 1654 Thomas Pell, an Englishman, purchased over 9000 acres from an Algonquin chieftain (part of the raiding group on Anne Hutchinson), which included much of the eastern Bronx and islands in the Sound, including City Island. The Dutch governor, Stuyvesant, ordered Pell and other settlers off that land in 1655, although Pell was allowed to stay if he pledged political allegiance. By 1664, the Dutch West India Company had given up control to James, Duke of York. When Thomas Pell died, his estate, and his manor in Pelham Bay Park, was inherited by his nephew, John Pell; the patent on the land was renewed in 1687 (LPC 1978). Pell subsequently sold City Island to a John Smith of Brooklyn in 1685 (LPC 2002:2). It remained part of Pelham, however (DCP 2001a:3). In the next 60 years, ownership of the island changed several times.

Benjamin Palmer bought the island in 1761 for 2730 pounds, and felt it could be a commercial center able to compete with New York (DCP 2001a:3). His plan for the "New City Island" divided the island into rectangles, which were further subdivided into housing lots measuring 25x100 feet. Four hundred feet of riparian rights around the island were granted in 1763, and ferries to Rodman's Neck and Hempstead, Long Island

were established in the 1760s (DCP 2001a:4). A bridge was planned to connect to the mainland (Wilson 1903:360). The Revolutionary War put a crimp in Palmer's development plans for the island; additionally British troops anchored in the Sound would pillage the settlements on the island for supplies (DCP 2001a:5). By 1804 there were only nine owners left on the island (DCP 2001a:32).

Early in the 19th century, much of City Island was in the hands of a new investor, Nicholas Haight, who had bought all but four parcels on the island by 1807 (DCP 2001a:6). By 1818, he and Joshua Huestes owned nearly the entire island, and in 1819 Huestes sold 42 acres on the southern end of the island to George Washington Horton. For the next few decades, the main families on the island were the Hortons; the Fordhams, who were oystermen; the Coopers, who operated a solar salt plant; and the Scofields (DCP 2001a:6). The Fordhams owned the land that was to become the APE, and sold it off in parcels through the mid to late 19th century. Through the 1850s and 1860s, the island's population grew as many came to make their living in fishing, clamming, and particularly oystering. The latter trade grew enormously when planted beds of oysters flourished. For some, it was an enormously profitable career; Samuel Pell, an oysterman and descendant of the Pells of Pelham Manor, erected a 15 room house in 1876 on City Island which is now landmarked (LPC 2002). From the 1840s on, City Island was also a home for pilots who would navigate ships through the dangerous water of Hell Gate, where the Sound meets the East River (DCP 2001b:7). Census records from the second half of the 19th century show a variety of occupations for City Island residents, including oysterman, farmers, farm laborers, ship's carpenters, merchants, and pilots.

Shipbuilding and yacht repair also became a major concern on the island in the second half of the 19th century and continued well into the 20th century. The first known commercial shipyard was the David Carll yard on the southern portion of the island, established in 1862. After the Civil War Carll garnered a reputation for building luxury yachts (DCP 2001b:11). Although yachting was indisputably popular by the 1880s, the New York Bay rather than the Long Island Sound was the center of activity. However, in 1885 some of the dangerously obstructive rocks were destroyed in Hell Gate, and by the 1890s the Sound, as well as City Island, became a popular destination for the yachters and their yacht clubs (DCP 2001b:12). It was also frequented by vacationers looking for the closest seaside resort.

Although Palmer had proposed a bridge connecting the island to the mainland in 1761, one was not built until 1868, when businessmen of the island banded together to get one constructed. Shipbuilders from the Carll yard, using planking salvaged from the USS *North Carolina*, built the bridge with the addition of a reused drawspan from an old bridge at Third Avenue on the Harlem River (DCP 2001b:13). The bridge remained a toll bridge until Westchester County agreed to incur its associated costs in 1876. After City Island became part of New York City in 1895, a new bridge was finished in 1901. A stagecoach line, and then a horsecar line, provided transport across the bridge and through the island. A monorail connected passengers briefly (1910-1914) from the City Island bridge to the Bartow train station in Pelham. Trolley cars then replaced the monorail and ran to the south of the island; city buses took over in 1928.

Gustav Hillman, a ship designer, along with Martin Hubbe, opened a shipyard at the project site in the 1860s. He leased his yard to John P. Hawkins in 1871, an Englishman by way of Mystic, Connecticut, who bought the yard outright in 1887. This shipyard became a center for the repair and upkeep of racing yachts, and was where several America's Cup defenders were repaired, serviced, and fitted out for each new season. The Archibald Robertson shipyard, also in the APE, became a busy shipyard in the late 1870s. Other notable shipyards of the late 19th century were those of Augustus Wood and his son, B.F. Wood, and Henry Piepgras. Robert Jacob, who bought the Piepgras yard in 1900, became one of the foremost builders of large (up to 200 feet) yachts (DCP 2001b:20). Henry B. Nevins and the Minneford Yacht Yard were both major boat builders in the 20th century.

Associated businesses such as sail makers, brokerage companies, and yacht design businesses also flourished on City Island in the 20th century. Yacht-oriented services continued, as well as fishing boat construction. During the first World War, shipyards on City Island took on retrofitting existing boats for naval use, as well as the construction of new ships. Production for the military was even greater in World War II, bringing hundreds of commuting workers on to the island, some of whom bought up the summer cottages and settled there (DCP 2001a:28). The post-war period brought some economic difficulties as production was steeply reduced. Today there still exists a marine-based and tourist economy.

3. History of the Project Site

For the purposes of this discussion, the APE has been divided into two discrete sections: the northern lot and the southern lot. The northern lot was and still is designated as Lot 235, while the southern lot originally comprised Lots 225 and 295 and is now part of Lot 235.

The project site was once part of the Fordham Estate, parcels of which were sold off during the 1860s, according to various deeds found at Bronx City Registry. The Fordhams were one of the major families on City Island, with residences and land holdings throughout the island. They made a comfortable living through the oystering industry. None of their houses were in or near the APE in the 1860s, although J.O. Fordham had a house opposite the APE by 1872 (Beers). The earliest available map depicting the project site is the Beers map from 1868 (Figure 3). At this time, there were only three clusters of development on the entire island, one each in the north, central, and southern sections of the island. The project site is in the central portion of the island. Main Street (now City Island Avenue) was and is the only major north-south road across the island. Prospect Street (now Carroll Street) is shown on this 1868 map as a heavily settled road stretching east-west across the island, just one block to the south of the APE (Figure 3).

At this time, the majority of the APE was labeled "Fordham Est.," and the only active street bordering it was Banta Lane (not labeled here) (Beers 1868). Banta Lane ran parallel with Prospect Street for a block to Minnieford Avenue (originally Billar Place; not labeled here). Fordham Street (not labeled here) only extended east just past Minnieford Avenue; it did not reach the APE. Fordham Place is not laid out on this map.

Banta Lane is shown here extending almost to the shoreline, and the portion of the APE bordering it to the north was the only part of the APE to contain a structure (discussed below). The following table summarizes the different current and previous street names of roadways surrounding the APE.

Current street name	City Island Avenue	Fordham Street	Fordham Place	Minnieford Avenue	Carroll Street
Previous names	Main Street	Fordham Avenue	King Avenue, Fordham Street	Billar Place	Prospect Street

Northern Lot

Gustav F.C. Hillman, a ship designer, along with Martin Hubbe, opened a shipyard on the northern lot of the APE in the late 1860s. Although others note that he built the shipyard in 1877 (Payne 1969, Nye n.d.), it must have been constructed by 1870, as an 1870 directory (New York State Business Directory and Gazetteer) lists Hillman & Hubbee, ship carpenters, as one of only ten businesses for all of City Island, and an 1872 map (Beers; Figure 4) shows the APE labeled “G. Hillman.” Hillman, a Dane, was primarily a ship’s architect, and one of his major designs was the *Nourmahal*, a 250 foot luxury steam yacht, for William Astor in 1884. He had learned naval architecture at the University of Denmark at Copenhagen (Nye n.d.). Martin Hubbe, a German shipwright and yacht designer, was Hillman’s partner.

John Passmore Hawkins, an English shipwright by way of Mystic, Connecticut, was taken on at some point in the 1870s to run the shipyard, so that Hillman and Hubbe could spend more time on ship design. Hawkins took on a lease on the shipyard as the other two became less involved in ship construction, and eventually purchased the Hillman and Hubbe yard in 1887 (Liber 220:484 1887) (Figure 5). Hawkins had arrived on City Island in 1871 (DCP 2001b:18); census records show that he was in Connecticut the previous year (federal census 1870). His name appears on a deed transaction in 1875 for property on City Island, in a transaction between him and John O. Fordham (Liber 198:183 1875). Hawkins was born in Bristol, England, on April 3, 1838; his grandfather was an Admiral in the British Navy, and his father was a noted shipwright (Nye n.d.). Hawkins came to the United States in 1855 with his mother, Caroline Hawkins, and they eventually settled in Mystic, where he learned the ship building trade. He married Jane M. Ward in 1862, and the family is listed in the 1870 census in Connecticut as having three children (they would eventually have 12), and as living with Caroline Hawkins, the mother of John Hawkins (federal census 1870). Hawkins was active in community affairs, and was Justice of the Peace for the town of Pelham for three terms (Nye n.d.).

The Beers 1872 map shows that Fordham Avenue (now Fordham Street) extended to the eastern shore of City Island, and led into a pier labeled “Town Dock” (Figure 4). This pier (or a replacement) still exists today and serves as the transportation portal to Hart’s Island, including access to the correctional facility and potter’s field located there. A structure was present along Fordham Avenue (now Street), and the label indicates “Ship Yard G. Hillman.” This structure is the house which currently still stands at 222 Fordham Street and became the Hawkins’ family home until the 1920s (Figure 5). There were no other structures depicted on the shipyard property other than this house.

Conveyance and federal census records also help illustrate the history of the APE in the mid to late 19th century. Records show that on October 7, 1867 John O. Fordham leased land to Gustav Hillman (Liber 137:239 1867). Martin Hubbe is listed in the grantee book also. On May 11, 1872, John O. and Angelina A. Fordham granted land to Gustavus F.C. Hillman (Liber 179:270 1872). Another deed shows that Rufus L. Scott granted land to Gustavus F.C. Hillman (Liber 202: 422 1877) on August 15, 1877, and on October 19, 1877, Ezra L. Waterhouse granted land to Hillman (Liber 202:483 1877). Gustavus Hillman was also a grantee for land from the State of New York on January 5, 1887 (Liber 218:97 1887). It is not clear which lots were involved in these transactions, but with the map information, it would seem that the house on Fordham Street was built by either Hillman, Hubbe, or Hawkins. Hillman does not seem to be listed in the 1870 or 1880 federal censuses for City Island, although there is a William Hillman, ship's carpenter, born in Mecklenburg, listed. Most birthplaces in America were listed as states, while foreign births were supposed to list countries, but Martin Hubbe, listed in the 1870 federal census as Huebbe, is noted as a ship carpenter born in Hamburg. Mecklenburg is a city in Germany, North Carolina, and Virginia. No addresses are identified on the 1870 federal census, but Hubbe's neighbors include the Leviness, Banta, and Staltz (Stoltz) families, who were known to live near the APE. Federal census records for 1880 show the Hawkins family living on City Island. John P. Hawkins is listed as a ship builder, his wife is listed as keeping house, and there are eight children as well as Hawkins' mother.

The Hawkins shipyard built schooners and scows, but also refitted and upgraded commercial boats. In the 1890s, the yacht business became one of the main concerns of the yard, and particularly the repair, service, and storage of yachts involved in the America's Cup, including the defenders *Vigilant*, *Defender*, *Columbia*, *Defiance*, and *Reliance* (Nye n.d.; Figure 6). On the 1893 Sanborn map, the yard is shown to have two large service buildings, along with the main residence and two smaller structures (Figure 7). One of the large structures, in the northwest corner of the lot, is labeled "stor'ge of boats and rigging," while the other, in the central portion of the lot, nearer the water, is labeled "woodwork." A small structure between the large storehouse and the main house is labeled storage, while the other small structure on the southwest corner of the lot is a one and one-half story frame dwelling, at the former address of 214 Fordham Street (now Fordham Place). This structure will be referred to as Structure A in the following discussion. It is not known who lived here, but the house was within the Hawkins property. This house would have been built between 1872 and 1893, and most likely housed a shipyard worker and his family. Street addresses are not available for the 1880 census, although neighbors were usually listed in proximity to another. Listed between the Hawkins and Robertson families on the 1880 census are six other families. No records are available for this area for the 1890 census. This house remained on the APE until sometime between 1935 and 1951 (Sanborn 1935, 1951). No demolition records were found at the Bronx Department of Buildings for any structures on the APE, although a violation notice was served for a 'vacant former shipyard' on Lot 225 in 1958.

A recollection by Adelaide Rodstrom Rosenfeld provides many details about life on City Island at the turn the 20th century, including the APE (Rosenfeld 1996). It is included in this report as Appendix A. Rosenfeld was the granddaughter of Ethan Waterhouse (who is discussed below) and the great-granddaughter of John P. Hawkins. She lived in the

house just opposite the APE, at 299 Fordham Place (originally 299 King Avenue); this house is still present. Her mother, Ethan Waterhouse's child, grew up in this building; Ethan Waterhouse inherited it from his father, Wesley Waterhouse. She said that the building, across the street from APE, had been "...a country store, a post office, a ship chancery and a livery stable." Ethan Waterhouse and his wife lived in the house as of 1907 as well as her grandfather's mother, Sarah Hillyer Waterhouse.

John P. Hawkins was Rosenfeld's grandmother's father. She describes his house (that still stands within the APE at 222 Fordham Street), across the street, as "...a beautiful house with a fine carved staircase, very elaborate,...in the middle of their kitchen there was a well right indoors" (Rosenfeld 1996). She goes on to describe that in her own yard they had "...the deepest well on the island...", a cistern, a privy, and an outside kitchen where her grandmother did all the cooking, because she "...never let her indoor kitchen get dirtied up cooking." Presumably the Hawkins house had a similar privy and cistern configuration. Sewer lines were not provided on the island until after 1900; this was a problem when the public school down the street was constructed in the late 1890s, and the builders did not want to run a pipe outlet down Fordham Street to the Sound, but would rather simply have privies, although this was generally against school building code for New York City (letter on file, 1898, Lot 235 folder, DOB). Water pipes are indicated on an 1897 map, although Rosenfeld says that in the early 20th century the well water was "excellent," and there may have been little incentive to hook up to city mains. Since Rosenfeld moved into that house in 1907, the year she was born, it appears that even when sewer and water hookups became available, there was no hurry to connect to them. This would indicate that any dwellings within the APE dating to the 19th century would have had privies, cisterns, and wells.

Rosenfeld's memoir also indicates that Hawkins owned land on the north side of Fordham Street that was apparently part of the shipyard; this land extends north to Pelham Cemetery (Estate Map 1923). She also says that the pier at the end of Fordham Street was built by Hawkins (Rosenfeld 1996).

The 1897 Bromley map labels the "Hawkins Ship Yard & Marine Railway" within the APE. The yard configuration remained essentially the same through the next two decades (Sanborn 1897; Bromley 1905, 1910, 1913), although in 1918 (Sanborn 1918) the Kyle and Purdy Shipyard (discussed below) extended partially into the Hawkins shipyard (Figures 8, 9).

John P. Hawkins died in 1909, but the family continued to oversee operation of the shipyard (Nye n.d.). During the next decade, the yard, while still under Hawkins family ownership, was operated by Captain Leonard (Lem) Miller as Miller Repair and Shipyard, and was officially leased to him in 1913 (Liber 121:252 1913; Liber 131:146 1915). When Jane Hawkins died, the property was auctioned off in 1923 (New York Times 1923). This included the house, the ship yard, riparian rights, and other lots across Fordham Street north to Pelham Cemetery, and apparently included bathing pavilions on the waterfront just to the north of the APE, visible on a 1927 map (Bromley 1927; New York Times 1923; Nye n.d.; Figure 10). A photo from a brochure available from the auction shows that the Hawkins house had a wraparound porch on the front in 1923 that is no longer present (Nye n.d.; Figure 5).

In 1927, Thomas A. Kyle, after his partnership with Reginald Purdy dissolved, relocated his shipyard from the southern lot (see below) to the northern lot (Nye n.d.). Sometime between 1927 and 1935 (Bromley 1927; Sanborn 1935; Figure 11) two structures were added to the shipyard. One was a structure that contained a machine house and boat house along Fordham Place. There was also an “Incline” noted on the Sanborn map by three sets of dotted lines leading down to the waterfront; these were probably tracks of the marine railway (Figure 12). The other structure was a boat house with a solid wharf attached, located in the southeast corner of the lot along the waterfront. The machine shop/boat house structure is still present today.

The Kyle yard stayed in business until World War II, when Patrick Murphy bought it and built large barges on government contracts (Nye n.d.). The 1951 Sanborn map shows that the older boathouse in the middle of the property had been removed, as well as the smaller dwelling that was later used for storage (Sanborn 1951; Figure 13). The shorefront appears to have been bulkheaded to some extent, with a solid wharf at the southern end of the lot, and a pier extending into the Sound.

In the second half of the 20th century, both the northern and southern yards were in limited use for boat storing and servicing. International Underwater Contractors (IUC), which owned the property from the late 1960s until recently, used the main house as an office and ran a business specializing in underwater construction and inspections. The 1972 Sanborn map showed that the only buildings on the northern lot were the Hawkins house, the machine shop, and a small shed to the east of the house. A scuba-diving company was also in business, as well as hyperbaric chambers, operated by IUC. Hyperbaric chambers are used to help decompression problems for divers as well as to help carbon monoxide poisoning victims. Sometime in the 1970s, the shoreline was extended into the Sound approximately 150 feet. This was apparently done by taking existing disused barges and boats, sinking them, and adding fill (GTA 2003; Photograph 11). Maps published after this time, however, do not accurately depict this changed shoreline (Sanborn 1972; Hyde 1989; Sanborn 1997; Figures 2, 14). Sometime after 1989, a large industrial shed was placed in the center of the lot, which is still present (Hyde 1989; Sanborn 1997; Figure 2).

Southern Lot

The southern portion of the APE formerly comprised Lots 225 and 295. Lot 225 occupied the majority, while Lot 295 was a strip on the southernmost portion bordering Banta Lane. On the 1868 Beers map, Lot 295 was developed, while Lot 225 was part of the Fordham Estate as described above (Figure 3). The 1868 map shows that Prospect Street, running east-west across the island and fairly developed, had at the eastern end a boat landing, a natural outcrop of land just south of the APE. This landing was the major gateway for people and goods to other areas of the island for much of the 19th century (Nye 2005; DCP 2001a:11). Banta Lane, running parallel to and north of Prospect Street, marked the southern border of the APE. North of Banta Lane were three businesses, the easternmost of which, the “W. & S. Billar Store & P.O.,” was within the APE. A small directory printed on the map indicates that the Billars sold “Groceries, Flour, Feed and Ship Stores.” Just west of this building was a smaller building labeled “A. Boonter,”

which appears to be just outside the APE in the southwesternmost section; to its west was another building labeled “Chas Stoltz Shoe Store.” Across the street from the APE, the Bayview House, a major hotel, was located on the south side at the eastern end of Prospect Street. Just north of the Bayview House, between Banta Lane and Prospect Street, was a “Bar Room and Bowling Alley” and the A. Browning Meat Market.

On the 1872 Beers map, Fordham Place (unlabeled, although variously called Fordham Street and King Avenue through the early 20th century), is shown extending southward from Fordham Avenue, almost to, but not connecting with, Banta Lane (Figure 4). It is not shown on a map as actually connecting with Banta Lane until 1935 (Sanborn 1935), and on a 1927 map (Bromley 1927) is shown stopping halfway through the block; at that time the Kyle and Purdy company property extended much farther westward from the APE into the next block (Figures 10, 11). The boat landing at the end of Prospect Street had been extended and was labeled “Steamboat Landing.” The Bar Room and Bowling Alley on the 1868 map were now labeled “J. Jardin.” The three stores on the north side of Banta Lane were the same, although the only structure that is within the APE, on Lot 295, was a building labeled “Waterhouse Bro. Store & P.O.” (shown in 1868 as W. & S. Billar store and post office). The other two structures that are shown in 1868, labeled “A. Boonter” and “Chas. Stoltz Shoe Store” were also present, but were outside the APE. Lot 225 was undeveloped.

The 1870 New York State Business Directory and Gazetteer lists the Waterhouse Brothers, groceries, as one of ten businesses for all of City Island. A deed from 1876 shows that E.W. Waterhouse obtained property from John O. and Angelina A. Fordham (Liber 200:182) and that he or his son (Ethan W. Waterhouse) bought property from them in 1891 (Liber 236:28). Ezra L. Waterhouse had also sold a parcel to Gustav Hillman in 1877 (Liber 202:483).

E.W. Waterhouse, born in 1836, had two brothers, E.L., born in 1834, and Orin F., born c. 1844. The 1870 federal census for City Island lists E.L. Waterhouse as an oysterman, and Orin F. as Ref.? Grocery. E.W. Waterhouse is not listed on the 1870 federal census, but he and his family are listed on the 1880 federal census for City Island, along with E.L. Waterhouse. E.W. Waterhouse is listed as a grocer, while his eldest son William is an oysterman. Orin Waterhouse is not listed in the 1880 federal census. E.L. Waterhouse is still listed as an oysterman in 1880.

E.W. Waterhouse, a grocer, and his family, are listed next to Hawkins family on the 1880 census list. Further down the same page is Archibald Robertson, a shipwright, and his family. Robertson owned the shipyard immediately south of the Hillman/Hawkins shipyard, on the southern half of the APE, on Lot 225 (Figure 6).

Archibald Robertson moved to City Island around 1877, and with Orin Waterhouse leased the area south of the Hillman yard and established a shipyard (Nye n.d.). A deed from 1876 shows that E.W. Waterhouse, Orin’s brother, bought land from John. O. and Angelina Fordham, although it is not clear if this is the shipyard property (Liber 200:182). Robertson is known to have bought the yard in the 1880s (Nye 2005). An estate map filed in 1889 (Map No. 699, Westchester County Register's Office, 1889), showing the estate of Orrin F. Fordham, indicated the north half of the APE belonged to

G. Hillman and the south half to L. Waterhouse, with the exception of the strip of land bordering Banta Lane (including Lot 295), which did not have a named owner.

Lot 225 is depicted on the 1893 Sanborn map as the “Archibald Robertson Ship Yard” (Figure 7). Robertson’s shipyard engaged in similar activities to that of Hawkins’: repair and outfitting of all types of vessels, including yachts. Robertson’s also maintained a marine railway that could handle large commercial schooners and steamers over 100 feet in length (Nye n.d.). Boat building, particularly of smaller sloops and schooners, also took place. By issuance of the 1893 Sanborn map, the shipyard had a number of structures depicted on it. Closest to the water were two two-story frame buildings, both used for wood work. Along the western edge of the APE, in the northwest corner of the lot, was a one and one-half story frame dwelling, at 213 Fordham Street. This structure will be referred to as Structure B in the discussion. There was also a two-story frame building in the southwest corner of the lot, used as a blacksmith shop. This building is also labeled “Old”; this may indicate that the building was not in use at that time. There were also three sheds located on the lot, as well as a narrow rectangular structure labeled “Steam Box.”

The 1893 Sanborn map indicates that south of the Robertson shipyard on former Lot 295 was a one and two-story frame structure, a store, which faced Banta Lane. This building is also labeled “Old,” and was the former Billar/Waterhouse post office and store. This building is shown on historic maps up to 1905 (Bromley 1897, Sanborn 1897, New York Commissioner of Street Improvements 1905), but appears to have been replaced by a contiguous row of three frame structures sometime in 1905 (Bromley 1905). In 1910, the Bromley map did not indicate the function of these buildings, although by issuance of the 1913 Bromley map they were marked as storage (Figure 8). It is possible that the store was altered to form dwellings, but there are no records to support this. Records from the Department of Buildings for Lot 295 show that Peter and Jessie Curren applied for an alteration permit for their wooden dwelling at 211 Banta Lane in 1911. The Currens are listed in the 1910 federal census as living at 211 Banta Lane. However, this address may actually refer to Lot 296, which is not within the APE. By publication of the 1918 Sanborn map, these structures were no longer present, and sometime between 1927 and 1935 the shipyard on Lot 225 made use of Lot 295 (Bromley 1927, Sanborn 1935). Lot 295 remained a separate lot until sometime after 1969, when it was bought by International Underwater Contractors (Liber 111:73 1969); the same occurred for Lot 225 (Liber 111:77 1969) and they were eventually consolidated into Lot 235.

Robertson leased part of his property to the Poucher Launch Company in 1905, and in 1906 leased it to Charles H. Collison and Reginald Fairns Purdy, who operated as City Island Shipbuilders (Nye n.d., DCP 2001b). Robertson had retired, but maintained a presence in the shipyard. Collison and Purdy built two new marine railways and built and repaired various types of vessels. Around the turn of the century, a revampment of the street grid was proposed surrounding the APE; this would have entailed eliminating Banta Lane, and running a new street from City Island Avenue through to the Sound that would have bisected the southern shipyard in the APE (Mack 1902, New York Commissioner of Street Improvements 1905). This plan was never carried out.

In 1910, the shipyard dissolved for financial reasons, and Purdy reorganized with Thomas A. Kyle as Kyle & Purdy, Inc. During these years the main focus was on building and repairing yachts. They added new buildings and an extensive set of railway tracks over the entire yard for moving the yachts around (Nye n.d.). They had a number of government contracts, including orders for ten each of subchasers and patrol boats for the U.S. Navy during World War I. They closed due to financial issues in 1922. A 1913 map (Bromley) shows eight frame structures of various sizes on the property, including the 1½-story dwelling, Structure B, shown on earlier maps (Figure 8). The 1918 Sanborn map showed major changes over the lot (Figure 9). Structure B was gone, as were many of the other structures. A very large structure, labeled “Ship Ways” took up much of the lot, and extended north into the Hawkins shipyard. In the approximate former location of the dwelling were two buried 10,000 gallon fuel tanks. There was also a two-story frame building with a one-story addition labeled “Tin Shop” in the southwest corner of the lot, abutting Lot 296. In 1918 the houses on the west side of Fordham Place, opposite Lot 225, had been demolished and replaced by a large building belonging to the Kyle and Purdy Company. The southern part of Fordham Place was not open at this time, and the tin shop extended into the footprint of the road. Although it is possible that this is the same building shown as a blacksmith shop on the 1893 Sanborn map, the two depictions of the location of the building appear to be somewhat different. A building in the location of the one on the 1918 Sanborn map also appears earlier (Bromley 1905, 1910, 1913). This is the approximate location of the currently standing brown-shingled structure on the APE, but the building outlines do not coincide. However, building footprints are not always accurately depicted on these maps.

In 1927, Thomas A. Kyle ended his partnership with Reginald Purdy and relocated his shipyard from the southern lot to the northern lot (discussed above). The Kyle-Purdy shipyard was bought by Howard W. Lyon and D. Stewart Tuttle in 1928, who operated a yacht building and servicing company known as the Lyon-Tuttle Corporation (Nye n.d., DCP 2001a). They reorganized the yard and added a number of buildings (Bromley 1927; Sanborn 1935; Figures 10, 11). According to Nye (2005), the yard was cleaned of scrap iron, and a bulkhead was created on the shoreline from timbers from a subway project. The scrap iron and old automobiles were deposited into the space created by the shoring, and fill from another city project was used to fill in and create a solid wharf. A pier was also constructed into the Long Island Sound (Figures 11, 12). Two large boathouses and one small one covered most of the eastern half of the lot, while an area west of these was labeled “Transfer Track.” On the western edge along Fordham Place were four structures. Two, in the northwestern corner of the lot, were in the approximate location of the former dwelling on Lot 225, which was taken down between 1913 and 1918. One of these structures was a paint house and the other was a gear house. The other two were in the southwestern corner of the lot. The northernmost was labeled “Rep’g” while the southernmost was labeled “Upholst’g.” The latter was a two story frame structure that has the same footprint as the brown-shingled structure currently on the lot. The Lyon-Tuttle yard closed in 1935, due to the economic fallout from the Depression (Nye 2005, n.d.).

After the Lyon-Tuttle yard closed, boat repair activities continued to take place, with the yard known as the United Boat Service Corporation by at least 1951 (Sanborn 1951). Joseph E. and Ida C. Butterworth, who had bought Lot 225 from the Kyle and Purdy

Company in 1923 and resold in 1928, bought part of Lots 225 and 295 back in 1939, and the rest in 1941 (Liber 227:225 1923; Liber 684:475 1928; Liber 846:139 1932; Liber 1011:485 1939; Liber 1119:474 1941). The lots appear to have been both resold and leased out in the following decades, until bought by IUC in 1962 (Liber 111:73). As seen on the 1951 Sanborn map, the layout of the yard remained similar to that of 1935, with a few differences on the west side of the lot. The two small structures in the northwestern corner were no longer present, and a boat repair shed had been constructed just south of where these were. The building labeled upholstery in 1935 was now used as an electrical shop, with a one story addition to the south used for pipe cutting. This may be the white shed that is currently on the lot, but is not part of the APE (Photograph 16). By the 1972 Sanborn map only the southernmost boat house and the structure in the southwestern corner were still present (Figure 14). There were also some one-story structures labeled “Contractors” along Fordham Place; these may be construction trailers. The 1989 Hyde map shows no other structures besides the southeastern building, and the 1997 Sanborn map shows the same situation (Figure 2).

Lot 296 was unofficially part of the southern shipyard for much of the 20th century. As discussed above, it is not clear if the grocery/post office structure was demolished and replaced by a similarly-sized building around 1900, but no structures remained as of 1918 (Sanborn 1918). The lot was then vacant until sometime between 1927 and 1935 (Bromley 1927, Sanborn 1935) when a boathouse was built on the site. This boathouse, built by the Lyon-Tuttle Company, remained until sometime between 1972 and 1989 (Sanborn 1972, Hyde 1989), and no structures have been present there since that time.

Shipyard summary:

The history of the APE can be summarized as follows: shipyards with marine railways and associated structures, dating from the 1870s, on both the northern and the southern lot; a general store and post office, dating from the 1860s and potentially earlier, on the southernmost part of the southern lot (Lot 295); a standing structure dating from c. 1870, used as a residence and office, on the northern lot (the Hawkins house); and two dwellings from the last third of the 19th century on both the northern lot (Structure A) and the southern lot (Structure B). The following tables give the date ranges and owners/occupants of the northern and southern lots.

Northern Lot	
Approximate Date Range	
1870-1887	Hillman and Hubbe (Hawkins starts work in 1870s)
1887-c. 1921	John P. Hawkins (Hawkins dies 1909)
1913-c. 1921	Lem Miller (lease, Hawkins family still owns yard)
1927-1940s	T.A. Kyle (relocating from southern lot)
1940s	Patrick Murphy

Southern Lot	
Approximate Date Range	
1877-1905	Archibald Robertson (land leased until 1880s, then bought)
1905-1906	Poucher Launch Co. (lease, part)
1906-1909	Purdy and Collison: City Island Shipbuilding (lease)
1910-1922	Kyle and Purdy
1923-1927	T.A. Kyle (Kyle relocates to northern lot in 1927)
1928-1935	Lyon and Tuttle

4. Disturbance Record

The natural landform of the APE appears to have remained intact until the second half of the 19th century. Two types of major modern disturbance are present within the APE. The first is associated with the extension of the APE into the Long Island Sound through landfilling and bulkheading, which would have impacted the natural sandy shoreline that existed on the eastern edge of the APE. The second type of disturbance stems from construction of the late 19th and 20th century buildings and infrastructure associated with the two shipyards operating on the property.

According to the limited soil boring data compiled for the APE, the upper stratum (approximately two feet in depth) consists of fill materials, even in areas once on fast land. Historic photographs show that construction of wooden piers, marine railways, and other shipyard-related structures severely impacted the natural ground surface and any associated archaeological resources on or near the original shoreline. Piers also existed within the APE prior to the episodes of land extension, but it is not clear if they then became part of the landfilled area, or if they were removed prior to this.

The massive activity that occurred over the entire surface of the APE due to shipyard construction and operation would very likely have destroyed any precontact living surfaces that may have existed along the portion of the APE that was once fast land. While there is evidence for the current elevation of the APE being higher than it would have been in the mid 19th century, since the area was used extensively by the shipyards before being filled in the 1970s, preservation of the natural ground surface under the fill is unlikely.

Certain 19th century resources may be intact, however. The main house on the property, belonging to one of the original shipyard owners, John P. Hawkins, is still extant. Shaft features associated with this house likely are still present, and the large shed structures currently standing nearby on the APE are without basements or substantial foundations. Structures A and B, which are no longer extant, were dwellings in the late 19th century, and thus would also have their own associated subsurface shaft features. The placement of a number of underground storage tanks (USTs) would have been far enough away from the main house that they are unlikely to have impacted such shaft features as cisterns, privies, and wells. However, the plotted location of a cluster of USTs on the western edge of the property would be approximately in the location of Structure B. Assuming that any associated shaft features were in the rear of the property, the USTs would not have impacted them, as the USTs are within the Structure B footprint (GTA

2003b, Figure 14). Additionally, shaft features may survive in proximity to the former blacksmith shop and the former grocery store/post office on the southern lot.

Development during the 20th century, although extensive over the APE, was not within the areas most likely to contain historic resources such as privies, cisterns, and wells. Of the three historic dwellings, the Hawkins house is still present, Structure A was present until sometime between 1935 and 1951, and Structure B was present until sometime between 1913 and 1918. There are temporary structures and dumpsters around the yard area of the Hawkins house, but these do not appear to have any subsurface components. Some of the footprint of Structure A has been covered by a large shed, but this shed does not have a foundation (Figure 14). The footprint of Structure B was severely impacted by the installation of USTs, but the surrounding yard areas appear to be intact. The grocery store area did experience the construction of a large boathouse, but this wooden structure did not have a basement.

The remainder of the APE not supporting houses or other structures historically contained shipyards. According to historic photographs, the majority of the activity at the shipyards occurred above ground, and after the shipyards closed, the machinery, scaffolding, and other above ground structural elements of the site were removed. What may remain below the current ground surface are remnants of piers and marine railways, which allowed ships to enter and leave the yards. However, it is unknown the degree to which the landfilling activities in the 1970s impacted these potential resources.

5. Precontact Archaeological Sensitivity

There have been a number of precontact sites identified on City Island, mainly shell middens. The APE is located within an area assigned a high sensitivity for precontact resources (Boesch 1995). However, this sensitivity ranking did not account for disturbance to the original ground surface, which as described above, is extensive. Even in areas of the project site that may not have been impacted by building construction or demolition, a century of historic use of the property would likely have disturbed or destroyed any potential precontact resources located at such a shallow depth. The eastern half of the APE is landfill, but historic construction would have severely impacted the land surfaces prior to the landfill deposition.

Additionally, although historic accounts indicate that there was a precontact/contact period burial ground within a half block of the site, on the Public School 17 property, these burials were removed prior to construction of the school (Rosenfeld 1996; Appendix A). As noted earlier in the discussion of Previously Recorded Archaeological Sites and Surveys, the burial/construction site is on an elevated landform. A careful comparison of the topographic features of the burial/construction site and the project site clearly argues against the possibility that any remnants of the precontact/contact period burials exist within the APE. The slope and elevation of the pre-filled project site, as well as the proximity to the tidal shoreline, make it very unlikely that there are burials located within the APE.

Finally, Boesch (1995) notes that areas of the Bronx shoreline along Long Island Sound were originally high ground during the Paleo-Indian and Early to Middle Archaic periods. He concludes that while most precontact resources from these periods have probably been destroyed by thousands of years of marine transgression associated with rising sea levels and subsequent tidal and current effects, in areas where a peat layer is present, which would have capped these deposits, precontact resources could survive. Peat generally forms in marshy areas; there is no reason to suspect that the former natural shoreline within the APE ever was marshy, since it was neither fed by an inland drainage nor was in shallow or a sheltered environment. Thus, the likelihood that precontact resources may exist beneath the filled shoreline area is also low.

6. Historical Archaeological Sensitivity

The historical archaeological resources that may be present within the City Island APE fall into the categories of residential and commercial. The residential resources include the Hawkins house and two other 19th century dwellings. The commercial resources include the 19th century blacksmith shop and grocery store/post office.

Dwellings, along with their associated outbuildings and yards, have the potential to contain resources which may furnish information about past lifeways, urban residential settlement patterns, socio-economic status, class distinctions, ethnicity and consumer choice issues. Such resources could be preserved in privies, cisterns or wells, which in the days before the construction of municipal services - namely sewers and a public water supply - would probably be located in the yard behind the dwelling. Once these shafts were no longer in use for their original purposes, would be quickly filled with refuse, providing a valuable time capsule of stratified deposits for the modern archaeologist. They frequently provide the best domestic remains recovered on urban sites. Portions of these shaft features are often encountered on residential lots because their deeper and therefore earlier layers remain undisturbed by subsequent construction, and in fact, construction often preserves the lower sections of the features by sealing them beneath structures and fill layers. Wells would have been excavated at least as far as the water table, and sometimes deeper, and cisterns and privies often were dug up to 10-15 feet below grade. Although the depth of the historic water table is not known for the APE, it would have been located beneath the modern fill layer, and as such potential shaft features could still be intact. Other commonly occurring but more fragile backyard remains include fence lines, paths, traces of landscaping and sheet midden scatter.

Because of the lack of map resources between 1872 and 1893, the construction date of those dwellings (Structures A and B) other than the Hawkins house are unable to be assigned more precisely than pre-1893. Census records for 1880 give little information as to who may have been living there, as street addresses are not available. Structure A was on the Hawkins property, while Structure B was on the Robertson property. However, it is known that these houses would not have had municipal sewer or water supplies, and therefore would have had subsurface shaft resources such as wells, cisterns, and privies.

Exact dates when public water and sewer became available to the residents and businesses on the project site are not available. It is known that the area did have access

to some public systems by the turn of the 20th century, but the Rosenfeld memoir indicates that there was no rush to connect to either sewer or water services. Wells were definitely in use for residents even in the early part of the 20th century, as were cisterns and privies. For Structures A and B, the end of their use as dwellings in the early 20th century may have meant that deep shaft structures like wells and privies may have then been used as refuse receptacles.

The level of disturbance to the project site would not necessarily preclude the recovery of shaft features within the former yards areas of the property. The soil borings indicated that historic fill existed from one to two feet below grade, although most borings were not able to continue to a lower depth. The depth of the water table is not known.

Where former occupants of the project site chose to place their wells, cisterns, and privies within their large property cannot be known at this time. Frequently, water sources (such as wells and cisterns) were located close to the dwelling, to ease collection for domestic use, but often there were supplemental wells or cisterns on other parts of properties, used for non-residential purposes, such as watering horses in rear stables. In general, during the 19th century privies often were located in the rear of city lots, away from the living areas and in places that were accessible to those who periodically cleaned them out. Finally, although wells and cisterns could have been used for many years, privies eventually filled up, and if they were not emptied at regular intervals, would outlive their utility. In areas where land is not scarce, it was not uncommon for a new privy to be dug when the previous one was full.

Although the Rosenfeld memoir indicates that the Hawkins house had a well inside the house, there remains a strong possibility that there would have been a second well to serve the shipyard. It is unlikely that the yard workers would have gone into the family home when water was needed. Privies probably also were constructed for the use of the shipyard and the grocery store workers.

Finally, although the shipyards occupied the majority of the APE, only possible remnants of marine railways and piers are likely to have survived under the present ground surface, and it is unclear the degree to which these resources have been disturbed. Additionally, it is highly likely that these resources were constructed according to standard plans and with common materials. There is nothing to suggest that these resources, if intact, would contain much research value. As described above, the majority of the work associated with the shipyards occurred above ground and these structures have now been removed from the APE. Thus, the shipyard component of the APE has a low sensitivity for archaeological resources.

V. CONCLUSIONS AND RECOMMENDATIONS

A. Precontact Period Resources

As the preceding sections have described, there is a low potential for the recovery of precontact period archaeological resources within the City Island development project site APE. No archaeological field testing is recommended for precontact period resources.

B. Historic Period Resources

Potential shaft features predating the introduction of public water and sewer may survive at discrete locations within the project site. Due to their fragility, there is a lesser chance that other historic period archaeological resources have survived, such as fence lines, paths, traces of landscaping and sheet midden scatter, but if disturbance is minimal (such as in former open yard areas that were never built over), these resources could still be present. Additionally, no shipyard-related archaeological resources appear to have significant research potential.

Shaft features could be present even under areas subjected to later construction and demolition episodes, and no industrial buildings on the site are known to have had basements or more than one story. Those areas within the APE that either were never built over, or had only one-story buildings on them have been assigned a high sensitivity for the recovery of historic period archaeological resources. Figure 14 depicts the areas of the project site designated highly sensitive. The remainder of the site has been assigned a low archaeological sensitivity.

Based upon these conclusions, it is recommended that Phase IB archaeological testing be undertaken within the project site, at locations identified as archaeologically sensitive, but chosen by the archaeological consultant in consultation with the LPC. The sampling protocol might include a series of backhoe trenches at selected locations, and depending on the results of the trenching, supplemented with archaeological monitoring during construction. All archaeological testing should be conducted according to applicable archaeological standards (LPC 2002), and in consultation with the LPC. RPA-certified professional archaeologists, with an understanding of and experience in urban archaeological excavation techniques, would be required to be part of the archaeological team.

VI. REFERENCES

Beers, Elias Soule

1868 *Atlas of New York and Vicinity*. E. Beers and Company, New York.

Beers, J.B.

1872 *County Atlas of Westchester, New York*. J.B. Beers and Company, New York.

Berger, Meyer

c. 1956-57 "City Islanders to Relive the Good Old Days in Toasts Tomorrow to Two Friends." Manuscript on file at the Bronx County Historical Society.

Boesch, Eugene J.

1996 *Archaeological Evaluation and Sensitivity Assessment of the Bronx, New York*. Prepared for the New York City Landmarks Preservation Commission.

Bolton, Robert

1881 *The History of the Several Towns, Manors, and Patents of the County of Westchester, from Its First Settlement to the Present Time*. Two Volumes. Charles F. Roper, New York.

Bromley, G. W.

1897 *Atlas of the Borough of the Bronx*. G.W. Bromley and Co., Philadelphia.

1905 *Atlas of the Borough of the Bronx*. G.W. Bromley and Co., Philadelphia.

1910 *Atlas of the Borough of the Bronx*. G.W. Bromley and Co., Philadelphia.

1913 *Atlas of the Borough of the Bronx*. G.W. Bromley and Co., Philadelphia.

1918 *Atlas of the Borough of the Bronx*. G.W. Bromley and Co., Philadelphia.

1927 *Atlas of the Borough of the Bronx*. G.W. Bromley and Co., Philadelphia.

1932 *Atlas of the Borough of the Bronx*. G.W. Bromley and Co., Philadelphia.

City Environmental Quality Review (CEQR)

2001 *City Environmental Quality Review Technical Manual*. City of New York, Mayor's Office of Environmental Coordination. October, 2001.

City of New York, Borough of the Bronx, Building Department

n.d. *Block and Lot Folders*. On file at the Department of Buildings, Bronx, New York.

City of New York, Borough of the Bronx, Department of Finance, City Register (City Register)

1867 Liber 137, page 239. Fordham to Hillman.

- 1872 Liber 179, page 270. Fordham to Hillman.
- 1875 Liber 198, page 183. Fordham to Hawkins.
- 1876 Liber 200, page 182. Fordham to E.W. Waterhouse.
- 1877 Liber 202, page 422. Scott to Hillman.
- 1877 Liber 202, page 483. Ezra L. Waterhouse to Hillman.
- 1887 Liber 220, page 484. Hillman to Hawkins.
- 1887 Liber 218, page 97. State of New York to Hillman.
- 1891 Liber 236, page 28. Fordham to Ethan W. Waterhouse.
- 1913 Liber 121, page 252. Jane Hawkins to Miller.
- 1915 Liber 131, page 146. Jane Hawkins to Miller.
- 1923 Liber 227, page 225. Kyle, Purdy, et al. to Butterworth.
- 1928 Liber 684, page 475. Butterworth to Ely.
- 1932 Liber 846, page 139. Butterworth to Lyon-Tuttle Corp.
- 1939 Liber 1011, page 485. Lyon-Tuttle Corp. to Butterworth.
- 1949 Liber 1119, page 474. Standard Industries to Butterworth.
- 1969 Liber 111, page 73. Scovetti to IUC.
- 1969 Liber 111, page 75. KNW Realty to IUC.

City of New York, Department of City Planning

- 2001a *"There is an Island..." City Island's Growth and Development.* City Island Maritime Heritage Preservation Study, NYC DCP #01-01b, New York, New York.
- 2001b *City Island: A Maritime History.* City Island Maritime Heritage Preservation Study, NYC DCP #01-01a, New York, New York.

Geismar, Joan

- 1989 *Historic and Cultural Resources of the Sea Breeze Estates Site, City Island, The Bronx, CEQR 89-040X.* Prepared for Konheim and Ketcham, Inc.

Geo-Technology Associates

2003a *Phase I Environmental Site Assessment, Proposed City Island Site*. Prepared for Pulte Home Corporation, Bernardsville, New Jersey, by Geo-Technology Associates, Abingdon, Maryland.

2003b *Phase II Environmental Site Assessment, City Island Site*. Prepared for Pulte Home Corporation, Bernardsville, New Jersey, by Geo-Technology Associates, Somerset, New Jersey.

Grumet, Robert S.

1981 *Native American Place Names in New York City*. Museum of the City of New York, New York.

Hyde, E. Belcher

1989 *Atlas of the Borough of the Bronx, City of New York, volume 2* (1935 corrected to 1989). E. Belcher Hyde Map Company, Brooklyn.

Landmarks Preservation Commission

1978 *Bronx Survey*. City of New York, New York.

2002 *Landmarks Preservation Commission Guidelines for Archaeological Work in New York City*.

2002 *Samuel Pell House, 586 City Island Avenue, Borough of the Bronx, LP-2115*. City of New York, New York.

Mack and Cameron

1902 *Atlas of the Borough of the Bronx, Volume 1*. Mack and Cameron, New York City.

New York Commissioner of Street Improvements

1905 *Maps or plans showing plan of drainage for the sewerage districts of the Bronx*. Topographical Bureau, New York.

New York State Business Directory and Gazetteer

1870

New York Times

1923 Display Ad 106, pg. RE3., November 4.

Nye, Tom

n.d. Unpublished manuscripts in the possession of the author. City Island, New York.

2005 Personal communication, July 22, 2005

Parker, Arthur C.

1922 "The Archaeological History of New York, Part Two." *New York State Museum Bulletin*, Nos. 237, 238, Albany, New York.

Payne, Alice

1969 *Tales of the Clamdiggers*. Graphicopy, Floral Park, New York.

Ritchie, William A.

1980 *The Archaeology of New York State*. Revised edition. Harbor Hill Books, Harrison, New York.

Rosenfeld, Adelaide Rodstrom

1996 "A City Island Childhood." *The Island Current*, March, p. 7.

Sanborn Map Company

1893 *Insurance Maps of City Island, New York*.

1897 *Insurance Maps of the City of New York*.

1918 *Insurance Maps of the City of New York: Borough of the Bronx*.

1935 *Insurance Maps of the City of New York: Borough of the Bronx*.

1951 *Insurance Maps of the City of New York: Borough of the Bronx*.

1972 *Insurance Maps of the City of New York: Borough of the Bronx*.

1997 *Insurance Maps of the City of New York: Borough of the Bronx*.

Schuberth, C.J.

1968 *The Geology of the City of New York*. The Natural History Press, New York, New York.

Skinner, Alanson

1919 "Exploration of Aboriginal Site at Throgs Neck and Clason's Point, New York City; Part I: The Throgs Neck or Schley Avenue Shellheap." *Contributions from the Museum of the American Indian, Heye Foundation*, Volume V, No. 4, Part I. New York, New York.

Snow, Dean

1980 *The Archaeology of New England*. Academic Press, New York.

United States Federal Census

1850 Pelham, Westchester County, New York.

1860 Pelham, Westchester County, New York.

1870 Pelham, Westchester County, New York.

1870 Madison, New Haven County, Connecticut.

1880 Pelham, Westchester County, New York.

1910 Pelham, Westchester County, New York.

United States Geological Survey

1979 Central Park, N.Y. Quadrangle. 7.5 minute series. U.S. Geological Survey,
Reston, VA.

FIGURES

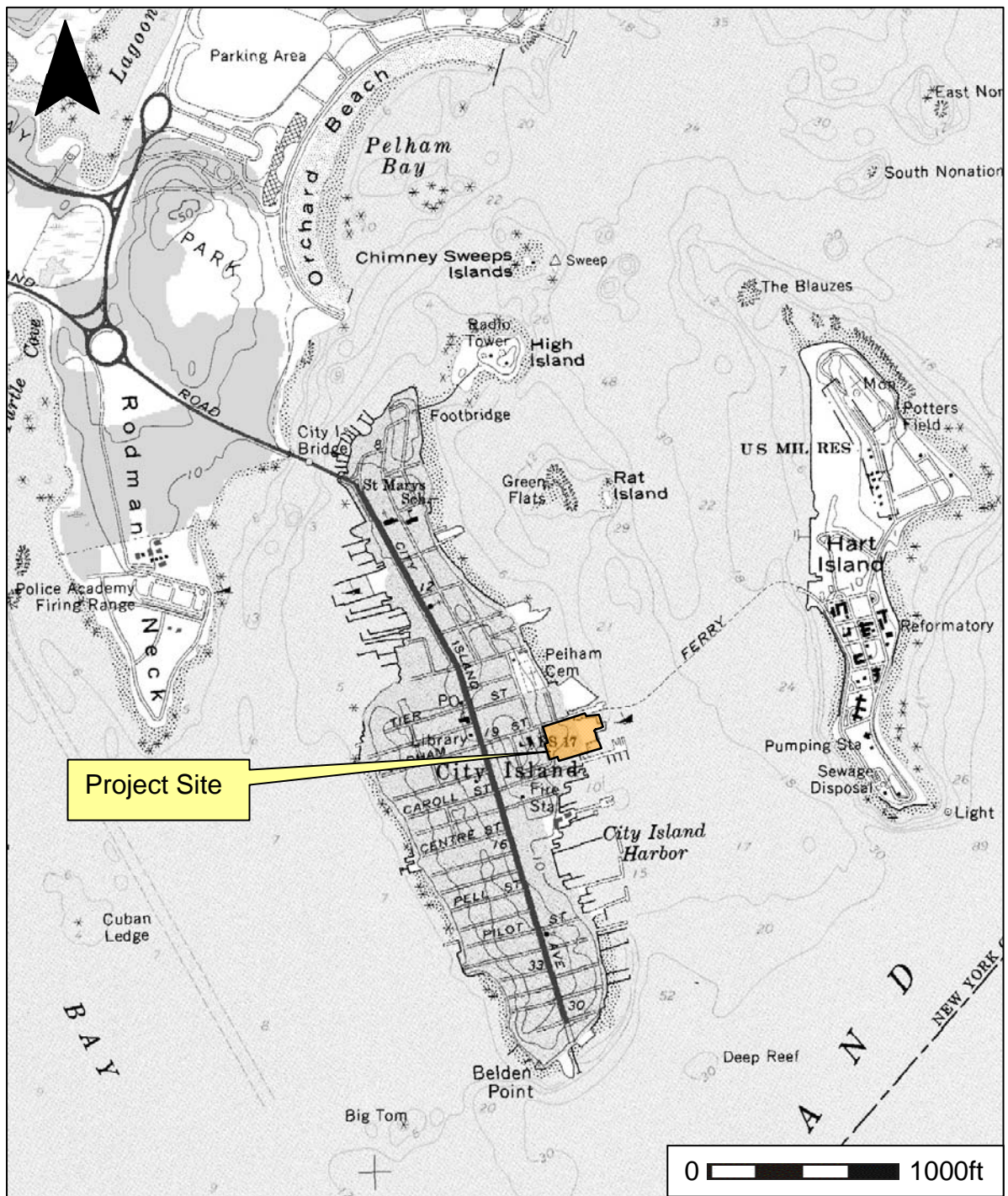


FIGURE 1
City Island

Central Park, New York Quadrangle, 7.5 Minute.
United States Geological Survey, 1979.

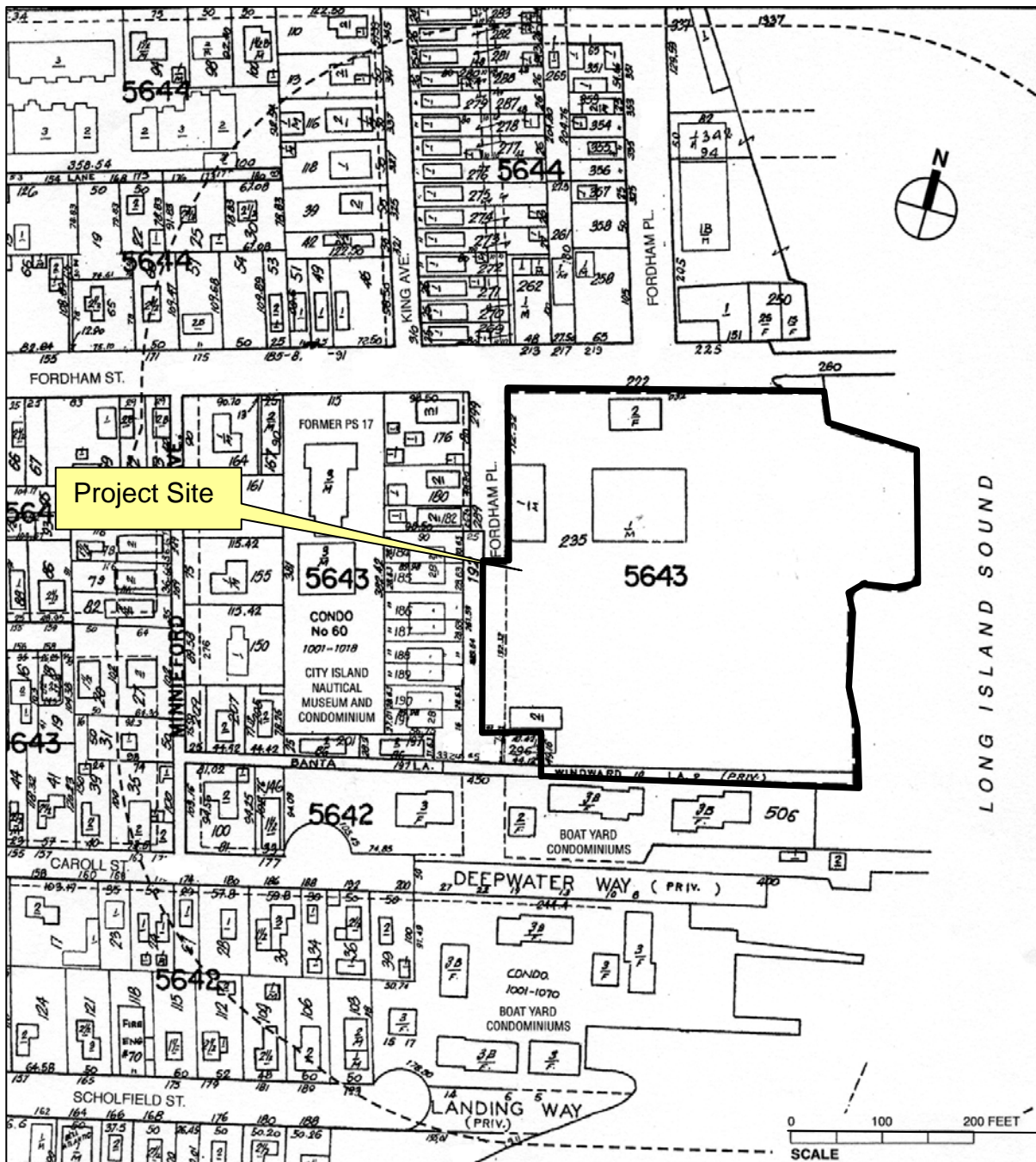


FIGURE 2

City Island Project Site.
AKRF, 2005.

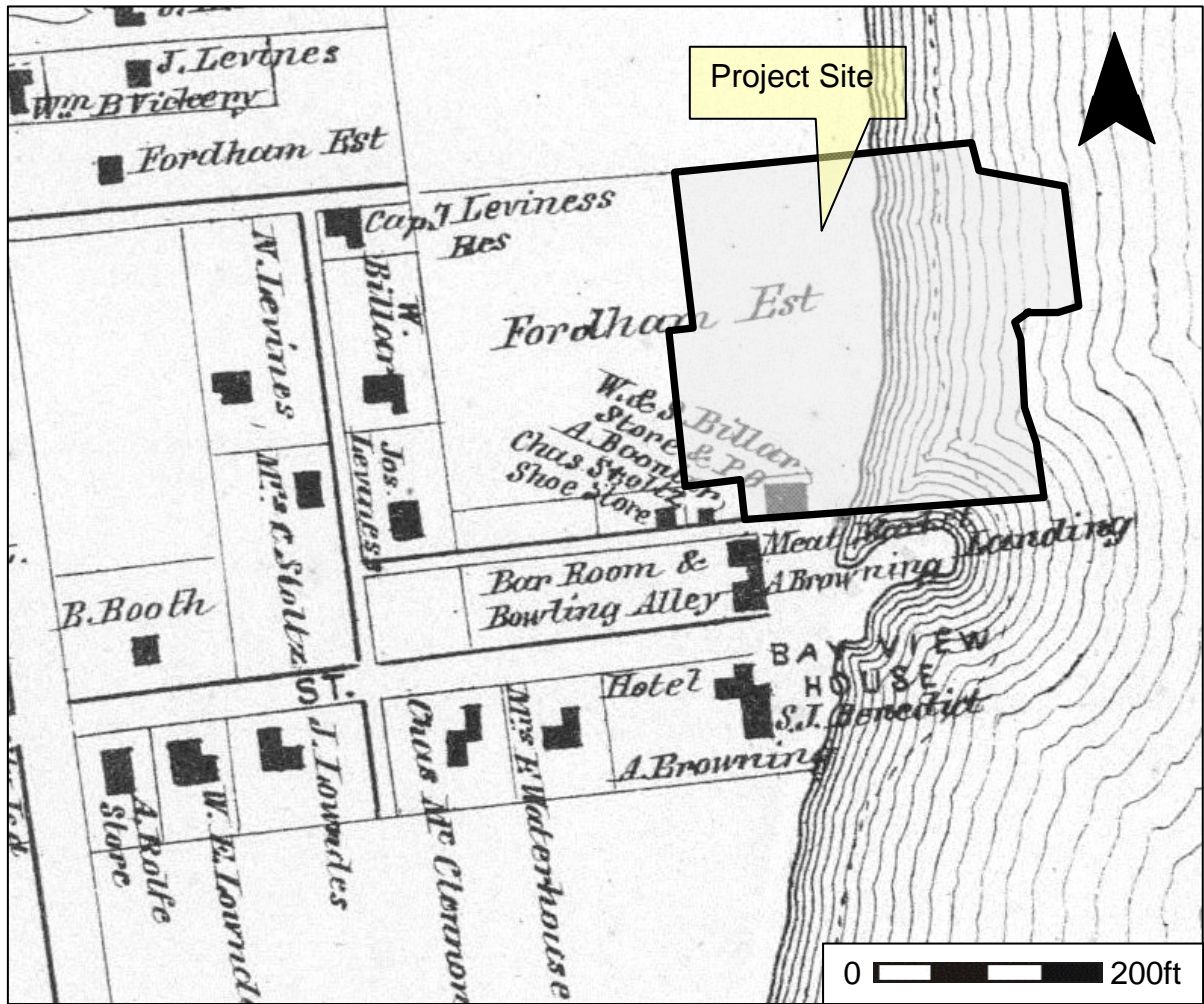


FIGURE 3

Atlas of New York and Vicinity.
Beers, 1868.

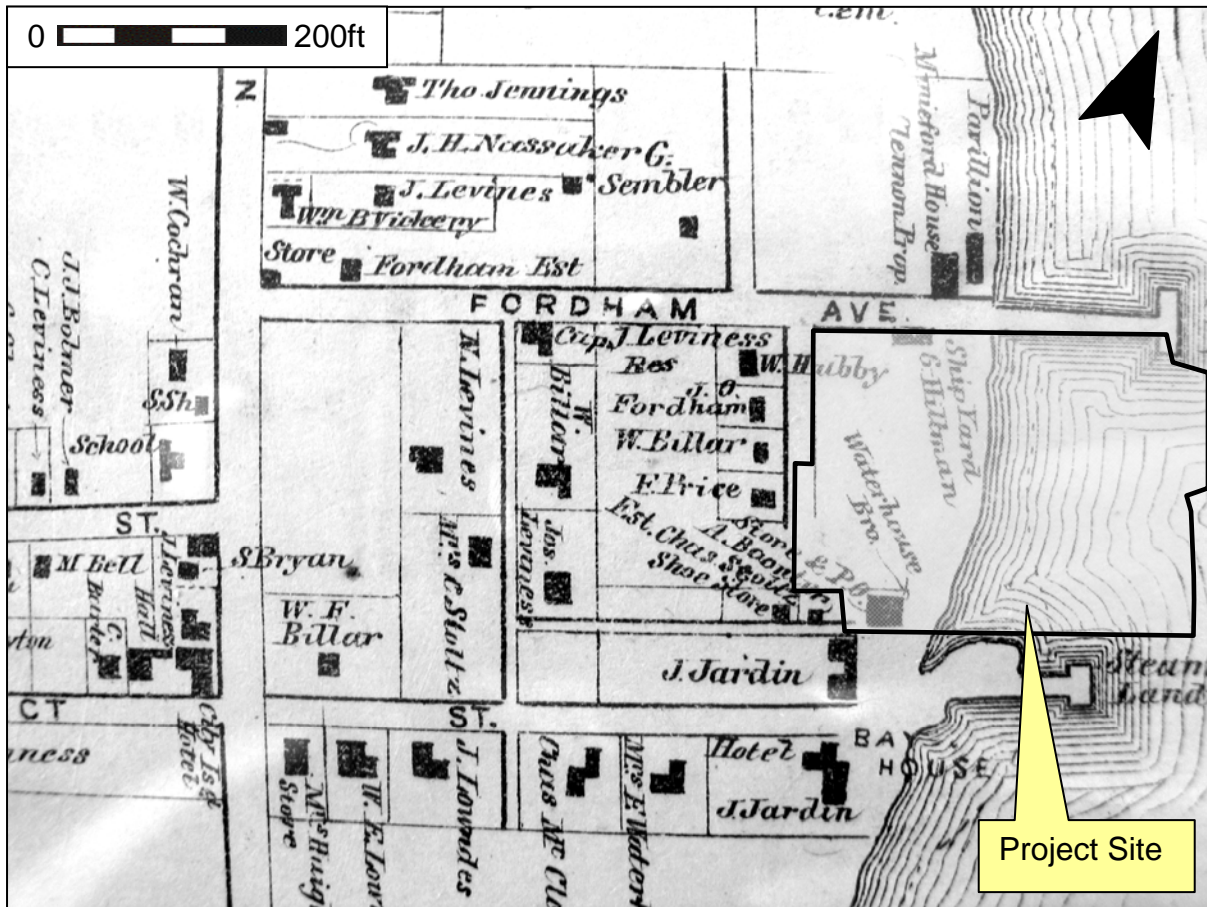


FIGURE 4

County Atlas of Westchester, New York.
Beers, 1872.



The Hawkins house and ship yard in the mid 1890s, looking northwest from shoreline.



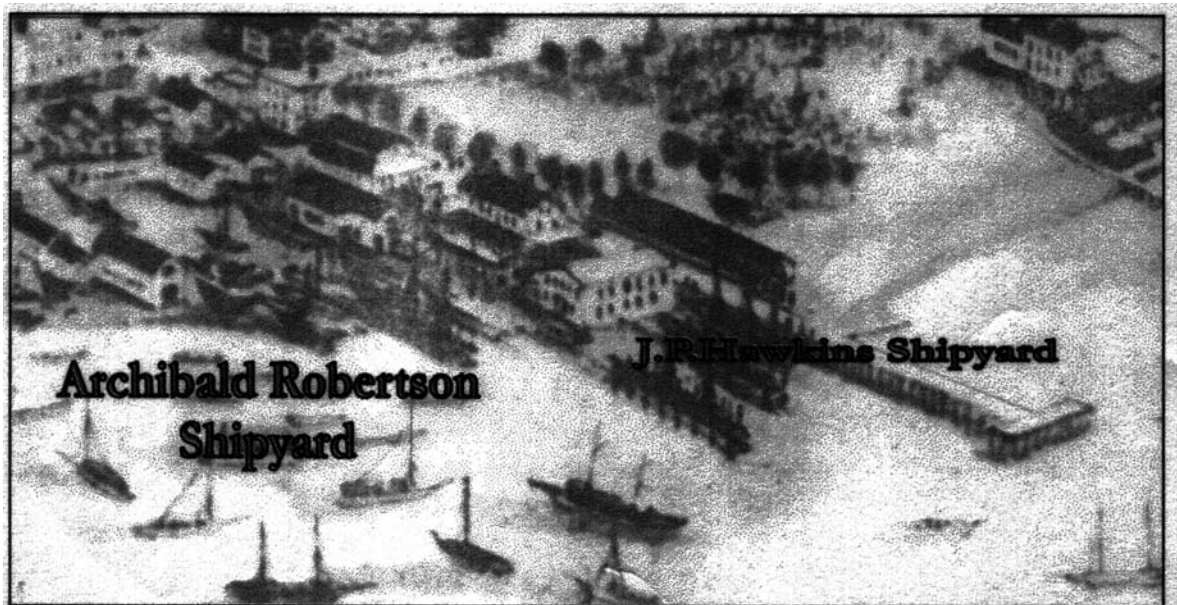
John P. Hawkins, undated.



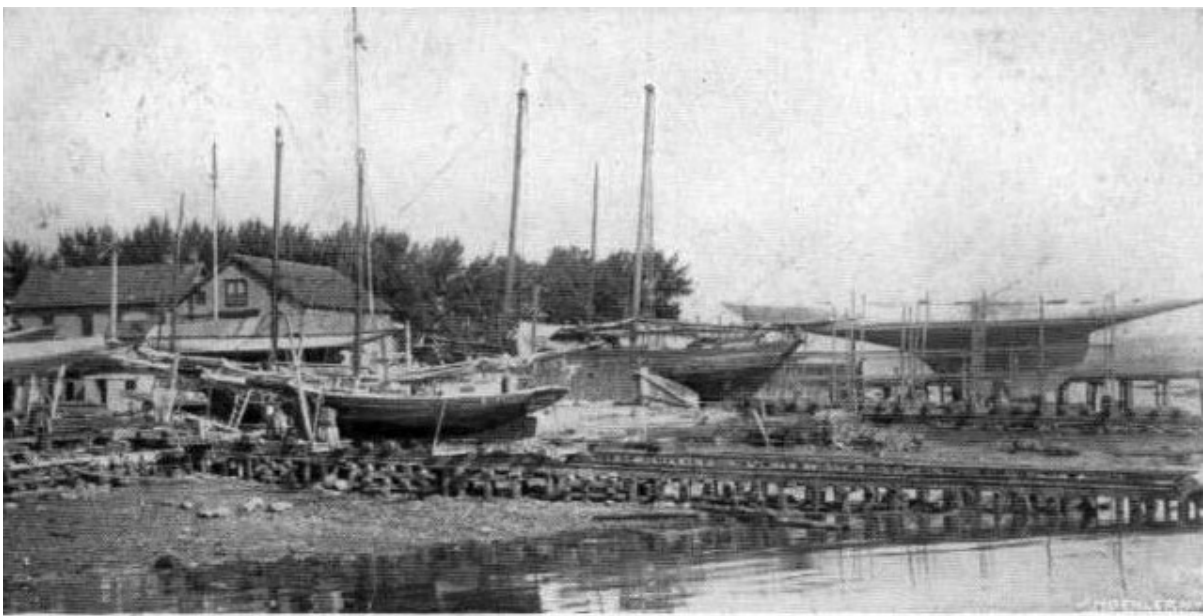
Front and west side of Hawkins house, c.1923, looking southeast from Fordham Street. Note steep slope at left, wraparound porch.

FIGURE 5
City Island

Historical Photographs.
Collection of Tom Nye.



Birds-eye drawing of the Robertson and Hawkins shipyards in the 1880s, looking northwest from shoreline.



Hawkins shipyard with *Columbia* in dry dock, at right, c. 1898. Note marine railway. Hawkins house is on far left.

FIGURE 6
City Island

Historical Photographs.
Collection of Tom Nye.

Insurance Maps of the Borough of the Bronx.
Sanborn, 1893.

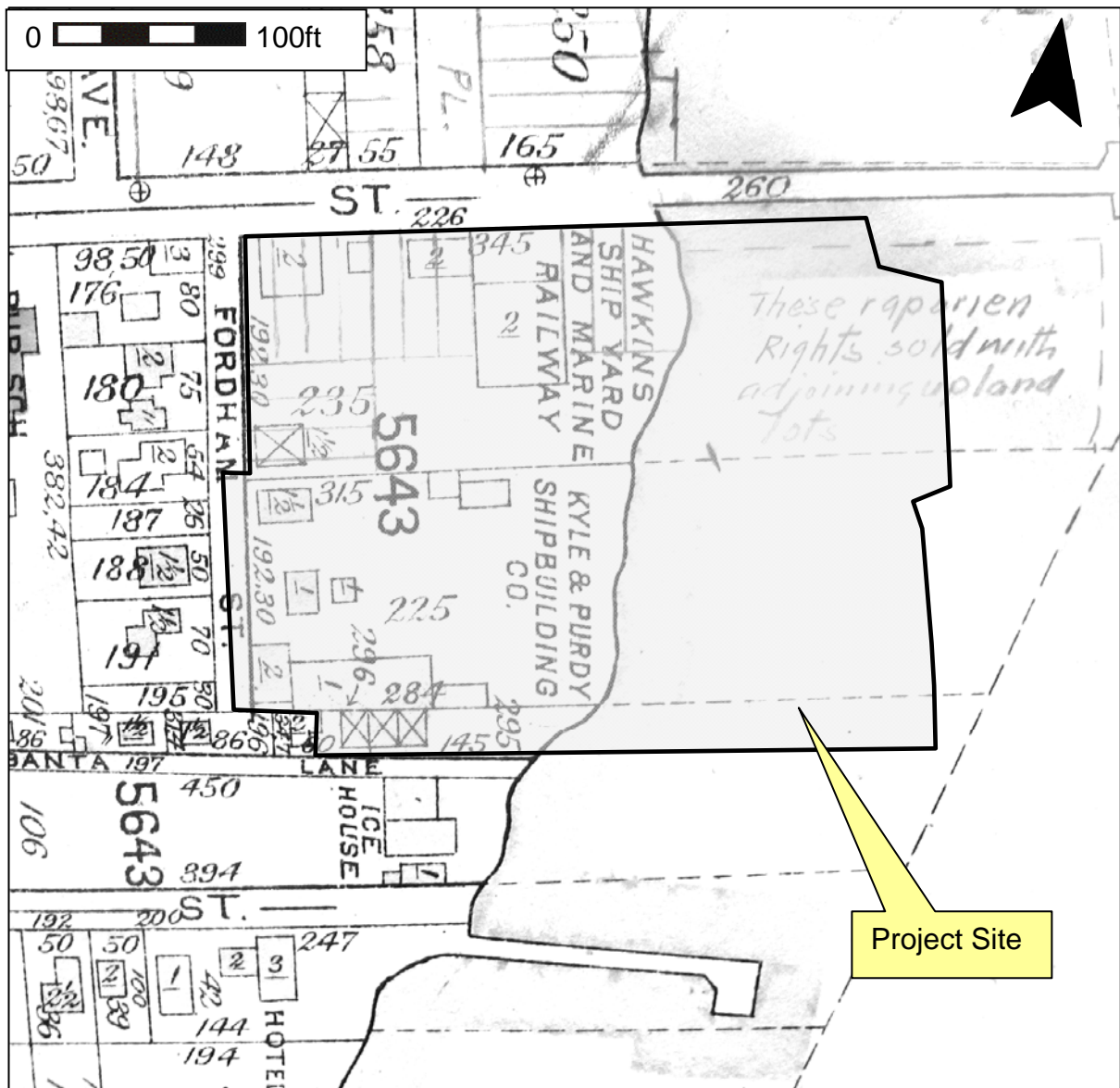


FIGURE 8
City Island

Atlas of the Borough of the Bronx.
Bromley, 1913.

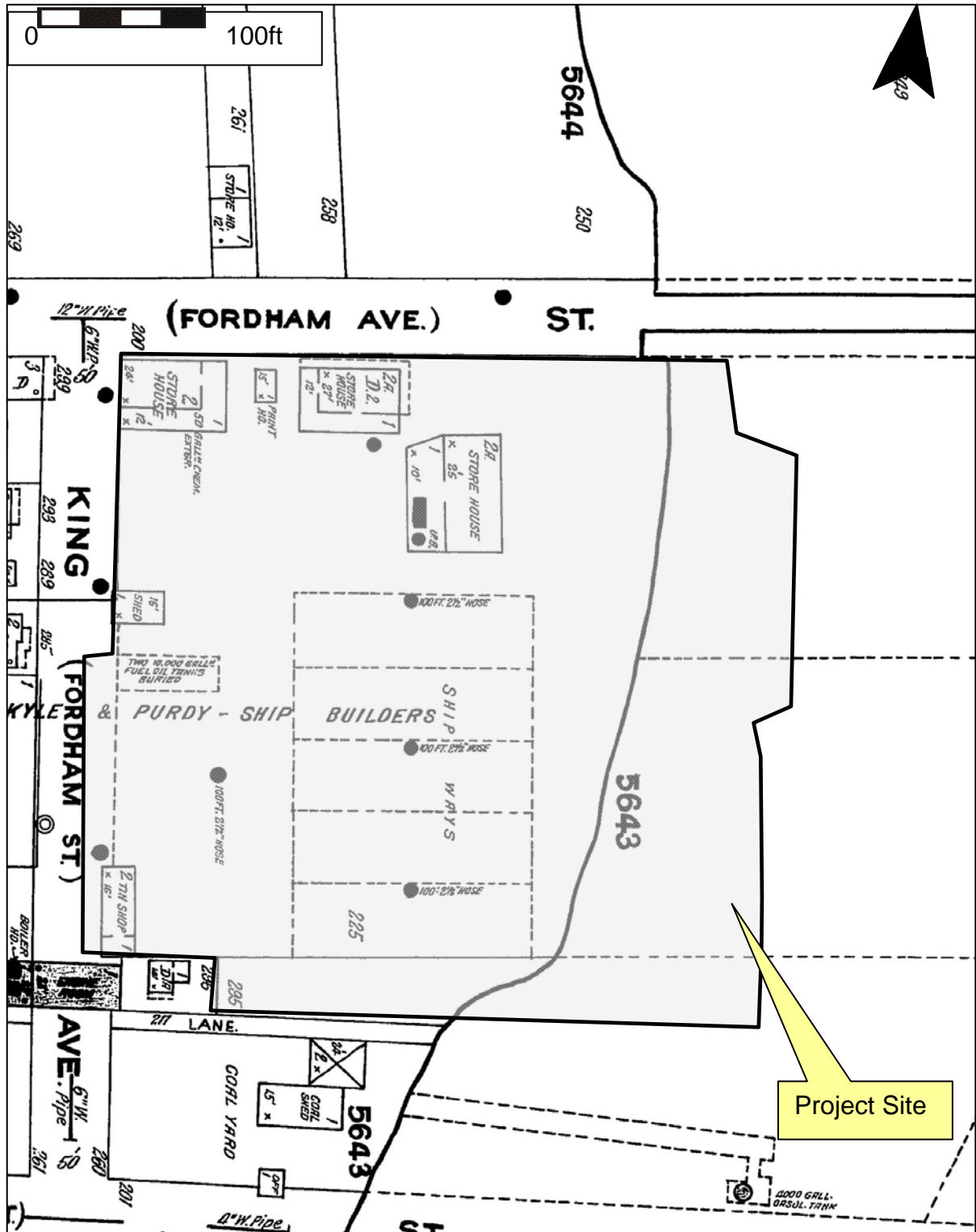


FIGURE 9
City Island

Insurance Maps of the Borough of the Bronx.
Sanborn, 1918.

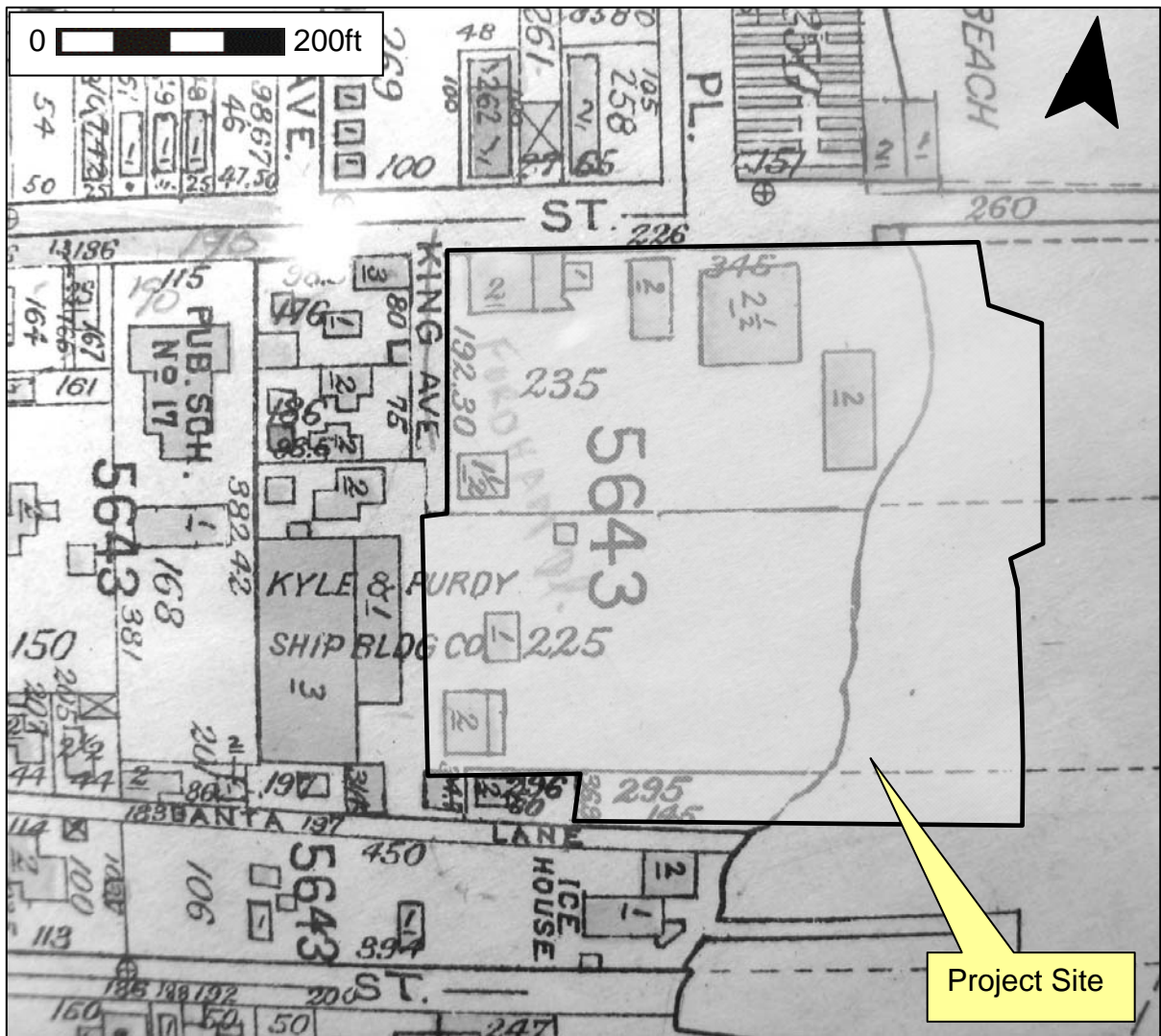


FIGURE 10
City Island

Atlas of the Borough of the Bronx.
Bromley, 1927.

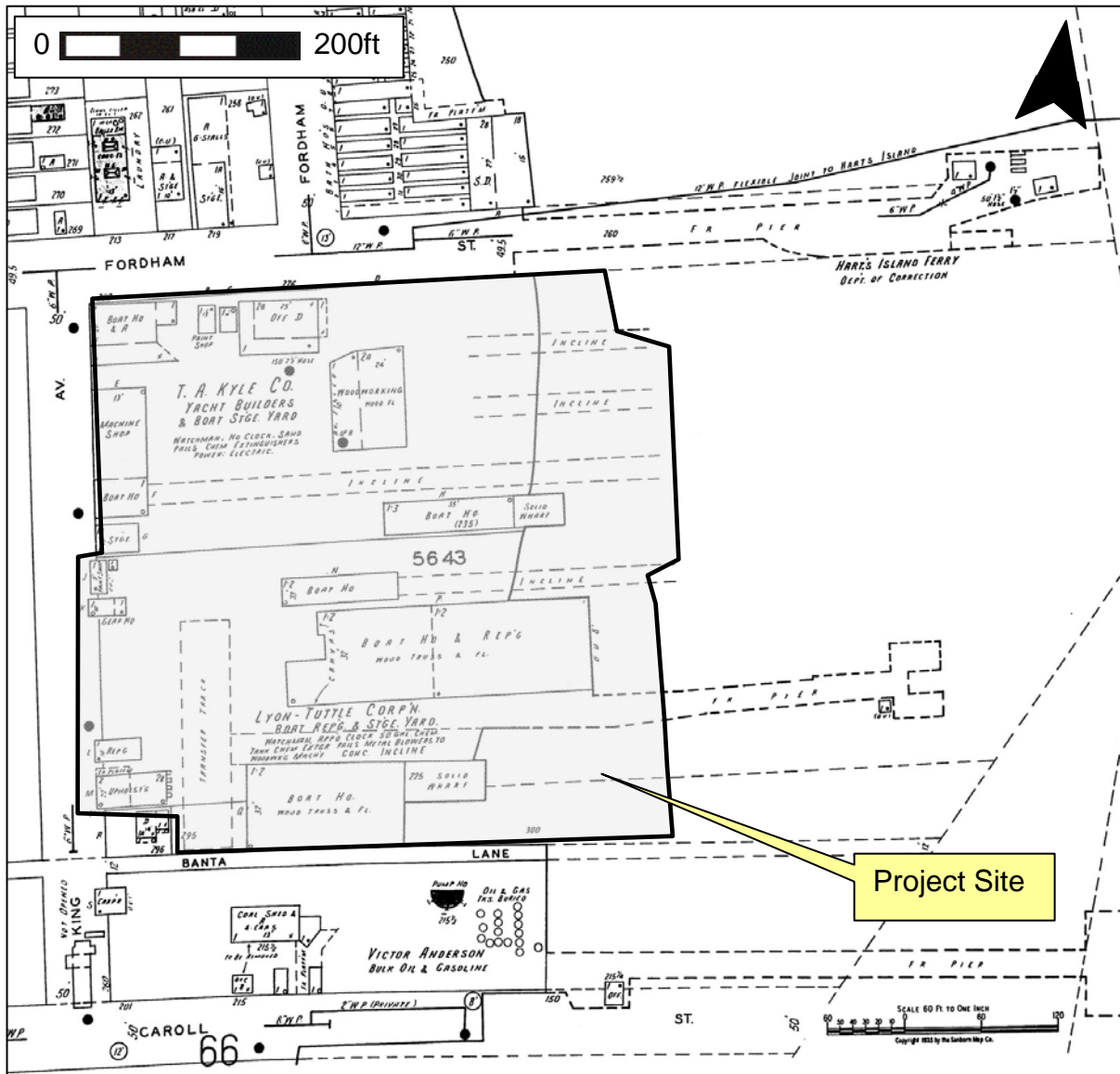
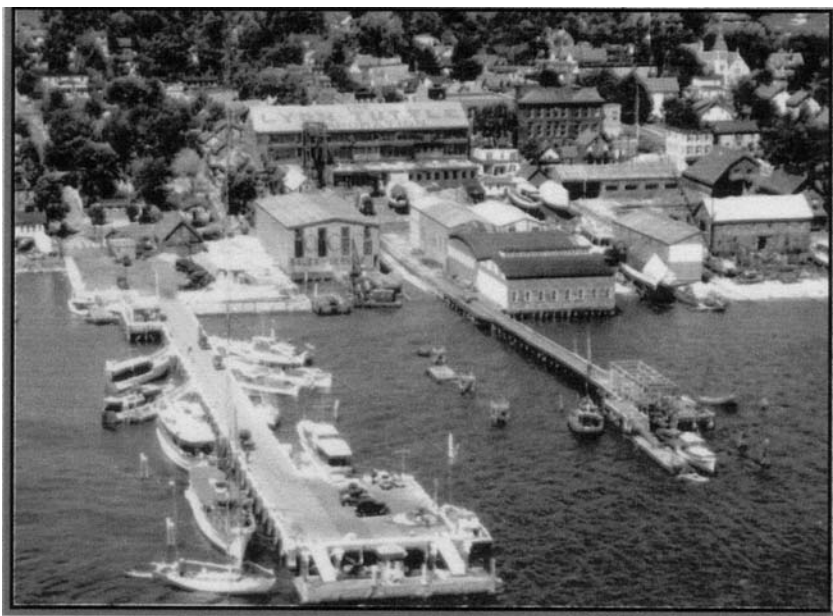


FIGURE 11
City Island

Insurance Maps of the Borough of the Bronx.
Sanborn, 1935.



T.A. Kyle shipyard in mid 1920s, with boat washed on shore from nor'easter. Note marine railway; Hawkins house on far right.



Lyon-Tuttle shipyard on left, T.A. Kyle shipyard on right, c. 1932. Large building with "Lyon-Tuttle" on roof is west of Fordham Place, outside of APE.

FIGURE 12
City Island

Historical Photographs.
Collection of Tom Nye.

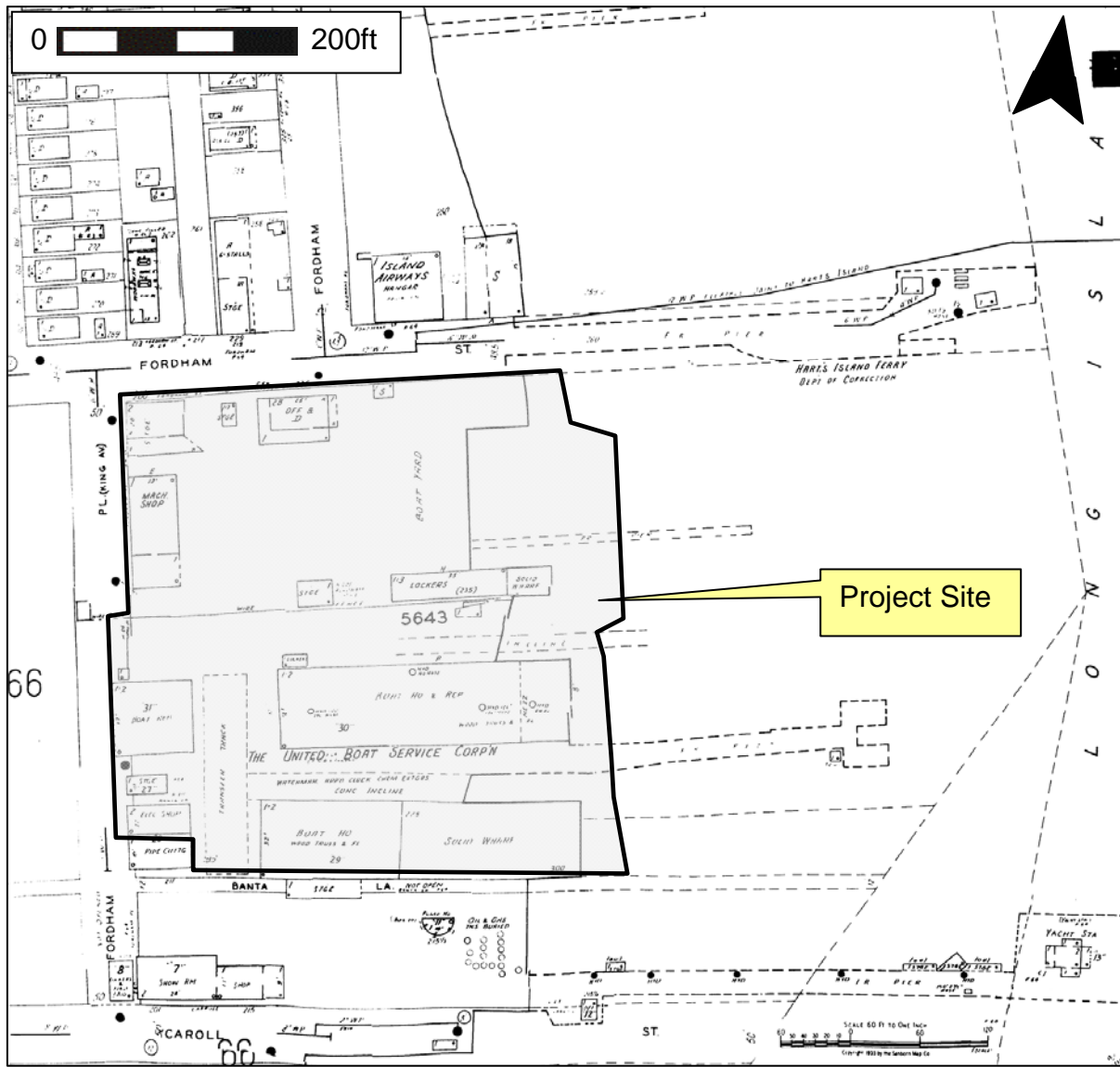


FIGURE 13
City Island

Insurance Maps of the Borough of the Bronx.
Sanborn, 1951.

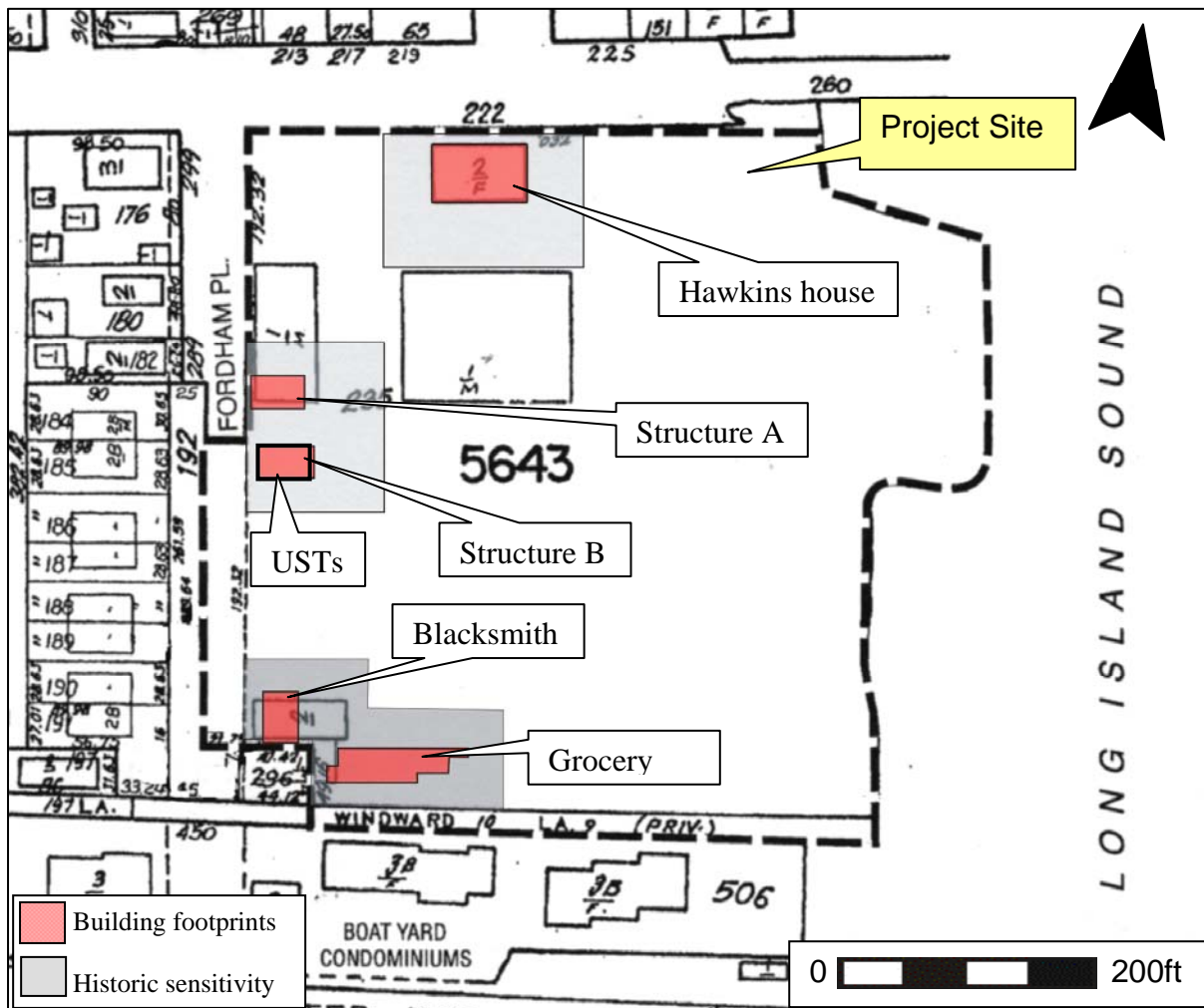


FIGURE 14
City Island

APE with Archaeological Sensitivity Areas.
Base map provided by AKRF, 2005.

PHOTOGRAPHS



Photograph 1: Looking east-southeast from the intersection of Fordham Street and Fordham Place. Hawkins house is at left.



Photograph 2: Looking east from western edge of APE at Fordham Place, showing rear yard of Hawkins house.



Photograph 3: Looking east from central portion of APE.



Photograph 4: Looking west from east central portion of APE.



Photograph 5: Looking east from Fordham Place.



Photograph 6: Center of APE looking west; note above-ground storage tanks at left.



Photograph 7: Looking east-southeast from western edge of APE; former Lot 296 is to the right.



Photograph 8: Looking west from Windward Lane at the Boatyard Condominiums (formerly Banta Lane); APE is to the right of chain-link fence.



Photograph 9: Hawkins house (222 Fordham Street), looking west-southwest from the bottom of Fordham Street.



Photograph 10: Northeast shoreline, looking southwest from Hart Island pier.



Photograph 11: Southeast shoreline, looking northwest from Boatyard Condominiums pier. Note barges on shoreline.



Photograph 12: Eastern end of shoreline, looking north from Boatyard Condominiums.



Photograph 13: Looking south from bottom of Fordham Street, just west of the Hart Island pier.



Photograph 14: Looking northwest from northern portion of APE at eastern yard of Hawkins house. Fordham Street is in the rear.



Photograph 15: Front of Hawkins house looking southwest from Fordham Street.



Photograph 16: Brown-shingled structure on Fordham Place; white shed is not in APE.

APPENDIX A

CITY ISLAND MEMOIR (ROSENFELD 1996)

A CITY ISLAND CHILDHOOD

By ADELAIDE RODSTROM ROSENFELD

The following is an edited transcript of a tape made by Adelaide Rodstrom Rosenfeld in 1982. Mrs. Rosenfeld, who died in 1985 at the age of 78, was a fifth-generation City Islander. She was the founding secretary of the City Island Civic Association and helped found the City Island Historical Society in the early 1970's. Intent on preserving City Island history, she was a major force in establishing the City Island Museum, which first opened in 1975 with Mrs. Rosenfeld as director and curator. Before her death, Mrs. Rosenfeld was instrumental in having the old P.S. 17 building at 180 Fordham Street listed in the New York State and National Registers of Historic Places. Our thanks to her daughter, Adelaide Rosenfeld Bialek, for making this transcript available to The Current.

In 1907 we moved to 299 King Avenue, the house just east of Public School 17 on Fordham Street, when I was a few months old. My mother, Cora Adelaide Rodstrom, grew up in that house, which her father, Ethan Waterhouse, inherited from his father, Wesley Waterhouse. It had been a country store, a post office, a ship chandery and a livery stable. Originally, the first floor had a very high ceiling; they used to have band practice there. It was rebuilt, with the ceiling lowered so there were two full ceilings on the second and third floors. My parents moved into the second floor and my grandfather and grandmother, Ellen Hawkins Waterhouse, had the first and third floors. My grandfather's mother, Sarah Hillyer Waterhouse, had a room or two on the third floor.

John P. Hawkins was my grandmother's father. He owned a shipyard on the property east of our house to the water and had a beautiful house with a fine carved staircase, very elaborate. That house was on Fordham Street, on the way to the dock, and it is still there, now the office for International Underwater Contractors, 222 Fordham St. In the middle of their kitchen there was a well, right indoors.

In our yard we had the deepest well on the island; we had excellent water. We also had what in those days was called a cistern, which collected all the rainwater from the leaders. The water was used for washing clothes; they

didn't use well water for that. My grandmother used to keep the butter and anything she wanted to keep cold in a bucket that hung on a rope down the well, just a few inches above the water.

There was a little house in the yard that was called the outside kitchen where my grandmother did all her cooking. My grandmother never let her indoor kitchen get dirtied up cooking. She always cooked in the outside little building, which now has been made into a bungalow.

In the back yard, toward the school fence, there was an outside privy. Then, later on, there was also a building where Uncle Chester lived. He was Grandpa's brother but they didn't get along so he didn't live in the big house. He lived in the house next to the school fence. I think that house is still there.

There was a playhouse in the yard that my father, Charles Rodstrom, built for us when we were three or four years old. Over the playhouse was a very prolific grape arbor, still there to this day [1982]. My grandmother and my mother used to make grape jelly and wine. There were two kinds of grapes, concord and white. There were two small apple trees and near the fence there was a huge wild cherry tree. My mother had a clothesline from the second-story kitchen window all the way across the yard to the wild cherry tree; that's how she dried her clothes.

There was a white hydrangea bush over near the school fence and it still blooms to this day. We had beautiful gardens when I was a child. My grandfather Rodstrom's best friend was gardener to the king of Sweden, and from him my father learned a great deal about gardening; he raised the most beautiful flowers. We had chrysanthemums like football mums and asters by the hundreds. There were geraniums and asters and ageratum and beautiful roses along the white picket fence. In the summer the priest used to come down on Saturday and pick flowers for the altar at St. Mary's. There was a picket fence across the back of the yard. To go to school we would just go through the fence. It was easy.



Photo courtesy of ADELAIDE E. BIALEK
The Waterhouse and Rodstrom families circa 1908. Front row, center, Adelaide Matilda Waterhouse. Second row, Ellen Hawkins Waterhouse holding Myrtle Waterhouse, Albert Waterhouse, Cora Adelaide Rodstrom holding Helen Rodstrom. Third row, Ethan Waterhouse, Louis Layes, Captain Charles Rodstrom, Wesley Waterhouse.

Text
describing
shaft
features

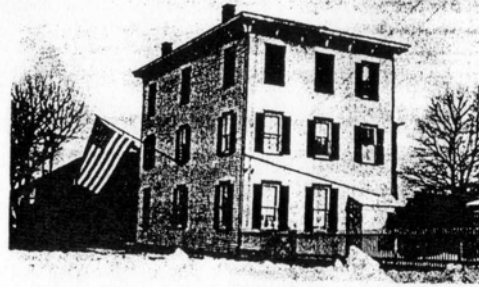


Photo courtesy of ADELAIDE E. BAILEY
299 King Avenue, photographed from Fordham Street, circa 1909

In the back of the little outdoor kitchen was a vegetable garden that my grandfather made, and back against the south fence there was a little chicken coop that my grandfather built for me when the neighbor down the block offered me a setting hen. I took 12 eggs from my mother's ice box and set the hen on them. And everybody said I'd get nothing, but I got 12 chickens, which was fun.

All along the waterfront was the shipyard that my great-grandfather Hawkins owned, and up parallel to Fordham Street was the America's Cup defender Columbia, which was no longer being used for racing. The Columbia was built, hauled and stood there for many years. When she was finally decommissioned and taken apart, they took the keel and melted it down and made pocket pieces. All the men around had pocket pieces made out of the keel of the Columbia.

We used to go fishing on the Fordham Street dock; my great-grandfather had built the dock many years before. When it got cold enough, we went ice boating. Eastchester Bay used to freeze over. My father had an ice boat that was very fast; it had runners on the bottom, like a sled. He used to take us all out on it on Eastchester Bay--a few of us at a time. We took the ice boat over to Eastchester Bay by horse and wagon. We ice skated over in the park more than on Eastchester Bay. We went sleigh riding down Fordham Street hill, all the way to halfway out the dock.

When my mother was young, everybody knew everybody else on the Island. She first went to school down where Hawkins Street Park is now, where the school was before they had P.S. 17. After the school moved out, the building was a police station and across the street on what is now Hawkins Street was the stable; we had mounted police. The fire station was on Schofield Street as long as I can remember. Before I can remember, it was up on City Island Avenue near Cross Street. I've seen it on maps.

The cemetery was north of our yard as long as I remember. P.S. 17 was built on what was formerly an Indian burial ground; some settlers were buried there, too. My mother watched them dig up the bodies and put them in the new cemetery, and she watched them build the new school. P.S. 17 was built by Italian laborers. My mother said they were paid 50 cents a week, and when they were paid, some of them would cry because the money was so little and they needed more to live on. But they had their way over paid; it was like indentured servitude.

When my mother was in the sixth grade they carried their books up to the new school, P.S. 17. The new school was built in 1897. We were part of Westchester County until 1895. At that time, New York City was consolidated into the five boroughs and they offered the people on City Island a new school and a new bridge if they would vote to join New York City and

break away from Westchester County. And that was how we got the new school. My mother got the general excellence medal when she graduated from eighth grade, and that medal is now in the City Island Historical Museum.

My mother had a brother Wes, a brother Bert, and a sister, Myrt who was younger than my sister Helen who was one year and 20 days younger than I was. So, my mother had two daughters before she had a sister. We were always treated as one family. My father was a sea captain, when he came back from a trip, he brought presents for the three of us.

When we were starting the museum, men working in the belfry of P.S. 17, tracing a wire that needed repair, found the school bell under a pile of debris. During World War I, I rang that bell for a half hour on the day when there was supposed to be an armistice, but it turned out to be a false armistice. The bell was missing for a long time and we were very excited when it was found. Miss Fitzpatrick had the bell's clapper; she gave it to Rosalie Phillips and now it's in the museum.

During World War I, I won a German helmet for selling the most liberty bonds in school. My great-grandmother kept buying bonds until I had sold the most, and as a reward I got the helmet. It had a spike on the top, a black helmet with a gold spike. My mother wouldn't have it in the house, since my father was in the Navy, so we gave it to the school for a present. We worried about my father, who was out at sea most of the time. I had one cousin who was killed in France, Leonard Hawkins. A number of boys from the Island were over in France, but he was the only one from the Island who was killed there.

We went to Evander Childs High School from City Island. To get there, you took the bus at 5 minutes after 6 in bad weather and 25 minutes after 6 in good weather. You went to West Farms on the bus and then you took either the Tremont Avenue or the Van Cortland trolley. At the other end you had to walk.

At first Sunday mass was held in private homes and then St. Mary's was built. I don't remember that but I know that's how it was. They didn't always have a priest on the Island. The priest came from Saint Raymond's on Tremont Avenue. Sometimes, when Eastchester Bay was frozen over, he used to walk across the ice.

In the snowy weather they used to bring prisoners across from Hart Island to shovel the snow along the whole of Fordham Street. They always had guards with them with guns in their hands. They kept Fordham Street open so they could get supplies back and forth. Potter's field, where people were buried who had no means of support, was on Hart Island as long as I can remember.

North from Fordham Street to the cemetery, about a third of the property was Mr. Ketchum's farm. There was an orchard too.

(Continued On Page 12)

Text
describing
former
cemetery

City Island Childhood

(Continued from Page 7)

The rest of it was part of my great-grandfather Hawkin's shipyard. Mr. Ketchum had a real old-time farm, we bought all our corn and tomatoes and lima beans from him. His daughter sold the produce; they had wooden measuring forms that they used to measure out everything they sold.

In 1911 we went to Sweden for Christmas to visit my father's family. My sister Helen and I went, my brother Charlie was born the next year. Everybody was seasick on the ship except my father and Helen. Crossing the North Sea, they were the only ones on the ship to come to breakfast. My grandmother, Josephine Wingard Rodstrom, had a big apron with a pocket underneath and had the pocket filled with cookies she would slip to us. My father didn't want us to have the cookies, they were very rich. But when he was not around, she would give them to us. And we each got a marzipan pig for Christmas; over there all the children got marzipan pigs, and I can remember that.

When I was a little girl, everybody believed in Santa Claus. Christmas Eve you had to go to bed by 7:30, but your father and mother never went to bed until 3 or 4 in the morning. They were hardly under

the covers when you all woke up to see what Santa Claus had left for you, so your poor father and mother got no sleep on Christmas Eve.

We always had a huge beautiful Christmas tree. If it wasn't a perfect shape, my father drilled holes in the stem and added branches. My father always trimmed the tree when he was home, which was most of the time at Christmas. Every ornament had a special place; they all went in order with the smallest ones on the top. We had strings of beads and tinsel and tinsel garlands in silver and gold. When we were in Sweden, every tree branch had a lit candle but we didn't have candles, we were afraid of fire. One year my father got a bonus and he trimmed the tree with hundred dollar bills. My parents called my grandmother to come and see. When she saw all the hundred dollar bills she practically fainted. They had to give her some whiskey to revive her, and she was not one to drink whiskey.

At Christmas, we had midnight mass on City Island, but we had no organ; we had an old second-hand piano up in the front of the church. One year I played the piano for midnight mass.

When my mother was young, City Island had a horsecar. The horsecar tracks

ran the length of City Island over to Bartow Station, where Glover's Rock Road joins the Shore Road. She and her friends would get on the rear of the horsecar and jump up and down. The horsecar would come off the tracks so the horse couldn't pull it. The man who owned and drove the horsecar was Pat Burns, and our Pell Place house is on Pat Burns' lot. [Mrs. Rosenfeld lived with her husband David at 91 Pell Place from 1937 until her death] When we first moved there, we had a man come to plant a lawn and he found stretches of big stones that were part of the barn's foundation.

My mother was a devil when she was young. She was 17 when she got married.

Her father was foreman in the shipyard and my father was the captain of a boat in the shipyard, so my father would come to the house. My mother thought he was coming to meet my grandfather, and it took a long time before it sank in that he was coming to see her. He was a serious person and would sit and talk to my grandfather about boats and so forth. Eventually it dawned on her that he was coming to see her. The night she got married, her father arranged a skimmington, a bunch of men from the shipyard were shooting off a cannon across the street. When someone got married, they made a whole lot of noise, then you threw money out and they went away.