

**Testimony from Brooklyn Community Board 7 Concerning PS/IS 437 (701 Caton Avenue)  
Presented to the City Council Subcommittee on Landmarks, Public Siting and Maritime Uses  
November 16, 2011**

Thank you for this opportunity to testify. My name is Jeremy Laufer and I am the District Manager for Community District 7 and I am here to present testimony on behalf of Community Board 7/Brooklyn.

In February of this year, Community Board 7 voted 32 to 1 in favor of site acquisition and construction of a new, 750-seat primary and intermediate school at 701 Caton Avenue, within School District 15. Our Board was very pleased that this site was chosen for the new school as it was our Site Selection Committee that first suggested it to the Department of Education and School Construction Authority. The many community members who attended a Public Hearing on a cold February night expressed happiness that the issue of this empty site, rumored for fifteen years to host an out-of-context development, would finally be settled and a facility that would serve the community and be in context with surrounding properties would be developed instead.

Along with our great satisfaction that a third new school will be built in our community within the next few years, is a word of caution and experience. Promises made by the Department of Education must be kept.

Our well-publicized forty year fight for a high school culminated in the opening of Sunset Park High School in 2009. Despite a promise from the DOE that a Charter School would move from the building after two years, DOE tried to renege on this promise this year and the building would have been at 109% capacity, before the high school even had a senior class, had the community not come together with our elected officials to find another solution.

PS 971 opened in our community in 2010. Although DOE presented the plan for this school as a Pre-K through 3<sup>rd</sup> Grade, Early Childhood Center, we learned weeks before the building opened that DOE had decided to change the school to K through 5. Additionally, this school also houses a significant number of students from an overcrowded school outside of its zone, reducing the capacity for children within the zone.

Empty space will be filled and if we follow recent DOE policy, to age into the school, grade by grade, this PS/IS would take nearly a decade to fill. It would take more than half a decade for students to reach the

intermediate school grades. This is why we advocate for concurrent admissions to grades in both parts of the school when it opens, serving younger and older children from the beginning.

The single dissenting vote against this site came from a Board Member who was worried that we would face a building of Charter Schools without the full capacity of the promised building, something that has not been discussed with the community. And we certainly understand the Board Member's concerns and believe her apprehension is valid, given our recent history with new schools. We believe Charter Schools should be in addition to what the DOE promises, not a substitute.

Therefore, while we enthusiastically endorse the site acquisition and construction of PS/IS 437 at 701 Caton Avenue, and I can't express our approval enough, we also urge you to help us keep DOE at their word on capacity and to endorse opening admissions to multiple grades when the school opens.

Once again, I thank you for the opportunity to testify on behalf of Community Board 7.



Lorraine Grillo  
President & CEO

lgrillo@nycsca.org

November 10, 2011

The Honorable Christine C. Quinn  
Speaker of the City Council  
City Hall  
New York, New York 10007

Dear Speaker Quinn:

The New York City School Construction Authority (the Authority) has undertaken its site selection process for the following proposed school:

- New, Approximately 750-Seat Primary/Intermediate School Facility, Brooklyn
- Block 5321, Lots 44, 64 and 73
- Block bounded by Caton Avenue, East 7<sup>th</sup> Street, East 8<sup>th</sup> Street, and Kermit Place
- Community School District No. 15
- Brooklyn Community Board No. 7

The project site contains a total of approximately 37,065 square feet (0.85 acres) of lot area located on the block bounded by Caton Avenue, East 7<sup>th</sup> Street, East 8<sup>th</sup> Street and Kermit Place in the Prospect Park South section of Brooklyn. The site consists of three (3) privately-owned vacant lots. Under the proposed project, the Authority would acquire the privately-owned lots, and would construct a new, approximately 750-seat primary/intermediate school facility serving students in Community School District No. 15.

The Notice of Filing of the Site Plan was published in the New York Post and the City Record on January 21, 2011. Brooklyn Community Board No. 7 was notified on January 21, 2011, and was asked to hold a public hearing on the proposed Site Plan. Brooklyn Community Board No. 7 held its public hearing on February 9, 2011, and submitted written comments dated February 18, 2011 that supported the proposed Site Plan. The City Planning Commission was also notified on January 21, 2011, and in a letter dated March 7, 2011 recommended in favor of the proposed site.



The Authority has considered all comments received on the proposed project and affirms the proposed Site Plan pursuant to §1731.4 of the Public Authorities Law. In accordance with §1732 of the Public Authorities Law, the Authority is submitting the enclosed Site Plan to the Mayor and the Council for consideration. Enclosed also are copies of the Environmental Assessment and Negative Declaration that have been prepared for this project.

The Authority looks forward to your favorable consideration of the proposed Site Plan. If you have any questions regarding this Site Plan or would like further information, please contact me at (718) 472-8001 at your convenience.

Thank you for your attention to this matter.

Sincerely,

  
Lorraine Grillo  
President & CEO

Encl.

c: Hon. Michael R. Bloomberg (w/o attachments)  
Hon. Leroy Comrie, Land Use Committee  
Hon. Brad Lander, Subcommittee on Landmarks,  
Public Siting and Maritime Uses  
Kathleen Grimm, Deputy Chancellor for Operations





Lorraine Grillo  
President & CEO

lgrillo@nycsca.org

November 10, 2011

The Honorable Michael R. Bloomberg  
Mayor  
City Hall  
New York, New York 10007

Dear Mayor Bloomberg:

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Thank you for your attention to this matter.

Sincerely,

A handwritten signature in cursive script that reads "Lorraine Grillo".

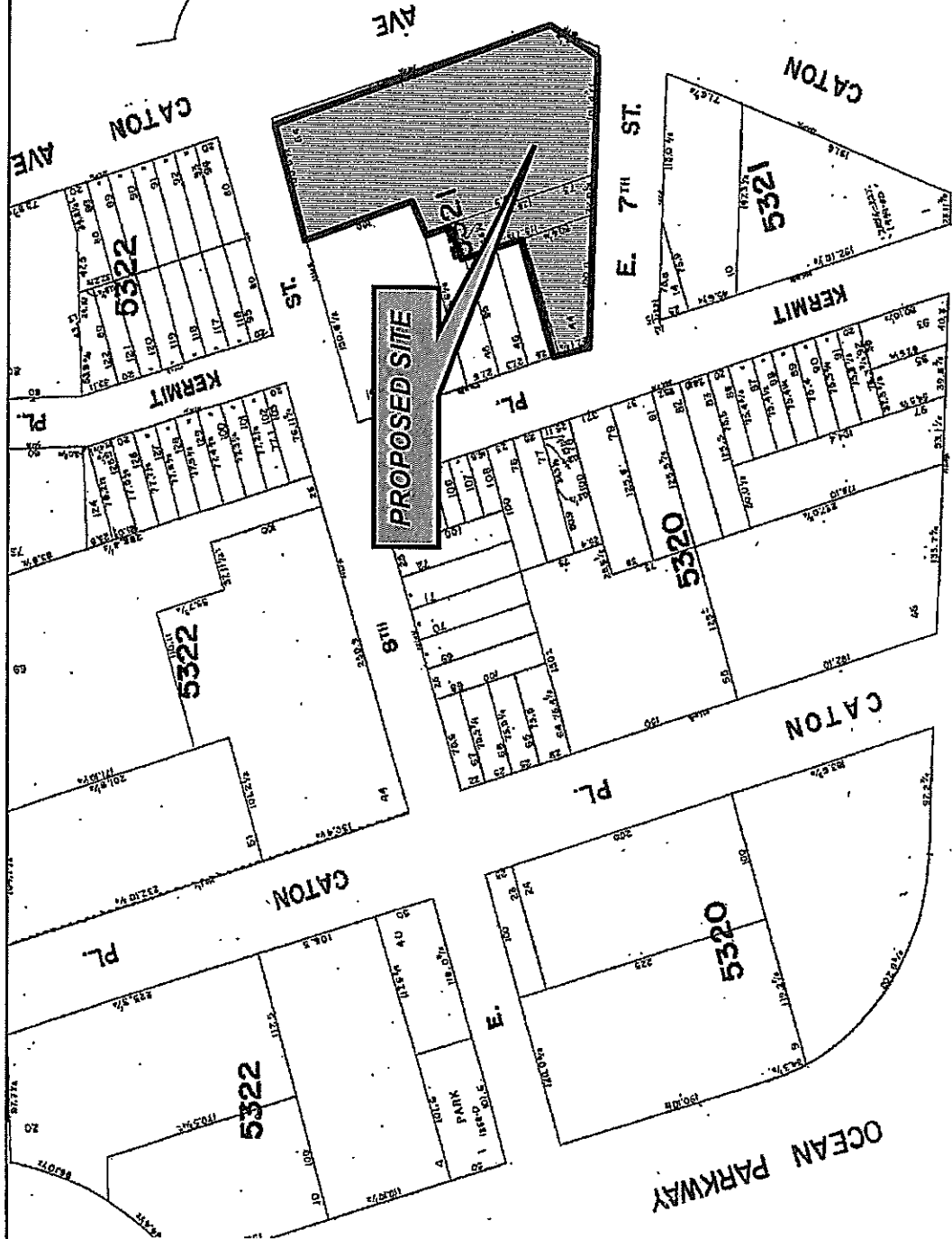
Lorraine Grillo  
President & CEO

Encl.

c: Hon. Christine C. Quinn (w/o attachments)  
Kathleen Grimm, Deputy Chancellor for Operations



**SITE PLAN FOR AN APPROXIMATELY 750-SEAT PRIMARY/INTERMEDIATE SCHOOL, BROOKLYN**  
Brooklyn Block 5321, Lots 64 and 73  
Community School District No. 15





January 21, 2011



The Honorable Christine C. Quinn  
Speaker of the City Council  
City Hall  
New York, New York 10007

**Re: New, Approximately 750-Seat Primary/Intermediate School, Brooklyn  
Community School District No. 15**

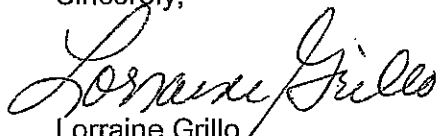
Dear Speaker Quinn:

Attached please find copies of the site selection notification for the selection of Block 5321, Lots 44, 64 and 73, and any other property in the immediate vicinity which may be necessary for the proposed project, located in the Borough of Brooklyn, for the development of a new, approximately 750-seat primary/intermediate school facility for Community School District No. 15. The site is bounded by Kermit Place to the north, Caton Avenue to the south, East 8<sup>th</sup> Street to the east and East 7<sup>th</sup> Street to the west.

This notification was sent to Brooklyn Community Board No.7 and the City Planning Commission. The Notice of Filing for this site selection will be published in the New York Post and City Record on January 21, 2011, and the SCA will continue to accept public comments until March 7, 2011.

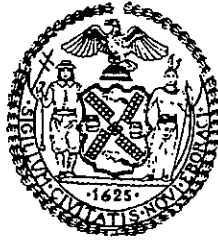
I have also attached the Site Plan and Alternate Sites Analyses for your review. If you require any additional information, please do not hesitate to contact Ross J. Holden, Vice President and General Counsel, at (718) 472-8220.

Sincerely,

  
Lorraine Grillo  
President & CEO

Attachments

c: Kathleen Grimm, Deputy Chancellor for Operations  
Hon. Leroy G. Comrie, Jr., Land Use Committee  
Hon. Brad Lander, District Councilmember and Subcommittee  
on Landmarks, Public Siting & Maritime Uses  
Gail Benjamin, Director, Land Use Division  
Alonzo Carr, Land Use Division



2/15- file with school #  
NEW YORK CITY SCHOOL CONSTRUCTION AUTHORITY  
OFFICE OF GENERAL COUNSEL  
2011 FEB 23 PM 2:05  
MARTY MARKOWITZ  
Borough President

THE CITY OF NEW YORK  
BOROUGH OF BROOKLYN  
COMMUNITY BOARD #7

Randolph Peers  
Chairperson

Jeremy Laufer  
District Manager

February 18, 2011

Mr. Ross J. Holden  
New York City School Construction Authority  
30-30 Thomson Avenue  
Long Island City, New York 11101

Dear Mr. Holden:

Community Board 7/Brooklyn held a Public Hearing on February 9, 2011 regarding the potential construction of a 750-seat, kindergarten through 8<sup>th</sup> grade school, at 701-711 Caton Avenue, Brooklyn. Our Education Committee presented the following motion before our full Board on February 16:

*Whereas there is demographic need for new elementary and middle school seats in School District 15; and*

*Whereas School Construction Authority and the Department of Education have published their intention to build a 750-seat, kindergarten to 8<sup>th</sup> grade, Elementary/Intermediate School at 701-711 Caton Avenue, Brooklyn, and have the capital funding appropriated for the project; and*

*Whereas neighborhood residents are concerned about safety, traffic, and environmental hazards at the site selected by the School Construction Authority (SCA); and*

*Whereas the Stable Brooklyn Neighborhood Group worked very hard with Department of City Planning and others to create appropriate contextual zoning for the neighborhood; and*

*Whereas community groups and area nonprofits desire to participate in the planning of the new school; and*

*Whereas the community hopes the school will allow community use of the facility;*

*Therefore be it resolved that Community Board 7 supports the development of a 750-seat PS-IS at 701-711 Caton Avenue provided that SCA works with the community to address and resolve safety, traffic, and environmental issues on the site and around the property; that SCA works with the community to develop and build a state-of-the-art facility and outdoor space within*

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E-mail: Communityboard7@yahoo.com

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*the contextual zones of the properties, if possible; that the building achieve the highest energy efficiency and environmental standards.*

*And be it further resolved that community groups, neighborhood nonprofits and the community board participate in the SCA and DOE planning of the school.*

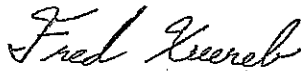
*And be it further resolved that the new school integrate with the neighborhood by allowing community use.*

The resolution carried by a vote of 32 – in favor, 1 – opposed, with 0 abstentions.

Our Board is very pleased that SCA and DOE are considering this site originally proposed by our Site Selection Committee. We look forward to continuing progress on this location and we ask that the Community Board's and the community's interests are taken into account when making decisions on this project. As such, we would be happy to meet with or facilitate meetings for SCA and DOE officials as well as the local community.

Thank you for your attention to this matter.

Sincerely,



Fred Xuereb  
Chair



Jeremy Laufer,  
District Manager

cc: Hon. Marty Markowitz, Borough President  
Hon. Brad Lander, Councilman  
Ms. Cathie Black, Department of Education, Chancellor



CITY PLANNING COMMISSION  
CITY OF NEW YORK  
OFFICE OF THE CHAIR

*Handed over  
to Jocal -  
please file with  
school #.*

NEW YORK CITY SCHOOL  
CONSTRUCTION AUTHORITY  
2011 MAR 10 PM 2: 15  
OFFICE OF GENERAL COUNSEL

March 7, 2011

Lorraine Grillo  
President and CEO  
New York City School Construction Authority  
30-30 Thomson Avenue  
Long Island City, NY 11101-3045

Dear Ms. Grillo,

This is in response to the SCA's letter of January 21, 2011 in which notice was given to the City Planning Commission of the proposed site selection of Block 5321 (Lots 44, 64, and 73) in the borough of Brooklyn (Community District 7) for the construction of an approximately 750-seat Primary/Intermediate school facility for Community School District 15.

In view of the need for additional primary/intermediate school capacity in this school district, the City Planning Commission recommends in favor of the proposed site for a new school facility for CSD 15.

Very sincerely,

Amanda M. Burden

C: Kathleen Grimm  
Ross Holden  
Sarah Goldwyn  
Purnima Kapur





January 21, 2011



Amanda M. Burden, FAICP  
Chairperson  
City Planning Commission  
22 Reade Street  
New York, New York 10007

**Re: New, Approximately 750-Seat Primary/Intermediate School, Brooklyn  
Community School District No. 15**

Dear Ms. Burden:

Pursuant to §1731 of the New York City School Construction Authority Act, notice is hereby given of the proposed site selection of Block 5321, Lots 44, 64 and 73, and any other property in the immediate vicinity which may be necessary for the proposed project, located in the Borough of Brooklyn, for the development of a new, approximately 750-seat primary/intermediate school facility in Community School District No. 15. The site is bounded by Kermit Place to the north, Caton Avenue to the south, East 8<sup>th</sup> Street to the east and East 7<sup>th</sup> Street to the west.

Attached please find copies of the Notice of Filing, Site Plan, and Alternate Sites Analyses for this proposed action. The Authority will accept public comments on this Site Plan until March 7, 2011. All comments will be taken into consideration in the Authority's final decision regarding this matter.

If you require any additional information, please do not hesitate to contact Ross J. Holden, Vice President and General Counsel, at (718) 472-8220.

Sincerely,

A handwritten signature in cursive script that reads 'Lorraine Grillo'. Below the signature, the name 'Lorraine Grillo' and the title 'President & CEO' are printed in a standard font.

Lorraine Grillo  
President & CEO

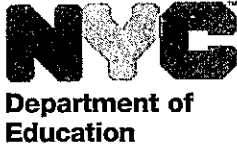
Attachments

c: Kathleen Grimm, Deputy Chancellor for Operations  
Sarah Whitham, NYC Department of City Planning





January 21, 2011



Mr. Randolph Peers  
Chairperson  
Brooklyn Community Board No. 7  
4201 4<sup>th</sup> Avenue  
Brooklyn, New York 11232

**Re: New, Approximately 750-Seat Primary/Intermediate School, Brooklyn  
Community School District No. 15**

Dear Mr. Peers:

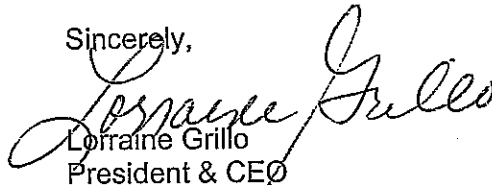
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Section 1731.2 states that within thirty (30) days of this notice, a public hearing with sufficient public notice shall be held by each affected community board on any or all aspects of the Site Plan. You may request the attendance of representatives of the Authority or Department of Education at this hearing.

In addition, §1731.3 states that within forty-five (45) days of this notice, each affected community board shall prepare and submit to the Authority written comments on the Site Plan. Attached please find copies of the Notice of Filing, Site Plan, and the Alternate Sites Analyses for this proposed action. The Authority will accept public comments on this proposed Site Plan until March 7, 2011. All comments will be taken into consideration in the Authority's final decision regarding this matter.

If you require any additional information, please contact Ross J. Holden, Vice President and General Counsel, at (718) 472-8220.

Sincerely,

  
Lorraine Grillo  
President & CEO

Attachments

c: Kathleen Grimm, Deputy Chancellor for Operations  
Jeremy Laufer, District Manager, Brooklyn Community District No. 7

## NOTICE OF FILING

### NEW YORK CITY SCHOOL CONSTRUCTION AUTHORITY

Pursuant to §1731 of the New York City School Construction Authority Act, notice has been filed for the proposed site selection of Block 5321, Lots 44, 64 and 73, and any other property in the immediate vicinity which may be necessary for the proposed project, located in the Borough of Brooklyn, for the development of a new, approximately 750-seat primary/intermediate school facility in Community School District No. 15.

The proposed site contains a total of approximately 39,000 square feet (0.9 acres) of lot area, and consists of three privately owned and vacant lots. It is bounded by Kermit Place to the north, Caton Avenue to the south, East 8<sup>th</sup> Street to the east and East 7<sup>th</sup> Street to the west. Under the proposed project, the New York City School Construction Authority would acquire all of the lots comprising the site and construct the proposed new public school facility.

Site plans and a summary thereof for the proposed action are available at:

New York City School Construction Authority  
30-30 Thomson Avenue  
Long Island City, New York 11101

Attention: Ross J. Holden

Comments on the proposed actions are to be sent to the New York City School Construction Authority at the above address and will be accepted until March 7, 2011.

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For publication in the New York Post and the City Record on Friday, January 21, 2011.

## ALTERNATE SITES ANALYSES

### CATON AVENUE BETWEEN EAST 7<sup>th</sup> AND EAST 8<sup>th</sup> STREETS

#### NEW, APPROXIMATELY 750-SEAT PRIMARY/INTERMEDIATE SCHOOL Block 5321, Lots 44, 64 and 73

#### School District 15, Brooklyn

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The following locations were also considered as potential sites for schools for School District 15:

1. **1908 8<sup>th</sup> Avenue, Block 888, Lot 7:** This approximately 22,300 square foot corner property is located on the northeast side of 8th Avenue, between 19<sup>th</sup> and 20<sup>th</sup> Streets. It is improved with a two-story warehouse building. The site was available for sale, but the building was not suitable for conversion to public school use and the property was insufficient in size to accommodate construction of a new school facility and adequate outdoor play area. Consequently, this site was dropped from consideration.
2. **4222 4<sup>th</sup> Avenue and 367 43<sup>rd</sup> Street, Block 723, Lot 25 (portion):** This property consists of two former parochial school buildings. We are currently in negotiations with the Diocese of Brooklyn to lease these buildings to accommodate public primary school use.
3. **822 4<sup>th</sup> Avenue and 149 29<sup>th</sup> Street, Block 664, Lots 37 and 42:** This approximately 21,000 square foot property is located at the corner of 4<sup>th</sup> Avenue and 29<sup>th</sup> Street. The property contains a car rental business and beverage distribution facility. The properties were available for sale. A preliminary review was conducted and it was determined that the property was insufficient in size to accommodate construction of a new school facility and adequate outdoor play area, and the adjoining Police Department parking lot presented safety concerns. Consequently, this site was dropped from consideration.
4. **364 43<sup>rd</sup> Street and 4302 4<sup>th</sup> Avenue, Block 728, Lots 34 and 36:** This property contains approximately 12,500 square feet and is located on the corner of 4<sup>th</sup> Avenue and 43<sup>rd</sup> Street. The site is privately-owned and contains a vacant landmarked former Police precinct building and a vacant lot. The feasibility of converting the former police building for public school use is under review, as well as potential school use of the property without the existing structure.



**STATE ENVIRONMENTAL QUALITY REVIEW  
NEGATIVE DECLARATION  
NOTICE OF DETERMINATION OF NON-SIGNIFICANCE**

**DATE:** October 27, 2011

**SEQR PROJECT NO.:** 12-006

**LEAD AGENCY:** New York City School Construction Authority  
30-30 Thomson Avenue  
Long Island City, New York 11101-3045

This notice is issued pursuant to Part 617 of the implementing regulations pertaining to Article 8 (State Environmental Quality Review Act) of the Environmental Conservation Law. Pursuant to §1730.2 of the Public Authorities Law, the New York City School Construction Authority (SCA) is SEQR Lead Agency.

The SCA, as Lead Agency, has determined that the proposed action described below will not have a significant effect on the quality of the environment, and a Draft Environmental Impact Statement (DEIS) will not be prepared.

**NAME OF ACTION:** P.S./I.S. 437, Brooklyn  
New, Approximately 757-Seat  
Primary and Intermediate School Facility

**LOCATION:** 701 Caton Avenue, Brooklyn, New York  
Tax Block 5321, Lots 44, 64, 73

**SEQR STATUS:** Unlisted

**NEGATIVE DECLARATION**

**Description of Action:**

On behalf of the New York City Department of Education (DOE), the SCA proposes the site selection, acquisition, acceptance of construction funding and construction of a new, approximately 757-seat primary and intermediate school facility in the Prospect Park South section of Brooklyn. The proposed school facility would serve students in grade levels pre-kindergarten through eight. Acquisition, design and construction of this proposed facility would be conducted pursuant to DOE's Five-Year Capital Plan for Fiscal Years 2010-2014.



P.S./I.S. 437, Brooklyn  
SEQR Project No. 12-006  
Negative Declaration  
October 27, 2011



The proposed school site is located on the block bounded by Kermit Place, Caton Avenue, East 8<sup>th</sup> Street, and East 7<sup>th</sup> Street. The irregularly shaped project site has 287 feet of frontage on Caton Avenue, 234 feet on East 7<sup>th</sup> Street, 101 feet on East 8<sup>th</sup> Street, and 27 feet on Kermit Place. The portions of the site without street frontage adjoin the rear yards of existing residential buildings that front Kermit Place and East 8<sup>th</sup> Street.

Construction of the proposed new school facility would require the acquisition of three privately-owned vacant lots (Lots 44, 64, and 73) on Block 5321. The assemblage contains a total of approximately 37,065 square feet.

The purpose of the proposed project is to provide additional long-term capacity in the area to meet needs identified in DOE's Five-Year Capital Plan. According to the Capital Plan, a total of 2,233 additional seats at the primary and intermediate school levels are required for Community School District No. 15 in order to address existing localized overcrowding and forecast changes in student enrollments, and also to support DOE's policies to implement class-size reduction. During the 2009-2010 school year, Community School District No. 15's existing primary and intermediate school facilities collectively operated at 93 percent of their target capacity.

Under the proposed project, the SCA would acquire the site assemblage and construct a new five-story (plus cellar) primary and intermediate school facility on the site. The proposed new facility would contain approximately 106,175 gross square feet. Three playgrounds would be provided on site including a 4,300 square foot playground on the northern portion of the site, a 7,600 square foot general playground on the southeastern portion of the site, and a 4,275 square foot Early Childhood playground for younger children on the southwestern portion of the site. The new building's main entrance would be located on Caton Avenue, and it would contain general education classrooms, special education classrooms, a gymnasium (gymnasium/auditorium), a kitchen and student dining area, a staff lunch room, a gymnasium, a library, music and art rooms, science rooms, reading and speech resource rooms, medical office space, administrative office space, and storage. Construction is anticipated to begin in 2012, with student occupancy of the new facility scheduled to begin in 2015.

#### **Reasons Supporting This Determination:**

A comprehensive Environmental Assessment Form (EAF) and Supplemental Environmental Studies for this action were completed and issued on October 27, 2011. Based upon those documents (which are appended hereto), the SCA has determined that the proposed project will have no significant adverse impacts on environmental conditions related to the following areas: land use, zoning and public policy; socioeconomic conditions; community facilities; open space and



P.S./I.S. 437, Brooklyn  
SEQR Project No. 12-006  
Negative Declaration  
October 27, 2011



recreational facilities; shadows; cultural resources; urban design and visual resources; neighborhood character; natural resources; soil and groundwater conditions; infrastructure; solid waste and sanitation; energy; traffic and transportation; pedestrians and parking; air quality; noise; and, construction-related impacts.

The key findings related to the analyses of the following three environmental impact areas are discussed in greater detail below.

### ***Soil and Groundwater Conditions***

As part of the evaluation of the site's soil and groundwater conditions, Phase I Environmental Site Assessments (ESAs) and Phase II Environmental Site Investigations (ESIs) were completed for the project site in 2008 and 2011 to evaluate the environmental conditions of the proposed project site. A Phase I ESA was conducted for Lot 64 in March 2008, a Phase II ESI was performed in April 2008, and a Supplemental Phase II ESI was completed in June 2008. In February 2011, an additional Phase I ESA was completed for Lots 44 and 73. A Phase II ESI was subsequently completed for those two lots in April 2011.

The Phase I ESA identified recognized environmental conditions (RECs) related to the historic use of the southern portion of the site as a metal manufacturing facility from at least 1905 through 1997; the potential presence of buried structures from the prior demolition of on-site dwellings on the northern portion of the site; potential for buried fuel tanks and/or prior fuel releases on site; an off-site spill incident at a nearby and crossgradient property; and long-term use of the surrounding properties as gasoline filling stations with reported releases, auto repair facilities, and a dry cleaning facility. Environmental concerns were identified with respect to the potential presence of suspect asbestos-containing materials (ACM), lead-based paint (LBP), and polychlorinated biphenyls (PCBs) in potential buried structures on site. Based on the results of the Phase I ESAs, Phase II ESI activities were completed on the site, which included a geophysical survey, advancement of soil borings and the collection of soil, soil vapor and ambient air, and groundwater samples for laboratory analyses.

The geophysical investigations identified minor scattered anomalies and remnants of former building foundations; however, no evidence of underground storage tanks was identified. The results of the soil vapor survey indicate the presence of elevated concentrations of chlorinated volatile organic compounds (VOCs) and petroleum-related VOCs above applicable New York State Department of Health (NYSDOH) background indoor air ranges. In addition, tetrachloroethene (PCE) and trichloroethene (TCE) were detected at concentrations greater than the NYSDOH Air Guidance Values (AGVs) of 100 ug/m<sup>3</sup> and 5.0 ug/m<sup>3</sup>, respectively.



P.S./I.S. 437, Brooklyn  
SEQR Project No. 12-006  
Negative Declaration  
October 27, 2011



Subsurface soils contain elevated concentrations of semi-volatile organic compounds (SVOCs), pesticides, polychlorinated biphenyls (PCBs), and metals. Fill materials characteristic of a hazardous waste for lead were also identified. These constituents are attributed to historic manufacturing operations conducted in the southern portion of the site from approximately 1905 through 1997, as well as to fill material.

The results of groundwater sampling indicate the presence of elevated concentrations of TCE, PCE, 1,1,1-trichloroethane, 1,1-dichloroethane, and chloroform. While the concentrations of VOCs in groundwater exceed NYSDEC standards, they are attributed to the historic use of VOCs on the southern portion of the site over the 90-year history of manufacturing, and possibly off-site sources since TCE and chloroform were detected in the most upgradient on-site well.

For the site to be suitable for construction of a public school, excavation and proper disposal of contaminated soils would be completed and a vapor barrier and sub-slab depressurization system would be included in the new school's design and construction to prevent potential migration of organic vapors into the proposed school building. During construction, the contractor would characterize soil anticipated for excavation to identify material handling, and/or waste disposal requirements and properly manage excavated soil in accordance with all applicable local, state, and federal regulations. Any ACM, LBP, and/or PCB-containing materials contained in potential buried structures would be identified and properly managed during such activities. For areas of the site where exposed soils may exist (i.e., landscaped areas), a twenty-four (24) inch thick layer of environmentally clean fill would be placed over the soils. All on-site groundwater monitoring wells and the inactive historic water supply well would be abandoned in accordance with State regulations. In addition, to minimize the potential for construction workers' exposure, standard industry practices, including appropriate health and safety measures, would be utilized. Since all of these measures would be implemented as part of the proposed project, no adverse impacts due to the identified soil and groundwater conditions would occur.

#### ***Traffic and Transportation, Pedestrians, and Parking***

The analysis of future conditions with the project in place required the determination of the number of trips by travel mode expected to be generated by the proposed school, the assignment of these vehicle trips to the street network approaching the site, and the determination of projected levels of service at the critical locations analyzed. Technical analysis performed for the signalized intersections in the study area revealed that significant impacts related to traffic would occur at the intersection of Caton Avenue and Coney Island Avenue as a result of the assignment of school-generated vehicle trips through the study area.



P.S./I.S. 437, Brooklyn  
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Negative Declaration  
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Traffic improvements at this intersection could be achieved through signal timing shifts during the AM and PM peak hours. With these improvements in place, the LOS of this intersection would be restored to the No Build condition and thus the project-generated traffic impact would be avoided.

Based on the project trip generation, parking demands within walking distance of the proposed school would increase by 32 staff vehicles during the week. This increase in parking demand could result in a parking shortfall when the most restrictions on curbside parking are in effect. This shortfall could be avoided by altering the parking restrictions along five block faces in the quarter-mile radius parking study area from Tuesday, when the shortfall is projected to occur, to Thursday, when few regulations are in effect, and therefore, a high supply of curbside spaces. The following block faces are proposed for this modification in curbside parking regulations: on the south side of Fort Hamilton Parkway between East 3<sup>rd</sup> Street and East 5<sup>th</sup> Street, change the parking restriction from Tuesday, 9:30-11 AM to Thursday, 11:30 AM-1 PM; and on the north side of Caton Avenue between East 3<sup>rd</sup> Street and Ocean Parkway, change the parking restriction from Tuesday, 11:30 AM-1 PM to Thursday, 11:30 AM-1 PM. The parking shortfall during regulation periods within the quarter-mile radius parking study area would be eliminated should these restrictions be altered as proposed. Implementing these new parking regulations would "recover" 34 curb parking spaces on the most restricted parking day. A comparison of the No Build on-street parking supply and demand versus Build demand with the proposed parking restrictions shows that the parking shortfall resulting from the project would be fully addressed.

### **Noise**

A comprehensive analysis was completed to assess the potential for the proposed new school facility to result in noise impacts attributable either to additional vehicular traffic generated by the school or to the three on-site playgrounds. That analysis determined that two of the three proposed playgrounds to be developed on the school site could result in a noticeable increase in future noise levels (i.e., increase in noise levels greater than five dBA) during the midday time period at two residential buildings that immediately adjoin the school site. The two affected residential buildings are: the private residence at 46 Kermit Place, between East 7<sup>th</sup> Street and East 8<sup>th</sup> Street, which would have a direct line of sight to the new playground on the northern portion of the site, and the apartment building at 70 East 8<sup>th</sup> Street, between Kermit Place and Caton Avenue, which would have a direct line of sight to the new general playground on the southeastern portion of the site.

To avoid significant playground noise impacts to the adjoining residences, the SCA would make available to the owners of 46 Kermit Place, eight storm or sound-attenuating windows and alternative ventilation for the two floors of





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 Negative Declaration  
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windows on the west face of the building, and to the owners of the apartment building at 70 East 8<sup>th</sup> Street, 30 storm or sound-attenuating windows and alternative ventilation for the bottom three floors of windows on the south face of the six-story apartment building. Since these measures would be implemented as part of the proposed project, no significant adverse playground noise impacts would occur.

The maximum L10 noise exposure experienced by the proposed school would be 70.7 dBA. This noise level includes the effect of traffic noise from local streets. To reduce the exterior noise exposure level to the required interior noise level of 45 dBA or below, attenuation measures (e.g., double glazed windows) would be incorporated into the new school building's design and construction. Standard double-glazed windows are available which would result in the required attenuation value of 26 dBA. As a result, the proposed school would not experience any noise exposure impacts.

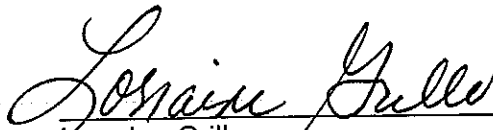
The proposed project would have the beneficial impact of providing approximately 757 additional seats of permanent public school capacity at the primary and intermediate levels for Community School District No. 15.

For further information contact:

Contact: Ross J. Holden  
 Executive Vice President and General Counsel

Address: New York City School Construction Authority  
 30-30 Thomson Avenue  
 Long Island City, New York 11101-3045

Telephone: (718) 472-8220

  
 \_\_\_\_\_  
 Lorraine Grillo  
 President and CEO

10/27/11  
 \_\_\_\_\_  
 Date

ENVIRONMENTAL  
ASSESSMENT FORM (EAF)  
&  
SUPPLEMENTAL  
ENVIRONMENTAL STUDIES

*for the*

**Proposed PS/IS 437**

Caton Avenue  
Brooklyn, New York

October 27, 2011

*Prepared on behalf of and for Lead Agency:*  
New York City School Construction Authority  
30-30 Thomson Avenue  
Long Island City, NY 11101

*Prepared by:*  
STV Incorporated  
225 Park Avenue South  
New York, NY 10003

*Lead Agency Contact:*  
Kenrick Ou  
Director, Real Estate Services  
New York City School Construction Authority  
30-30 Thomson Avenue  
Long Island City, NY 11101

Telephone: (718) 472-8000

617.20  
Appendix A  
State Environmental Quality Review  
**FULL ENVIRONMENTAL ASSESSMENT FORM**

**Purpose:** The full EAF is designed to help applicants and agencies determine, in an orderly manner, whether a project or action may be significant. The question of whether an action may be significant is not always easy to answer. Frequently, there are aspects of a project that are subjective or unmeasurable. It is also understood that those who determine significance may have little or no formal knowledge of the environment or may not be technically expert in environmental analysis. In addition, many who have knowledge in one particular area may not be aware of the broader concerns affecting the question of significance.

The full EAF is intended to prove a method whereby applicants and agencies can be assured that the determination process has been orderly, comprehensive in nature, yet flexible to allow introduction of information to fit a project or action.

**Full EAF Components:** The full EAF is comprised of three parts:

- Part 1:** Provides objective data and information about a given project and its site. By identifying basic project data, it assists a reviewer in the analysis that takes place in Parts 2 and 3.
- Part 2:** Focuses on identifying the range of possible impacts that may occur from a project or action. It provides guidance as to whether an impact is likely to be considered small to moderate or whether it is a potentially large impact. The form also identifies whether an impact can be mitigated or reduced.
- Part 3:** If any impact in Part 2 is identified as potentially large, then Part 3 is used to evaluate whether or not the impact is actually important.

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**THIS AREA FOR LEAD AGENCY USE ONLY**  
**DETERMINATION OF SIGNIFICANCE – Type 1 and Unlisted Actions**

**Identify the Portions of EAF completed for this project:**  Part 1                       Part 2                       Part 3

Upon review of the information recorded in this EAF (Parts 1 and 2 and 3, if appropriate), and any other supporting information, and considering both the magnitude and importance of each impact, it is reasonably determined by the lead agency that:

- A. The project will not result in any large and important impact(s) and, therefore, is one which **will not** have a significant impact on the environment, therefore a **negative declaration will be prepared.**
- B. Although the project could have a significant effect on the environment, there will not be a significant effect for this Unlisted Action because the mitigation measures described in PART 3 have been required, therefore a **CONDITIONED negative declaration will be prepared. \***
- C. The project may result in one or more large and important impacts that may have a significant impact on the environment, therefore a **positive declaration will be prepared.**

\* A Conditioned Negative Declaration is only valid for Unlisted Actions

Proposed PS/IS 437, Brooklyn

Name of Action

New York City School Construction Authority

Name of Lead Agency

Kenrick Ou

Print or Type Name of Responsible Officer in Lead Agency

Director, Real Estate Services

Title of Responsible Officer

Signature of Responsible Officer in Lead Agency

Signature of Preparer (if different from responsible officer)

10/27/11

Date

**PART 1 – PROJECT INFORMATION**  
**Prepared by Project Sponsor**

NOTICE: This document is designed to assist in determining whether the action proposed may have a significant effect on the environment. Please complete the entire form, Parts A through E. Answers to these questions will be considered as part of the application for approval and may be subject to further verification and public review. Provide any additional information you believe will be needed to complete Parts 2 and 3.

It is expected that completion of the full EAF will be dependent on information currently available and will not involve new studies, research or investigation. If information requiring such additional work is unavailable, so indicate and specify each instance.

Proposed PS/IS 437, Brooklyn

NAME OF ACTION

Caton Avenue, Brooklyn, New York, 11218 (Kings County)

LOCATION OF ACTION (Include Street Address, Municipality and County)

New York City School Construction Authority

NAME OF APPLICANT / SPONSOR

30-30 Thomson Avenue

ADDRESS

Long Island City

CITY / PO

New York

STATE

11101-3045

ZIP CODE

(718) 472-8000

BUSINESS TELEPHONE

Block 5321, Lot 44 - Kermit 7 Realty, LLC, 42 Kermit Place, Brooklyn, New York 11218

Block 5321, Lot 64 - 701 Caton Ave. Realty, LLC, 701 Caton Avenue, Brooklyn, New York 11218

Block 5321, Lot 73 - Kermit 7 Realty, LLC, 161 East 7<sup>th</sup> Street, Brooklyn, New York 11218

NAME OF OWNER (If different)

ADDRESS

CITY / PO

STATE

ZIP CODE

BUSINESS TELEPHONE

DESCRIPTION OF ACTION

On behalf of the New York City Department of Education (DOE), the New York City School Construction Authority (SCA) proposes to construct a new approximately 757-seat primary and intermediate school facility, to be known as PS/IS 437, on Caton Avenue in the Prospect Park South section of Brooklyn. Construction of the new PS/IS 437 has been proposed by DOE to provide additional public school capacity for Community School District No. 15.

Under the proposed action, SCA would acquire three vacant lots (Lots 44, 64, and 73) on Block 5321 to assemble an approximately 37,065-square-foot (sf) site. According to the current design scheme, the proposed new school facility would be a five-story building, plus cellar, and would contain approximately 106,175 gross square feet. Three playgrounds would be developed on the site including a 4,300 sf playground on the northern portion of the project site, a 7,600 sf general playground on the southeastern portion of the project site, and a 4,275 sf Early Childhood playground on the southwestern portion of the project site. The main entrance to the new school would be located on Caton Avenue. The new PS/IS 437 would provide approximately 757 seats for grade levels pre-kindergarten through eight, and would include classrooms, a gymnasium (gymnasium/auditorium), a kitchen and student dining area, a staff lunch room, a gymnasium, a library, music and art rooms, science rooms, reading and speech resource rooms,

medical office space, administrative office space, and storage. It is estimated that approximately 76 teachers and staff would work at the new school facility. PS/IS 437 is expected to open September 2015.

**Please Complete Each Question -- Indicate N.A. if not applicable**

**A. Site Description**

Physical setting of overall project, both developed and underdeveloped areas.

1. Present Land Use:  Urban     Industrial     Commercial     Residential     Rural (non-farm)  
 Forest     Agriculture     Other Institutional, Mixed-Use, Vacant Lots

2. Total acreage of project area: 0.85 acres.

| APPROXIMATE ACREAGE   | PRESENTLY         | AFTER COMPLETION  |
|---|-------------------|-------------------|
| Meadow or Brushland (Non-agricultural)                      | <u>0</u> acres    | <u>0</u> acres    |
| Forested  | <u>0</u> acres    | <u>0</u> acres    |
| Agricultural (Includes orchards, cropland, pasture, etc.)   | <u>0</u> acres    | <u>0</u> acres    |
| Wetland (Freshwater or tidal as per Articles 24, 25 of ECL) | <u>0</u> acres    | <u>0</u> acres    |
| Water Surface Area  | <u>0</u> acres    | <u>0</u> acres    |
| Unvegetated (Rock, earth or fill)                           | <u>0.10</u> acres | <u>0</u> acres    |
| Roads, buildings and other paved surfaces                   | <u>0.10</u> acres | <u>0.85</u> acres |
| Other (Indicate type) <u>overgrown lot</u>                  | <u>0.65</u> acres | <u>0</u> acres    |

3. What is predominant soil type(s) on project site? Urban Land
- a. Soil Drainage:  Well drained 100 % of site     Moderately well drained \_\_\_ % of site  
 Poorly drained \_\_\_ % of site
- b. If any agricultural land is involved, how many acres of soil are classified within soil groups 1 through 4 of the NYS Land Classification System? N/A acres (See 1 NYCRR 370).
4. Are there bedrock outcroppings on project site?     Yes     No
- a. What is depth to bedrock? greater than 50 (maximum boring depth) (in feet)
5. Approximate percentage of proposed project site with slopes:  0-10% 100 %     10-15% \_\_\_ %     15% or greater \_\_\_ %
6. Is project substantially contiguous to, or contain a building, site, or district, listed on the State or National Registers of Historic Places?     Yes     No
7. Is project substantially contiguous to a site listed on the Register of National Natural Landmarks?     Yes     No
8. What is the depth of the water table? approx. 38-43 below grade surface (in feet)
9. Is site located over a primary, principal, or sole source of aquifer?     Yes     No All of Brooklyn is located over an aquifer identified by USEPA as a sole source aquifer: it is not used for drinking purposes within the City of New York.
10. Do hunting, fishing or shell fishing opportunities presently exist in the project area?     Yes     No
11. Does project site contain any species of plant or animal life that is identified as threatened or endangered?     Yes     No  
 According to: \_\_\_\_\_

Identify each species:

\_\_\_\_\_

12. Are there any unique or unusual land forms on the project site? (i.e., cliffs, dunes, other geological formations)?  
 Yes  No Describe: \_\_\_\_\_
13. Is the project site presently used by the community or neighborhood as an open space or recreation area?  
 Yes  No If yes, explain: \_\_\_\_\_
14. Does the present site include scenic views known to be important to the community?  Yes  No
15. Streams within or contiguous to project area: N/A  
 a. Name of Stream and name of River to which it is tributary: \_\_\_\_\_
16. Lakes, ponds, wetland areas within or contiguous to project area: N/A  
 a. Name \_\_\_\_\_ b. Size (in acres) \_\_\_\_\_
17. Is the site served by existing public utilities?  Yes  No  
 a. If Yes, does sufficient capacity exist to allow connection?  Yes  No  
 b. If Yes, will improvements be necessary to allow connection?  Yes  No
18. Is the site located in an agricultural district certified pursuant to Agriculture and Markets Law, Article 25-AA, Section 303 and 304?  Yes  No
19. Is the site located in or substantially contiguous to a Critical Environmental Area designated pursuant to Article 8 of the ECL, and 6 NYCRR 617?  Yes  No
20. Has the site ever been used for the disposal of solid or hazardous wastes?  Yes  No

**B. Project Description**

1. Physical dimensions and scale of project (fill in dimensions as appropriate).  
 a. Total contiguous acreage owned or controlled by project sponsor: 0 acres.  
 b. Project acreage to be developed: 0.85 acres initially; 0.85 acres ultimately.  
 c. Project acreage to remain undeveloped: 0 acres.  
 d. Length of project, in miles: N/A (if appropriate)  
 e. If the project is an expansion, indicate percent of expansion proposed: N/A %  
 f. Number of off-street parking spaces existing 0 proposed 0  
 g. Maximum vehicular trips generated per hour: AM peak hour- 184; PM peak hour- 159 (upon completion of project)  
 h. If residential: Number and type of housing units: N/A

|                   | <i>One Family</i> | <i>Two Family</i> | <i>Multiple Family</i> | <i>Condominium</i> |
|-------------------|-------------------|-------------------|------------------------|--------------------|
| <i>Initially</i>  |                   |                   |                        |                    |
| <i>Ultimately</i> |                   |                   |                        |                    |

- i. Dimension (in feet) of largest proposed structure: approx. 76' height; approx. 215' width; approx. 144' length.  
 j. Linear feet of frontage along a public thoroughfare project will occupy is? approx. 287' along Caton Avenue and 234' along East 7<sup>th</sup> Street
2. How much natural material (i.e., rock, earth, etc.) will be removed from the site? TBD tons/cubic yards

3. Will disturbed areas be reclaimed?  Yes  No  N/A  
 a. If yes, for what intended purposes is the site being reclaimed? \_\_\_\_\_  
 b. Will topsoil be stockpiled for reclamation?  Yes  No  
 c. Will upper subsoil be stockpiled for reclamation?  Yes  No
4. How many acres of vegetation (trees, shrubs, and ground covers) will be removed from site? 0.65 acres
5. Will any mature forest (over 100 years old) or other locally important vegetation be removed by this project?  
 Yes  No
6. If single phase project: Anticipated period of construction: 30 months, (including demolition)
7. If multi-phased: N/A  
 a. Total number of phases anticipated: \_\_\_\_ (number)  
 b. Anticipated date of commencement phase 1: \_\_\_\_ month \_\_\_\_ year, (including demolition)  
 c. Approximate completion date of final phase: \_\_\_\_ month \_\_\_\_ year  
 d. Is phase 1 functionally dependent on subsequent phases?  Yes  No
8. Will blasting occur during construction?  Yes  No
9. Number of jobs generated: during construction +/- 50; after project is complete +/- 76 faculty and staff.
10. Number of jobs eliminated by this project 0.
11. Will project require relocation of any project or facilities?  Yes  No  
 If yes, explain: \_\_\_\_\_
12. Is surface liquid waste disposal involved?  Yes  No  
 a. If yes, indicate type of waste (sewage, industrial, etc.) and amount \_\_\_\_\_  
 b. Name of water body into which effluent will be discharged \_\_\_\_\_
13. Is subsurface liquid waste disposal involved?  Yes  No Type \_\_\_\_\_
14. Will surface area of an existing water body increase or decrease by proposal?  Yes  No  
 If yes, explain: \_\_\_\_\_
15. Is project or any portion of project located in a 100-year flood plain?  Yes  No
16. Will the project generate solid waste?  Yes  No  
 a. If yes, what is the amount per month? 15,765 pounds  
 b. If yes, will an existing solid waste facility be used?  Yes  No  
 c. If yes, give name DSNY; location All waste is collected and sent to designated disposal facilities.  
 d. Will any wastes not go into a sewage disposal system or into a sanitary landfill?  Yes  No  
 e. If yes, explain: \_\_\_\_\_



17. Will the project involve the disposal of solid waste?  Yes  No  
 a. If yes, what is the anticipated rate of disposal? \_\_\_\_\_ tons/months.  
 b. If yes, what is the anticipated site life? \_\_\_\_\_ years.
18. Will project use herbicides or pesticides?  Yes  No
19. Will project routinely produce odors (more than one hour per day)?  Yes  No
20. Will project produce operating noise exceeding the local ambient noise levels?  Yes  No
21. Will project result in an increase in energy use?  Yes  No  
 If yes, indicate type(s) Mechanical systems, elevator, heating fuel (oil and gas) and electricity.
22. If water supply is from wells, indicate pumping capacity: N/A gallons/minutes.
23. Total anticipated water usage per day 26,380 gallons/day.
24. Does project involve Local, State or Federal Funding?  Yes  No  
 If yes, explain: Funding to construct the proposed school facility is provided by the DOE's Five-Year Capital Plan for Fiscal Years 2010-2014. The school's operations would be funded by DOE's operating funds.

25. Approvals Required:

|                                    | <input type="checkbox"/> Yes | <input checked="" type="checkbox"/> No | Type  | Submittal Date |
|------------------------------------|------------------------------|--|-------|----------------|
| City, Town, Village Board          | <input type="checkbox"/> Yes | <input checked="" type="checkbox"/> No | _____ | _____          |
| City, Town, Village Planning Board | <input type="checkbox"/> Yes | <input checked="" type="checkbox"/> No | _____ | _____          |
| City, Town Zoning Board            | <input type="checkbox"/> Yes | <input checked="" type="checkbox"/> No | _____ | _____          |
| City, County Health Department     | <input type="checkbox"/> Yes | <input checked="" type="checkbox"/> No | _____ | _____          |
| Other Local Agencies               | <input type="checkbox"/> Yes | <input checked="" type="checkbox"/> No | _____ | _____          |
| Other Regional Agencies            | <input type="checkbox"/> Yes | <input checked="" type="checkbox"/> No | _____ | _____          |
| State Agencies                     | <input type="checkbox"/> Yes | <input checked="" type="checkbox"/> No | _____ | _____          |
| Federal Agencies                   | <input type="checkbox"/> Yes | <input checked="" type="checkbox"/> No | _____ | _____          |

C. Zoning and Planning Information

1. Does proposed action involve a planning or zoning decision?  Yes  No  
 If yes, indicate decision required:  
 Zoning Amendment     Zoning Variance     New/revision of master plan     Subdivision  
 Site plan     Special use permit     Resource management plan     Other  
*Zoning overrides required from Deputy Mayor for Economic Development*
2. What is the zoning classification(s) of the site? R5B (Residential), R6A (Residential), Special Ocean Parkway District

3. What is the maximum potential development of the site if developed as permitted by the present zoning?  
Lots 44 and 73 (zoned R5B): 7,855 sf X 1.35 FAR (community facility) = 10,604 zsf  
Lot 64 (zoned R6A): 29,210 sf X 3.0 FAR (community facility) = 87,630 zsf
4. What is the proposed zoning of the site? No change in zoning is proposed.
5. What is the maximum potential development of the site if developed as permitted by the proposed zoning? N/A
6. Is the proposed action consistent with the recommended uses in adopted local land use plans?  
 Yes    No
7. What are the predominant land use(s) and zoning classifications within a 1/4-mile radius of proposed action?  
Zoning: Lower-Density and Medium-Density Residential (R1-2, R5, R5B, R6, R6A, R6B, R7A, and R8B) and Commercial (C8-2 and Commercial Overlays C1-3 and C2-4); Special Ocean Parkway District (OP).  
Land Uses: residential, commercial, mixed-use, institutional, and parkland/open space.
8. Is the proposed action compatible with adjoining/surrounding land uses within a 1/4-mile?    Yes    No
9. If the proposed action is the subdivision of land, how many lots are proposed? N/A  
a. What is the minimum lot size proposed? \_\_\_\_\_
10. Will proposed action require any authorization(s) for the formation of sewer or water districts?    Yes    No
11. Will the proposed action create a demand for any community provided services (recreation, education, police, and fire protection)?    Yes    No  
a. If yes, is existing capacity sufficient to handle the projected demand?    Yes    No  
\_\_\_\_\_
12. Will the proposed action result in the generation of traffic significantly above present levels?    Yes    No  
a. If yes, is the existing road network adequate to handle the additional traffic.    Yes    No  
\_\_\_\_\_

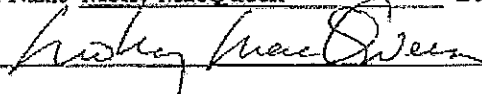
**D. Informational Details**

Attach any additional information as may be needed to clarify your project. If there are or may be any adverse impacts associated with your proposal, please discuss such impacts and the measures which you propose to mitigate or avoid them.

**E. Verification**

I certify that the information provided above is true to the best of my knowledge.

Applicant/Sponsor Name Molly MacQueen Date 10/27/11

Signature 

Title Vice President, STV Incorporated

If the action is in the Coastal Area, and you are a state agency, complete the Coastal Assessment Form before proceeding with this assessment.

**Part 2 – PROJECT IMPACTS AND THEIR MAGNITUDE**  
**Responsibility of Lead Agency**

**General Information** (Read carefully)

- In completing the form the reviewer should be guided by the question: Have my responses and determinations been **reasonable**? The reviewer is not expected to be an expert environmental analyst.
- The **Examples** provided are to assist the reviewer by showing types of impacts and wherever possible the threshold of magnitude that would trigger a response in column 2. The examples are generally applicable throughout the State and for most situations. But, for any specific project or site other examples and/or lower thresholds may be appropriate for a Potential Large Impact response, thus requiring evaluation in Part 3.
- The impacts of each project, on each site, in each locality, will vary. Therefore, the examples are illustrative and have been offered as guidance. They do not constitute an exhaustive list of impacts and thresholds to answer each question.
- The number of examples per question does not indicate the importance of each question.
- In identifying impacts, consider long term, short term and cumulative effects.

**Instructions** (Read carefully)

- a. Answer each of the 20 questions in PART 2. Answer **Yes** if there will be **any** impact.
- b. **Maybe** answers should be considered as **Yes** answers.
- c. If answering **Yes** to a question then check the appropriate box (column 1 or 2) to indicate the potential size of the impact. If impact threshold equals or exceeds any example provided, check column 2. If impact will occur but threshold is lower than example, check column 1.
- d. Identifying that an Impact will be potentially large (column 2) does not mean that it is also necessarily **significant**. Any large impact must be evaluated in PART 3 to determine significance. Identifying an impact in column 2 simply asks that it be looked at further.
- e. If reviewer has doubt about size of the impact then consider the impact as potentially large and proceed to PART 3.
- f. If a potentially large impact checked in column 2 can be mitigated by change(s) in the project to a small to moderate impact, also check the **Yes** box in column 3. A **No** response indicates that such a reduction is not possible. This must be explained in Part 3.

**IMPACT ON LAND**

1. Will the Proposed Action result in a physical change to the project site?

No     Yes

Examples that would apply to column 2

- Any construction on slopes of 15% or greater, (15 foot rise per 100 foot of length), or where the general slopes in the project area exceed 10%.
- Construction on land where the depth to the water table is less than 3 feet.
- Construction of paved parking area for 1,000 or more vehicles.
- Construction on land where bedrock is exposed or generally within 3 feet of existing ground surface.
- Construction that will continue for more than 1 year or involve more than one phase or stage.
- Excavation for mining purposes that would remove more than 1,000 tons of natural material (i.e., rock or soil) per year.

| 1<br>Small to<br>Moderate<br>Impact | 2<br>Potential<br>Large<br>Impact | 3<br>Can Impact be<br>Mitigated by<br>Project Change     |
|-------------------------------------|-----------------------------------|--|
| <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| <input checked="" type="checkbox"/> | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |

- Construction or expansion of a sanitary landfill.
- Construction in a designated floodway.
- Other impacts: \_\_\_\_\_

2. Will there be an effect to any unique or unusual land forms found on the site (i.e., cliffs, dunes, geological formations, etc.)  No  Yes
- Specific land forms: \_\_\_\_\_

**IMPACT ON WATER**

3. Will Proposed Action affect any water body designated as protected? (Under Articles 15, 24, 25 of the Environmental Conservation Law, ECL)  No  Yes

**Examples** that would apply to column 2

- Developable area of site contains a protected water body.
- Dredging more than 100 cubic yards of material from channel of a protected stream.
- Extension of utility distribution facilities through a protected water body.
- Construction in a designated freshwater or tidal wetland.
- Other impacts: \_\_\_\_\_

4. Will proposed action affect any non-protected existing or new body of water?  No  Yes

**Examples** that would apply to column 2

- A 10% increase or decrease in the surface area of any body of water or more than a 10-acre increase or decrease.
- Construction of a body of water that exceeds 10 acres of surface area.
- Other impacts: \_\_\_\_\_

5. Will proposed Action affect surface or groundwater quality or quantity?  No  Yes

**Examples** that would apply to column 2

- Proposed Action will require a discharge permit.
- Proposed Action requires use of a source of water that does not have approval to serve proposed (project) action.
- Proposed Action requires water supply from wells with greater than 45 gallons per minute pumping capacity.

| 1<br>Small to<br>Moderate<br>Impact | 2<br>Potential<br>Large<br>Impact | 3<br>Can Impact be<br>Mitigated by<br>Project Change     |
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| <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
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- Construction or operation causing any contamination of a water supply system.
- Proposed Action will adversely affect groundwater.
- Liquid effluent will be conveyed off the site to facilities which presently do not exist or have inadequate capacity.
- Proposed Action would use water in excess of 20,000 gallons per day. Proposed school building would have an estimated water usage of 8,330 gallons per day (gpd); however, it would consume an additional 18,050 gpd for air conditioning for a total of 26,380 gpd during the cooling season.
- Proposed Action will likely cause siltation or other discharge into an existing body of water to the extent that there will be an obvious visual contrast to natural conditions.
- Proposed action will require the storage of petroleum or chemical products greater than 1,100 gallons.
- Proposed Action will allow residential uses in areas without water and/or sewer services.
- Proposed Action locates commercial and/or industrial uses which may require new or expansion of existing waste treatment and/or storage facilities.
- Other impacts: \_\_\_\_\_

6. Will Proposed Action alter drainage flow or patterns, or surface water runoff?

No  Yes

**Examples** that would apply to column 2

- Proposed Action would change flood water flows.
- Proposed Action may cause substantial erosion.
- Proposed Action is incompatible with existing drainage patterns.
- Proposed Action will allow development in a designated floodway.
- Other impacts: \_\_\_\_\_

***IMPACT ON AIR***

7. Will proposed action affect air quality?

No  Yes

**Examples** that would apply to column 2

- Proposed Action will include 1,000 or more vehicle trips in any given hour.
- Proposed Action will result in the incineration of more than 1 ton of refuse per hour.

|   | 1<br>Small to<br>Moderate<br>Impact | 2<br>Potential<br>Large<br>Impact | 3<br>Can Impact be<br>Mitigated by<br>Project Change     |
|---|-------------------------------------|-----------------------------------|--|
| • Construction or operation causing any contamination of a water supply system.   | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Proposed Action will adversely affect groundwater.  | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Liquid effluent will be conveyed off the site to facilities which presently do not exist or have inadequate capacity.   | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Proposed Action would use water in excess of 20,000 gallons per day. <u>Proposed school building would have an estimated water usage of 8,330 gallons per day (gpd); however, it would consume an additional 18,050 gpd for air conditioning for a total of 26,380 gpd during the cooling season.</u> | <input checked="" type="checkbox"/> | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Proposed Action will likely cause siltation or other discharge into an existing body of water to the extent that there will be an obvious visual contrast to natural conditions.  | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Proposed action will require the storage of petroleum or chemical products greater than 1,100 gallons.  | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Proposed Action will allow residential uses in areas without water and/or sewer services.   | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Proposed Action locates commercial and/or industrial uses which may require new or expansion of existing waste treatment and/or storage facilities.   | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Other impacts: _____  | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| 6. Will Proposed Action alter drainage flow or patterns, or surface water runoff?<br><input checked="" type="checkbox"/> No <input type="checkbox"/> Yes  |                                     |                                   |  |
| <b>Examples</b> that would apply to column 2  |                                     |                                   |  |
| • Proposed Action would change flood water flows.   | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Proposed Action may cause substantial erosion.  | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Proposed Action is incompatible with existing drainage patterns.  | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Proposed Action will allow development in a designated floodway.  | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Other impacts: _____  | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| <b><i>IMPACT ON AIR</i></b>   |                                     |                                   |  |
| 7. Will proposed action affect air quality?<br><input checked="" type="checkbox"/> No <input type="checkbox"/> Yes  |                                     |                                   |  |
| <b>Examples</b> that would apply to column 2  |                                     |                                   |  |
| • Proposed Action will include 1,000 or more vehicle trips in any given hour.   | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |
| • Proposed Action will result in the incineration of more than 1 ton of refuse per hour.  | <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |

- Emission rate of total contaminants will exceed 5 lbs. per hour or a heat source producing more than 10 million BTU's per hour.
- Proposed Action will allow an increase in the amount of land committed to industrial use.
- Proposed Action will allow an increase in the density of industrial development within existing industrial areas.
- Other impacts: \_\_\_\_\_

***IMPACT ON PLANTS AND ANIMALS***

8. Will proposed action affect any threatened or endangered species?  
 No  Yes

**Examples** that would apply to column 2

- Reduction of one or more species listed on the New York or Federal list, using the site, over or near the site, or found on the site.
- Removal of any portion of a critical or significant wildlife habitat.
- Application of pesticide or herbicide more than twice a year, other than for agricultural purposes.
- Other impacts: \_\_\_\_\_

9. Will Proposed Action substantially affect non-threatened or non-endangered species?  
 No  Yes

**Examples** that would apply to column 2

- Proposed Action would substantially interfere with any resident or migratory fish, shellfish or wildlife species.
- Proposed Action requires the removal of more than 10 acres of mature forest (over 100 years or age) or other locally important vegetation.
- Other impacts: \_\_\_\_\_

***IMPACT ON AGRICULTURAL LAND RESOURCES***

10. Will Proposed Action affect agricultural land resources?  
 No  Yes

**Examples** that would apply to column 2

- The proposed action would sever, cross or limit access to agricultural land (includes cropland, hayfields, pasture, vineyard, orchard, etc.).
- Construction activity would excavate or compact the soil profile of agricultural land.
- The proposed action would irreversibly convert more than 10 acres of agricultural land or, if located in an Agricultural District, more than 2.5 acres of agricultural land.

| 1<br>Small to<br>Moderate<br>Impact | 2<br>Potential<br>Large<br>Impact | 3<br>Can Impact be<br>Mitigated by<br>Project Change     |
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- The proposed action would disrupt or prevent installation of agricultural land management systems (e.g., subsurface drain lines, outlet ditches, strip cropping); or create a need for such measure (e.g., cause a farm field to drain poorly due to increased runoff).
- Other impacts: \_\_\_\_\_

***IMPACT ON AESTHETIC RESOURCES***

11. Will proposed action affect aesthetic resources? (If necessary, use the Visual EAF Addendum in Section 617.20, Appendix B.)

- No  Yes

Examples that would apply to column 2

- Proposed land uses, or project components obviously different from or in sharp contrast to current surrounding land use patterns, whether man-made or natural.
- Proposed land uses, or project components visible to users of aesthetic resources which will eliminate or significantly reduce their enjoyment of the aesthetic qualities of that resource.
- Project components that will result in the elimination or significant screening of scenic views known to be important to the area.
- Other impacts: \_\_\_\_\_

***IMPACT ON HISTORIC AND ARCHAEOLOGICAL RESOURCES***

12. Will Proposed Action impact any site or structure of historic, prehistoric or paleontological importance?

- No  Yes

Examples that would apply to column 2

- Proposed Action occurring wholly or partially within or substantially contiguous to any facility or site listed on the State or National Registers of Historic Places.
- Any impact to an archaeological site or fossil bed located within the project site.
- Proposed Action will occur in an area designated as sensitive for archaeological sites on the NYS Site Inventory.
- Other impacts: \_\_\_\_\_

***IMPACT ON OPEN SPACE AND RECREATION***

13. Will Proposed Action affect the quantity or quality of existing or future open spaces or recreational opportunities?

- No  Yes

Examples that would apply to column 2

- The permanent foreclosure of a future recreational opportunity.

|  | 1<br>Small to<br>Moderate<br>Impact | 2<br>Potential<br>Large<br>Impact | 3<br>Can Impact be<br>Mitigated by<br>Project Change     |
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- A major reduction of an open space important to the community.
- Other impacts: \_\_\_\_\_

**IMPACT ON CRITICAL ENVIRONMENTAL AREAS**

14. Will Proposed Action affect the exceptional or unique characteristics of a critical environmental area (CEA) established pursuant to subdivision 6NYCRR 617.14 (g)?

- No  Yes

List the environmental characteristics that caused the designation of the CEA. \_\_\_\_\_

Examples that would apply to column 2

- Proposed Action to locate within the CEA?
- Proposed Action will result in a reduction in the quantity of the resource?
- Proposed Action will result in a reduction in the quality of the resource?
- Proposed Action will impact the use, function or enjoyment of the resource?
- Other impacts: \_\_\_\_\_

**IMPACT ON TRANSPORTATION**

15. Will there be an effect to existing transportation systems?

- No  Yes

Examples that would apply to column 2

- Alteration of present patterns of movement of people and/or goods.
- Proposed Action will result in major traffic problems.
- Other impacts: Traffic impacts would be less than significant with improvements. With a change to the parking regulations, no significant shortfall to parking capacity would occur.

**IMPACT ON ENERGY**

16. Will Proposed Action affect the community's sources of fuel or energy supply?

- No  Yes

Examples that would apply to column 2

- Proposed action will cause a greater than 5% increases in the use of any form of energy in the municipality.
- Proposed Action will require the creation or extension of an energy transmission or supply system to serve more than 50 single or two family residences or to serve a major commercial or industrial use.
- Other impacts: \_\_\_\_\_

| 1<br>Small to<br>Moderate<br>Impact | 2<br>Potential<br>Large<br>Impact | 3<br>Can Impact be<br>Mitigated by<br>Project Change     |
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**NOISE AND ODOR IMPACT**

17. Will there be objectionable odors, noise, or vibration as a result of the Proposed Action?

No  Yes

**Examples** that would apply to column 2

- Blasting within 1,500 feet of a hospital, school or other sensitive facility.
- Odors will occur routinely (more than one hour per day).
- Proposed Action will produce operating noise exceeding the local ambient noise levels for noise outside of structures.
- Proposed Action will remove natural barriers that would act as a noise screen.
- Other impacts: The planned on-site playgrounds could generate noise impacts to immediately adjacent residences, but those noise levels would not be significant due to measures the SCA is incorporating into the project.

**IMPACT ON PUBLIC HEALTH**

18. Will Proposed Action affect public health and safety?

No  Yes

**Examples** that would apply to column 2

- Proposed Action may cause a risk of explosion or release of hazardous substances (i.e., oil, pesticides, chemicals, radiation, etc.) in the event or accident or upset conditions, or there may be a chronic low level discharge or emission.
- Proposed Action may result in the burial of "hazardous wastes" in any form (i.e., toxic, poisonous, highly reactive, radioactive, irritating, infectious, etc.)
- Storage facilities for one million or more gallons of liquefied natural gas or other flammable liquids.
- Proposed Action may result in the excavation or other disturbance within 2,000 feet of a site used for the disposal of solid or hazardous waste.
- Other impacts: \_\_\_\_\_

**IMPACT ON GROWTH AND CHARACTER OF COMMUNITY OR NEIGHBORHOOD**

19. Will Proposed Action affect the character of the existing community?

No  Yes

**Examples** that would apply to column 2

- The permanent population of the city, town or village in which the project is located is likely to grow by more than 5%.

| 1<br>Small to<br>Moderate<br>Impact | 2<br>Potential<br>Large<br>Impact | 3<br>Can Impact be<br>Mitigated by<br>Project Change     |
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- The municipal budget for capital expenditures or operating services will increase by more than 5% per year as a result of this project.
- Proposed Action will conflict with officially adopted plans or goals.
- Proposed Action will cause a change in the density of land use.
- Proposed Action will replace or eliminate existing facilities, structures or areas of historic importance to the community.
- Development will create a demand for additional community services (e.g. schools, police and fire, etc.)
- Proposed Action will set an important precedent for future projects.
- Proposed Action will create or eliminate employment.
- Other impacts: \_\_\_\_\_

20. Is there, or is there likely to be, public controversy related to potential adverse environmental impacts?  
 No  Yes

| 1<br>Small to<br>Moderate<br>Impact | 2<br>Potential<br>Large<br>Impact | 3<br>Can Impact be<br>Mitigated by<br>Project Change     |
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| <input type="checkbox"/>            | <input type="checkbox"/>          | <input type="checkbox"/> Yes <input type="checkbox"/> No |

**If Any Action in Part 2 Is Identified as a Potential Large Impact or If You Cannot Determine the Magnitude of Impact, Proceed to Part 3**

**Part 3 – EVALUATION OF THE IMPORTANCE OF IMPACTS  
 Responsibility of Lead Agency**

Part 3 must be prepared if one or more impact(s) is considered to be potentially large, even if the impact(s) may be mitigated.

**Instructions** (If you need more space, attach additional sheets)  
 Discuss the following for each impact identified in Column 2 of Part 2:

1. Briefly describe the impact.
2. Describe (if applicable) how the impact could be mitigated or reduced to a small to moderate impact by project change(s).
3. Based on the information available, decide if it is reasonable to conclude that this impact is **important**.

To answer the question of importance, consider:

- The probability of the impact occurring
- The duration of the impact
- Its irreversibility, including permanently lost resources of value
- Whether the impact can or will be controlled
- The regional consequence of the impact
- Its potential divergence from local needs and goals
- Whether known objections to the project relate to this impact

(Continue on Attachments)

See Attached Report - "Supplemental Environmental Studies for the Proposed PS/IS 437, Brooklyn, New York"

SUPPLEMENTAL  
ENVIRONMENTAL STUDIES

*for the*

**Proposed PS/IS 437**

Caton Avenue

Brooklyn, New York

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Proposed PS/IS 437  
Caton Avenue  
Brooklyn, New York

SUPPLEMENTAL ENVIRONMENTAL STUDIES

EXECUTIVE SUMMARY

INTRODUCTION

The New York City School Construction Authority (SCA) proposes to construct a new primary and intermediate school (PS/IS) facility, to be known as PS/IS 437, on Caton Avenue in the Prospect Park South section of Brooklyn. The proposed school would provide approximately 757 seats for students in grade levels pre-kindergarten through eight within Community School District (CSD) No. 15.

In order to develop the new school facility, the SCA would acquire three privately-owned vacant lots (Lots 44, 64, and 73) on Block 5321 for the proposed school site. In total, the three lots comprising the proposed school site contain approximately 0.85 acres (37,065 square feet).

According to the current design scheme, the proposed new school facility would be a five-story building, plus cellar, and would contain approximately 106,175 gross square feet (gsf). The school's main entrance would be located on Caton Avenue. The design program for the proposed school facility includes classrooms for grade levels pre-kindergarten through eight, special education classrooms, a gymnasium (gymnasium/auditorium), a kitchen and student dining area, a staff lunch room, a gymnasium, a library, music and art rooms, science rooms, reading and speech resource rooms, medical office space, administrative office space, and storage. Three playgrounds would be provided on site including a 4,300 sf playground on the northern portion of the project site, a 7,600 sf general playground on the southeastern portion of the project site, and a 4,275 sf Early Childhood (pre-kindergarten and kindergarten) playground on the southwestern portion of the project site. It is estimated that approximately 76 teachers and staff would work at the new school facility.

The project site is located on the block bounded by Kermit Place to the north, Caton Avenue to the south, East 8<sup>th</sup> Street to the east, and East 7<sup>th</sup> Street to the west. The irregularly shaped project site has 287 feet of frontage on Caton Avenue, 234 feet on East 7<sup>th</sup> Street, 101 feet on East 8<sup>th</sup> Street, and 27 feet on Kermit Place. The portions of the site without street frontage adjoin the rear yards of existing residential buildings that front Kermit Place and East 8<sup>th</sup> Street.

The proposed school site is located in both R5B and R6A residential zoning districts, in which schools are permitted as-of-right. The entire site is also within a designated Special Purpose District, known as the Special Ocean Parkway District (OP), in which schools are permitted as-of-right.

Funding for site acquisition, design and construction of the proposed school facility would be provided by the New York City Department of Education's (DOE's) Five-Year Capital Plan for Fiscal Years 2010-2014. It is expected that the proposed PS/IS 437 would open in September 2015.

The new public school facility would serve primary and intermediate school students and special education students within CSD No. 15. Construction of the new approximately 757-seat PS/IS 437 has been proposed by DOE to provide additional seating capacity for CSD No. 15 in order to address localized overcrowding and forecast changes in student enrollments, and also to support DOE's policies to implement class-size reduction.

This report examines the environmental effects expected to result from the construction and operations of the new PS/IS 437. The following summarizes the expected impacts and their significance.

## PROBABLE IMPACTS OF THE PROPOSED PROJECT

### A. LAND USE, ZONING, AND PUBLIC POLICY

#### *LAND USE*

The project would replace a series of adjacent vacant lots, and therefore require no demolition. According to the current design scheme, the proposed new school facility would be a five-story building, plus cellar, and would contain approximately 106,175 gsf, with its main entrance on Caton Avenue. The project would also develop three playgrounds on site including a 4,300 sf playground on the northern portion of the project site, a 7,600 sf general playground on the southeastern portion of the project site, and a 4,275 sf Early Childhood (pre-kindergarten and kindergarten) playground on the southwestern portion of the project site. The new school facility would provide space for approximately 757 primary and intermediate school students. The site and the surrounding residential, commercial, institutional, and mixed uses would not be adversely affected by the proposed project, nor would land use trends be affected.

#### *ZONING AND PUBLIC POLICY*

The project site is divided by a district boundary line between a R5B residential zoning district on the northern portion of the project site and an R6A residential zoning district on the southern portion of the project site. Within the R5B zoning district (which includes Lots 44 and 73) and the R6A zoning district (which includes Lot 64), schools are permitted as-of-right. The entire project site lies within the OP special district, in which schools are permitted as-of-right.

The proposed school facility would conform to the requirements of the R5B and the R6A zoning districts and the OP special district with respect to use, as schools are permitted as-of-right in all districts. However, the proposed school building would not be in compliance with the following zoning requirements: maximum permitted FAR (for the R5B portion of the site only); maximum permitted interior lot coverage; minimum required front yard (for the R5B portion of the site only); minimum required rear yard; building height and setback requirements; and the Special Off-Street Loading Regulations pursuant



to the OP special district designation. These zoning overrides for zoning non-conformities would be necessary from the Deputy Mayor for Economic Development. As the zoning overrides would pertain only to the project site, no significant adverse impact to zoning and public policy would occur.

#### **B. SOCIOECONOMIC CONDITIONS**

The proposed school facility would be constructed on a currently vacant and unoccupied site. The proposed project would introduce approximately 757 primary and intermediate school students and a total of approximately 76 teachers, administrators, and support staff to the project site. Although the proposed project would be a change of land use, it would not introduce activities that are incompatible with surrounding existing uses. The proposed PS/IS 437 would not result in the displacement of any residents or businesses. The proposed school would create additional jobs for teachers and support staff.

Although the proposed project would result in new construction, the construction activities would be generally contained within the site. In addition, the construction of the new school building would be a localized activity of limited duration, without the potential to affect a larger area or the conditions of any specific industry. Significant adverse impacts to socioeconomic conditions from the proposed project would not result, and no further analysis is required.

#### **C. COMMUNITY FACILITIES**

The proposed project would not introduce new residents to the area, creating little new demand for community facilities and services (i.e., public or publicly-funded facilities such as fire protection, police protection, schools, hospitals, and other health care facilities, libraries, and day care centers). The proposed new school facility would provide additional seating capacity for CSD No. 15; however, the new facility would not introduce new school-aged population to the school district or change its service area. The proposed facility would not impinge on the abilities of the New York City Police Department and Fire Department to provide services to the project site or their respective service areas. Therefore, no significant impacts to community facilities would result.

#### **D. OPEN SPACE AND RECREATIONAL FACILITIES**

The construction of a new school facility on the project site would not have any direct or indirect impacts on open space. The need for physical education at the school would be met within the project site itself with the provision of three separate playgrounds including a 4,300 sf playground on the northern portion of the project site, a 7,600 sf general playground on the southeastern portion of the project site, and a 4,275 sf Early Childhood (pre-kindergarten and kindergarten) playground on the southwestern portion of the project site. Therefore, the proposed new school facility would not result in any significant adverse impacts to open space resources.

## E. SHADOWS

With an estimated height of approximately 76 feet, the proposed school building's maximum shadow would extend approximately 327 feet. There are no buildings or open spaces that would fall in the shadow of the proposed PS/IS 437 that are considered historic or possess significant sunlight-sensitive features. Therefore, because the proposed school would not cast a shadow over any historic buildings or landscapes, significant adverse shadow impacts would not result.

## F. CULTURAL RESOURCES

The creation of a new school facility would result in a disturbance of lands already disturbed by previous construction activities. The project site is located in an area comprised mostly of residential uses, with some neighborhood commercial uses nearby. The site is not located within a historic district or within close proximity to any historic landmark or district.

In accordance with the New York State Historic Preservation Act of 1980 (SHPA), consultation with the New York State Office of Parks, Recreation and Historic Preservation (OPRHP) was undertaken as part of the cultural resources site review. OPRHP (OPRHP Project Review Number 11PR02787), in its letter of July 21, 2011, stated that the proposed project will have No Impact upon cultural resources in or eligible for inclusion in the State and National Register of Historic Places. Therefore, construction of the proposed new school facility on the site would not result in significant adverse impacts to archaeological resources or historic resources.

## G. URBAN DESIGN AND VISUAL RESOURCES

No visual resources, such as parks or historic structures, exist on the project site, and the Prospect Park Parade Grounds, located one block to the east of the site, does not share visual connectivity with the site. Slight views to and from Ocean Parkway, likewise, would not present a change in context of Ocean Parkway; rather, where the currently vacant site may be visible, the improvements to the site, particularly the provision of street trees, would improve upon the visual context of Ocean Parkway. Therefore, the proposed project would not result in visual resources impacts.

The height and massing of the school would resemble the surrounding apartment buildings, and the arrangement of the school volumes and playgrounds would blend the site with the low-scale residential and commercial streets to the north and south. Thus, the form of the building and the ample landscaping would coherently tie the site into the built fabric while improving the current, vacant state of the site. Overall, the proposed PS/IS 437 would contribute positively to the urban design of the area, enhancing the pedestrian experience in the vicinity of the site. Therefore, no significant adverse impacts related to urban design would result.

## H. NEIGHBORHOOD CHARACTER

The construction of the proposed PS/IS 437 would be an appropriate land use, and its design would contribute to the visual quality of the area. Its height and massing would be consistent with the apartment buildings in the neighborhood, and the arrangement of the site would

ensure balance along the surrounding, lower-density residential and commercial streetscapes. The new landscaping and site design would contribute positively to the streetscapes.

Furthermore, technical analyses have concluded that with the recommended improvement measures in place, the proposed school at this location would not result in significant adverse impacts related to traffic, air or noise conditions that would alter the character of the neighborhood.

## I. NATURAL RESOURCES

There are no known natural resources (e.g., terrestrial ecological features, wetlands, water bodies, streams, or special flood hazard area) on or adjacent to the project site, and none would be affected by the proposed project. The site is fully disturbed and is located within a well-developed residential and commercial urban context. Furthermore, the proposed project would not have any impact on endangered or threatened wildlife species, since none are known to inhabit or visit the site. The site of the proposed PS/IS 437 was reviewed by the New York State Department of Environmental Conservation (NYSDEC) which stated that an endangered vascular plants species from the New York Natural Heritage Program database has been identified at Prospect Park Lake within approximately 0.3 miles of the project site. None of the plant species are located on the project site. No significant adverse impacts to natural resources would result.

## J. HAZARDOUS MATERIALS

Phase I Environmental Site Assessments (ESAs) and Phase II Environmental Site Investigations (ESIs) were completed by STV Incorporated (STV) on behalf of the SCA in 2008 and 2011 to evaluate the environmental conditions of the proposed project site. A Phase I ESA was conducted for Lot 64 in March 2008, a Phase II ESI was performed in April 2008, and a Supplemental Phase II ESI was completed in June 2008. In February 2011, an additional Phase I ESA was completed for Lots 44 and 73. A Phase II ESI was subsequently completed for those two lots in April 2011.

The site consists of an approximate 37,100 square foot property comprised of three vacant lots. The surrounding area is developed with residential buildings and several commercial properties.

The Phase I ESA identified recognized environmental conditions (RECs) related to the historic use of the southern portion of the site as a metal manufacturing facility from at least 1905 through 1997; the potential presence of buried structures from the prior demolition of on-site dwellings on the northern portion of the site; potential for buried fuel tanks and/or prior fuel releases on site; an off-site spill incident at a nearby and crossgradient property; and long-term use of the surrounding properties as gasoline filling stations with reported releases, auto repair facilities, and a dry cleaning facility. Environmental concerns were identified with respect to the potential presence of suspect asbestos-containing materials (ACM), lead-based paint (LBP), and polychlorinated biphenyls (PCBs) in potential buried structures on site. Based on the results of the Phase I ESAs, Phase II ESI activities were completed on the site, which included a geophysical survey, advancement of soil borings and the collection of soil, soil vapor and ambient air, and groundwater samples for laboratory analyses.

The geophysical investigations identified minor scattered anomalies and remnants of former building foundations; however, no evidence of underground storage tanks was identified. The results of the soil vapor survey indicate the presence of elevated concentrations of chlorinated volatile organic compounds (VOCs) and petroleum-related VOCs above applicable New York State Department of Health (NYSDOH) background indoor air ranges. In addition, tetrachloroethene (PCE) and trichloroethene (TCE) were detected at concentrations greater than the NYSDOH Air Guidance Values (AGVs) of 100 ug/m<sup>3</sup> and 5.0 ug/m<sup>3</sup>, respectively.

Subsurface soils contain elevated concentrations of semi-volatile organic compounds (SVOCs), pesticides, polychlorinated biphenyls (PCBs), and metals. Fill materials characteristic of a hazardous waste for lead were also identified. These constituents are attributed to historic manufacturing operations conducted in the southern portion of the site from approximately 1905 through 1997, as well as to fill material.

The results of groundwater sampling indicate the presence of elevated concentrations of TCE, PCE, 1,1,1-trichloroethane, 1,1-dichloroethane, and chloroform. While the concentrations of VOCs in groundwater exceed NYSDEC standards, they are attributed to the historic use of VOCs on the southern portion of the site over the 90-year history of manufacturing, and possibly off-site sources since TCE and chloroform were detected in the most upgradient on-site well.

For the site to be suitable for construction of a New York City public school, excavation and proper disposal of contaminated soils will be completed and a vapor barrier and sub-slab depressurization system would be included in the new school's design and construction to prevent potential migration of organic vapors into the proposed school building. During construction, the contractor would characterize soil anticipated for excavation to identify material handling, and/or waste disposal requirements and properly manage excavated soil in accordance with all applicable local, state, and federal regulations. Any ACM, LBP, and/or PCB-containing materials contained in potential buried structures would be identified and properly managed during such activities. For areas of the site where exposed soils may exist (i.e., landscaped areas), a twenty-four (24) inch thick layer of environmentally clean fill would be placed over the soils. All on-site groundwater monitoring wells and the inactive historic water supply well would be abandoned in accordance with State regulations.

## K. INFRASTRUCTURE

The project site is located within the Owls Head Wastewater Treatment Plant (WWTP) drainage area. This WWTP is permitted to treat 120 million gallons per day (mgd). The proposed school would include approximately 757 seats and 76 faculty and staff, and thus, daily water usage would be approximately 7,570 gpd for students and 760 gpd for staff, for a total of 8,330 gpd. The proposed school building would contain approximately 106,175 gsf, and thus, would consume an additional 18,050 gpd for air conditioning, for a total of 26,380 gpd during the cooling season. No significant adverse impacts to infrastructure would result.

## L. SOLID WASTE AND SANITATION

The new school facility, with a total of approximately 757 students and 76 staff, would generate a total of approximately 3,638 pounds of solid waste per week, or 15,765 pounds per month. The New York City Department of Sanitation (DSNY) is responsible for collecting and disposing of solid waste from residences and public facilities, including schools. The typical DSNY collection truck for commercial carters typically carries between twelve to fifteen tons of waste material per truck. Therefore, with 3,638 pounds of solid waste per week, or 15,765 pounds per month, to be generated by occupants of the proposed school facility, there would be no significant adverse impact anticipated with solid waste collection and disposal.

## M. ENERGY

It is expected that the new school building would be substantially more energy efficient than the adjacent buildings in the neighborhood. The proposed project would comply with the New York State Energy Conservation Construction Code. The proposed project would also incorporate energy conservation measures.

The construction of the new approximately 106,175 gsf school building would require approximately 147.2 billion BTUs. Following construction, the estimated annual usage of energy for the proposed school facility would be approximately 26.6 billion BTUs or 20 BTUs for the nine-month academic year. It is expected that no significant adverse impacts would occur with the capacity of both Con Edison and National Grid to provide service to the project site and surrounding area.

The proposed project has been designed following the NYC Green Schools Rating System (guidelines specific to the design, construction and operation of New York City public school buildings) and is in compliance with site-related credits to achieve a LEED-certified or higher rating.

## N. TRAFFIC AND TRANSPORTATION, PEDESTRIANS, AND PARKING

**Traffic.** The identification of potential significant traffic impacts was based on criteria for signalized intersections defined in the *CEQR Technical Manual*, and for vehicle trip thresholds. The proposed PS/IS 437 would generate 184 vehicle trip ends in the AM and 159 vehicle trip ends in the PM peak hours, thus exceeding the 50-trip end threshold specified in the *CEQR Technical Manual*. Traffic analysis performed for the intersections in the study area revealed that significant impacts at the intersection of Caton Avenue and Coney Island Avenue would occur as a result of the assignment of these school-generated vehicle trips through the study area. However, adjustments to the signal timing at that intersection during the AM and PM hours would avoid those traffic impacts.

**Parking.** The proposed project could result in a significant parking impact (i.e., shortfall) when the most restrictive curbside parking regulations are in effect. This impact could be avoided by altering the parking restrictions along five block faces in the ¼-mile radius parking study area from Tuesday, when the shortfall is projected to occur, to Thursday, when few regulations are in effect, and therefore, a high supply of curbside spaces. Modification of the existing curbside parking regulations is proposed for the following locations:

- South side of Fort Hamilton Parkway between East 3<sup>rd</sup> Street and East 5<sup>th</sup> Street: Change the parking restriction from Tuesday, 9:30-11 AM to Thursday, 11:30 AM-1 PM.
- North side of Caton Avenue between East 3<sup>rd</sup> Street and Ocean Parkway: Change the parking restriction from Tuesday, 11:30 AM-1 PM to Thursday, 11:30 AM-1 PM.

The parking shortfall during regulation periods within the ¼-mile radius parking study area would be eliminated should these restrictions be altered as proposed. Implementing these new parking regulations would "recover" 34 curb parking spaces on the most restricted parking day.

**Transit and Pedestrians.** The potential for transit and pedestrian impacts is determined by comparing school-generated transit and pedestrian trips to respective thresholds specified in the *CEQR Technical Manual*. Approximately 63 and 65 new transit trips would be generated by the new PS/IS 437 during the respective AM and PM peak school hour, which is substantially less than the 200 peak-hour bus rider threshold; therefore, no further analysis is required, and no transit-related impact would result. Likewise, the new facility would not meet the threshold for potential pedestrian impacts, as no individual street element would carry more than 200 new pedestrians per hour; therefore, no further analysis of pedestrian conditions is required, and no significant adverse impacts related to pedestrians would result from the proposed PS/IS 437 facility.

#### O. AIR QUALITY

Based on the air quality screening procedures described in the *CEQR Technical Manual*, the proposed school would have no adverse effect on surrounding air quality due to either project-induced traffic or its heating, ventilation, and air conditioning (HVAC) systems. In addition, existing stationary source emissions in the immediate vicinity of the project site would not have a detrimental effect on the health of students or staff at the proposed school.

#### P. NOISE

The *CEQR Technical Manual* recommends a detailed technical assessment of potential traffic-related noise impacts if a potential action would result in the doubling of existing passenger car equivalent (PCE) values at any intersection during the peak traffic hour. PCEs are used to account for the different types of motor vehicles (i.e., cars, trucks, buses) and their varying levels of sound. Based on the data obtained from the traffic studies associated with this project, the number of PCEs generated by this project would not double existing PCE values at any location. As a result, traffic-related noise impacts would not occur.

As part of the proposed project, three separate playgrounds would be developed on the project site. Based on an assessment of the three playgrounds, the increase in the future project noise from two of the three playgrounds would exceed the five dBA SCA impact criteria during the Midday time period. As a result, the operation of the proposed school project could result in an adverse noise impact for the affected noise receptors at 46 Kermit Place and 70 East 8<sup>th</sup> Street, which are residences that adjoin two of the three planned playgrounds.

To address the potential playground noise impacts to the adjoining residences, the SCA would make available to the owners of the apartment building at 70 East 8<sup>th</sup> Street, storm or sound-

attenuating windows and alternative ventilation for the bottom three floors. Only 30 windows on the south face of the building, fronting the proposed General Playground on the project site, would be replaced. Likewise, for the property owners of 46 Kermit Place, eight storm or sound-attenuating windows and alternative ventilation would be offered for the two floors of windows on the west face of the building. These measures would reduce the impact of playground noise upon the two affected residential properties to less than significant levels.

The maximum  $L_{10}$  noise exposure experienced by the proposed school would be 70.7 dBA. This noise level includes the effect of traffic noise from local streets. As a result, based on the CEQR noise exposure standards, the school's exterior noise exposure would be in the marginally unacceptable category. To reduce the exterior noise exposure level to the required interior noise level of 45 dBA or below, attenuation measures (e.g., double glazed windows) would be incorporated into the new school building's design and construction. Standard double-glazed windows are available which would result in the required attenuation value of 26 dBA. As a result, the proposed school would not experience any noise exposure impacts.

The proposed school's HVAC equipment, along with any other project-related mechanical devices would be designed to meet the NYC Noise Code standards.

#### Q. CONSTRUCTION-RELATED IMPACTS

The anticipated construction period for the proposed school is expected to be approximately 30 months. Impacts that may result from construction of the proposed project include temporary traffic and parking congestion, increased noise from construction activities, fugitive dust and mobile source emissions, soil erosion and sedimentation, and disturbance of potentially hazardous materials. Construction impacts would be temporary and to the extent practicable would be limited to the proposed school site.

Construction activities may result in temporary disruptions to the surrounding community. Various measures would be implemented in order to minimize the temporary disruptions and to ensure the safety of the community during construction. Therefore, it is expected that no significant adverse impacts would occur with the construction of the proposed project.

## CHAPTER 1: PROJECT DESCRIPTION

### A. INTRODUCTION

The New York City School Construction Authority (SCA) proposes to construct a new primary and intermediate school (PS/IS) facility, to be known as PS/IS 437, on Caton Avenue in the Prospect Park South section of Brooklyn. The proposed school would provide approximately 757 seats for students in grade levels pre-kindergarten through eight within Community School District (CSD) No. 15. In order to develop the new school facility, the SCA would acquire Lots 44, 64, and 73 on Block 5321 for the proposed school site.

Funding for site acquisition, design and construction of the proposed school facility would be provided by the New York City Department of Education's (DOE's) Five-Year Capital Plan for Fiscal Years 2010-2014. It is expected that the proposed PS/IS 437 would open in September 2015.

### B. PURPOSE AND NEED

The new public school facility would serve primary and intermediate school students and special education students within CSD No. 15. Construction of the new approximately 757-seat PS/IS 437 has been proposed by DOE to provide additional seating capacity for CSD No. 15.

According to the Capital Plan, a total of 2,233 additional seats at the primary and intermediate school levels are required for CSD No. 15 in order to address localized overcrowding and forecast changes in student enrollments, and also to support DOE's policies to implement class-size reduction. During the 2009-2010 school year, CSD No. 15's existing primary and intermediate school facilities collectively operated at 93 percent of their target capacity.

### C. PROJECT SITE

The project site is located in the Prospect Park South section of Brooklyn, within Brooklyn Community District 7 (see Figure 1-1). The project site is located on the block bounded by Kermit Place to the north, Caton Avenue to the south, East 8<sup>th</sup> Street to the east, and East 7<sup>th</sup> Street to the west. The irregularly shaped project site has 287 feet of frontage on Caton Avenue, 234 feet on East 7<sup>th</sup> Street, 101 feet on East 8<sup>th</sup> Street, and 27 feet on Kermit Place. The portions of the site without street frontage adjoin the rear yards of existing residential buildings that front Kermit Place and East 8<sup>th</sup> Street. The project site contains approximately 0.85 acres (37,065 sf).

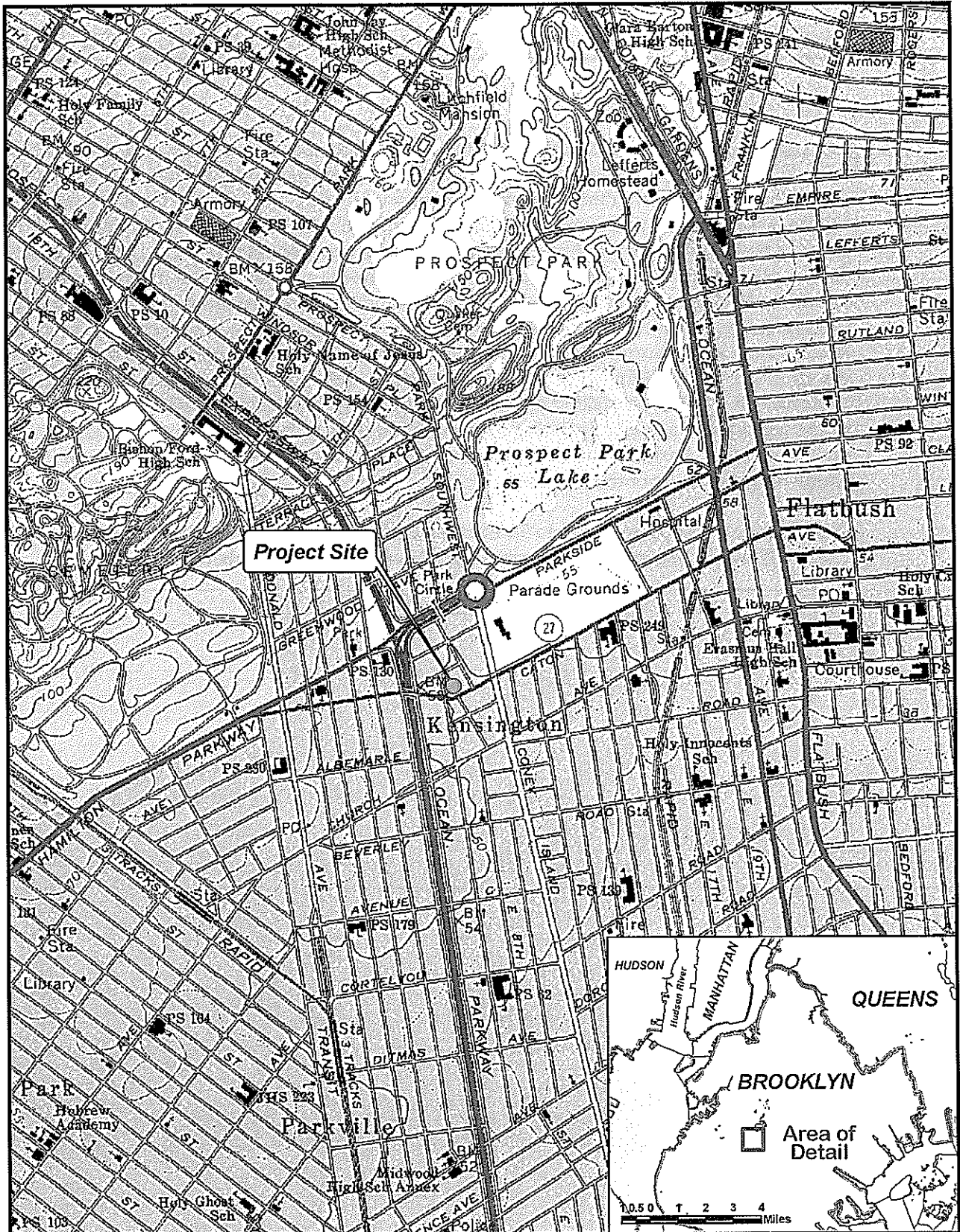
The proposed school site is located in both R5B and R6A residential zoning districts, in which schools are permitted as-of-right. The entire site is also within a designated Special Purpose District, known as the Special Ocean Parkway District (OP), in which schools are permitted as-of-right.



#### D. PROPOSED ACTION

The proposed action would entail the acquisition of three privately-owned vacant lots (Lots 44, 64, and 73) on Block 5321, and construction of a new primary and intermediate school facility. According to the current design scheme, the proposed new school facility would be a five-story building, plus cellar, and would contain approximately 106,175 gross square feet (gsf). The school's main entrance would be located on Caton Avenue (see Figure 1-2). The new PS/IS 437 would provide approximately 757 seats for grade levels pre-kindergarten through eight, and would contain classrooms for grade levels pre-kindergarten through eight, special education classrooms, a gymnasium (gymnasium/auditorium), a kitchen and student dining area, a staff lunch room, a gymnasium, a library, music and art rooms, science rooms, reading and speech resource rooms, medical office space, administrative office space, and storage. Three playgrounds would be provided on site including a 4,300 sf playground on the northern portion of the project site, a 7,600 sf general playground on the southeastern portion of the project site, and a 4,275 sf Early Childhood (pre-kindergarten and kindergarten) playground on the southwestern portion of the project site.

It is estimated that approximately 76 teachers and staff would work at the new school facility. PS/IS 437 would operate during normal school hours, from September to June.



**Legend**

● Project Site

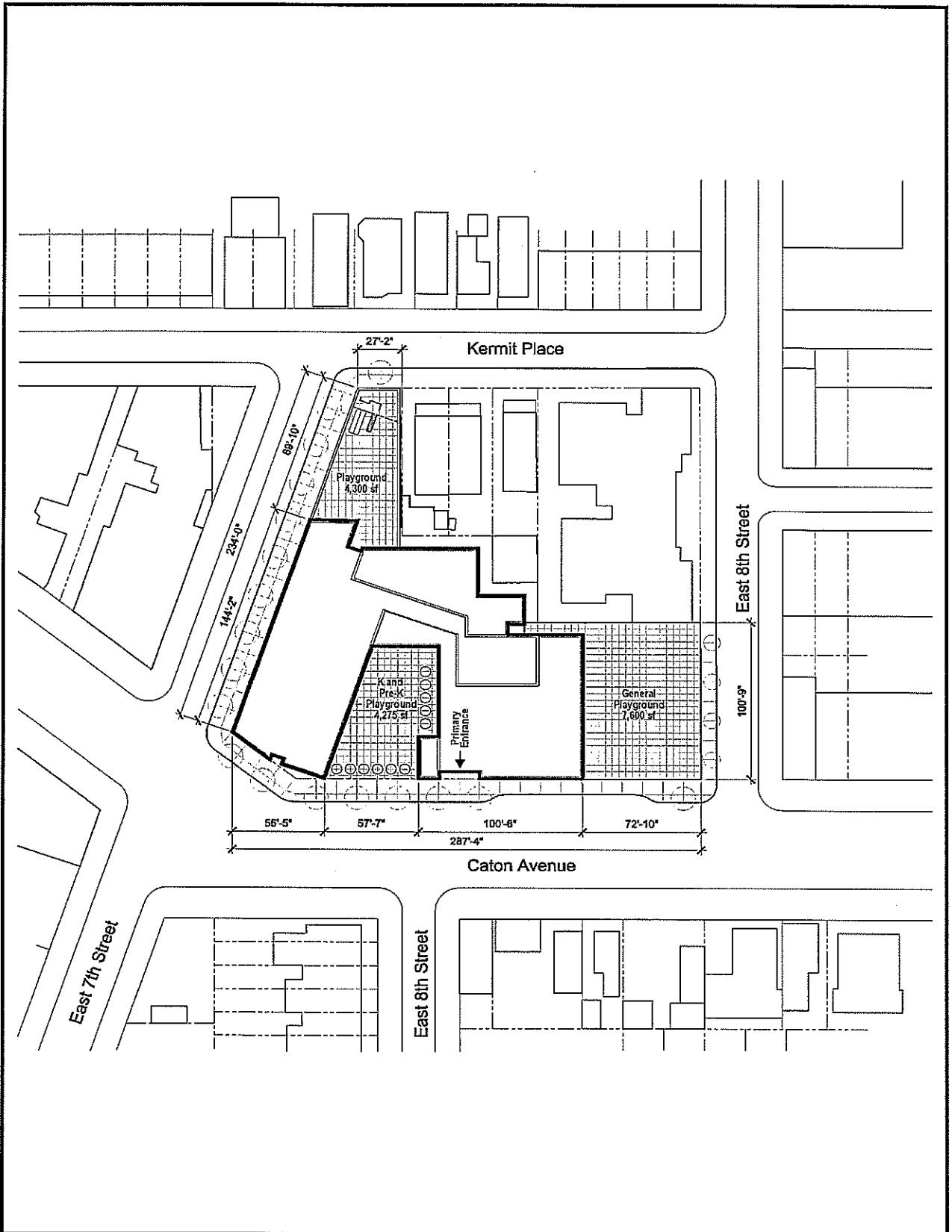


Source: USGS Topographic Map, quad o40073f8

**Figure 1-1: Project Location**

*Proposed PS/IS 437  
Caton Avenue, Brooklyn*

*New York City  
School Construction Authority*



*Figure 1-2: Site Plan*

*Proposed PS/IS 437  
Caton Avenue, Brooklyn*

*New York City  
School Construction Authority*



Scale: NTS  
Source: NYC SCA June 2, 2011

## CHAPTER 2: LAND USE, ZONING AND PUBLIC POLICY

Land use refers to the activity that is occurring on land and within the structures that occupy it. Types of uses include residential, commercial, industrial, community facilities/institutional, vacant land, and parkland/open space. An analysis of land use patterns characterizes the uses and development trends in the area that may be changed or affected by the proposed action. This analysis is then used to determine whether the proposed project is compatible with, or may alter those conditions. Zoning establishes standards and requirements used to regulate and guide development within New York City. Regulatory controls prescribe permitted uses, building coverage and open space standards, setbacks, structure heights and parking requirements. Public policies are those adopted policies, other than zoning, that can affect or define land use.

### A. EXISTING CONDITIONS

#### LAND USE

The proposed new public school facility would be constructed on a site comprised of three privately-owned vacant lots on Block 5321 (Lots 44, 64, and 73) in the Prospect Park South section of Brooklyn. The northern portion of the project site, comprising Lots 44 and 73, has wooden construction fencing around its perimeter. These two lots are overgrown with weeds and strewn with debris. The southern portion of the project site, comprising Lot 64, is enclosed by chain-link fencing and includes an area used for outdoor storage of landscaping equipment along the western side of this lot. Otherwise, Lot 64 is vacant and unused.

The project site is bounded by Caton Avenue to the south, East 8<sup>th</sup> Street to the east, and East 7<sup>th</sup> Street to the west. The northern boundary of the project site follows an irregular line that is created by the adjacent lot lines and the street. The northern boundary of the project site includes Kermit Place, the rear lot lines of Block 5321, Lots 45, 46, and 48 (residential buildings) and the side of a six-story apartment building that fronts East 8<sup>th</sup> Street.

The study area for the analysis of land use, zoning, and public policy was defined in accordance with the *CEQR Technical Manual* to include the area within a 400-foot radius surrounding the project site. As illustrated on Figure 2-1, the study area boundary is generally defined by Caton Place to the north, Friel Place to the south, Coney Island Avenue to the east, and Ocean Parkway to the west.

The land uses within the study area are primarily residential, including one- and two-family detached and semi- attached buildings, and rowhouses, generally two-stories in height. Along East 7<sup>th</sup> Street, south of Caton Avenue, are 3-story single family detached houses. In addition, the western portion of the study area along Ocean Parkway features several large apartment buildings ranging from six- to 15-stories in height. Institutional uses are concentrated in the northeast portion of the study area and include the Calvary Cathedral of Praise World Outreach Center (which serves as a church as well as food and a clothing distribution center) and the Brooklyn College Academy Annex (including the Bridges to Brooklyn school). Directly northwest of the project site is the Smart Kids R Us Group Family Daycare and After School. This facility is housed in two converted residences.

Mixed-use buildings (typically ground floor commercial and upper floor residential) are interspersed throughout the study area. Commercial uses are clustered on the south side of Caton Avenue at its intersection with East 7<sup>th</sup> Street; they include a landscaping business, and neighborhood retail (a laundromat, restaurants, and a pharmacy). Along the western side of Coney Island Avenue straddling both sides of Caton Avenue are two gas stations. Two vacant lots are included within the study area. The study area also includes a portion of the Prospect Park Parade Grounds, which is one block to the east of the project site, and a portion of the Ocean Parkway medians, which are one block to the west of the project site.

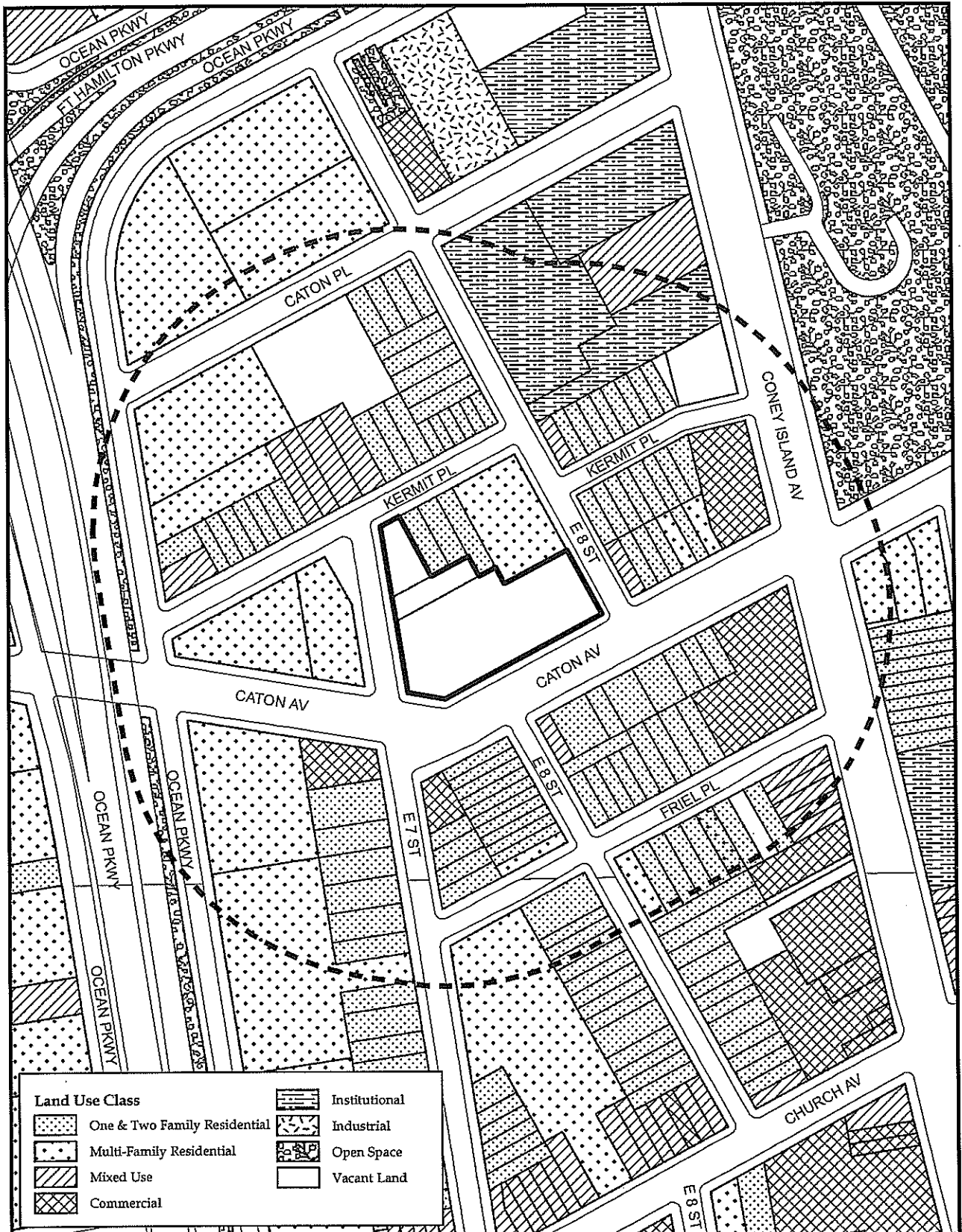
#### ZONING AND PUBLIC POLICY

The New York City Council adopted the East Windsor Terrace/Stable Brooklyn Rezoning on March 11, 2009, which instituted the zoning districts and regulations that currently govern the project site. The proposed project site is located within two residential zoning districts and one special purpose district. As shown on Figure 2-2, the northern portion of the proposed project site (Block 5321, Lots 44 and 73) is located in an R5B contextual lower-density residential zoning district, where schools are permitted as-of-right, and the southern portion of the project site (Block 5321, Lot 64) is located in an R6A contextual medium-density residential zoning district, where schools are permitted as-of-right. The entire project site also lies within a designated Special Purpose District known as the Special Ocean Parkway District (OP), in which schools are permitted as-of-right. However, pursuant to § 113-02 of the *Zoning Resolution* (Article XI: Special Purpose Districts), the regulations of the underlying districts remain in force except as modified by the express provisions of the OP special district.

The R5B district, mapped over the northern portion of the project site, is designed to preserve the traditional three-story rowhouses, while also promoting new rowhouse development. The R6A district, mapped over the southern portion of the project site, typically produces high lot coverage, six- or seven-story apartment buildings designed to be compatible with existing buildings found in older neighborhoods. A C2-4 commercial overlay, which allows for neighborhood commercial uses within residential districts, is mapped along the north side of Caton Avenue between East 8<sup>th</sup> and East 7<sup>th</sup> Streets (within the project site's R6A district).

The purpose of the OP special district, encompassing a band of blocks east and west of Ocean Parkway between Prospect Park and Brighton Beach, is to enhance the character and quality of Ocean Parkway, which is a designated scenic landmark, and to encourage large single-family or two-family detached and semi-detached residences.

The northern portion of the study area includes additional R5B zoning and an R7B residential zoning district. An R5 residential zoning district is mapped south of Caton Avenue over the southern portion of the study area. To the east, additional R5B and R6A zoning, and a C8-2 commercial zoning district along the west side of Coney Island Avenue, are mapped. To the west, additional R6A zoning and a R7A residential zoning district along both sides of Ocean Parkway are mapped. The OP special district covers the entire study area west of Coney Island Avenue. The Flatbush Rezoning, adopted by the New York City Council on July 29, 2009, provided new zoning for the eastern edge of the study area (just south of the Prospect Park Parade Grounds and east of Coney Island Avenue) to match the existing built character, which includes areas of detached homes, rowhouses, and apartment buildings.



| Land Use Class |                              |
|----------------|------------------------------|
|                | One & Two Family Residential |
|                | Multi-Family Residential     |
|                | Mixed Use                    |
|                | Commercial                   |
|                | Institutional                |
|                | Industrial                   |
|                | Open Space                   |
|                | Vacant Land                  |

**Legend**

Project Site

400' Study Area Radius

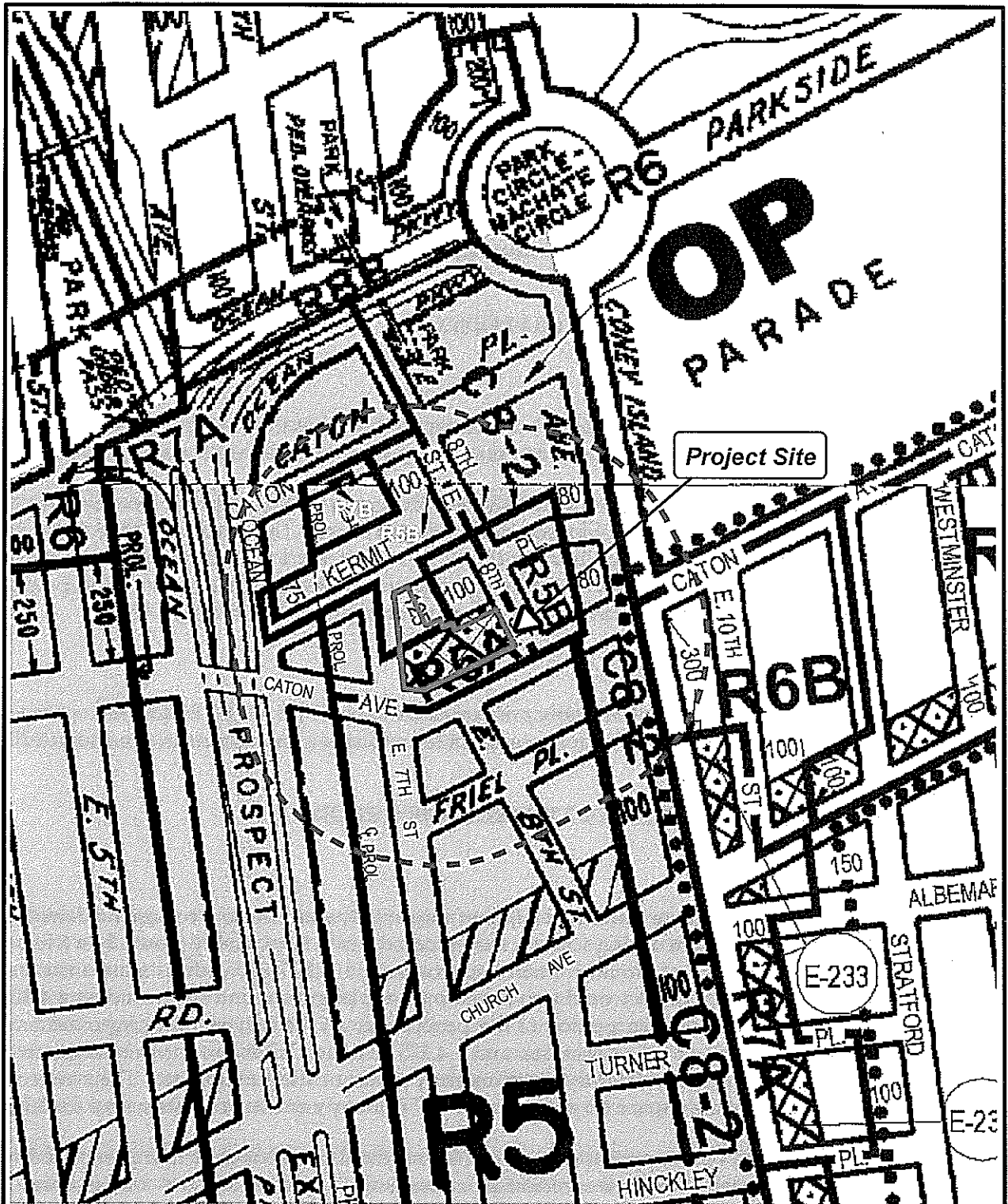
100 0 100 200  
 Feet

**Figure 2-1: Land Use**

*Proposed PS/IS 437  
 Caton Avenue, Brooklyn*

*New York City  
 School Construction Authority*

Source: NYC Department of City Planning MapPLUTO 2009;  
 STV Incorporated Field Observation 3/11



**Commercial Overlay Districts**

|      |      |      |      |      |      |      |      |      |      |
|------|------|------|------|------|------|------|------|------|------|
| C1-1 | C1-2 | C1-3 | C1-4 | C1-5 | C2-1 | C2-2 | C2-3 | C2-4 | C2-5 |
|      |      |      |      |      |      |      |      |      |      |

**Legend**

- Project Site
- 400' Study Area Radius

**Major Zoning Classifications**

- R - Residential District
- C - Commercial District
- M - Manufacturing District
- OP - Special Ocean Parkway District

Scale: NTS  
 Source: New York City Zoning Maps 16d, 22c

*Figure 2-2: Zoning*

*Proposed PS/IS 437  
 Caton Avenue, Brooklyn*

*New York City  
 School Construction Authority*

Other than zoning, there are no specific public policies applicable to the project site (e.g., 197-a plan or New York City Comprehensive Waterfront Plan).

**Waterfront Revitalization Program.** As the proposed project does not fall within the City's designated coastal zone, the proposed action was not assessed for its consistency with the policies of the City's Local Waterfront Revitalization Program.

## B. THE FUTURE WITHOUT THE PROJECT

### *LAND USE*

If the proposed PS/IS 437 is not built, no changes to the project site are expected to occur by the 2015 Build Year. The existing three lots comprising the project site would remain as vacant lots.

As part of the recently approved Flatbush Rezoning, none of the projected development sites (with a build year of 2019) are located within the study area. The Brooklyn Office of the New York City Department of City Planning (DCP) was contacted to identify other major projects planned for completion in the vicinity of the project site by the build year of the proposed school. No additional development projects or rezonings were identified by DCP.

### *ZONING AND PUBLIC POLICY*

No changes to zoning or public policy are expected to occur by the 2015 Build Year; zoning and public policy currently in effect for the project site and study area will remain in effect in 2015.

## C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

### *LAND USE*

The project would replace a series of adjacent vacant lots, and therefore require no demolition. According to the current design scheme, the proposed new school facility would be a five-story building, plus cellar, and would contain approximately 106,175 gsf, with its main entrance on Caton Avenue. The project would also develop three playgrounds on site including a 4,300 sf playground on the northern portion of the project site, a 7,600 sf general playground on the southeastern portion of the project site, and a 4,275 sf Early Childhood (pre-kindergarten and kindergarten) playground on the southwestern portion of the project site. The new school facility would provide space for approximately 757 primary and intermediate school students.

The school would be an appropriate use in the residential neighborhood. The proposed school would be consistent with the residential, commercial, institutional, and mixed uses, and therefore, locating the use at the proposed site would reinforce the well established general land use pattern of the study area. No significant adverse impacts to land use would result from the proposed PS/IS 437.



## ZONING AND PUBLIC POLICY

The project site is divided by a district boundary line between an R5B residential zoning district on the northern portion of the project site and an R6A residential zoning district on the southern portion of the project site. Within the R5B zoning district (which includes Lots 44 and 73) and the R6A zoning district (which includes Lot 64), schools are permitted as-of-right. The entire project site lies within the OP special district, in which schools are permitted as-of-right.

Pursuant to §113-11 of the *Zoning Resolution* (Article XI: Special Purpose Districts), all community facility developments and enlargements in an R5B district shall be subject to the applicable underlying district bulk regulations of Article II, Chapter 3 (Bulk Regulations for Residential Buildings in Residence Districts); however, in an R6A district, the applicable bulk regulations set forth in Article II, Chapter 4 (Bulk Regulations for Community Facility Buildings in Residence Districts) shall apply. Parking requirements vary by type of community facility; for schools, no accessory off-street parking is required.

According to the current design scheme, the proposed new building would be approximately 80,391 sf (excluding cellar and roof areas) and would have a height of approximately 76 feet. The proposed school facility would conform to the requirements of the R5B and the R6A zoning districts and the OP special district with respect to use, as schools are permitted as-of-right in all districts. However, using the current design scheme, the proposed school building would not be in compliance with the following zoning requirements: maximum permitted FAR (for the R5B portion of the site only); maximum permitted interior lot coverage; minimum required front yard (for the R5B portion of the site only); minimum required rear yard; building height and setback requirements; and the Special Off-Street Loading Regulations pursuant to the OP special district designation.<sup>1</sup> These zoning overrides for zoning non-conformities would be necessary from the Deputy Mayor for Economic Development. As the zoning overrides would pertain only to the project site, no significant adverse impact to zoning and public policy would occur.

## D. SUSTAINABILITY

Under the *CEQR Technical Manual*, large publicly sponsored projects must conduct a sustainability assessment to determine whether the project is consistent with the planning goals and objectives of PlaNYC. As the proposed project would result in the construction of a new approximately 757-seat public school to address localized school overcrowding, and is not considered to be a large publicly sponsored project, the proposed project was not assessed for its consistency with the goals and objectives established in PlaNYC.

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<sup>1</sup> Zoning analysis provided by Michael Fieldman, Architect

## CHAPTER 3: SOCIOECONOMIC CONDITIONS

Socioeconomic impacts may occur when an action would directly or indirectly change population, housing stock, or economic activities in an area. Changes may be substantial but not adverse, or beneficial to some groups and adverse to others. This chapter discusses potential impacts to socioeconomics and identifies their significance.

A detailed socioeconomic analysis is typically conducted if an action would create substantial socioeconomic changes in an area, such as direct displacement of residential population or of substantial numbers of businesses or employees. Other analysis criteria pertain to new development that may be markedly different from existing uses or that would attract substantial residential or worker populations to the area, such as development of 200 or more residential units or more than 200,000 square feet of commercial space. Under CEQR, if an action could affect the real estate market over a larger area or if it could adversely affect economic conditions of a specific industry, a socioeconomic analysis may be necessary. The proposed action would include neither residential nor commercial elements; the proposed action is the construction of a new school building, thus increasing school district capacity to address localized overcrowding and meet projected demand. Therefore, no detailed socioeconomic analysis is required.

### A. EXISTING CONDITIONS

The proposed school site is currently comprised of three vacant lots. The site is located within an area that is primarily residential. Commercial uses, however, are present just south of the site on Caton Avenue, as well as to the west and east along Ocean Parkway and Coney Island Avenue, respectively. Businesses include local services and gas stations.

### B. THE FUTURE WITHOUT THE PROJECT

If the proposed PS/IS 437 is not built, the site is expected to remain vacant. No other developments are anticipated for the study area by the 2015 Build Year, and socioeconomic conditions are generally expected to resemble existing conditions.

### C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

The proposed school facility would be constructed on a currently vacant and unoccupied site. The proposed project would introduce approximately 757 primary and intermediate school students and a total of approximately 76 teachers, administrators, and support staff to the project site. Although the proposed project would be a change of land use, it would not introduce activities that are incompatible with surrounding existing uses. The proposed PS/IS 437 would not result in the displacement of any residents or businesses. The proposed school would create additional jobs for teachers and support staff.

Although the proposed project would result in new construction, the construction activities would be generally contained within the site. In addition, the construction of the new school building would be a localized activity of limited duration, without the potential to affect a

larger area or the conditions of any specific industry. Significant adverse impacts to socioeconomic conditions from the proposed project would not result, and no further analysis is required.

## CHAPTER 4: COMMUNITY FACILITIES AND SERVICES

According to the *CEQR Technical Manual*, "...community facilities are public or publicly funded schools, libraries, child care centers, health care facilities and fire and police protection." The *CEQR Technical Manual* calls for analysis of impacts on community facilities where there are direct effects (a physical alteration or displacement) or indirect effects (addition to population of an area and a concomitant increase in demand for community services). The proposed project would not directly displace a community facility or introduce new resident population or otherwise increase demand on facilities; therefore, no direct or indirect effects to community facilities are expected and a detailed analysis is not required. This analysis, therefore, focuses on police and fire protection services, described below.

### A. EXISTING CONDITIONS

**Police Services.** Police protection is provided by the City of New York Police Department (NYPD) 72<sup>nd</sup> Police Precinct, which has jurisdiction over the project site. Its headquarters are located at 830 4<sup>th</sup> Avenue, approximately 2.4 miles northwest of the site.

**Fire Services.** Fire protection services would be provided by the City of New York Fire Department (FDNY). The facilities closest to the project site that would serve the proposed school include Engine Company 240, located approximately 0.6 miles northwest of the school site at 1307 Prospect Avenue; and Engine Company 281 and Ladder Company 147, located approximately 0.9 miles southeast of the school site at 1210 Cortelyou Road.

### B. THE FUTURE WITHOUT THE PROJECT

**Police Protection.** No significant change in the demand for service or in the provision of service to community residents is expected.

**Fire Protection.** No significant change in the demand for service or in the provision of service to community residents is expected.

### C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

The proposed action would create a new public school facility on a site currently comprised of three vacant lots. The proposed PS/IS 437 would serve approximately 757 students in grades pre-kindergarten through eight within CSD No. 15.

**Police Protection.** A letter, dated February 3, 2011, was sent to the NYPD seeking their opinion as to whether or not the proposed school would adversely impact their ability to provide police protection to its secure area (see Appendix A). It is expected that the proposed school would have no significant impact on police protection in the community as a result of the project.

**Fire Protection.** The proposed school would be constructed to meet all existing fire code regulations and would generate a negligible increase to the potential workload of the FDNY. The FDNY has no plans to make any changes in stations or equipment in the area of the proposed school. A letter, dated February 24, 2011, from the FDNY states that the proposed project would not increase demand for additional services (see Appendix A). It is expected that

the proposed project would not adversely impact the FDNY's ability to provide fire protection to its service area.

The proposed project would not introduce new residents to the area, creating little new demand for community facilities and services. The proposed new school facility would provide additional seating capacity for CSD No. 15; however, the new facility would not introduce new school-aged population to the school district or change its service area. None of the CEQR criteria for detailed community facility analyses are met, and no significant adverse impacts to community facilities would occur as a result of the proposed project.

## CHAPTER 5: OPEN SPACE AND RECREATIONAL FACILITIES

The *CEQR Technical Manual* calls for analysis of open space impacts if there could be direct effects on an open space (physical loss of public open space by encroachment or displacement); or indirect impacts (increase in demand through the addition of 200 residents or more, or 500 employees or more). As the proposed project would not directly eliminate or alter open space or increase the utilization of neighborhood open spaces (e.g., as through the addition of 200 or more residents or 500 or more employees), a detailed open space analysis is not required.

### A. EXISTING CONDITIONS

The project site does not contain any publicly accessible open space. The 400-foot study area contains a portion of the Prospect Park Parade Grounds, which is one block to the east of the project site, and a portion of the Ocean Parkway medians, which are one block to the west of the project site. The closest publicly accessible open space to the proposed project site is Prospect Park, which is approximately 585 acres and contains a forest, the 90-acre Long Meadow, the 60-acre Prospect Lake, Prospect Park Zoo, and the Prospect Park Parade Grounds. The Ocean Parkway medians extend over a distance of approximately five miles from Prospect Park to Brighton Beach. The Ocean Parkway medians contain trees, benches, and pedestrian paths; the west median also has a bike path, part of the Brooklyn-Queens Greenway. A public park, located at the intersection of Ocean Parkway and East 8<sup>th</sup> Street, is approximately two blocks to the north of the project site outside of the study area.

### B. THE FUTURE WITHOUT THE PROJECT

In the absence of the proposed project, no significant change is expected regarding open space resources within the study area.

### C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

The construction of a new school facility on the project site would not have any direct or indirect impacts on open space. The need for physical education at the school would be met within the project site itself with the provision of three separate playgrounds including a 4,300 sf playground on the northern portion of the project site, a 7,600 sf general playground on the southeastern portion of the project site, and a 4,275 sf Early Childhood (pre-kindergarten and kindergarten) playground on the southwestern portion of the project site. Therefore, the proposed new school facility would not result in any significant adverse impacts to open space resources.

## CHAPTER 6: SHADOWS

This section discusses the potential impacts of the proposed project with regard to shadows. Under CEQR, a shadow is defined as "...the condition that results when a building or other built structure blocks the sunlight that would otherwise directly reach a certain area, space or feature." An adverse impact may occur if a proposed action would result in a new structure (or addition to an existing structure of 50 feet or more) or is located adjacent to, or across the street from, a resource that has been identified as sunlight sensitive.

### A. EXISTING CONDITIONS

The proposed project site is currently vacant and unoccupied. As noted in the land use and open space analyses, the 400-foot study area contains a portion of the Prospect Park Parade Grounds to the east and a portion of the Ocean Parkway medians to the west. There are no historic buildings located in the vicinity of the project site or within the study area.

### B. THE FUTURE WITHOUT THE PROJECT

If the new PS/IS 437 is not built, the proposed project site is expected to remain vacant.

### C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

The proposed project would result in a five-story school building which would be over 50 feet in height. Therefore, a screening for shadow impacts was performed.

With an estimated height of approximately 76 feet, the proposed school building's maximum shadow would extend approximately 327 feet. There are no buildings or open spaces that would fall in the shadow of the proposed PS/IS 437 that are considered historic or possess significant sunlight-sensitive features. Therefore, because the proposed school would not cast a shadow over any historic buildings or landscapes, significant adverse shadow impacts would not result, and no further analysis is warranted.

## CHAPTER 7: CULTURAL RESOURCES

This section considers the potential impact of the construction of the proposed PS/IS 437 on archaeological and historic resources on or near the project site.

For archaeological resources, the *CEQR Technical Manual* recommends a detailed evaluation if there would be in-ground disturbance of an area not previously excavated. For historic resources, the *CEQR Technical Manual* recommends a detailed assessment if a proposed action would result in an adverse effect on historic buildings, structures, objects, sites or districts.

The creation of a new school facility would result in a disturbance of lands already disturbed by previous construction activities. The project site is located in an area comprised mostly of residential uses, with some neighborhood commercial uses nearby. The site is not located within a historic district or within close proximity to any historic landmark or district.

In accordance with the New York State Historic Preservation Act of 1980 (SHPA), consultation with the New York State Office of Parks, Recreation and Historic Preservation (OPRHP) was undertaken as part of the cultural resources site review (see Appendix A). A letter, dated March 28, 2011, was sent to OPRHP requesting a cultural resources site review of the project site in order to ascertain whether an archaeological documentary study and/or an historic resources evaluation must be conducted. OPRHP, in its letter of April 27, 2011, requested additional information about the project site including: a full project description showing area of potential effect; clear, original photographs of buildings/structures 50 years or older; and clear, original photographs of the surroundings looking out from the project site in all directions, keyed to a site map. These items were provided to OPRHP in a response letter, dated July 15, 2011, and are included in Appendix A. OPRHP (OPRHP Project Review Number 11PR02787), in its letter of July 21, 2011, stated that the proposed project will have No Impact upon cultural resources in or eligible for inclusion in the State and National Register of Historic Places. Therefore, construction of the proposed new school facility on the site would not result in significant adverse impacts to archaeological resources or historic resources, and no further research and study of archaeological resources or historic resources is warranted.



## CHAPTER 8: URBAN DESIGN AND VISUAL RESOURCES

Urban design is the physical appearance of the neighborhood, including building bulk, use and type, building arrangement, block form and street pattern, streetscape elements, street hierarchy and natural features. Visual resources are the unique or important public view corridors, vistas, or natural or built features of the area. The assessment of urban design is concerned with the potential changes to the pedestrian experience that may result from a proposed action. The *CEQR Technical Manual* recommends a preliminary assessment to determine whether physical changes proposed by the project could rise to the level of potential significant adverse impact. A detailed assessment of urban design and visual resources may be appropriate when a project would have substantially different bulk or setbacks than exist in an area, and when substantial new, above-ground construction would occur in an area that has important views, natural resources or landmark criteria.

### A. EXISTING CONDITIONS

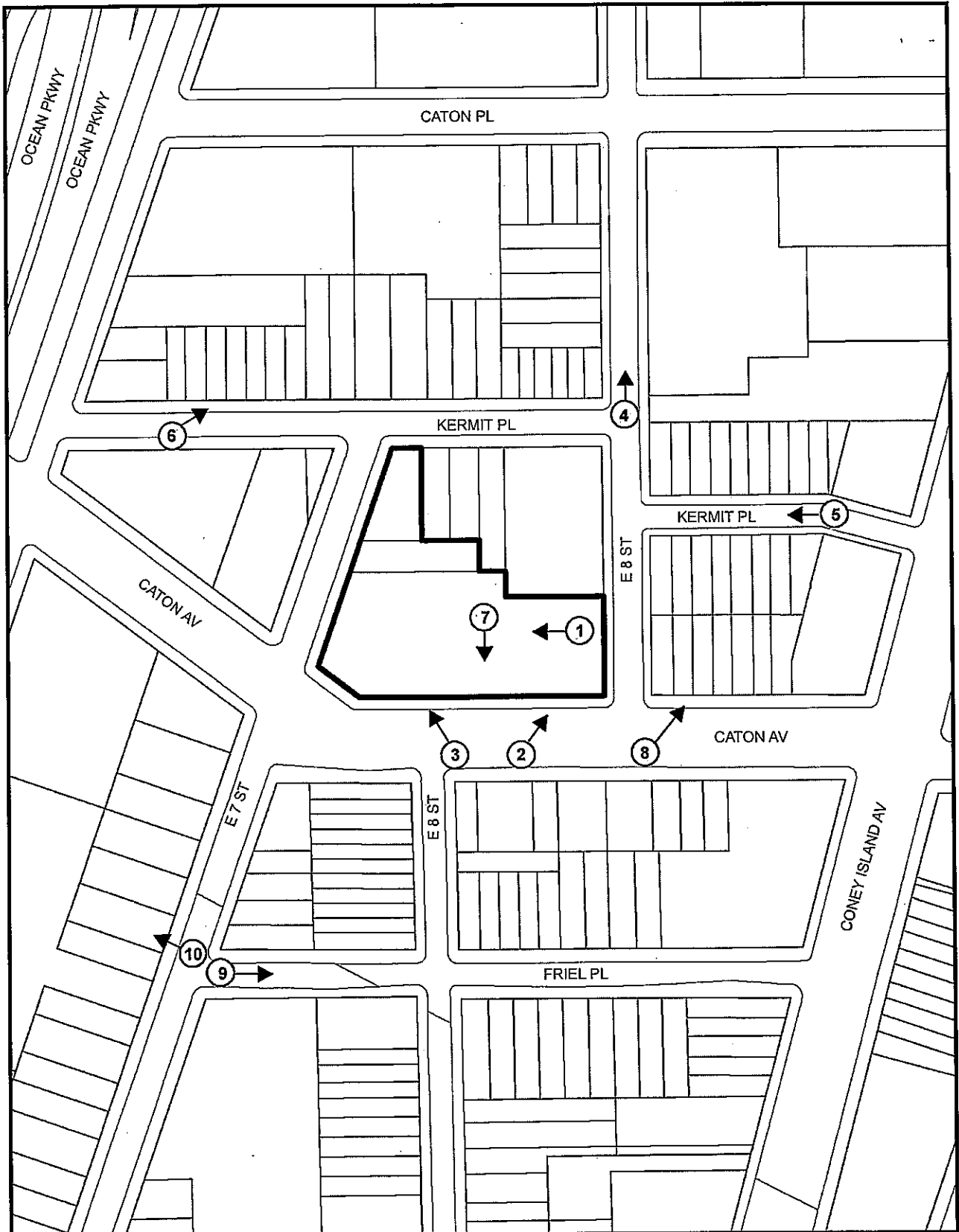
#### *PROJECT SITE*

As described in Chapter 2, "Land Use, Zoning, and Public Policy," the site is located within a residential area, though commercial uses ranging from gas stations to local neighborhood retail and services are present along the wider streets, such as Caton Avenue, Coney Island Avenue, and Ocean Parkway.



The site contains no structures (see Figure 8-1, Photo 8-1). Previously developed as commercial property and residences, the site is now vacant and enclosed by a mix of plywood construction fencing (Lots 44 and 73) and chain-link fencing (Lot 64). While much of the interior of the site, therefore, is not readily visible from the sidewalk, most of the site is unpaved, either with soil exposed or overgrown with grasses/weeds. Landscaping equipment, materials and vans are stored along the southwestern corner of the project site behind the chain-link fence, where a portion of the site is paved in concrete and asphalt, in poor condition.

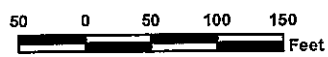
#### *STUDY AREA*

**Building bulk, use and type.** Most streetscapes immediately surrounding the site are characterized by residential uses, which range from two-story single family homes to six-story elevator apartment buildings. A six-story apartment building stands on the northeastern corner of the site block, and similar six-story apartment buildings stand west and southwest of the site on East 7<sup>th</sup> Street (see Photos 8-1, 8-2, and 8-3).



**Legend**

-  Project Site
-  Photograph



Source: STV Incorporated Field Observation March 2011

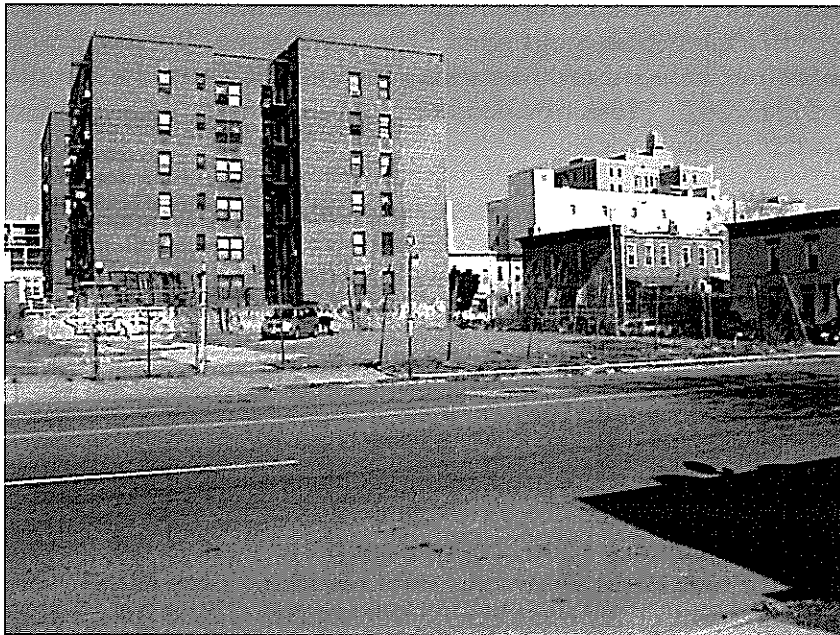
**Figure 8-1: Photograph Key**

*Proposed PS/IS 437  
Caton Avenue, Brooklyn*

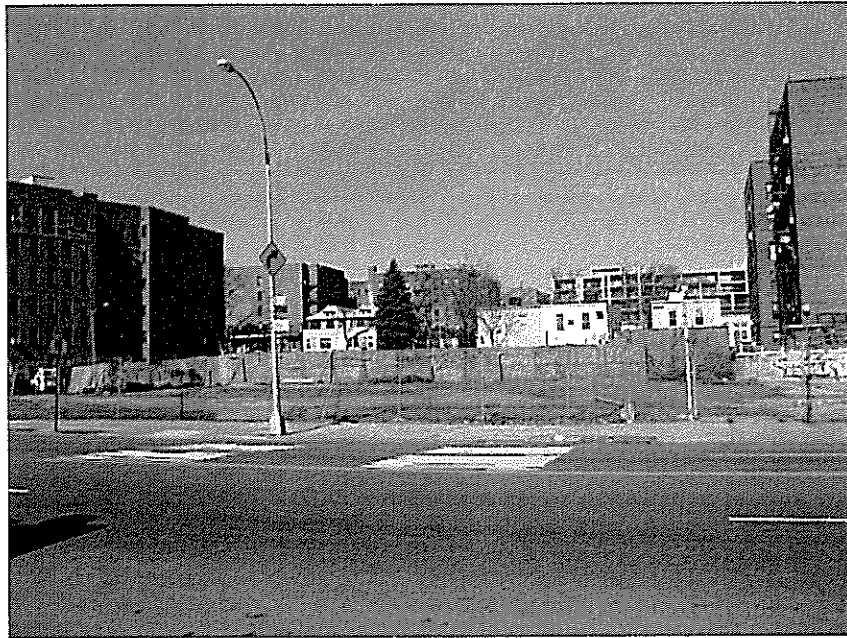
*New York City  
School Construction Authority*



*Photo 8-1: View of site, facing west, from East 8<sup>th</sup> Street; apartment buildings on west side of East 7<sup>th</sup> Street visible in background.*



*Photo 8-2: View of southeast corner of site, facing northeast from Caton Avenue.*



*Photo 8-3: View of site, facing northwest from Caton Avenue.*

Bulky institutional and commercial buildings are also located around the intersection of East 8<sup>th</sup> Street and Caton Place, where a new six-story apartment building is under construction. The block northeast of East 8<sup>th</sup> Street and Kermit Place (northeast of the site) is dominated by the Calvary Cathedral of Praise church, its parking lot, and the annex for the Brooklyn College Academy (see Photo 8-4). These two buildings and the church parking lot, together, cover about three-quarters of this block.

Other portions of the streetscape immediately surrounding the site, on the northeast corner of the block, the Kermit Place and East 8<sup>th</sup> Street streetscapes north and east of the site, respectively, are intimately scaled. Extending east from the site to Coney Island Avenue, Kermit Place includes two-story rowhouses (see Photos 8-3 and 8-5). This rowhouse streetscape continues along Kermit Place, west from site, until nearing Ocean Parkway (see Photo 8-6). A large vacant lot once the site of an automobile dealership is present at the northwest corner of Coney Island Avenue and Kermit Place.

Caton Avenue is a wide street that runs east-west along the southern boundary of the site. Directly south of the site, the buildings on Caton Avenue are one- and two-stories tall (see Photo 8-7). Buildings of similar bulk, both residential and commercial, line the remainder of Caton Avenue to the east in the study area until reaching Coney Island Avenue, creating a streetscape similar to Kermit Place one block north. At Coney Island Avenue, buildings include two 6-story elevator apartment buildings (see Photo 8-8).



*Photo 8-4: View of East 8<sup>th</sup> Street looking north towards Caton Place. Calvary Cathedral of Praise is to the right and the apartment building under construction on Caton Place is in upper left.*



*Photo 8-5: View of rowhouses on Kermit Place, looking west toward East 8<sup>th</sup> Street. The apartment building in background is adjacent to the site, on the northeast corner of the same block.*



*Photo 8-6: View of rowhouses on north side of Kermit Place between Ocean Parkway and East 7<sup>th</sup> Street.*



*Photo 8-7: View of project site, view facing south toward Caton Avenue.*



*Photo 8-8: View of rowhouses on north side of Caton Avenue between Coney Island Avenue and East 8<sup>th</sup> Street.*

Streetscapes south of the site are similar to those to the east. East 8<sup>th</sup> Street, south of the site and south of Caton Avenue, is characterized by attached, two-story houses. Friel Place, one block south of Caton Avenue, between East 7<sup>th</sup> Street and Coney Island Avenue, is characterized by one- and two-family attached residences, although a seven-story apartment building stands southeast corner of Friel Place and East 7<sup>th</sup> Street (see Photo 8-9). As Friel Place reaches Coney Island Avenue to the east, two-story mixed use buildings (commercial on the ground floor/residential top floor) stand along the south side of the street and a one-story gas station is present on the north side. East 7<sup>th</sup> Street between Caton Avenue and Friel Place, southwest of the site, is characterized by detached, three-story single family houses; however, there is dramatic difference in bulk and height between houses on East 7<sup>th</sup> Street in the study area and buildings on the same block but facing onto Ocean Parkway just beyond the western edge of the study area (see Photo 8-10).

**Building arrangement.** Rowhouses on Kermit Place north and east of the site and on Caton Avenue southeast of the site are uniformly built to or nearly to the front lot lines, thus establishing a regular streetwall in these areas directly north, east and southeast of the site. Similar building arrangements characterize East 7<sup>th</sup> Street and East 8<sup>th</sup> Street south of the site, though the portion of Caton Avenue directly south of the site is not as densely arranged or evenly aligned to form a uniform streetwall.





*Photo 8-9: View of Friel Place looking west toward East 8<sup>th</sup> Street.*



*Photo 8-10: View of homes along west side of East 7<sup>th</sup> Street south of Caton Avenue, looking west (southwest of the site).*



The building arrangements for the institutional, mixed-use and apartment buildings are high coverage with extensive lot area devoted to the building footprints. In general these buildings are built up to the lot lines. This pattern characterizes the outer edges of the study area, along Ocean Parkway to the west, Caton Place and Hamilton Parkway to the north, and Coney Island Avenue to the east, as well as the block directly west of the site.

**Street hierarchy, block form, and street pattern.** Coney Island Avenue, with its two travel lanes in each direction, is a major north-south street one block east of the site, and Ocean Parkway is a large thoroughfare one block to the west, with one travel lane and two parking lanes in each direction. Caton Avenue, which runs along the southern edge of the site, is the major east-west street. Other streets (East 7<sup>th</sup> and East 8<sup>th</sup> Streets, Kermit Place, Caton Road, and Friel Place) are narrower local streets, serving the residential neighborhoods surrounding the site (see Figure 2-1).

The blocks in the study area vary in size and orientation and are trapezoidal in shape because some streets (i.e., Ocean Parkway, East 7<sup>th</sup> Street, Coney Island Avenue, and Caton Avenue) run diagonally through the otherwise regular grid of local streets in the study area. Consequently, the sizes of the lots in the study area vary, with large lots common to most blocks; the larger lots typically host apartment buildings, institutional uses, gas stations, vacant lots, and commercial uses. The smaller, narrower lots in the study area generally host rowhouses, while similar lots, though double or triple in width, host single family residences along East 7<sup>th</sup> Street south of Caton Avenue, along portions of Friel Place, and along East 8<sup>th</sup> Street north of Kermit Place.

**Streetscape elements.** Street trees are found along the entire segment of Ocean Avenue within the study area boundary, one block west of the site; along the north side of Kermit Place from East 8<sup>th</sup> Street to Ocean Parkway north and northeast of the site; in front of the residential buildings along the south side of Caton Avenue between Coney Island Avenue and East 8<sup>th</sup> Street, south and southeast of the site; and generally along the residential blocks of East 7<sup>th</sup> and East 8<sup>th</sup> Streets and Friel Place, south and southwest of the site. The presence of street trees, however, is not a defining feature of the streetscape, as they are not of uniform maturity and size or consistent placement.

Residential yards feature plantings and trees, though levels of maintenance vary throughout the study area. For the most part, yards are small, and so the visual contribution of private landscaping to the public streetscape is limited. Commercial uses generally contribute little or no landscaping to the streetscape.

Street lighting fixtures throughout the study area are utilitarian, rather than decorative, and do not promote any unique or meaningful design statement. Likewise, there is no street furniture, within the study area, aside from mail boxes or bus stops.

Curbside parking is present and utilized throughout the study area; parking meters are provided along the south side of Friel Place (parallel to the mixed use buildings located to the west of Coney Island Avenue).

**Visual Resources.** A small portion of the Prospect Park Parade Grounds extends to within 400 feet of the site, along Caton Avenue west of Coney Island Avenue. The Parade Grounds are marginally visible to/from the sidewalks south of the project site along Caton Avenue. From

the project site itself, the Parade Grounds are not visible, nor is the project site in its current condition, visible from the Parade Grounds (see Photo 8-5). This owes to the bend in Kermit Place that extends from the site at East 8<sup>th</sup> Street, to Coney Island Avenue, as well as to the apartment building on the northeast corner of the site block.

## B. THE FUTURE WITHOUT THE PROJECT

If the proposed PS/IS 437 is not built, no changes to the project site are expected to occur by the 2015 Build Year. No other developments are anticipated for the study area by the 2015 Build Year, and urban design and general visual quality are generally expected to resemble existing conditions. The school site, itself, would remain vacant and unoccupied, and future conditions without the project would generally resemble existing conditions.

## C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

**Building bulk, use and type.** The proposed PS/IS 437 would not fully comply with zoning regulations with respect to bulk. The building would stand approximately five stories tall and its height and massing would be similar to that of apartment buildings found throughout the study area and adjacent to the site.

**Building arrangement.** The placement of the proposed school would appear less intensive than apartment buildings, particularly as the school would be placed in two connected volumes oriented toward the southwest corner of the site. The school's three outdoor playgrounds would function visually as side yards, and therefore blend the site with the lower-scale residential and commercial streetscapes to the north and south.

**Block form and street pattern.** The proposed PS/IS 437 would not alter the arrangement or configuration of blocks, nor would it alter the surrounding streets from the current pattern and prevailing form.

**Streetscape elements.** New street trees would be planted along sidewalks surrounding the site, thus enhancing the East 7<sup>th</sup> Street and Caton Avenue streetscapes. The proposed PS/IS 437 playgrounds would be enclosed with fencing that would maintain the visual openness of these spaces, further enhancing the surrounding streetscapes.

**Street hierarchy.** The proposed project would not alter the street hierarchy of the study area, nor would it affect the street hierarchy of the broader area.

**Visual Resources.** No visual resources, such as parks or historic structures, exist on the project site, and the Prospect Park Parade Grounds, located one block to the east of the site, does not share visual connectivity with the site. Slight views to and from Ocean Parkway, likewise, would not present a change in context of Ocean Parkway; rather, where the currently vacant site may be visible, the improvements to the site, particularly the provision of street trees, would improve upon the visual context of Ocean Parkway. Therefore, the proposed project would not result in visual resources impacts and no further analysis is necessary.

The height and massing of the school would resemble the surrounding apartment buildings, and the arrangement of the school volumes and playgrounds would blend the site with the low-scale residential and commercial streets to the north and south. Thus, the form of the building and the ample landscaping would coherently tie the site into the built fabric while improving the current, vacant state of the site. Overall, the proposed PS/IS 437 would contribute positively to the urban design of the area, enhancing the pedestrian experience in the vicinity of the site. Therefore, no significant adverse impacts related to urban design would result and no further analysis is warranted.

## CHAPTER 9: NEIGHBORHOOD CHARACTER

The *CEQR Technical Manual* defines neighborhood character as the amalgam of various elements that give neighborhoods their distinct personality, including land use, urban design, visual resources, historic resources, socioeconomic conditions, traffic, and noise. The *CEQR Technical Manual* recommends an assessment of potential impact on neighborhood character when the proposed project has the potential to result in any significant adverse impacts in the following areas: land use, zoning, and public policy; socioeconomic conditions; open space; historic and cultural resources; urban design and visual resources; shadows; transportation; or noise. An assessment of neighborhood character is also a means of summarily describing whether the proposed school facility would be compatible with its surroundings.

### A. EXISTING CONDITIONS

The project site is situated along Caton Avenue, a busy and wide street providing the only east-west thoroughfare in the immediate area. Ocean Parkway to the west provides a well trafficked route for northbound traffic and is where higher density residential uses are located. Coney Island Avenue is a heavily used north-south corridor east of the site, lined with commercial uses.

The project site currently contains three vacant lots, surrounded by wooden construction fencing, and chain link fence. The site is poorly maintained, with some paved areas and the remainder comprising a mix of exposed soil or grasses and weeds. Landscaping equipment and materials are stored in a small portion of the site. In its current condition the site detracts from the streetscape along Caton Avenue and contrasts with the more well-maintained and attractive residential streets in the study area, particularly to the north and west.

The side streets in the residential blocks surrounding the project site have a consistent visual character due to the uniformity in urban design. Building heights range from two to three stories for attached and detached homes and up to six stories for the apartment buildings that are interspersed throughout the study area. Apart from the vacant site, the homes and buildings in the neighborhood are well maintained. Many homes have small front yards, decorative fencing or plantings, further enhancing the residential character of the streetscape.

### B. THE FUTURE WITHOUT THE PROJECT

If the proposed PS/IS 437 were not built, no changes to the project site are expected to occur by the 2015 Build Year. The character of the site, its adjacent streetscapes, and surrounding neighborhoods would be expected to resemble existing conditions. The site would continue to detract from the overall quality of the neighborhood.

### C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

The construction of the proposed PS/IS 437 would be an appropriate land use, and its design would contribute to the visual quality of the area. Its height and massing would be consistent with the apartment buildings in the neighborhood, and the arrangement of the site would

ensure balance along the surrounding, lower-density residential and commercial streetscapes. The new landscaping and site design would contribute positively to the streetscapes.

Furthermore, technical analyses have concluded that with the recommended improvement measures in place, the proposed school at this location would not result in significant adverse impacts related to traffic, air or noise conditions that would alter the character of the neighborhood.

## CHAPTER 10: NATURAL RESOURCES

Under CEQR, a natural resources assessment considers species in the context of the surrounding environment, habitat or ecosystem, and examines a project's potential to impact those resources. The *CEQR Technical Manual* recommends that an assessment may be appropriate if a natural resource is present on or near the site of the project and disturbance of that resource is caused by the project.

### A. EXISTING CONDITIONS

The project is located within an urbanized area and is not in close proximity to any significant terrestrial or aquatic resources. There are no visible wetlands, water bodies or streams located on or near the site. Flood potential is evaluated by the Federal Emergency Management Agency (FEMA), which delineates the floodplain for 100- and 500-year flood events. According to information obtained through the on-line FEMA Map Services Center ([www.msc.fema.gov](http://www.msc.fema.gov)), the area of the project site is not located within a 100- or 500-year flood zone. Therefore, this does not represent an environmental concern for the project site. As the project site is located in an unprinted panel area, a FEMA map was not available for the project site. No significant natural resources exist within the disturbed project site, or within the surrounding area.

### B. THE FUTURE WITHOUT THE PROJECT

Without the proposed project, no significant changes are expected with regard to natural resources.

### C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

There are no known natural resources (e.g., terrestrial ecological features, wetlands, water bodies, streams, or special flood hazard area) on or adjacent to the project site, and none would be affected by the proposed project. The site is located within a well-developed residential and commercial urban context. Furthermore, the proposed project would not have any impact on endangered or threatened wildlife species, since none are known to inhabit or visit the site. A letter, dated February 15, 2011, was received from the New York State Department of Environmental Conservation (NYSDEC), Division of Fish, Wildlife & Marine Resources, stating that an endangered vascular plants species from the New York Natural Heritage Program database has been identified at Prospect Park Lake within approximately 0.3 miles of the project site (see Appendix A). None of the plant species are located on the project site.

None of the CEQR criteria for detailed natural resources analyses are met; significant adverse impacts to natural resources would not result, and no additional analysis is necessary.

## CHAPTER 11: HAZARDOUS MATERIALS

This section addresses soil and groundwater conditions at the proposed site that was originally three separate but contiguous properties. Phase I Environmental Site Assessments (ESAs) were conducted by STV Incorporated (STV) on behalf of the SCA in March 2008 and February 2011. The main objectives of the Phase I ESAs were to identify the presence or likely presence, use, or release of hazardous substances or petroleum products which are defined in American Society of Testing and Materials (ASTM) Standard Practice E 1527-05 as recognized environmental conditions (RECs). In addition, other environmental issues such as radon, asbestos-containing materials (ACM), lead-based paint (LBP), and polychlorinated biphenyl (PCB) containing materials/equipment were evaluated. Both Phase I ESAs included a site inspection, a review of the existing data on geology and hydrology of the area, interviews, a review of historical maps, available regulatory agency records, and other documents to assess past and current uses of the site and adjacent areas.

The Phase I ESAs identified recognized environmental conditions (RECs) related to the historic use of the southern portion of the site as a metal manufacturing facility from at least 1905 through 1997, the potential presence of buried structures from the prior demolition of on-site dwellings on the northern portion of the site, potential for buried fuel tanks and/or prior fuel releases on site; an off-site spill incident at a nearby and crossgradient property; and long-term use of the surrounding properties as gasoline filling stations with reported releases, auto repair facilities, and a dry cleaning facility. Environmental concerns were identified with respect to the potential presence of suspect ACM, LBP, and PCBs in potential buried structures on site.

### A. EXISTING CONDITIONS

The site is located at 701 Caton Avenue, 161 East 7th Street, and 42 Kermit Place, Brooklyn, New York and is situated on the north side of Caton Avenue between East 7<sup>th</sup> Street to the west, East 8<sup>th</sup> Street to the east, and Kermit Place to the north. The legal description for the site is Block 5321, Lots 64, 73, and 44. The site consists of an approximate 37,100 square foot vacant property. The northern portion of the site contains a partial building foundation from an abandoned construction project. The surrounding area is developed with residential buildings and several commercial properties.

Phase II Environmental Site Investigations (ESIs) were performed on the site in 2008 and 2011. The Phase II ESIs consisted of geophysical surveys, advancement of soil borings, installation of groundwater monitoring wells, and collection of soil vapor, soil, and groundwater samples within the proposed site for laboratory analyses. Soil vapor samples were analyzed for volatile organic compounds (VOCs) plus methane; subsurface soil samples were analyzed for VOCs, semi-volatile organic compounds (SVOCs), pesticides, PCBs, and metals; and groundwater samples collected from temporary and permanent monitoring wells were analyzed for VOCs, SVOCs, metals, and cyanide.

The depth to groundwater beneath the site as measured during the 2011 Phase II ESI ranged from approximately 38 to 43 feet below ground surface (ft bgs). Groundwater at the site flows in a southerly direction. No evidence of historic fill was encountered in the northern portion of the site; however, soil borings advanced on the southern portion of the site in 2008 revealed the

presence of historic fill materials classified as sand-silt mixtures containing fragments of brick and concrete that ranged in depth from grade to a maximum depth of 27 ft bgs. The fill material was deepest beneath the original site building that was used as a metal manufacturing facility.

The geophysical investigations identified minor scattered anomalies and remnants of former building foundations; however, no evidence of underground storage tanks was identified. The results of the soil vapor survey indicate the presence of elevated concentrations of chlorinated volatile organic compounds (VOCs) and petroleum-related VOCs above applicable New York State Department of Health (NYSDOH) background indoor air ranges. In addition, the VOCs, tetrachloroethene (PCE), and trichloroethene (TCE) were detected at concentrations greater than the NYSDOH Air Guidance Values (AGVs) of 100 ug/m<sup>3</sup> and 5 ug/m<sup>3</sup>, respectively.

Subsurface soils contain elevated concentrations of semi-volatile organic compounds (SVOCs), pesticides, polychlorinated biphenyls (PCBs), and metals. The data from shallow soil samples indicate elevated concentrations of lead, at concentrations characteristic of hazardous waste. These constituents are attributed to historic manufacturing operations conducted in the southern portion of the site from approximately 1905 through 1997, as well as to fill material.

The results of groundwater sampling indicate the presence of elevated concentrations of TCE, PCE, 1,1,1-trichloroethane, 1,1-dichloroethane, and chloroform. While the concentrations of VOCs in groundwater exceed NYSDEC standards, they are attributed to the historic use of VOCs on the southern portion of the site over the 90-year history of manufacturing, and possibly off-site sources since TCE and chloroform were detected in the most upgradient on-site well.

## **B. THE FUTURE WITHOUT THE PROJECT**

This analysis assumes that without the proposed project, the site would remain the same and would not be converted to a New York City School.

## **C. PROBABLE IMPACTS OF THE PROPOSED PROJECT**

The proposed project would not result in impacts from contaminated media and building materials. During construction, contaminated soils would be removed and the contractor would properly manage excavated soil in accordance with all applicable local, state, and federal regulations. In addition, to minimize the potential for construction workers' exposure, standard industry practices, including appropriate health and safety measures, would be utilized. A vapor barrier and sub-slab depressurization system would be included in the new school's design and construction to prevent potential migration of organic vapors into the proposed school building. For areas of the site where exposed soils may exist (i.e., landscaped areas), a two-foot thick layer of environmentally clean fill would be placed over the soils. All on-site groundwater monitoring wells and the inactive historic water supply well would be abandoned in accordance with State regulations.



## CHAPTER 12: INFRASTRUCTURE

The *CEQR Technical Manual* sets the following relevant criteria for the preparation of a detailed infrastructure assessment: if an action would have an exceptionally large water requirement (greater than 1 million gallons per day), or is located in a portion of the water supply distribution system known to have limited supply capacity, a detailed analysis is appropriate. For water usage, the proposed action would need to meet the CEQR criteria of demanding a very large quantity of water, which is not typical of school projects. Therefore, no detailed analysis of water supply is needed.

Stormwater management can be a concern if it transmits new or increased levels of pollutants to the City's water bodies, such as may occur as a result of industrial facilities, large impervious surfaces or project activities or construction that would increase the potential for soil erosion and sedimentation of water bodies. The *CEQR Technical Manual* lists industrial activities that may require assessment and indicates that clearing, grading and excavation activities affecting an area of less than five acres (and not also part of a larger plan of development) would not require a State Pollution Discharge Elimination System (SPDES) permit.

### A. EXISTING CONDITIONS

Publicly-supplied infrastructure includes water, sewage, and solid waste services. Privately-supplied infrastructure includes electrical and gas service, as well as telephone service.

**Water Supply.** Water is supplied to the site from the Delaware and Catskill reservoir systems through New York City's municipal water distribution system, which has a cumulative storage capacity of 550 billion gallons. Information obtained from a feasibility study prepared for 701 Caton Avenue (SCA, 2008) indicates that 8-inch water mains run around the project site along Caton Avenue, East 8<sup>th</sup> Street, and East 7<sup>th</sup> Street.

These mains currently provide potable water for both process and sanitary requirements, and also supply fresh water for the proposed school's fire sprinkler system. Water pressure throughout the City system is generally about 20 pounds per square inch (psi), which, according to the *CEQR Technical Manual*, is the minimum pressure acceptable for uninterrupted service.

The existing site is currently vacant and unoccupied; therefore, there is currently no on-site water usage.

**Storm/Sanitary Sewers.** The site is located within the Owls Head Wastewater Treatment Plant (WWTP) drainage area, which serves portions of Brooklyn. The Owls Head WWTP is permitted to treat 120 million gallons per day (mgd). Effluent from the plant is regulated by NYSDEC under SPDES.

Sanitary wastewaters generated at the project site are currently discharged to the New York City sewer system, which carries wastewaters to the Owls Head WWTP. According to the feasibility study for 701 Caton Avenue, a system of combined sanitary and storm sewer mains service the project site as follows:

- One 12-inch combined sewer runs along East 7<sup>th</sup> Street;
- One 15-inch combined sewer runs along East 8<sup>th</sup> Street; and
- One 18-inch combined sewer runs along Caton Avenue.

There is currently no wastewater generation at the project site since it is unoccupied.

#### B. THE FUTURE WITHOUT THE PROJECT

Without the proposed action, no substantial change is expected with regard to water usage and sewage flow at the project site.

#### C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

**Water Supply.** According to the *CEQR Technical Manual*, each occupied school seat is estimated to consume approximately 10 gallons per day (gpd) of water, and it is assumed each staff member would consume approximately 10 gpd. In addition, 0.17 gpd would be required per square foot of space for air conditioning an educational facility. The proposed school would include approximately 757 seats and 76 faculty and staff, and thus, daily water usage would be approximately 7,570 gpd for students and 760 gpd for staff, for a total of 8,330 gpd. The proposed school building would contain approximately 106,175 gsf, and thus, would consume an additional 18,050 gpd for air conditioning, for a total of 26,380 gpd during the cooling season. No significant adverse impacts to water supply would result.

**Storm/Sanitary Sewers.** The amount of sewage generated by the proposed school would be approximately 8,330 gpd, and would be minimal in comparison to the treatment plant's permitted capacity; no adverse impacts are expected.

## CHAPTER 13: SOLID WASTE AND SANITATION

A solid waste assessment determines whether a proposed project would cause a substantial increase in solid waste production that would overburden available waste management capacity or otherwise be inconsistent with the City's Solid Waste Management Plan (SWMP) or with state policy related to the City's integrated solid waste management system. According to the *CEQR Technical Manual*, if a project's generation of solid waste in the With-Action condition would not exceed 50 tons per week, it may be assumed that there would be sufficient public or private carting and transfer station capacity in the metropolitan area to absorb the increment, and further analysis generally would not be required. The *CEQR Technical Manual* recommends that the solid waste to be generated by a project be disclosed, using the citywide average rates for waste generation.

### A. EXISTING CONDITIONS

Solid waste collection and disposal is the responsibility of the New York City Department of Sanitation (DSNY) and private carters. DSNY is responsible for collecting and disposing of solid waste from public facilities and residences while commercial entities must retain private carters.

There is currently no solid waste generated on the project site since it is currently unoccupied.

### B. THE FUTURE WITHOUT THE PROJECT

Without the proposed action, no substantial change is expected with regard to solid waste generation at the project site.

### C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

Using the solid generation rates for a public primary school use and a public intermediate school use, which is 3.5 pounds per pupil per week (average of the two rates) and 13 pounds per employee (office building rate), the proposed school would generate approximately 3,638 pounds of solid waste per week, or 15,765 pounds per month.

DSNY is responsible for collecting and disposing of solid waste from residences and public facilities, including schools. The typical DSNY collection truck for commercial carters typically carries between twelve to fifteen tons of waste material per truck. Therefore, with 3,638 pounds of solid waste per week, or 15,765 pounds per month, to be generated by occupants of the proposed school facility, there would be no significant adverse impact anticipated with solid waste collection and disposal.

## CHAPTER 14: ENERGY

Energy analyses are appropriate when an action could significantly affect the transmission or generation of energy, or generate substantial indirect consumption of energy. A detailed assessment of energy impacts would be limited to projects that may significantly affect the transmission or generation of energy. Although significant adverse energy impacts are not anticipated for the great majority of projects analyzed under CEQR, a discussion of the proposed school's projected amount of energy consumption during long-term operation is discussed below.

### A. EXISTING CONDITIONS

The neighborhood surrounding the project site along with other parts of New York City is supplied with electricity by the Consolidated Edison Company of New York (Con Edison), and natural gas by National Grid. Both Con Edison and National Grid are state-regulated and have sufficient capacity to meet the area's electrical and natural gas needs. Both companies can increase their capacities by purchasing from other utility companies. Energy demand for the proposed project consists of the building loads for heating, ventilation, and air conditioning (HVAC) systems, and for lighting and other electrical power.

Currently, the project site is vacant and unoccupied and creates no demand for energy.

### B. THE FUTURE WITHOUT THE PROJECT

Without the proposed action, no substantial change is expected with regard to energy demand at the project site.

### C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

Electrical utility service would continue to be purchased from Con Edison and natural gas from National Grid. The proposed project would be required to comply with the New York State Energy Conservation Construction Code. This code governs performance requirements for heating, ventilation, and air conditioning systems, as well as the exterior building envelope. The code, promulgated on January 1, 1979, pursuant to Article Eleven of the Energy Law of the State of New York, requires that new and recycled buildings (both public and private) be designed to ensure adequate thermal resistance to heat loss and infiltration. Consequently, the proposed school facility is expected to be substantially more energy efficient than conventional pre-code buildings. In addition, it provides requirements for the design and selection of mechanical, electrical, and illumination systems.

The proposed project would incorporate energy conservation measures. The proposed project has been designed following the NYC Green Schools Rating System (guidelines specific to the design, construction and operation of New York City public school buildings) and is in compliance with site-related credits to achieve a LEED-certified or higher rating.

The proposed project would include the creation of new educational space plus support facilities, staff support spaces, food service and related building support services. The

construction of the new approximately 106,175 gsf school building would require approximately 147.2 billion BTUs. Following construction, the new school is expected to consume approximately 250,700 BTUs per square foot per year. The estimated annual usage of energy for the proposed school facility would be approximately 26.6 billion BTUs or 20 BTUs for the nine-month academic year. The proposed PS/IS 437 would neither affect transmission or generation of energy, nor generate substantial indirect consumption of energy. It is expected that no significant adverse impacts would occur with the capacity of both Con Edison and National Grid to provide service to the project site and surrounding area.

## CHAPTER 15: TRAFFIC AND TRANSPORTATION, PEDESTRIANS AND PARKING

This chapter analyzes the potential traffic, transit, parking, and pedestrian impacts of the proposed PS/IS 437 located on Caton Avenue in the Prospect Park South section of Brooklyn within CSD No. 15. A study area was defined that considered site location, potential access points to the school, primary streets serving the general area, and key intersections likely to be affected by school-generated trips.

### A. EXISTING CONDITIONS

**Roadway Network.** The traffic study area comprises eight intersections (seven signalized and one unsignalized) along Caton Avenue in the Prospect Park South section of Brooklyn (see Figure 15-1). These include:

- Caton Avenue at East 3<sup>rd</sup> Street
- Caton Avenue at East 5<sup>th</sup> Street
- Caton Avenue at Ocean Parkway Southbound Service Road
- Caton Avenue at Ocean Parkway Northbound Service Road
- Caton Avenue at East 7<sup>th</sup> Street
- Caton Avenue at East 8<sup>th</sup> Street
- Caton Avenue at Coney Island Avenue
- Coney Island Avenue at Church Avenue

The street networks in Brooklyn are a series of regular grids that are, in places, irregularly set such that intersections often meet at odd angles. In the neighborhood of Prospect Park South, the grid network is rotated such that streets are at diagonals to true north. Most arterials, collectors, and major local streets in the vicinity of the proposed school are two-way northeast-southwest roadways, while the more minor local streets in the area are typically an alternating series of one-way northwest and southeast roadways. For purposes of the transportation and pedestrian analyses, the northwest-southeast and northeast-southwest roadways are considered east-west and north-south roadways, respectively, and will be referred to as such for the remainder of this document.

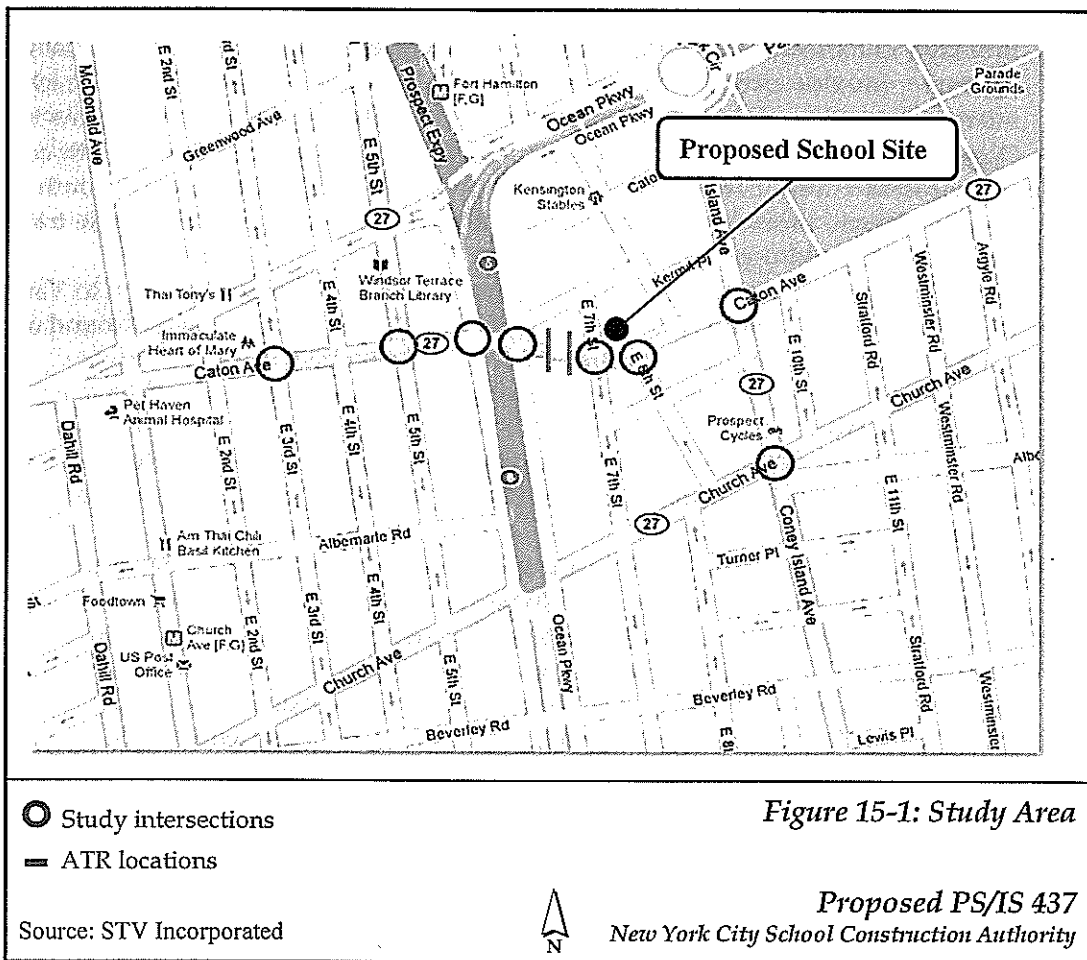


Figure 15-1: Study Area

The following analysis considers the intersections near the site that are most likely to be affected by the project-generated traffic. The main travel routes in the study area are:

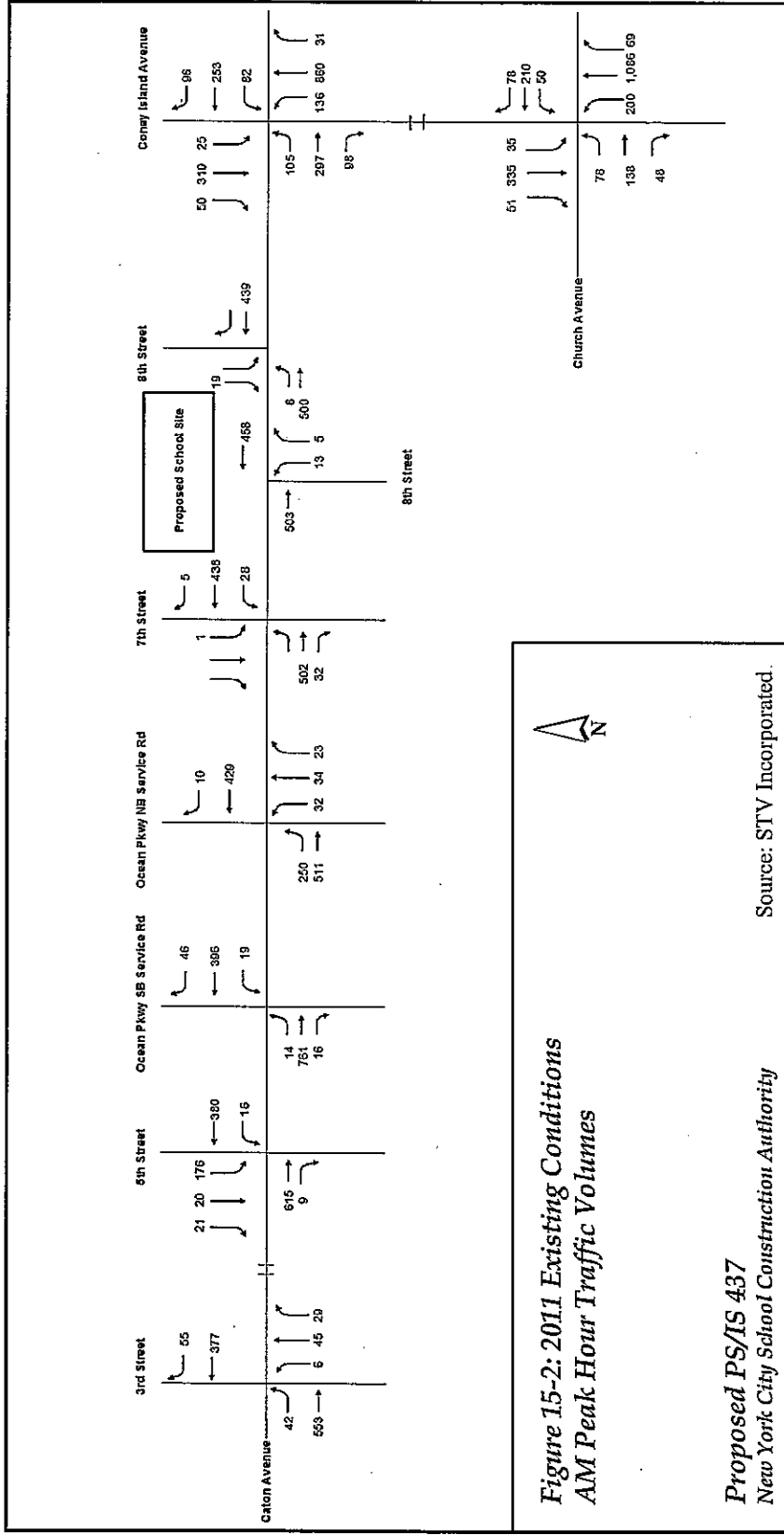
- Caton Avenue is an east-west collector that processes traffic from Fort Hamilton Parkway in Kensington to Bedford Avenue in Flatbush, Brooklyn. In the vicinity of the study area, the number of travel lanes along Caton Avenue varies between one and two lanes, with curbside parking primarily allowed in both directions.
- Kermit Place is a local unsignalized roadway connecting Northbound Ocean Parkway and Coney Island Avenue, with one travel lane and curbside parking lane each direction.
- Church Avenue is an east-west collector extending between 38<sup>th</sup> Street in Kensington to East 98<sup>th</sup> Street in East Flatbush, Brooklyn. In the project area, eastbound Church Avenue provides two travel lanes west of Coney Island Avenue and one travel lane west of Coney Island Avenue, while the westbound direction provides one travel lane. Church Avenue predominantly contains metered curbside parking in each direction.

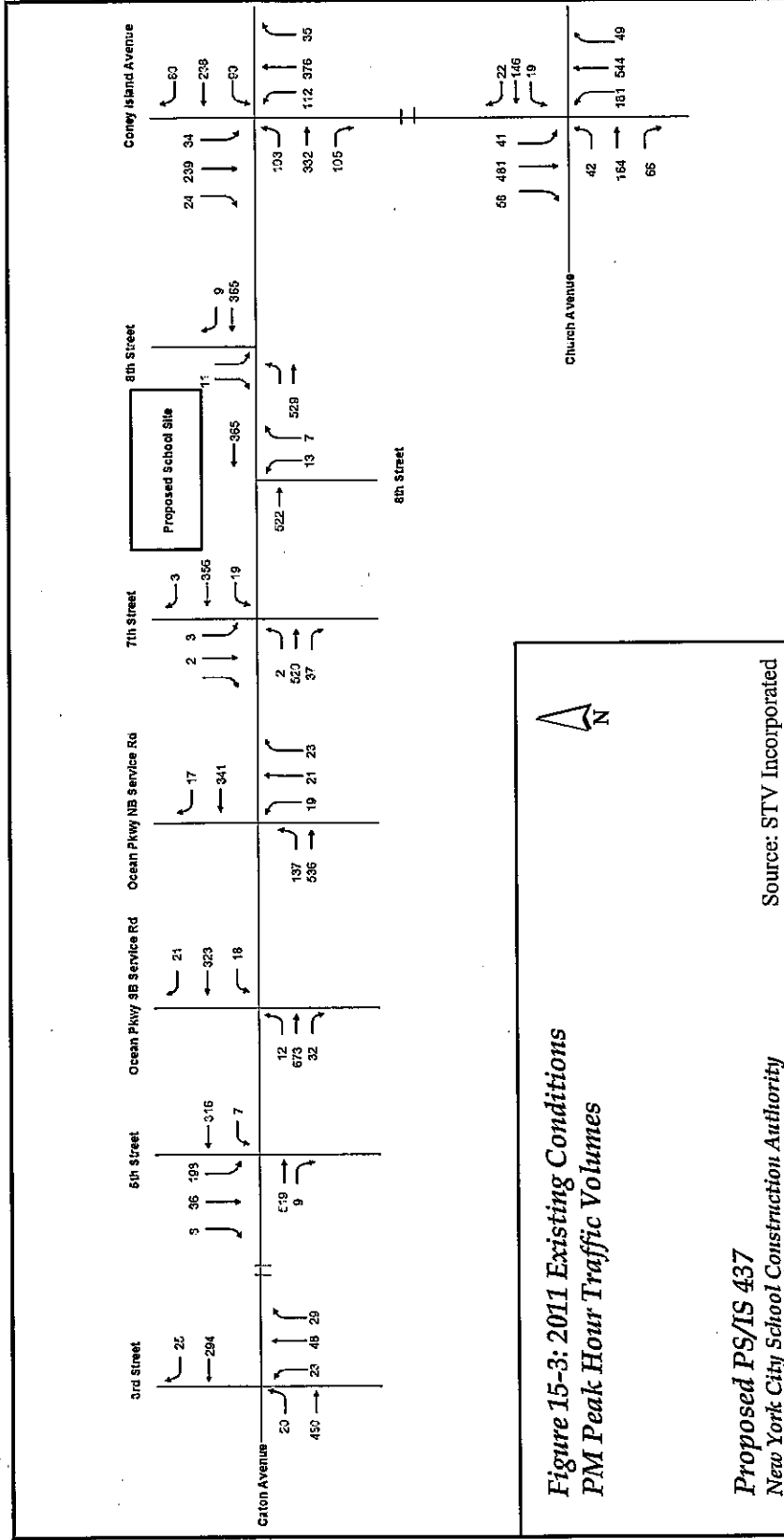
- Coney Island Avenue is a north-south arterial (lined mostly with commercial uses) that carries traffic extending from Brightwater Court in the Brighton Beach section of Brooklyn to Parkside Avenue in Prospect Park South. In the project area, Coney Island Avenue provides two travel lanes with an exclusive left-turn bay at each study intersection and predominantly contains metered curbside parking in each direction.
- Ocean Parkway Northbound and Southbound Service Roads are north-south collectors that process traffic between Park Circle in Windsor Terrace and the south end of Brighton Beach, Brooklyn. Within the study area, each road provides single travel lane and curbside parking on both sides.
- East 3<sup>rd</sup> Street is a north-south roadway from Avenue Y in Brighton Beach to Vanderbilt Street in Windsor Terrace, Brooklyn. Within the project area, it is a northbound one-way street with single traffic lane and curbside parking on both sides, extending
- East 5<sup>th</sup> and East 7<sup>th</sup> Streets both are southbound one-way street and have single traffic lane and curbside parking on each side within the study area. East 5<sup>th</sup> Street connects traffic from Vanderbilt Street in Windsor Terrace to Angela Drive in Brighton Beach, and East 7<sup>th</sup> Street extends from Kermit Place in Windsor Terrace to Shore Parkway in Brighton Beach, Brooklyn.
- East 8<sup>th</sup> Street is a north-south roadway extending from Ocean Parkway in Windsor Terrace to Gravesend Neck Road in Homecrest, Brooklyn. Within the study area, East 8<sup>th</sup> Street is divided into two individual sections by Caton Avenue, forming two T-intersections. The street changes from a two-way street north of Caton Avenue with single travel lane and one curbside parking for each direction, to northbound only towards south of Caton Avenue, with one travel lane and curbside parking on both sides.

**Traffic Conditions.** Traffic counts, including manual turning movement and vehicle classification counts at the study area intersections, as well as 24-hour automatic traffic recorder (ATR) machine counts along Caton Avenue between East 7<sup>th</sup> Street and Ocean Parkway Northbound Service Road, were conducted during the week of February 14, 2011 while schools were in session. The peak periods identified for analysis and counted for this project were the weekday AM and mid-afternoon PM peak periods when travel to and from the school would be busiest. A review of the manual count data and the 24-hour ATR data indicated that traffic volumes peak between 8 and 9 AM in the morning, and between 3 and 4 PM in the afternoon.

Overall, traffic volumes throughout the study area during both peak periods are moderate (see Figures 15-2 and 15-3), as the highest traffic volumes are carried along northbound Coney Island Avenue between Church and Caton Avenues, around 1,300 vehicles per hour (vph) during AM peak hour. The PM peak hour volumes are about half of those occurring during the AM peak hour. The east-west collector, Caton Avenue, handles relatively balanced bi-directional volumes during both peak periods, ranging from 320 to 790 vph, with moderately higher volumes on eastbound direction. The lowest volumes typically occur along the residential north-southbound roadways of East 7<sup>th</sup> and East 8<sup>th</sup> Streets, with volumes ranging between one and 20 vph during the AM and PM peak periods.







**Analysis Methodology and Results.** The *Highway Capacity Manual 2000 (HCM2000)* procedures were used to determine the capacities and levels of service for each of the intersections comprising the traffic study area. For a signalized intersection, levels of service are determined for the intersection and its individual lane groups and are defined in terms of the average control delays experienced by all vehicles that arrive in the analysis period, including delays incurred beyond the analysis period when the intersection or lane group is saturated.

The delay levels for signalized intersections are detailed below.

- LOS A describes operations with very low delay, i.e., up to 10 seconds per vehicle. This occurs when signal progression is extremely favorable, and most vehicles arrive during the green phase. Most vehicles do not stop at all.
- LOS B describes operations with delay in the range of 10 to 20 seconds per vehicle. This generally occurs with good progression and/or short cycle lengths. Again, most vehicles do not stop at the intersection.
- LOS C describes operations with delay in the range of 20 to 35 seconds per vehicle. These higher delays may result from fair progression and/or longer cycle lengths. The number of vehicles stopping at an intersection is significant at this level, although many still pass through without stopping.
- LOS D describes operations with delay in the range of 35 to 55 seconds per vehicle. At LOS D, the influence of congestion becomes more noticeable. Longer delays may result from some combination of unfavorable progression, long cycle lengths, or high volume-to-capacity (v/c) ratios. Many vehicles stop, and the proportion of vehicles that do not stop declines.
- LOS E describes operations with delay in the range of 55 to 80 seconds per vehicle. These high delay values generally indicate poor progression, long cycle lengths, and high volume-to-capacity ratios.
- LOS F describes operations with delay in excess of 80.0 seconds per vehicle. This is considered to be unacceptable to most drivers. This condition often occurs with oversaturation, i.e., when arrival flow rates exceed the capacity of the intersection. It may also occur at high volume-to-capacity ratios with cycle failures. Poor progression and long cycle lengths may also be contributing to such delays. Often, vehicles do not pass through the intersection in one signal cycle.

The LOS thresholds for unsignalized intersections differ slightly from those for signalized intersections. Delay levels for unsignalized intersections are detailed below.

- LOS A describes operations with very low delay, i.e., up to 10 seconds per vehicle. This generally occurs when little or no delay is experienced at the intersection.
- LOS B describes operations with delay in the range of 10 to 15 seconds per vehicle. This generally occurs when short traffic delays are experienced at the intersection.
- LOS C describes operations with delay in the range of 15 to 25 seconds per vehicle. These higher delays may result from fair progression and/or longer cycle lengths. This generally occurs when average traffic delays are experienced at the intersection.

- LOS D describes operations with delay in the range of 25 to 35 seconds per vehicle. At LOS D, the influence of congestion becomes more noticeable, and longer traffic delays are experienced.
- LOS E describes operations with delay in the range of 35 to 50 seconds per vehicle. At LOS E, there is obvious congestion, and very long traffic delays are experienced at the intersection.
- LOS F describes operations with delay greater than 50 seconds per vehicle. At LOS F, there is heavy congestion, and excessive traffic delays are experienced at the intersection.

For both signalized and unsignalized intersections, LOS A, B, and C are considered acceptable; LOS D is considered marginally acceptable/unacceptable for delays shorter than or equal to/longer than those at mid-LOS D; and LOS E and F are considered unacceptable.

Each of the intersections comprising the traffic study area was analyzed in terms of its capacity to accommodate existing traffic volumes as defined by the resulting levels of service. The analyses showed that most of the intersections in the project study area operate at acceptable levels during both the AM and PM peak analysis hours – with overall operations at LOS mid-D or better (see Table 15-1); however, the following movements operate with some congestion:

- Ocean Parkway Northbound Service Road's northbound approach at Caton Avenue functions slightly beyond LOS mid-D with approximately 47 seconds of delay during the AM peak hour. The delay could be attributed to the short green time allotted to the minor street (approximately 23 percent).
- Westbound Caton Avenue's left-turn movement onto southbound Coney Island Avenue operates at LOS E during the PM peak hour. The lack of an exclusive left-turn phase and the high eastbound volume during the PM peak, which significantly reduces the available gaps in traffic for vehicles to turn, typically causes vehicles to wait until the end of the green phase to turn.
- Church Avenue's westbound approach functions slightly beyond LOS mid-D with approximately 47 seconds of delay during the AM peak hour. A potential cause of the marginal LOS is the slow process rate of vehicles through the approach due to one single shared travel lane by permitted left-turn and through/right movements, which causes vehicles to wait.

Table 15-1: 2011 Existing Conditions Traffic Operations

| INTERSECTION & APPROACH                |    |      | Mvt. | AM Peak Hour |               |      | PM Peak Hour |               |     |
|--|----|------|------|--------------|---------------|------|--------------|---------------|-----|
|  |    |      |      | V/C          | Control Delay | LOS  | V/C          | Control Delay | LOS |
| <b>Signalized</b>                      |    |      |      |              |               |      |              |               |     |
| <b>Caton Ave and Third St</b>          |    |      |      |              |               |      |              |               |     |
| Caton Ave                              | EB | LT   | 0.61 | 17.3         | B             | 0.51 | 15.0         | B             |     |
|  | WB | TR   | 0.44 | 13.8         | B             | 0.32 | 12.2         | B             |     |
| Third St                               | NB | LTR  | 0.16 | 30.7         | C             | 0.19 | 31.3         | C             |     |
|  |    |      | -    | 16.9         | B             |      | 15.8         | B             |     |
| Overall Intersection                   |    |      |      |              |               |      |              |               |     |
| <b>Caton Ave and Fifth St</b>          |    |      |      |              |               |      |              |               |     |
| Caton Ave                              | EB | TR   | 0.61 | 17.1         | B             | 0.52 | 15.1         | B             |     |
|  | WB | LT   | 0.41 | 13.4         | B             | 0.33 | 12.3         | B             |     |
| Fifth St                               | SB | LTR  | 0.42 | 35.2         | D             | 0.46 | 36.2         | D             |     |
|  |    |      | -    | 19.1         | B             |      | 18.9         | B             |     |
| Overall Intersection                   |    |      |      |              |               |      |              |               |     |
| <b>Caton Ave and NB Ocean Parkway</b>  |    |      |      |              |               |      |              |               |     |
| Caton Ave                              | EB | DefL | 0.47 | 12.4         | B             | NA   | NA           | NA            |     |
|  |    | (L)T | 0.46 | 10.9         | B             | 0.43 | 10.1         | B             |     |
| NB Ocean Parkway                       | WB | TR   | 0.21 | 8.0          | A             | 0.17 | 7.7          | A             |     |
|  | NB | LTR  | 0.35 | 46.7         | D             | 0.25 | 44.7         | D             |     |
| Overall Intersection                   |    |      |      |              |               |      |              |               |     |
| <b>Caton Ave and SB Ocean Parkway</b>  |    |      |      |              |               |      |              |               |     |
| Caton Ave                              | EB | LTR  | 0.44 | 13.3         | B             | 0.40 | 12.7         | B             |     |
|  | WB | LTR  | 0.27 | 11.4         | B             | 0.21 | 10.8         | B             |     |
| Overall Intersection                   |    |      |      |              |               |      |              |               |     |
| <b>Caton Ave and Seventh St</b>        |    |      |      |              |               |      |              |               |     |
| Caton Ave                              | EB | LTR  | 0.28 | 11.4         | B             | 0.31 | 11.7         | B             |     |
|  | WB | LTR  | 0.26 | 11.3         | B             | 0.21 | 10.8         | B             |     |
| Seventh St                             | SB | LTR  | 0.00 | 28.7         | C             | 0.01 | 28.8         | C             |     |
|  |    |      | -    | 11.4         | B             |      | 11.4         | B             |     |
| Overall Intersection                   |    |      |      |              |               |      |              |               |     |
| <b>Caton Ave and Coney Island Ave</b>  |    |      |      |              |               |      |              |               |     |
| Caton Ave                              | EB | L    | 0.49 | 35.9         | D             | 0.47 | 35.1         | D             |     |
|  |    | TR   | 0.62 | 34.8         | C             | 0.69 | 37.3         | D             |     |
|  | WB | L    | 0.51 | 40.0         | D             | 0.70 | 56.5         | E             |     |
|  |    | TR   | 0.72 | 41.1         | D             | 0.72 | 41.0         | D             |     |
| Coney Island Ave                       | NB | L    | 0.32 | 17.3         | B             | 0.25 | 15.8         | B             |     |
|  |    | TR   | 0.56 | 19.5         | B             | 0.28 | 15.3         | B             |     |
|  | SB | L    | 0.13 | 14.9         | B             | 0.09 | 13.6         | B             |     |
|  |    | TR   | 0.21 | 14.5         | B             | 0.14 | 13.8         | B             |     |
| Overall Intersection                   |    |      |      |              |               |      |              |               |     |
| <b>Church Ave and Coney Island Ave</b> |    |      |      |              |               |      |              |               |     |
| Church Ave                             | EB | LT   | 0.39 | 29.2         | C             | 0.35 | 35.4         | D             |     |
|  |    | R    | 0.14 | 25.5         | C             | 0.21 | 33.8         | C             |     |
| Coney Island Ave                       | WB | LTR  | 0.80 | 46.8         | D             | 0.37 | 36.1         | D             |     |
|  | NB | L    | 0.65 | 37.0         | D             | 0.38 | 20.8         | C             |     |
|  |    | TR   | 0.84 | 36.5         | D             | 0.27 | 17.2         | B             |     |
|  | SB | L    | 0.22 | 23.2         | C             | 0.07 | 9.3          | A             |     |
|  |    | TR   | 0.28 | 15.3         | B             | 0.25 | 10.3         | B             |     |
|  |    |      | -    | 33.4         | C             |      | 20.3         | C             |     |
| Overall Intersection                   |    |      |      |              |               |      |              |               |     |
| <b>Unsignalized</b>                    |    |      |      |              |               |      |              |               |     |
| <b>Caton Ave and Eighth St</b>         |    |      |      |              |               |      |              |               |     |
| Caton Ave                              | EB | LT   | 0.01 | 8.2          | A             | 0.00 | 8.0          | A             |     |
|  |    | LR   | 0.04 | 13.8         | B             | 0.04 | 13.2         | B             |     |
| Eighth St                              | NB | LR   | 0.02 | 9.5          | A             | 0.03 | 13.9         | B             |     |
|  |    |      |      |              |               |      |              |               |     |

## Notes:

- "Mvt." refers to the specific intersection approach lane(s) and how the lane(s) operate and/or specific pavement striping. TR is a combined through- right turn lane(s), R or L refers to exclusive right- or left-turn movement lane(s), and LTR is a mixed lane(s) that allows for all movement types. It is possible that lane uses change in different time periods. For example, a very heavy right-turn volume may exceed a single lane capacity, thus forcing drivers to use (or "share") an adjacent lane for additional travel capacity in the AM, but as flows decrease later in the day, a shared lane may not be needed. DefL is a defacto left-turn lane automatically input by the HCS software when the volume of left turns is high enough to create a "natural" turn lane to accommodate the demand; through movements would then use the adjacent travel lane.
- V/C is the volume-to-capacity ratio for the Mvt. listed in the first column. Values above 1.0 indicate an excess of demand over capacity.
- Level of service (LOS) for signalized intersections is based upon average control delay per vehicle (sec/veh) for each lane group listed in the Mvt. Column as noted in the 2000 HCM - TRB.
- The delay calculations for signalized intersections represent the average control delay experienced by all vehicles that arrive in the analysis period, including delays incurred beyond the analysis period when the lane group is saturated.

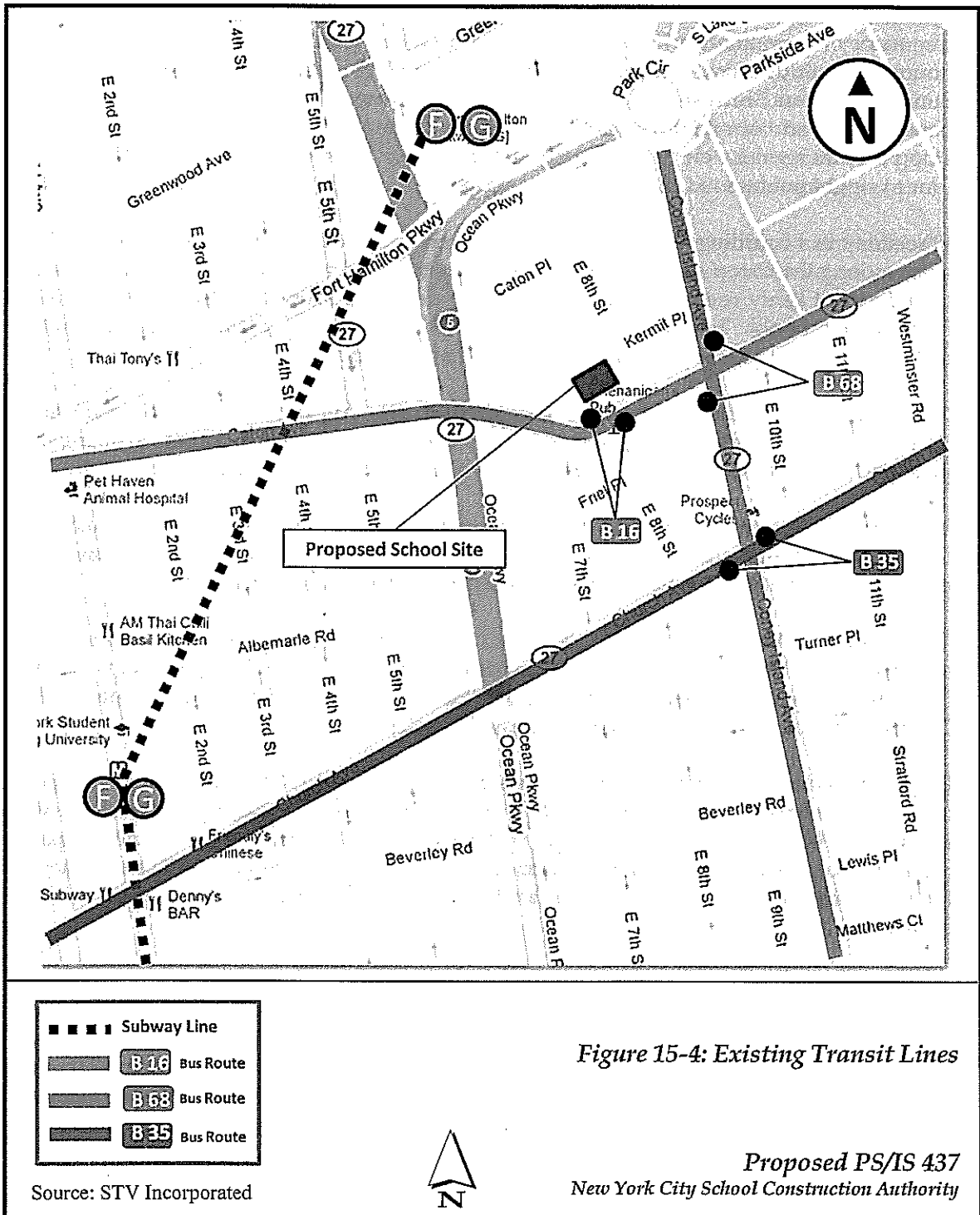
**Parking.** The parking study area is within a ¼-mile (a typical “walkable” radius) of the proposed school site. It is bounded by Greenwood Avenue to the north, Hinckley Place to the south, Argyle Road to the east, and East 3<sup>rd</sup> Street to the west. Alternate-side curbside parking restrictions are posted throughout most of the study area, with metered curbside parking in effect along Coney Island and Church avenues. There is also a small segment along westbound Friel Place between Coney Island Avenue and East 8<sup>th</sup> Street that has metered curbside parking. Curbside parking is reserved for school buses during school hours at a few locations near existing schools in the study area. All metered parking spaces were assumed to be unavailable to school-generated traffic, since the allowable time in these spaces is typically limited to two hours or less. Similarly, restricted curbside parking spaces were also disregarded, as these spaces are reserved for permit holders specific to each location.

On-street parking surveys were conducted on two representative midweek days to determine the number of spaces within an acceptable walking distance (i.e., a ¼-mile radius) of the proposed school site. Two surveys were conducted – one when most parking restrictions are in effect, and the other when most regulations are not in effect. Based on the surveys, there are approximately 1,340 legal on-street parking spaces within a reasonable walking distance of the project site on days when few alternate-side regulations are in effect. The supply for on-street parking spaces has an available capacity of 111 spaces on those days (eight percent of capacity). On the most restrictive regulation days, the number of available on-street parking spaces is reduced to 960, resulting in a shortfall of 92 spaces (about ten percent of capacity) (see Table 15-2).

**Table 15-2: 2011 Existing On-Street Parking Supply and Demand**

| Parking Parameter          | w/Regs          | w/o Regs       |
|----------------------------|-----------------|----------------|
| Parking-Space Supply       | 961             | 1,339          |
| Demand<br>(Occupancy Rate) | 1,053<br>(110%) | 1,228<br>(92%) |
| Spaces Available<br>(Rate) | -92<br>(-10%)   | 111<br>(8%)    |

**Transit and Pedestrians.** The area is served by New York City Transit (NYCT), with three bus routes and two subway lines (see Figure 15-4).



The B16 bus route provides local service from Prospect-Lefferts Gardens and Fort Hamilton, Brooklyn. The frequency of operation for the B16 during the AM and PM peak periods range between ten and 15 minutes in both directions. The B68 bus route provides local service primarily along Coney Island Avenue between Coney Island and Park Slope, Brooklyn. The frequency of operation is in the range of seven to nine minutes during the AM and PM peak hours in both directions. The local and limited-stop B35 bus route serves passengers between Sunset Park and Brownsville, Brooklyn. The local service provides operational frequencies between six and ten minutes in either direction during both peak periods, while the limited-stop provides service every six to eight minutes in the Brownsville-bound direction and every four to eight minutes in the Sunset Park-bound direction during the AM and PM peak hours.

Weekday bus boarding and alighting counts were conducted for the east/westbound B16 bus stops along the Caton Avenue corridor at the East 8<sup>th</sup> Street intersection that students and staff would most likely use to access the proposed school. The location of the bus stop is right in front of the school. The next closest bus stop, which is served by the B68, is located about 400 feet west of the proposed school at Caton and Coney Island avenues.

The counts at the eastbound bus stop indicate that in the AM peak hour, a maximum number of four passengers board and only one passenger alight upon each B16 arrival. During the PM peak hour, fewer than four passengers board/alight the B16 at any one stop interval.

The counts at the westbound bus stop indicate that fewer than three passengers board or alight the B68 bus during the AM peak hour. During the PM peak hour, a maximum of four passengers alight the B68 and only one passenger board at any stop interval.

The nearest subway station is the BMT F/G station at the Fort Hamilton Parkway, approximately 300 yards north of the proposed school site. The F line provides service from Stillwell Avenue in Brooklyn to Jamaica-179<sup>th</sup> Street in Queens, and the G line operates between Church Avenue in Brooklyn and Court Square in Queens.

Pedestrian flow operating conditions were evaluated using *HCM2000* methodologies. The congestion levels of a pedestrian facility are determined by considering pedestrian volumes; measuring the sidewalk, passageway, or crosswalk width; determining the available pedestrian capacity; and developing a ratio of volume flows to capacity conditions. The resulting ratio is then compared with the LOS standards for flow, measured in terms of either pedestrian space or delay.

At interrupted-flow facilities, such as signalized and stop-controlled intersections, crosswalk and corner operations are often based on crosswalk time-space and pedestrian space, respectively, which are the average effective area per pedestrian of the analyzed element, measured in square feet per pedestrian (sf/ped). The levels of service for all crosswalk elements at a signalized intersection and for all corner elements at both a signalized and unsignalized intersection are defined in terms of these spaces. LOS A occurs when the average time or pedestrian space is greater than 60 sf/ped. LOS B, C, and D occur when the space is in the range of 40 to 60, 24 to 40, and 15 to 24 sf/ped, respectively. LOS E is capacity, for a space from eight to 15 sf/ped. LOS F describes jammed conditions with an average space of eight sf/ped or less.



Pedestrian counts were performed in 15-minute intervals during the AM and PM peak periods for the Caton Avenue and Kermit Place intersections at East 7<sup>th</sup> and East 8<sup>th</sup> Streets, which are located adjacent to the proposed school site. With the exception of Caton Avenue and East 7<sup>th</sup> Street, all intersections are unsignalized, and provide a single crosswalk to cross either in the east-west or north-south direction. The intersection of Caton Avenue and East 7<sup>th</sup> Street provides crosswalks on all four legs of the intersection, one of which is a high visibility crosswalk.

Pedestrian counts at the four study intersections indicate that existing volumes are low to moderate during the peak study periods. During both AM and PM peak 15-minute periods, the south crosswalk at Caton Avenue and East 7<sup>th</sup> Street was the most utilized, processing a bi-directional volume ranging from ten to 45 pedestrians. All other crosswalks handled fewer than 20 pedestrians per direction during the AM and PM peak 15-minute periods. All crosswalks and corners at the signalized intersection of Caton Avenue and East 7<sup>th</sup> Street currently operate at LOS A conditions (see Table 15-3).

**Table 15-3: 2011 Existing Pedestrian Conditions**

| INTERSECTION and ELEMENT                | AM Peak                |     | PM Peak                |     |
|---|------------------------|-----|------------------------|-----|
|   | Average Space (sf/ped) | LOS | Average Space (sf/ped) | LOS |
| <b>Caton Avenue and East 7th Street</b> |                        |     |                        |     |
| Northeast Corner                        | 271                    | A   | 188                    | A   |
| Southeast Corner                        | 107                    | A   | 86                     | A   |
| Northwest Corner                        | 284                    | A   | 167                    | A   |
| Southwest Corner                        | 313                    | A   | 216                    | A   |
| North Crosswalk                         | 713                    | A   | 540                    | A   |
| South Crosswalk                         | 396                    | A   | 320                    | A   |
| East Crosswalk                          | 4,641                  | A   | 1,543                  | A   |
| West Crosswalk                          | 633                    | A   | 307                    | A   |

**Note:** Average space and delay are based on the assumption that pedestrians distribute themselves uniformly throughout the effective crosswalk and corner space. LOS designations for corner analyses are based on average space per pedestrian (sf/ped). LOS designations for crosswalk analyses at signalized intersections are based on average space per pedestrian (sf/ped).

**Safety.** A review of the accident data provided from New York State Department of Transportation for the most recent three-year period from November 2007 to November 2010 indicated that most locations within a ½-mile radius of the study area experienced five or fewer pedestrian/bicycle-type accidents within a given year, and consequently, would not be considered high-accident locations according to 2010 CEQR guidelines. The intersection of Caton and Coney Island avenues experienced relatively more accidents than other locations, with a total of five pedestrian accidents in 2008 and a total of one bicyclist and three pedestrian accidents in 2009, with varying contributing factors that included alcohol involvement, pedestrian error/confusion, and improper vehicular turning.

## B. THE FUTURE WITHOUT THE PROJECT

The analysis of the future traffic conditions of the proposed school (i.e., the future No Build condition) serves as the baseline against which impacts of the project are compared. The future No Build analysis includes the traffic volume increases expected due to an overall growth in background traffic through and within the study area and to major real estate developments, and roadway system changes scheduled to be occupied or implemented by the 2015 Build Year. A background growth rate of ½ percent per year, resulting in an overall growth of approximately two and a half percent by 2015, was assumed for this area of Brooklyn, per 2010 CEQR standards.

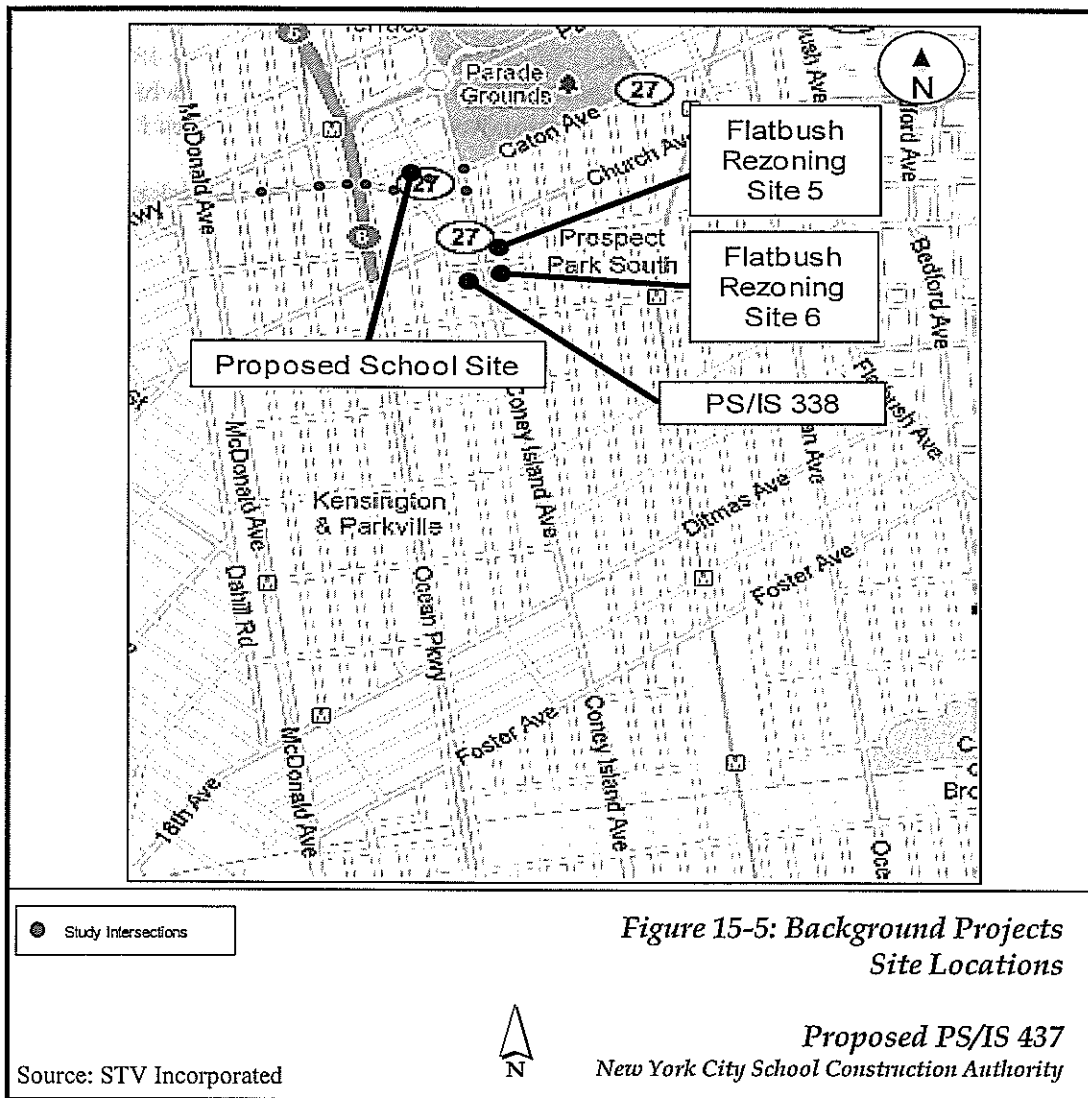
According to DCP, an Environmental Assessment Statement (EAS) was completed in March 2009 for a planned rezoning of the Flatbush section of Brooklyn and was approved in July 2009. The analysis year for the proposed action is 2019. The document cites an amendment to the zoning map, as well as amendments to the zoning text, affecting 180 blocks in two areas in Flatbush's Community District 14. It is important to note that the EAS cites what *could* be developed as a result of the Flatbush rezoning amendments, and is not reflective of what would actually be built in the rezoned areas by 2019.

The proposed rezoning action is anticipated to result in the development on 17 sites with a net increase of 180 residential units and 70,167 square feet of commercial space, a net decrease of 198,070 square feet of community facility space, and a net increase of 95 parking spaces. A total of 17 projected development sites and 72 potential development sites have been identified in the area.

Two of the 17 projected development sites are located within ½ mile of the proposed school site (see Figure 15-5). Below is a brief description of these locations.

- 1) *Site 5 (Block 5112, Lot 1)* is located at 904 Albemarle Road, at the intersection of Albemarle Road and Coney Island Avenue. The site comprises one 5,545 square-foot lot, which is currently built with a one-story building used as a community facility, with an FAR of 0.92. In the Future With-Action condition, the site could be developed with a eight-story 25,507 square foot building with 4,436 square feet of commercial space on the ground floor, and 21 dwelling units on the upper floors. There would be no required parking spaces.

- 2) *Site 6 (Block 5113, Lot 24)* is located at 531 Coney Island Avenue at the intersection of Hinckley Place and Coney Island Avenue. This vacant site comprises one 12,770 square-foot lot. In the Future With-Action condition, the site could be developed with one, eight-story 58,742 square foot building with 10,216 square feet of commercial space on the ground floor, and 49 dwelling units on the upper floors. The 26 required parking spaces could be accommodated on one underground level.

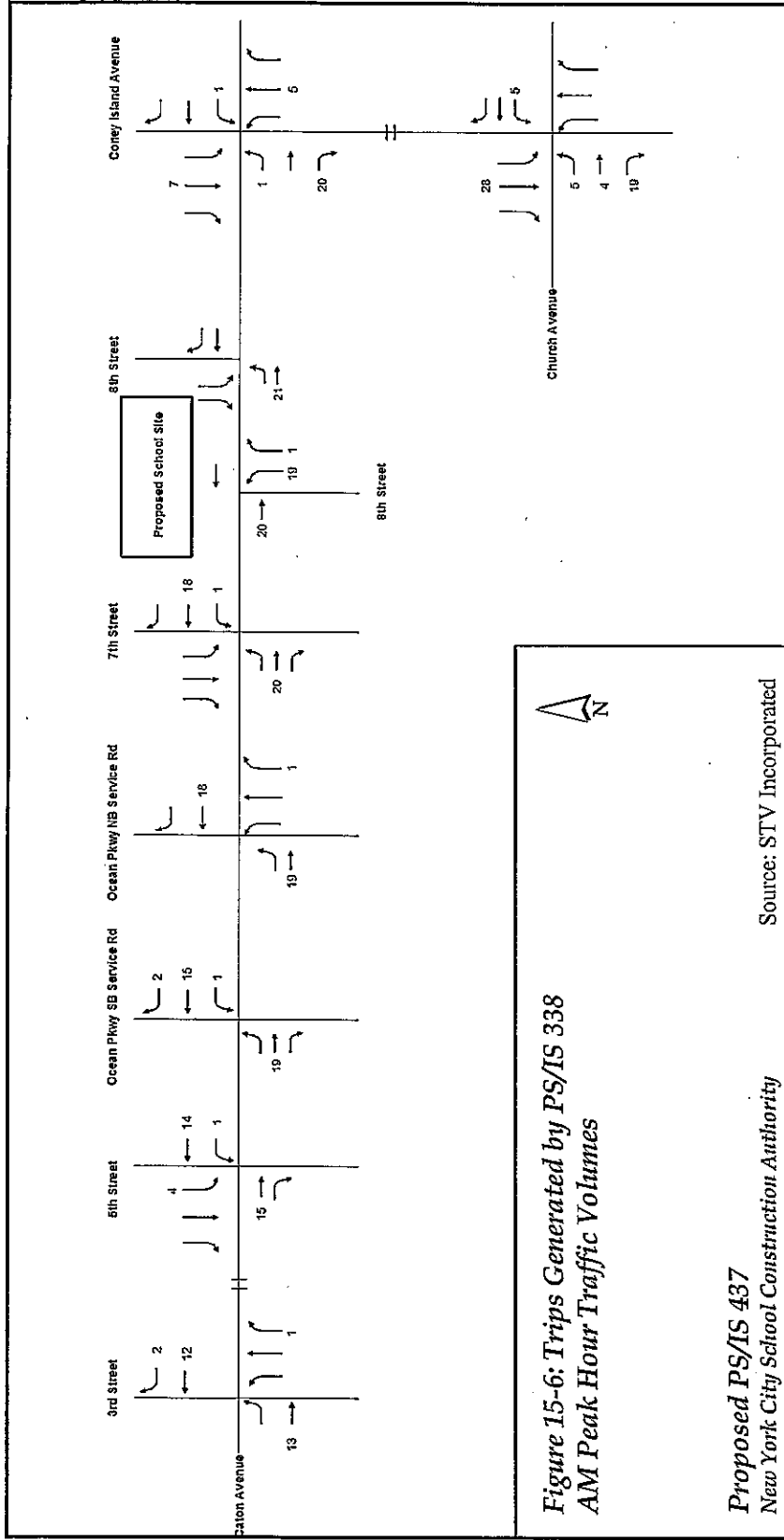


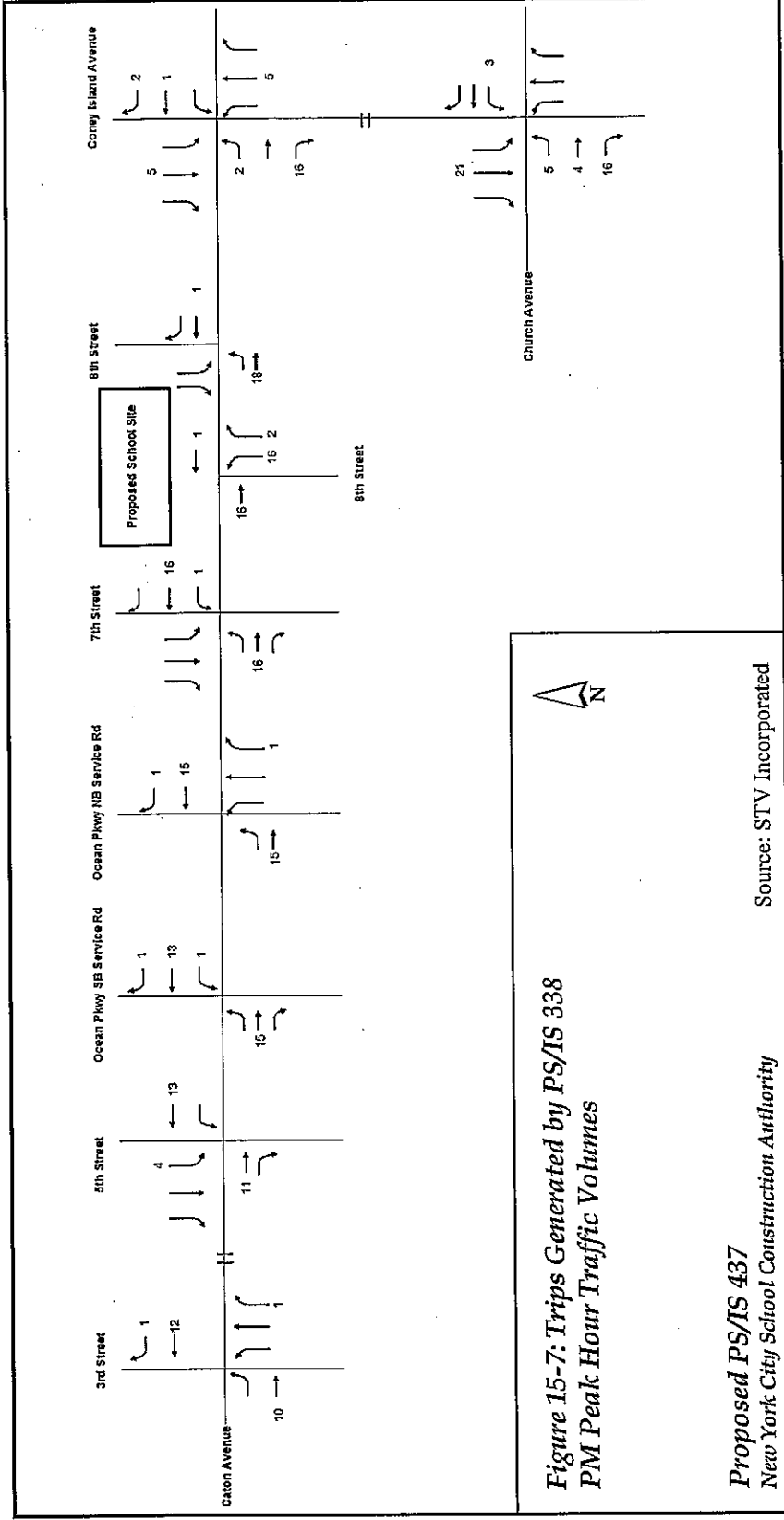
The Flatbush EAS concludes that *all* projected development sites would collectively generate fewer than 50 net vehicle trips during all peak hours throughout the study area; thus, based upon the *CEQR Technical Manual* guidelines, no further traffic or parking analysis is required. Additionally, the proposed action would produce fewer bus, subway, and pedestrian trips than the *CEQR Technical Manual* threshold of 200 net trips for each component, during the AM, Midday, and PM peak hours, respectively. Consequently, no further analysis is necessary.

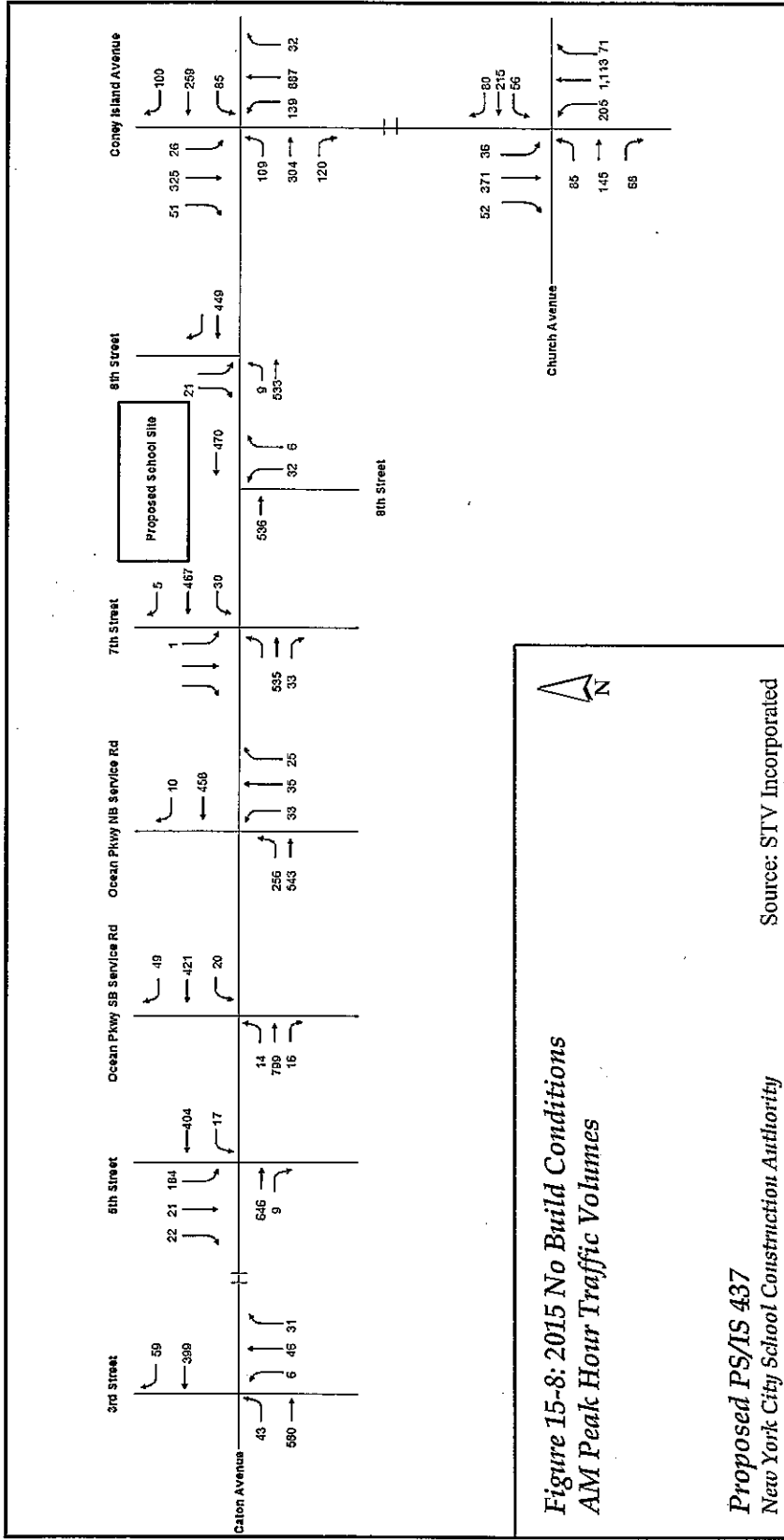
Another rezoning that was also adopted by DCP in March 2009 is the rezoning of a five-block area in the East Windsor Terrace neighborhood of Brooklyn's Community District 7. This action mostly aims at downzoning the area to preserve neighborhood character, and adds a new commercial overlay on the primary corridor of Caton Avenue. Overall, the rezoning would not result in significant new trips in the area, and therefore, no further analysis is required.

Finally, a major development project that would result in an increase in traffic in the vicinity of the proposed school is the construction of another school, PS/IS 338 located at 510 Coney Island Avenue, which would be completed in 2014. PS/IS 338 is projected to generate 184 trips during the AM and 159 trips during the PM peak hours, approximately 20 percent of which is expected to travel through the study intersections for the proposed PS/IS 437 (see Figures 15-6 and 15-7).

**Future No Build Traffic Conditions.** Based on the two and a half percent background growth and the trips generated by PS/IS 338, there would be a minor increase in traffic volumes along the roadways included in the project study area (see Figures 15-8 and 15-9).







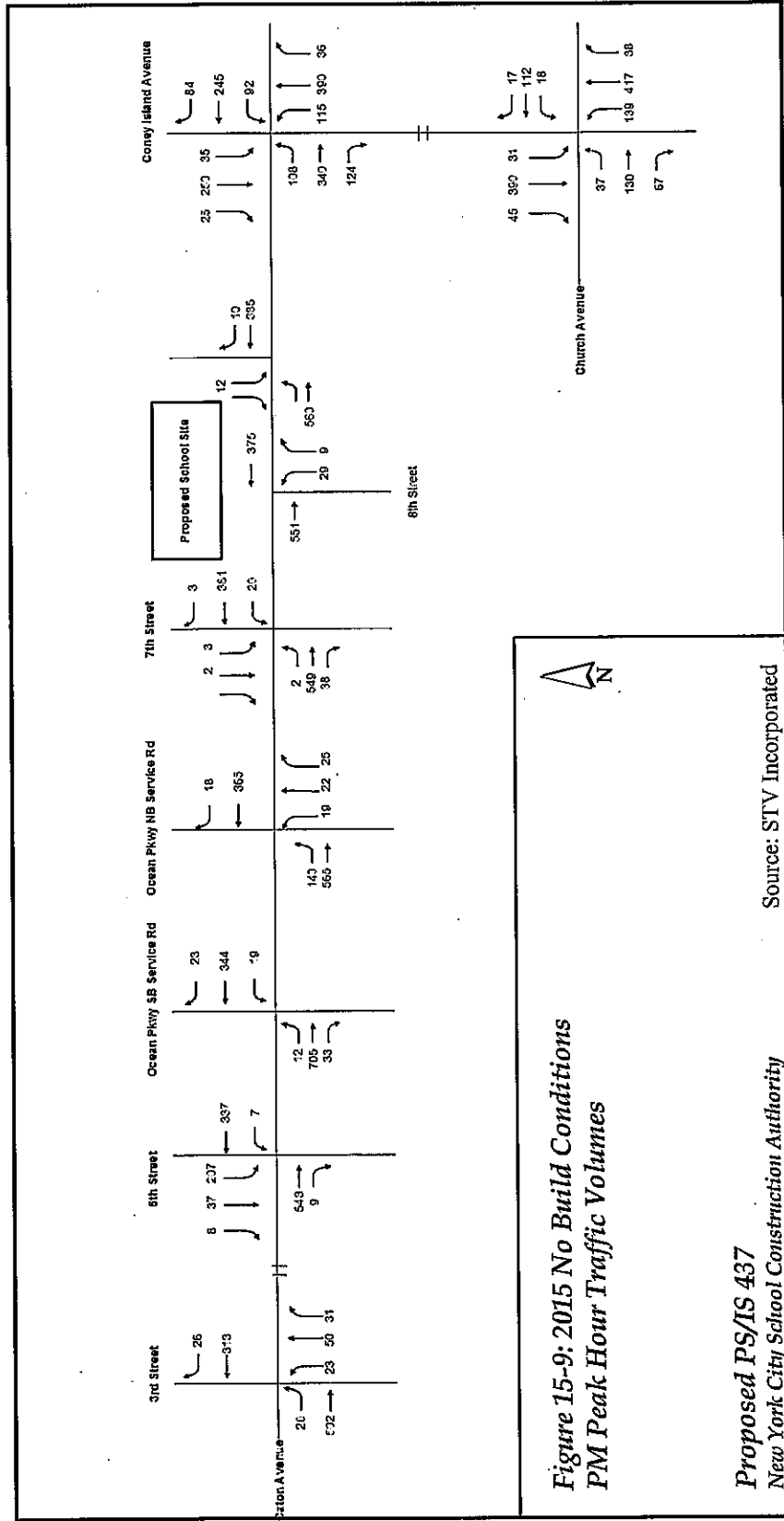


Figure 15-9: 2015 No Build Conditions PM Peak Hour Traffic Volumes

Proposed PS/IS 437  
New York City School Construction Authority

Source: STV Incorporated



All study intersections would continue to operate at acceptable levels with overall operations at LOS mid-D or better (see Table 15-4); however, the following movements would continue to operate with congestion:

- Ocean Parkway Northbound Service Road's northbound approach at Caton Avenue would continue to function beyond LOS mid-D, with approximately 47 seconds of delay during the AM peak hour.
- Westbound Caton Avenue's left-turn movement onto southbound Coney Island Avenue would operate beyond LOS mid-E during the PM peak hour, with an 18-second delay increase.
- Church Avenue's westbound approach would worsen to LOS E, with approximately 57 seconds of delay during the AM peak hour.

Table 15-4: 2015 No Build Conditions Traffic Operations

| INTERSECTION & APPROACH               | Mvt. | AM Peak Hour |               |             | PM Peak Hour |               |             |          |
|---------------------------------------|------|--------------|---------------|-------------|--------------|---------------|-------------|----------|
|                                       |      | V/C          | Control Delay | LOS         | V/C          | Control Delay | LOS         |          |
| <b>Signalized</b>                     |      |              |               |             |              |               |             |          |
| <b>Caton Ave and Third St</b>         |      |              |               |             |              |               |             |          |
| Caton Ave                             | EB   | LT           | 0.66          | 18.7        | B            | 0.53          | 15.4        | B        |
|                                       | WB   | TR           | 0.46          | 14.2        | B            | 0.34          | 12.5        | B        |
| Third St                              | NB   | LTR          | 0.16          | 30.8        | C            | 0.20          | 31.4        | C        |
| <b>Overall Intersection</b>           |      | -            |               | <b>17.8</b> | <b>B</b>     |               | <b>16.1</b> | <b>B</b> |
| <b>Caton Ave and Fifth St</b>         |      |              |               |             |              |               |             |          |
| Caton Ave                             | EB   | TR           | 0.64          | 17.9        | B            | 0.54          | 15.6        | B        |
|                                       | WB   | LT           | 0.44          | 13.8        | B            | 0.35          | 12.5        | B        |
| Fifth St                              | SB   | LTR          | 0.44          | 35.6        | D            | 0.48          | 36.6        | D        |
| <b>Overall Intersection</b>           |      | -            |               | <b>19.6</b> | <b>B</b>     |               | <b>19.3</b> | <b>B</b> |
| <b>Caton Ave and NB Ocean Parkway</b> |      |              |               |             |              |               |             |          |
| Caton Ave                             | EB   | DefL         | 0.50          | 13.2        | B            | NA            | NA          | NA       |
|                                       |      | (L)T         | 0.49          | 11.3        | B            | 0.45          | 10.4        | B        |
|                                       | WB   | TR           | 0.22          | 8.1         | A            | 0.18          | 7.8         | A        |
| NB Ocean Parkway                      | NB   | LTR          | 0.36          | 47.0        | D            | 0.26          | 44.9        | D        |
| <b>Overall Intersection</b>           |      | -            |               | <b>13.0</b> | <b>B</b>     |               | <b>11.5</b> | <b>B</b> |
| <b>Caton Ave and SB Ocean Parkway</b> |      |              |               |             |              |               |             |          |
| Caton Ave                             | EB   | LTR          | 0.50          | 17.9        | B            | 0.45          | 17.1        | B        |
|                                       | WB   | LTR          | 0.31          | 15.2        | B            | 0.25          | 14.5        | B        |
| <b>Overall Intersection</b>           |      | -            |               | <b>16.9</b> | <b>B</b>     |               | <b>16.2</b> | <b>B</b> |

Table 15-4: 2015 No Build Conditions Traffic Operations, cont'd

| INTERSECTION & APPROACH                | Mvt. | AM Peak Hour |               |             | PM Peak Hour |               |             |          |
|--|------|--------------|---------------|-------------|--------------|---------------|-------------|----------|
|  |      | V/C          | Control Delay | LOS         | V/C          | Control Delay | LOS         |          |
| <b>Caton Ave and Seventh St</b>        |      |              |               |             |              |               |             |          |
| Caton Ave                              | EB   | LTR          | 0.30          | 11.6        | B            | 0.33          | 11.9        | B        |
|  | WB   | LTR          | 0.28          | 11.5        | B            | 0.22          | 10.9        | B        |
| Seventh St                             | SB   | LTR          | 0.00          | 28.7        | C            | 0.01          | 28.8        | C        |
| <b>Overall Intersection</b>            |      | -            |               | <b>11.6</b> | <b>B</b>     |               | <b>11.6</b> | <b>B</b> |
| <b>Caton Ave and Coney Island Ave</b>  |      |              |               |             |              |               |             |          |
| Caton Ave                              | EB   | L            | 0.52          | 37.3        | D            | 0.51          | 37.1        | D        |
|  |      | TR           | 0.67          | 36.4        | D            | 0.73          | 39.2        | D        |
|  | WB   | L            | 0.53          | 41.0        | D            | 0.81          | 74.7        | E        |
|  |      | TR           | 0.74          | 42.1        | D            | 0.74          | 42.4        | D        |
| Coney Island Ave                       | NB   | L            | 0.34          | 17.6        | B            | 0.26          | 15.9        | B        |
|  |      | TR           | 0.58          | 19.8        | B            | 0.29          | 15.4        | B        |
|  | SB   | L            | 0.14          | 15.2        | B            | 0.09          | 13.7        | B        |
|  |      | TR           | 0.22          | 14.6        | B            | 0.14          | 13.8        | B        |
| <b>Overall Intersection</b>            |      | -            |               | <b>26.3</b> | <b>C</b>     |               | <b>30.2</b> | <b>C</b> |
| <b>Church Ave and Coney Island Ave</b> |      |              |               |             |              |               |             |          |
| Church Ave                             | EB   | LT           | 0.42          | 29.7        | C            | 0.38          | 36.0        | D        |
|  |      | R            | 0.20          | 26.4        | C            | 0.29          | 35.6        | D        |
| Coney Island Ave                       | WB   | LTR          | 0.89          | 57.3        | E            | 0.39          | 36.6        | D        |
|  |      | L            | 0.69          | 39.9        | D            | 0.40          | 21.4        | C        |
|  | SB   | TR           | 0.86          | 37.8        | D            | 0.28          | 17.3        | B        |
|  |      | L            | 0.23          | 23.8        | C            | 0.07          | 9.4         | A        |
| <b>Overall Intersection</b>            |      | -            |               | <b>35.7</b> | <b>D</b>     |               | <b>20.8</b> | <b>C</b> |
| <b>Unsignalized</b>                    |      |              |               |             |              |               |             |          |
| <b>Caton Ave and Eighth St</b>         |      |              |               |             |              |               |             |          |
| Caton Ave                              | EB   | LT           | 0.01          | 8.2         | A            | 0.00          | 8.1         | A        |
| Eighth St                              | NB   | LR           | 0.10          | 15.6        | C            | 0.09          | 14.7        | B        |
|  |      | SB           | LR            | 0.03        | 9.5          | A             | 0.03        | 14.4     |

## Notes:

- "Mvt." refers to the specific intersection approach lane(s) and how the lane(s) operate and/or specific pavement striping. TR is a combined through- right turn lane(s), R or L refers to exclusive right- or left-turn movement lane(s), and LTR is a mixed lane(s) that allows for all movement types. It is possible that lane uses change in different time periods. For example, a very heavy right-turn volume may exceed a single lane capacity, thus forcing drivers to use (or "share") an adjacent lane for additional travel capacity in the AM, but as flows decrease later in the day, a shared lane may not be needed. DefL is a defacto left-turn lane automatically input by the HCS software when the volume of left turns is high enough to create a "natural" turn lane to accommodate the demand; through movements would then use the adjacent travel lane.
- V/C is the volume-to-capacity ratio for the Mvt. listed in the first column. Values above 1.0 indicate an excess of demand over capacity.
- Level of service (LOS) for signalized intersections is based upon average control delay per vehicle (sec/veh) for each lane group listed in the Mvt. Column as noted in the 2000 HCM - TRB.
- The delay calculations for signalized intersections represent the average control delay experienced by all vehicles that arrive in the analysis period, including delays incurred beyond the analysis period when the lane group is saturated.

**Parking.** Demand for parking was assumed to increase proportionally to the traffic growth in the study area, or by ½ percent per year. Based on population growth alone, the on-street parking-space shortfall would increase from 92 to 119 spaces (an increase from an existing ten percent shortfall to twelve percent) during the most restrictive regulation periods. During the non-regulation periods, there would be fewer available spaces, from 111 to 80 on-street spaces (a decrease in supply from eight to six percent) (see Table 15-5).

**Table 15-5: 2015 No Build On-Street Parking Supply and Demand**

| Parking Parameter          | w/Regs          | w/o Regs       |
|----------------------------|-----------------|----------------|
| Parking-Space Supply       | 961             | 1,339          |
| Demand<br>(Occupancy Rate) | 1,080<br>(112%) | 1,259<br>(94%) |
| Spaces Available<br>(Rate) | -119<br>(-12%)  | 80<br>(6%)     |

**Transit and Pedestrians.** The number of transit riders and pedestrians in the study area were also assumed to increase by ½ percent per year in proportion to traffic volumes. Transit service and operational conditions are expected to remain similar to the current conditions since the only major development in the area to increase transit ridership, the construction of PS/IS 338, would result in approximately 63 transit trips during the AM and 58 transit trips during the PM peak hours, which are below the thresholds used by CEQR and NYCT for significance.

Pedestrian activity near the project site would increase due to students walking to/from PS/IS 338 (see Table 15-6). Approximately five percent of walkers would traverse through the Caton Avenue/East 7<sup>th</sup> Street intersection, resulting in an increase of approximately 30 pedestrians during the AM and PM peak hours. The pedestrian levels of service at the corners and crosswalks would remain acceptable within LOS B.

Table 15-6: 2013 No Build Pedestrian Conditions

| INTERSECTION and ELEMENT                | AM Peak                |     | PM Peak                |     |
|---|------------------------|-----|------------------------|-----|
|   | Average Space (sf/ped) | LOS | Average Space (sf/ped) | LOS |
| <b>Caton Avenue and East 7th Street</b> |                        |     |                        |     |
| Northeast Corner                        | 211                    | A   | 157                    | A   |
| Southeast Corner                        | 67                     | A   | 54                     | B   |
| Northwest Corner                        | 211                    | A   | 139                    | A   |
| Southwest Corner                        | 200                    | A   | 152                    | A   |
| North Crosswalk                         | 613                    | A   | 477                    | A   |
| South Crosswalk                         | 241                    | A   | 209                    | A   |
| East Crosswalk                          | 1,834                  | A   | 1,010                  | A   |
| West Crosswalk                          | 404                    | A   | 239                    | A   |

### C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

The analysis of future conditions with the project in place requires the determination of the number of trips by travel mode expected to be generated by the proposed school, the assignment of these vehicle trips to the street network approaching the site, and the determination of projected levels of service at the critical locations analyzed.

**Trip Generation.** The proposed school would provide a total capacity of 757 students. For trip generation purposes, it was assumed that the new school would be filled to capacity from pre-kindergarten through grade eight. To obtain trip generation rates, modal splits, and directional distribution estimates, data were used from the student/staff surveys of nearby 139 conducted for the PS/IS 338 study. The total project trip generation rates and modal splits are discussed below, and summarized in Tables 15-7 and 15-8.

Table 15-7: AM Modal Split and Total Trip Generation Data

| Travel Mode                  | % K-8 Students | % Staff    | K-8 Student Person-Trips <sup>(1)</sup> | Staff Person-Trips | Student Vehicle-Trips | Staff Vehicle-Trips |
|------------------------------|----------------|------------|---|--------------------|-----------------------|---------------------|
| Walk                         | 71             | 5          | 538 <sup>(2)</sup>                      | 4                  | N/A                   | N/A                 |
| Auto                         | 19             | 58         | 146                                     | 44                 | 166 <sup>(3)</sup>    | 54 <sup>(4)</sup>   |
| General Education School Bus | 2              | N/A        | 13                                      | N/A                | 4 <sup>(5)</sup>      | N/A                 |
| Public Transit / Other       | 8              | 37         | 60                                      | 28                 | N/A                   | N/A                 |
| <b>TOTAL</b>                 | <b>100</b>     | <b>100</b> | <b>757</b>                              | <b>76</b>          | <b>170</b>            | <b>54</b>           |

## Notes:

1. No absentee rate was applied for the proposed school. The school was assumed to be at full capacity during both the AM and PM peak hours.
2. The percentage of grades K-4 students walking to school is 67 percent versus 76 percent for grades 5-8.
3. The total number of student auto trips consist of 83 arrivals and 83 departures, assuming a vehicle occupancy of 1.8 and 1.7 students per auto for grades K-4 and grades 5-8, respectively. The percentage of grades K-4 students being driven to school is 23 percent versus 15 percent for grades 5-8.
4. The total number of staff auto trips consist of 43 arrivals and eleven departures to and from the area, assuming a vehicle occupancy rate of 1.1 persons per auto. This includes 32 teachers driving/carpooling to the school and eleven teachers being dropped off at the school.
5. The general education school bus trips consist of two arrivals and two departures, assuming an occupancy rate of seven students per bus.

Table 15-8: PM Modal Split and Total Trip Generation Data

| Travel Mode                  | % K-8 Students | % Staff    | K-8 Student Person-Trips <sup>(1)</sup> | Staff Person-Trips | Student Vehicle-Trips | Staff Vehicle-Trips |
|------------------------------|----------------|------------|---|--------------------|-----------------------|---------------------|
| Walk                         | 74             | 5          | 558 <sup>(2)</sup>                      | 4                  | N/A                   | N/A                 |
| Auto                         | 17             | 58         | 128                                     | 44                 | 144 <sup>(3)</sup>    | 54 <sup>(4)</sup>   |
| General Education School Bus | 2              | N/A        | 15                                      | N/A                | 4 <sup>(5)</sup>      | N/A                 |
| Public Transit / Other       | 7              | 37         | 56                                      | 28                 | N/A                   | N/A                 |
| <b>TOTAL</b>                 | <b>100</b>     | <b>100</b> | <b>757</b>                              | <b>76</b>          | <b>148</b>            | <b>54</b>           |

## Notes:

1. No absentee rate was applied for the proposed school. The school was assumed to be at full capacity during both the AM and PM peak hours.
2. The percentage of grades K-4 students walking to school is 68 percent versus 81 percent for grades 5-8.
3. The total number of student auto trips consist of 72 arrivals and 72 departures, assuming a vehicle occupancy of 1.8 and 1.7 students per auto for grades K-4 and grades 5-8, respectively. The percentage of grades K-4 students being driven to school is 21 percent versus 12 percent for grades 5-8.
4. The total number of staff auto trips consist of eleven arrivals and 43 departures to and from the area, assuming a vehicle occupancy rate of 1.1 persons per auto. This includes 32 teachers driving/carpooling to the school and eleven teachers being dropped off at the school.
5. The general education school bus trips consist of two arrivals and two departures, assuming an occupancy rate of eight students per bus.

The surveys questioned students and staff in terms of trip origin, travel mode, vehicle occupancy, and school arrival/departure times. According to the data, students would arrive at and depart from school by a number of travel modes, including private autos, transit buses, subways, general education school buses, and walking from nearby residences. The data indicate that a majority of children attending the school would live in nearby residential areas, within a ½-mile distance to the school. Consequently, the majority of these students (71 percent) would walk to school, while approximately 19 percent would be driven to school by their parents. The remaining ten percent of the students would commute to school by public transit (i.e., local buses, subways) and yellow school buses.

School bus and auto drop-off trips were assumed to make a complete in-and-out cycle within the AM and PM peak hours, i.e., arrive full and depart empty within the AM study peak hour and arrive empty and depart full in the PM study peak hour. Vehicle occupancy rates of 1.8 and 1.7 students per auto were applied to grades K through four and grades five through eight, respectively.

It is expected that the new school facility would employ 76 staff members. Based on the survey data, 37 percent of the staff would utilize public transit, 58 percent would travel in private automobiles at an occupancy rate of 1.1 persons per vehicle, and the remaining five percent would walk to school.

**Temporal Distribution:** The trip generation rates have been adjusted to reflect the traffic conditions for the 8-9 AM and 3-4 PM peak analysis hours (see Tables 15-9 and 15-10). All student trips would arrive during the 8-9 AM peak analysis hour, while approximately 89 percent depart during 3-4 PM peak analysis hour, resulting in 85 student vehicle arrivals/departures (autos and buses) during the AM peak hour and 65 student vehicle arrivals/departures during the PM peak hour. Approximately 28 percent of all staff trips arrive during the 8-9 AM peak analysis hour, while nearly 54 percent depart during 3-4 PM peak analysis hour, resulting in eleven arrivals and three departures during the AM peak hour and six arrivals and 23 departures during the PM peak hour.

Table 15-9: AM Modal Split and Trip Generation Data (8-9 AM)

| Travel Mode                  | % K-8 Students | % Staff    | K-8 Student Person-Trips <sup>(1)</sup> | Staff Person-Trips | Student Vehicle-Trips | Staff Vehicle-Trips |
|------------------------------|----------------|------------|---|--------------------|-----------------------|---------------------|
| Walk                         | 71             | 5          | 538 <sup>(2)</sup>                      | 2                  | N/A                   | N/A                 |
| Auto                         | 19             | 58         | 146                                     | 11                 | 166 <sup>(3)</sup>    | 14 <sup>(4)</sup>   |
| General Education School Bus | 2              | N/A        | 13                                      | N/A                | 4 <sup>(5)</sup>      | N/A                 |
| Public Transit / Other       | 8              | 37         | 60                                      | 8                  | N/A                   | N/A                 |
| <b>TOTAL</b>                 | <b>100</b>     | <b>100</b> | <b>757</b>                              | <b>21</b>          | <b>170</b>            | <b>14</b>           |

## Notes:

1. No absentee rate was applied for the proposed school. The school was assumed to be at full capacity during both the AM and PM peak hours.
2. The percentage of grades K-4 students walking to school is 67 percent versus 76 percent for grades 5-8.
3. The student auto trips consist of 83 arrivals and 83 departures during the 7:45-8:45 AM analysis hour, assuming a vehicle occupancy of 1.8 and 1.7 students per auto for grades K-4 and grades 5-8, respectively. The percentage of grades K-4 students being driven to school is 23 percent versus 15 percent for grades 5-8.
4. The staff auto trips consist of eleven arrivals and three departures to and from the area during the 7:45-8:45 AM analysis hour, assuming a vehicle occupancy rate of 1.1 persons per auto. This includes eight teachers driving/ carpooling to the school and three teachers being dropped off at the school.
5. The general education school bus trips consist of two arrivals and two departures during the 7:45-8:45 AM analysis hour, assuming an occupancy rate of seven students per bus.

Table 15-10: PM Modal Split and Trip Generation Data (3-4 PM)

| Travel Mode                  | % K-8 Students | % Staff    | K-8 Student Person-Trips <sup>(1)</sup> | Staff Person-Trips | Student Vehicle-Trips | Staff Vehicle-Trips |
|------------------------------|----------------|------------|---|--------------------|-----------------------|---------------------|
| Walk                         | 74             | 5          | 492 <sup>(2)</sup>                      | 2                  | N/A                   | N/A                 |
| Auto                         | 17             | 58         | 113                                     | 23                 | 126 <sup>(3)</sup>    | 29 <sup>(4)</sup>   |
| General Education School Bus | 2              | N/A        | 13                                      | N/A                | 4 <sup>(5)</sup>      | N/A                 |
| Public Transit / Other       | 7              | 37         | 50                                      | 15                 | N/A                   | N/A                 |
| <b>TOTAL</b>                 | <b>100</b>     | <b>100</b> | <b>668</b>                              | <b>40</b>          | <b>130</b>            | <b>29</b>           |

## Notes:

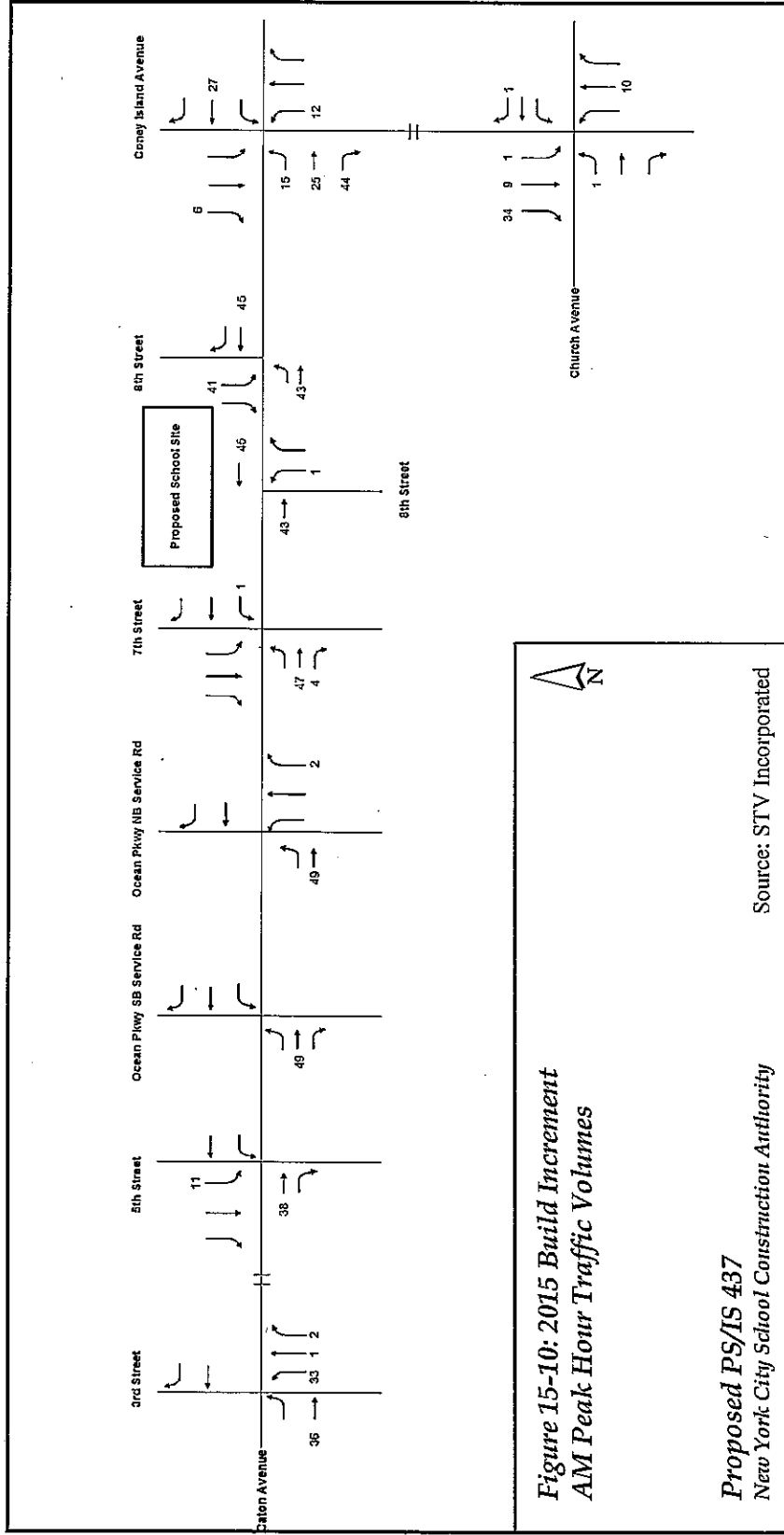
1. No absentee rate was applied for the proposed school. The school was assumed to be at full capacity during both the AM and PM peak hours.
2. The percentage of grades K-4 students walking to school is 68 percent versus 81 percent for grades 5-8.
3. The student auto trips consist of 63 arrivals and 63 departures during the 3-4 PM analysis hour, assuming a vehicle occupancy of 1.8 and 1.7 students per auto for grades K-4 and grades 5-8, respectively. The percentage of grades K-4 students being driven to school is 21 percent versus 12 percent for grades 5-8.
4. The staff auto trips consist of six arrivals and 23 departures to and from the area during the 3-4 PM analysis hour, assuming a vehicle occupancy rate of 1.1 persons per auto. This includes 17 teachers driving/ carpooling to the school and six teachers being dropped off at the school.
5. The general education school bus trips consist of two arrivals and two departures during the 3-4 PM analysis hour, assuming an occupancy rate of seven students per bus.

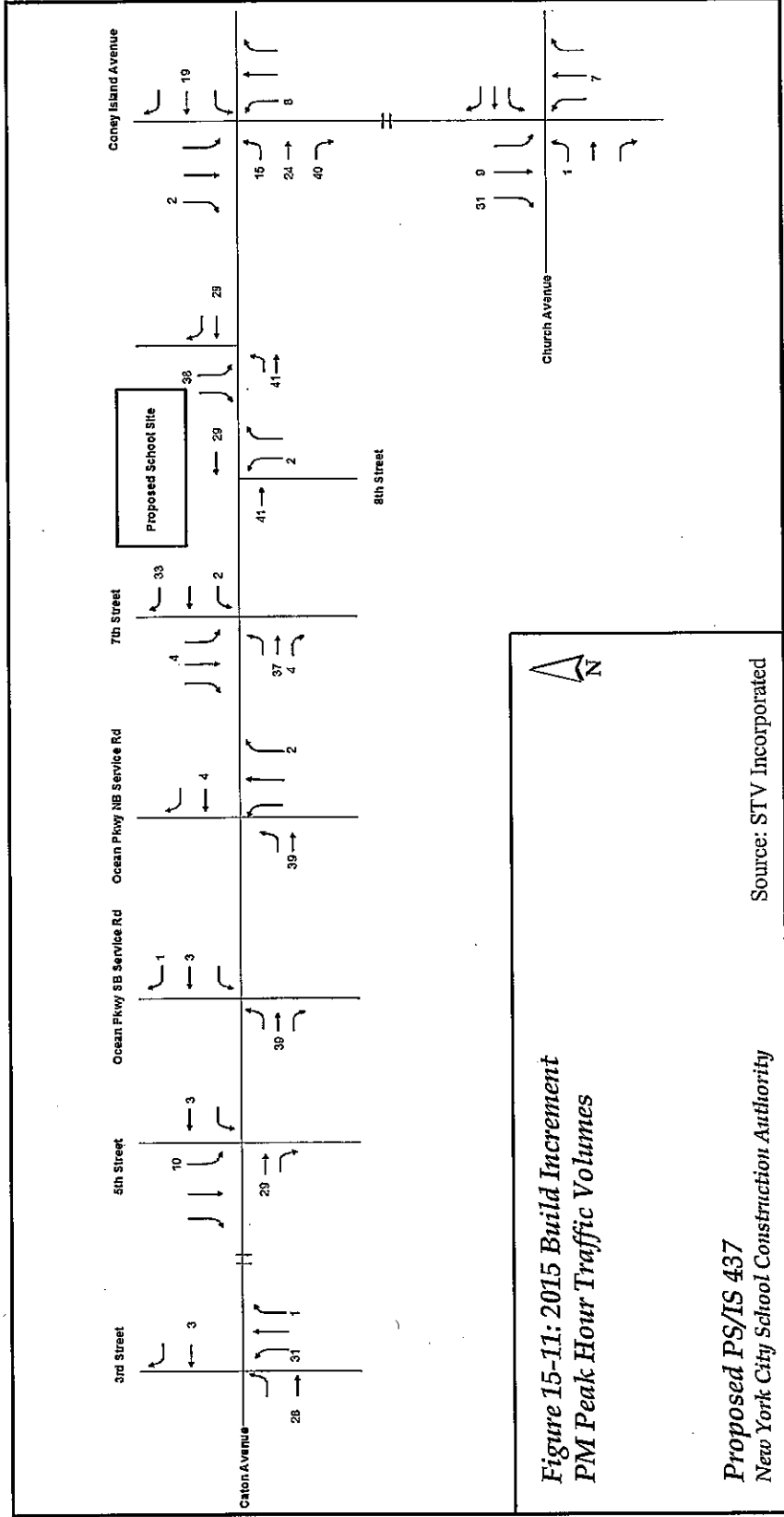
**Total Project Vehicle Trips Generated:** The total number of new project-generated vehicle trips (autos and school buses) is projected to be 96 arrivals and 88 departures during the AM and 71 arrivals and 88 departures during the PM peak hours.

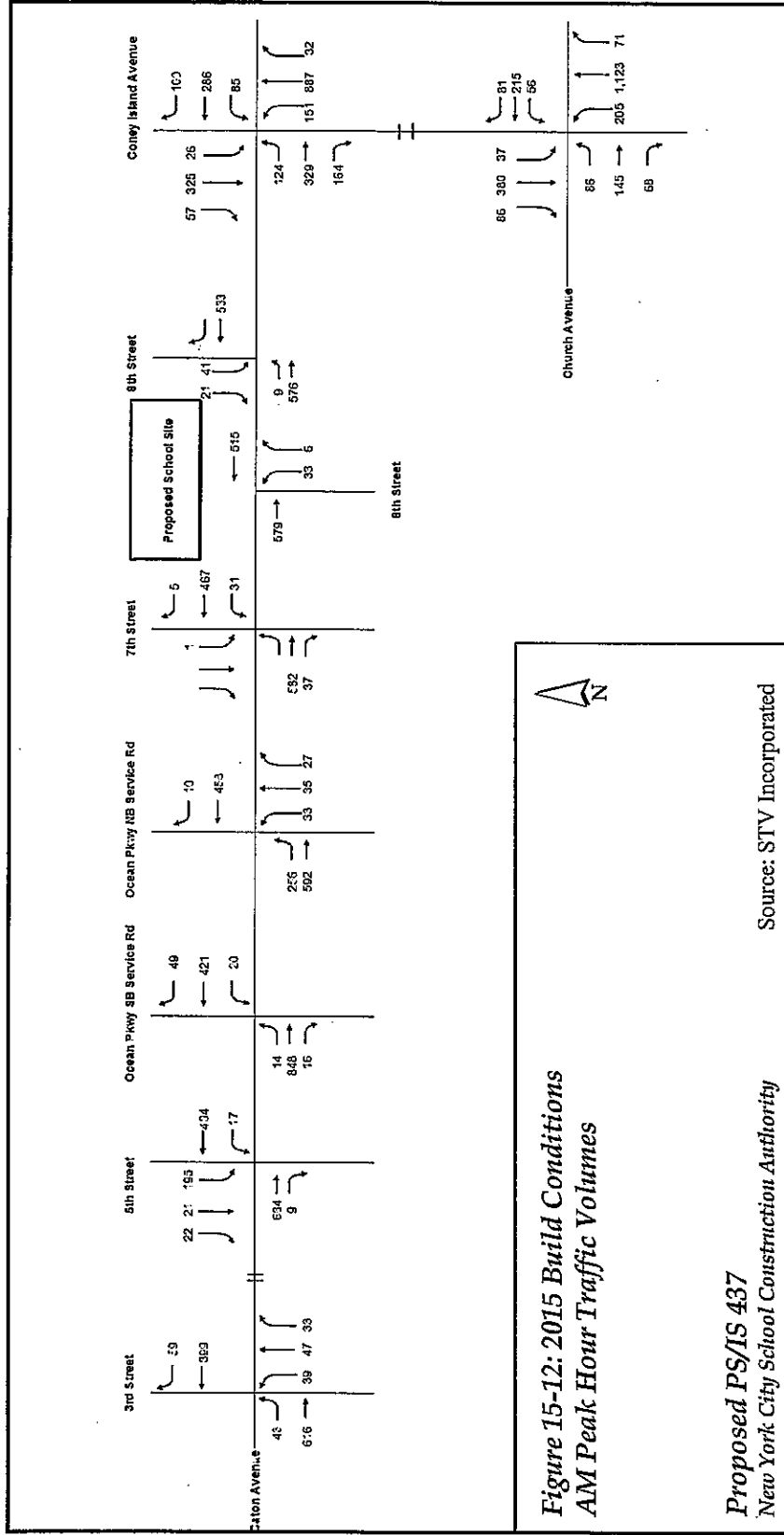
**Project Vehicle Assignment:** The distribution of new vehicle trips to the school was developed based on the existing distribution of traffic along the main approach routes to the school.

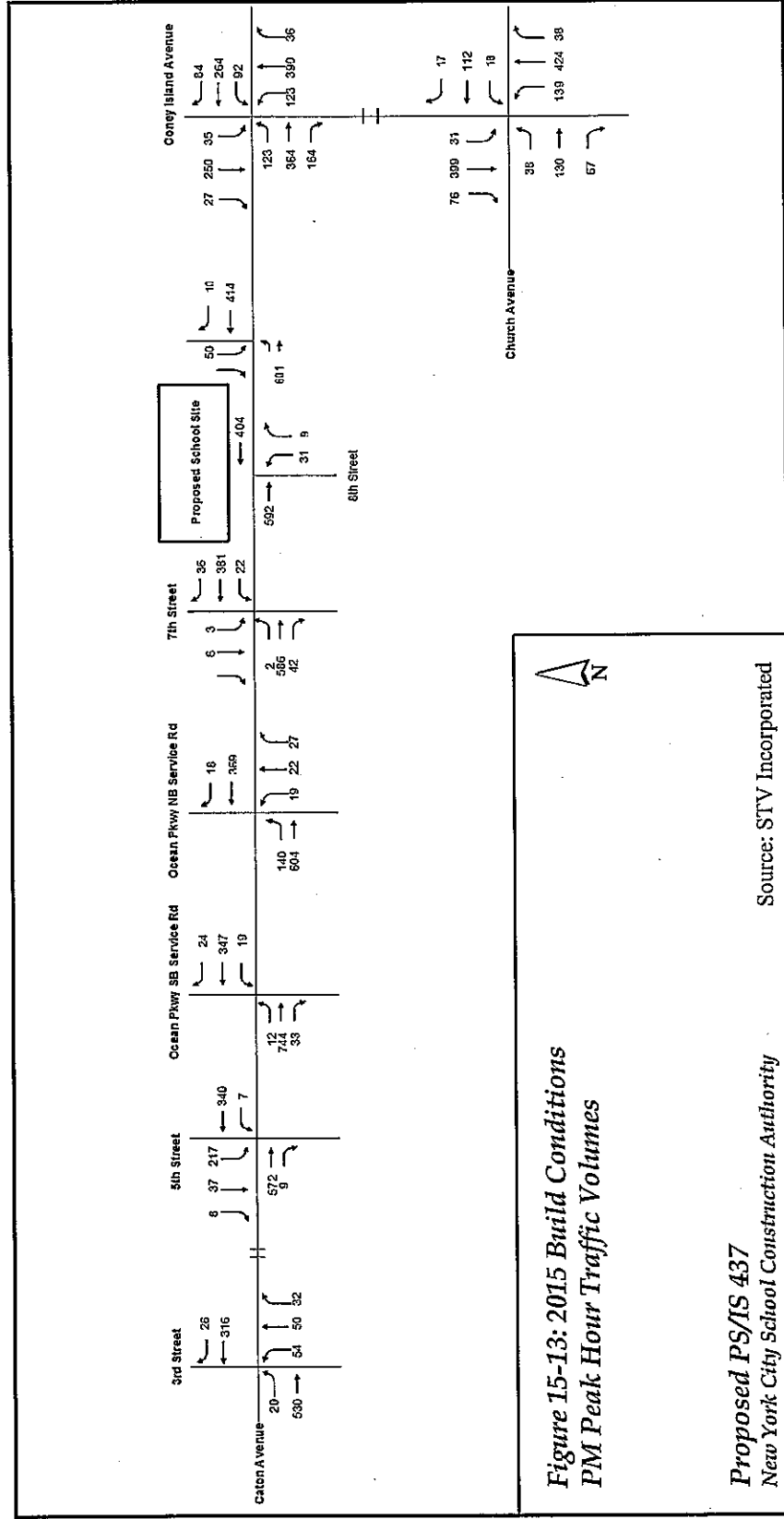
Figures 15-10 and 15-11 show the respective volumes of all vehicle trips (students and teachers) that would be generated by the proposed school during the AM and PM peak hours. Figures 15-12 and 15-13 indicate the total Build volumes during the AM and PM peak hours, respectively.











**Significant Impact Criteria.** The identification of potential significant traffic impacts was based on criteria for signalized intersections defined in the *CEQR Technical Manual*. A deterioration from LOS A, B, or C No Build conditions to unacceptable LOS D, E, or F Build conditions is considered a significant impact. Improvements must be made such that the unacceptable levels of service operate at LOS mid-D or better (with delays per vehicle of 45 and 30 seconds or less for signalized and unsignalized intersections, respectively). A deterioration from No Build LOS D conditions to unacceptable LOS D, E, or F Build conditions and an increase of five or more seconds of delay is also considered significant. For No Build LOS E conditions, an increase of four or more seconds of Build delay is significant. For No Build LOS F conditions, an increase of three or more seconds of Build delay is considered significant. However, if the No Build LOS F conditions already have delays in excess of 120 seconds, an increase of one or more seconds of Build delay is significant, unless the Proposed Action would generate less than five vehicles through a signalized intersection in the peak hour. In addition to these requirements, for the minor-street of an unsignalized intersection to create a significant impact, at least 90 car equivalents (PCEs) must be identified in the future Build condition. If significant impacts are identified for movements that operated as LOS D, E, or F for No Build conditions, improvements must be made to achieve the same or better delays as for the No Build conditions.

**Future Build Traffic Conditions.** The level-of-service analysis for the Build condition indicated that significant traffic impacts would be expected at the following locations during the weekday AM and PM peak hours (see Table 15-11):

- Caton Avenue's eastbound left-turn movement onto northbound Coney Island Avenue would incur an 8.1-second increase in delay, thereby worsening beyond acceptable LOS mid-D conditions during the AM peak hour.
- The condition of Caton Avenue's westbound left-turn movement onto southbound Coney Island Avenue would worsen from LOS E to F during PM peak hour, with a 103-second increase in delay.

Table 15-11: 2015 Build Conditions Traffic Operations

| INTERSECTION & APPROACH                | Mvt.                 | AM Peak Hour |               |      | PM Peak Hour |               |       |   |
|--|----------------------|--------------|---------------|------|--------------|---------------|-------|---|
|  |                      | V/C          | Control Delay | LOS  | V/C          | Control Delay | LOS   |   |
| <b>Signalized</b>                      |                      |              |               |      |              |               |       |   |
| <b>Caton Ave and Third St</b>          |                      |              |               |      |              |               |       |   |
| Caton Ave                              | EB                   | LT           | 0.70          | 19.8 | B            | 0.56          | 16.0  | B |
|  | WB                   | TR           | 0.46          | 14.2 | B            | 0.34          | 12.5  | B |
| Third St                               | NB                   | LTR          | 0.23          | 31.8 | C            | 0.26          | 32.4  | C |
|  | Overall Intersection |              | -             | 18.9 | B            |               | 17.0  | B |
| <b>Caton Ave and Fifth St</b>          |                      |              |               |      |              |               |       |   |
| Caton Ave                              | EB                   | TR           | 0.68          | 18.9 | B            | 0.57          | 16.2  | B |
|  | WB                   | LT           | 0.44          | 13.8 | B            | 0.35          | 12.6  | B |
| Fifth St                               | SB                   | LTR          | 0.46          | 36.1 | D            | 0.50          | 37.1  | D |
|  | Overall Intersection |              | -             | 20.4 | C            |               | 19.7  | B |
| <b>Caton Ave and NB Ocean Parkway</b>  |                      |              |               |      |              |               |       |   |
| Caton Ave                              | EB                   | LT           | 0.61          | 13.1 | B            | 0.47          | 10.6  | B |
|  | WB                   | TR           | 0.22          | 8.1  | A            | 0.19          | 7.8   | A |
| NB Ocean Parkway                       | NB                   | LTR          | 0.37          | 47.2 | D            | 0.26          | 45.1  | D |
|  | Overall Intersection |              | -             | 13.7 | B            |               | 11.7  | B |
| <b>Caton Ave and SB Ocean Parkway</b>  |                      |              |               |      |              |               |       |   |
| Caton Ave                              | EB                   | LTR          | 0.53          | 18.4 | B            | 0.47          | 17.4  | B |
|  | WB                   | LTR          | 0.31          | 15.3 | B            | 0.25          | 14.5  | B |
|  | Overall Intersection |              | -             | 17.3 | B            |               | 16.5  | B |
| <b>Caton Ave and Seventh St</b>        |                      |              |               |      |              |               |       |   |
| Caton Ave                              | EB                   | LTR          | 0.33          | 11.9 | B            | 0.35          | 12.2  | B |
|  | WB                   | LTR          | 0.31          | 11.8 | B            | 0.25          | 11.1  | B |
| Seventh St                             | SB                   | LTR          | 0.00          | 28.7 | C            | 0.02          | 29.0  | C |
|  | Overall Intersection |              | -             | 11.8 | B            |               | 11.9  | B |
| <b>Caton Ave and Coney Island Ave</b>  |                      |              |               |      |              |               |       |   |
| Caton Ave                              | EB                   | L            | 0.64          | 45.4 | D            | 0.62          | 43.3  | D |
|  |                      | TR           | 0.77          | 41.6 | D            | 0.83          | 45.5  | D |
|  | WB                   | L            | 0.53          | 40.8 | D            | 1.15          | 177.7 | F |
|  |                      | TR           | 0.79          | 45.7 | D            | 0.79          | 45.2  | D |
| Coney Island Ave                       | NB                   | L            | 0.37          | 18.2 | B            | 0.28          | 16.2  | B |
|  |                      | TR           | 0.58          | 19.8 | B            | 0.29          | 15.4  | B |
|  | SB                   | L            | 0.14          | 15.2 | B            | 0.09          | 13.7  | B |
|  |                      | TR           | 0.22          | 14.6 | B            | 0.15          | 13.8  | B |
|  | Overall Intersection |              | -             | 28.7 | C            |               | 38.1  | D |
| <b>Church Ave and Coney Island Ave</b> |                      |              |               |      |              |               |       |   |
| Church Ave                             | EB                   | LT           | 0.42          | 29.7 | C            | 0.38          | 36.0  | D |
|  |                      | R            | 0.20          | 26.4 | C            | 0.29          | 35.6  | D |
|  | WB                   | LTR          | 0.89          | 58.0 | E            | 0.39          | 36.6  | D |
| Coney Island Ave                       | NB                   | L            | 0.73          | 42.7 | D            | 0.42          | 22.0  | C |
|  |                      | TR           | 0.87          | 38.3 | D            | 0.29          | 17.4  | B |
|  | SB                   | L            | 0.23          | 24.1 | C            | 0.08          | 9.4   | A |
|  |                      | TR           | 0.34          | 16.1 | B            | 0.29          | 10.7  | B |
|  | Overall Intersection |              | -             | 36.0 | D            |               | 20.7  | C |
| <b>Unsignalized</b>                    |                      |              |               |      |              |               |       |   |
| <b>Caton Ave and Eighth St</b>         |                      |              |               |      |              |               |       |   |
| Caton Ave                              | EB                   | LT           | 0.01          | 8.5  | A            | 0.00          | 8.1   | A |
| Eighth St                              | NB                   | LR           | 0.11          | 16.8 | C            | 0.11          | 15.7  | C |
|  | SB                   | LR           | 0.16          | 16.2 | C            | 0.14          | 16.3  | C |

**Parking.** According to CEQR, a parking shortfall that exceeds the number of off-street parking spaces and more than half the available on-street spaces within a ¼-mile of the site in a residential area is considered a significant parking impact. Based on the project trip generation, parking demands within walking distance of the proposed PS/IS 437 would increase by 32 staff vehicles during the week (see Table 15-12). This increase represents less than half the available on-street spaces within a ¼-mile of the site when few regulations are in effect; and therefore, would not be considered a significant impact.

However, the proposed school would result in an increased on-street parking shortfall from twelve percent (No Build) to 16 percent (Build) when the most restrictive curbside parking regulations are in effect. This added parking demand by the new school would not be met since there are no off-street parking facilities (i.e., municipal lots, parking garages) within the study area to alleviate the increased parking shortfall. Therefore, the 32-space increase in parking demand during the most restrictive regulation periods would constitute a significant parking impact (i.e., increased shortfall from the No Build to the Build).

**Table 15-12: 2015 Build Parking Supply and Demand**

| Parking Parameter          | w/Regs          | w/o Regs       |
|----------------------------|-----------------|----------------|
| Parking-Space Supply       | 961             | 1,339          |
| Demand<br>(Occupancy Rate) | 1,112<br>(116%) | 1,291<br>(96%) |
| Spaces Available<br>(Rate) | -151<br>(-16%)  | 48<br>(4%)     |

**Transit and Pedestrians.** It is expected that seven to eight percent of students and 37 percent of staff members bound for school would utilize public transit, resulting in approximately 63 new transit trips arriving during the AM analysis peak hour and 65 new transit trips departing during the PM analysis peak hour. According to general thresholds used by CEQR and NYCT, if the proposed action is projected to result in fewer than 200 peak hour bus transit riders, the action is considered unlikely to create a significant transit impact. Thus, no further technical analyses are needed.

Approximately 71 percent of students and five percent of the staff would be expected to walk to the proposed school during the AM peak hour, resulting in 540 pedestrian trips. In addition, 63 students and staff that would utilize public transit would walk from the bus/train stops to the school door.

During the PM peak hour, approximately 74 percent of students and five percent of the staff would be anticipated to walk from the proposed school, resulting in 494 pedestrian trips. Additionally, 65 student and staff members that would walk from the school door would use

public transit. These trips were assigned within the study area based on existing pedestrian movements in the area.

According to the *CEQR Technical Manual*, an increase of 200 or more pedestrians per hour at any pedestrian element would typically be considered a significant impact. When the expected pedestrian trips to be generated by the proposed PS/IS 437 were assigned to the study area network, it was found that no single pedestrian element would likely experience an increase of 200 people or more. In addition, CEQR guidelines further dictate that, for corner and crosswalk analyses, the proposed action should not create a significant impact unless analyses resulted in average occupancies of less than 20 sf/ped (mid-LOS D). As shown in Table 15-13, all crosswalks at the intersection of Caton Avenue and East 7<sup>th</sup> Street would continue to function acceptably at LOS A during both the AM and PM peak periods. The southeast corner would operate at LOS B, and the southwest corner would operate at LOS A during both time periods. The northeast and northwest street corners would experience a deterioration from No Build LOS A to Build LOS C during the AM and PM peak periods. This would not be considered a significant impact. Therefore, no further analyses are needed.

**Table 15-13: 2015 Build Pedestrian Conditions**

| INTERSECTION and ELEMENT                | AMPeak                 |     | PMPeak                 |     |
|---|------------------------|-----|------------------------|-----|
|   | Average Space (sf/ped) | LOS | Average Space (sf/ped) | LOS |
| <b>Caton Avenue and East 7th Street</b> |                        |     |                        |     |
| Northeast Corner                        | 28                     | C   | 25                     | C   |
| Southeast Corner                        | 40                     | B   | 42                     | B   |
| Northwest Corner                        | 34                     | C   | 35                     | C   |
| Southwest Corner                        | 90                     | A   | 99                     | A   |
| North Crosswalk                         | 74                     | A   | 92                     | A   |
| South Crosswalk                         | 200                    | A   | 182                    | A   |
| East Crosswalk                          | 365                    | A   | 379                    | A   |
| West Crosswalk                          | 97                     | A   | 98                     | A   |

**Safety.** The magnitudes of the vehicular and pedestrian volumes that would be generated by the proposed school are not anticipated to adversely affect safety in the area. However, it is recommended that a school crossing guard be stationed at the Caton Avenue and East 8<sup>th</sup> Street intersection to enhance pedestrian safety.



**D. PROPOSED IMPROVEMENT MEASURES**

In order to eliminate the delay increase and parking shortfall created by the proposed project, improvement measures were identified which, if implemented, would avoid the projected impacts to the intersection of Caton Avenue and Coney Island Avenue and on the availability of curbside parking within a ¼-mile of the project site.

**Traffic.** Caton Avenue and Coney Island Avenue: Shifting five seconds of green time from Coney Island Avenue's north-south approaches during AM and PM peak hours would restore both east- and westbound left-turn movement LOS to the No Build condition and would avoid project-generated traffic impacts (see Table 15-14).

Table 15-14: 2015 Improved Build Conditions Traffic Operations

| INTERSECTION & APPROACH                                      | Mvt. | No Build |               | Mvt. | Build |      | Mvt.  | Improved Build |     | Improvement Measures   |
|--|------|----------|---------------|------|-------|------|-------|----------------|-----|--|
|  |      | V/C      | Control Delay |      | LOS   | V/C  |       | Control Delay  | LOS |  |
| <b>AMPeak</b><br>Caton Ave and Coney Island Ave<br>Caton Ave | L    | 0.52     | 37.3          | D    | L     | 0.64 | 45.4  | D              | L   | - Shift five seconds of green time from Coney Island Avenue's north-south approaches to Caton Avenue |
|  | TR   | 0.67     | 36.4          | D    | TR    | 0.77 | 41.6  | D              | TR  |  |
|  | L    | 0.53     | 41.0          | D    | L     | 0.53 | 40.8  | D              | L   |  |
|  | TR   | 0.74     | 42.1          | D    | TR    | 0.79 | 45.7  | D              | TR  |  |
|  | L    | 0.34     | 17.6          | B    | L     | 0.37 | 18.2  | B              | L   |  |
| Coney Island Ave   | TR   | 0.58     | 19.8          | B    | TR    | 0.58 | 19.8  | B              | TR  |  |
|  | L    | 0.14     | 15.2          | B    | L     | 0.14 | 15.2  | B              | L   |  |
|  | TR   | 0.22     | 14.6          | B    | TR    | 0.22 | 14.6  | B              | TR  |  |
|  | -    | 26.3     | C             | -    | 28.7  | C    | -     | 27.3           | C   |  |
| <b>PMPeak</b><br>Caton Ave and Coney Island Ave<br>Caton Ave | L    | 0.51     | 37.1          | D    | L     | 0.62 | 43.3  | D              | L   | - Shift five seconds of green time from Coney Island Avenue's north-south approaches to Caton Avenue |
|  | TR   | 0.73     | 39.2          | D    | TR    | 0.83 | 45.5  | D              | TR  |  |
|  | L    | 0.81     | 74.7          | E    | L     | 1.15 | 177.7 | F              | L   |  |
|  | TR   | 0.74     | 42.4          | D    | TR    | 0.79 | 45.2  | D              | TR  |  |
|  | L    | 0.26     | 15.9          | B    | L     | 0.28 | 16.2  | B              | L   |  |
| Coney Island Ave   | TR   | 0.29     | 15.4          | B    | TR    | 0.29 | 15.4  | B              | TR  |  |
|  | L    | 0.09     | 13.7          | B    | L     | 0.09 | 13.7  | B              | L   |  |
|  | TR   | 0.14     | 13.8          | B    | TR    | 0.15 | 13.8  | B              | TR  |  |
|  | -    | 30.2     | C             | -    | 38.1  | D    | -     | 29.5           | C   |  |
| <b>Overall Intersection</b>                                  |      |          |               |      |       |      |       |                |     |  |

**Parking.** The proposed project could result in a significant parking impact (i.e., shortfall) during the periods when the most restrictive curbside parking regulations are in effect. This impact could be avoided by altering the parking restrictions along five block faces in the ¼-mile radius parking study area from Tuesday, when the shortfall is projected to occur, to Thursday, when few regulations are in effect, and therefore, a high supply of curbside spaces. Modification of the existing curbside parking regulations is proposed for the following locations:

- South side of Fort Hamilton Parkway between East 3<sup>rd</sup> and East 5<sup>th</sup> Streets: Change the parking restriction from Tuesday, 9:30-11 AM to Thursday, 11:30 AM-1 PM.
- North side of Caton Avenue between East 3<sup>rd</sup> Street and Ocean Parkway: Change the parking restriction from Tuesday, 11:30 AM-1 PM to Thursday, 11:30 AM-1 PM.

The parking shortfall during regulation periods within the ¼-mile radius parking study area would be eliminated should these restrictions be altered as proposed. Implementing these new parking regulations would “recover” 34 curb parking spaces on the most restricted parking day. A comparison of the No Build on-street parking supply and demand versus Build demand with the proposed parking restrictions shows that the parking shortfall resulting from the project would be fully avoided (see Table 15-15).

**Table 15-15: 2015 No Build and Build with Improvements  
Parking Supply and Demand (¼-mile study area)**

| Parking Parameter          | No Build        |                | Build w/ Improvements |                |
|----------------------------|-----------------|----------------|-----------------------|----------------|
|                            | w/Regs          | w/o Regs       | w/Regs                | w/o Regs       |
| Parking-Space Supply       | 961             | 1,339          | 995                   | 1,339          |
| Demand<br>(Occupancy Rate) | 1,080<br>(112%) | 1,259<br>(94%) | 1,112<br>(112%)       | 1,291<br>(96%) |
| Spaces Available<br>(Rate) | -119<br>(-12%)  | 80<br>(6%)     | -117<br>(-12%)        | 48<br>(4%)     |

\* Parking shortfall reduced to No Build levels; impact avoided.

## CHAPTER 16: AIR QUALITY

The procedures followed in this analysis are based on those contained in the *CEQR Technical Manual*. In addition, the air quality characteristics of the proposed school project are identified and discussed within the context of the Clean Air Act of 1990 requirements and other applicable state and local air quality standards.

**Pollutants of Concern.** The United States Environmental Protection Agency (USEPA) has identified several criteria pollutants as being of concern nationwide: carbon monoxide (CO), nitrogen dioxide (NO<sub>2</sub>), ozone (O<sub>3</sub>), particulate matter (PM) sulfur dioxide (SO<sub>2</sub>), and lead (Pb). As a result, the USEPA has established National Ambient Air Quality Standards (NAAQS) for all of these criteria pollutants and has categorized these standards as "primary" and "secondary." Primary standards are designed to establish limits to protect public health, including the health of "sensitive" populations such as asthmatics, children, and the elderly. Secondary standards set limits to protect public welfare, including protection against decreased visibility and damage to animals, crops, vegetation, and buildings. The NAAQS for all of the criteria pollutants are listed in Table 16-1. In addition to criteria pollutants, greenhouse gases are also of concern and are discussed below.

Table 16-1: National and New York State Ambient Air Quality Standards

| Pollutant                           | Averaging Period               | New York AAQS         |           | NAAQS                  |                        |
|-------------------------------------|--------------------------------|-----------------------|-----------|------------------------|------------------------|
|                                     |                                | Primary               | Secondary | Primary                | Secondary              |
| Carbon Monoxide (CO)                | 1-hour <sup>1</sup>            | 35 ppm                | 35 ppm    | 35 ppm                 | 35 ppm                 |
|                                     | 8-hour <sup>1</sup>            | 9 ppm                 | 9 ppm     | 9 ppm                  | 9 ppm                  |
| Ozone (O <sub>3</sub> )             | 1-hour <sup>1</sup>            | 0.12 ppm              | 0.08 ppm  | 0.12 ppm               | 0.12 ppm               |
|                                     | 8-hour <sup>4</sup> (2008 std) | ----                  | ----      | 0.075 ppm              | 0.075 ppm              |
|                                     | 8-hour <sup>4</sup> (1997 std) | 0.08 ppm              | 0.12 ppm  | ----                   | ----                   |
| Nitrogen Dioxide (NO <sub>2</sub> ) | Annual                         | 0.05 ppm              | 0.05 ppm  | 0.053 ppm              | 0.053 ppm              |
|                                     | 1-hour                         | ----                  | ----      | 100 ppb                | 53 ppb                 |
| Lead (Pb)                           | Quarterly                      | ----                  | ----      | 0.15 µg/m <sup>3</sup> | 0.15 µg/m <sup>3</sup> |
| Total Suspended Particulates (TSP)  | 12 consecutive months          | 75 µg/m <sup>3</sup>  | ----      | ----                   | ----                   |
|                                     | 24-hours                       | 150 µg/m <sup>3</sup> | ----      | 260 µg/m <sup>3</sup>  | 150 µg/m <sup>3</sup>  |
| Particulates (PM <sub>10</sub> )    | 24-hour <sup>1</sup>           | ----                  | ----      | 150 µg/m <sup>3</sup>  | 150 µg/m <sup>3</sup>  |
| Particulates (PM <sub>2.5</sub> )   | 24-hour <sup>3</sup>           | ----                  | ----      | 35 µg/m <sup>3</sup>   | 35 µg/m <sup>3</sup>   |
|                                     | Annual <sup>2</sup>            | ----                  | ----      | 15 µg/m <sup>3</sup>   | 15 µg/m <sup>3</sup>   |
| Sulfur Dioxide (SO <sub>2</sub> )   | 1-hour                         | ----                  | ----      | 75 ppb                 | ----                   |
|                                     | 3-hour <sup>1</sup>            | ----                  | 0.5 ppm   | ----                   | 0.5 ppm                |
|                                     | 24-hour <sup>1</sup>           | 0.14 ppm              | 0.10 ppm  | 0.14 ppm               | ----                   |
|                                     | Annual                         | 0.03 ppm              | 0.02 ppm  | 0.03 ppm               | ----                   |

1 - Not to be exceeded more than once per year  
2 - 3 year average of annual mean within an area must not exceed 15 µg/m<sup>3</sup>  
3 - 3 year average of 98<sup>th</sup> percentile of 24-hour concentrations at each monitor within an area must not exceed 35 µg/m<sup>3</sup>  
4 - 3 year average of the 4<sup>th</sup> highest daily maximum 8-hour average ozone concentrations, measured at each monitor within an area over each year, must not exceed 0.08 ppm.

Source: New York State Department of Environmental Conservation; US Environmental Protection Agency, 2011

A summary of the characteristics of the criteria pollutants are as follows.

**Carbon Monoxide.** Carbon monoxide (CO) is a colorless and odorless gas, which is primarily associated with the incomplete combustion of vehicle fuel. CO is very reactive and its concentrations are limited to relatively short distances near crowded intersections and along slow moving, heavily traveled roadways. Under the Clean Air Act of 1990, each state is committed to offset any CO emissions resulting from Vehicle Miles Traveled (VMT) growth in non-attainment areas. New York City has recently been re-designated as a maintenance area. To assure that air quality conditions continue to improve within the New York City metropolitan area, it is important to monitor potential impacts of new traffic-generating projects. As a result, concentrations of CO are evaluated on a local or microscale basis.

**Nitrogen Oxides.** Nitrogen dioxide (NO<sub>2</sub>) is formed from the burning of fossil fuels such as natural gas. Primary sources include on and off road vehicles as well as power generating plants. NO<sub>2</sub> and ozone are linked in that the production of NO<sub>2</sub> is a precursor to the formation of ozone. It is considered a highly reactive gas that is also linked to the production of acid rain. Because the chemical reactions that form ozone occur slowly, the effects of the pollutants involved are usually analyzed on a regional level. Although New York City is designated as a non-attainment area for ozone, the small scale of this project does not warrant a regional assessment of this pollutant. However, because the proposed school facility would include a natural gas burning furnace for heating and hot water, a more localized assessment of this pollutant is warranted.

**Lead.** Lead emissions are associated with industrial uses and motor vehicles that use gasoline containing lead additives. Most U.S. vehicles available since 1975 and all after 1980 are designed to use unleaded fuel. As a result, as newer models have replaced these older vehicles, lead emissions have decreased significantly. Therefore, lead is not a pollutant of concern for the proposed school project.

**Inhalable Particulates.** Inhalable particulate matter is a respiratory irritant and is of most concern when classified as being less than ten microns in diameter (PM<sub>10</sub>). Particulate matter (PM) is primarily generated by stationary sources, such as industrial facilities and power plants, however, PM can also be produced by the combustion of diesel fuel used in some buses and trucks as well as residential and commercial HVAC systems using oil as fuel. PM also develops from the mechanical breakdown of coarse particulate matter (e.g., from building demolition or roadway surface wear as well as other construction-related activities). As the proposed school project may induce heavy duty diesel (HDD) bus trips, PM from mobile sources is a pollutant of concern for this project.

The USEPA has also recently promulgated standards for PM less than 2.5 microns in diameter (PM<sub>2.5</sub>). While PM<sub>2.5</sub> and PM<sub>10</sub> both emanate from similar sources, PM<sub>2.5</sub> or "fine particulates" are made up of a complex mixture of extremely small particles and liquid droplets and are considered the most damaging to human health because they penetrate and remain in the deepest passages of the lungs. In addition to health effects, it has been shown that fine particles are the major cause of visibility impairment within major urban landscapes. At present, while New York State has submitted a designation recommendation to the USEPA, a final determination and direction on analysis techniques have not yet been issued. As a result, an analysis of PM<sub>2.5</sub> using NAAQS is not possible. However, the New York City Department of Environmental Protection (NYCDEP), in conjunction with NYSDEC, has recently promulgated an interim guidance for the screening and assessment of these fine particulates (*CEQR Technical Manual*). The mobile source screening portion of the guidelines requires that if a proposed action would generate fewer heavy duty diesel vehicles (HDDV) per hour (or its equivalent in vehicular emissions) than listed below, the need for a detailed PM<sub>2.5</sub> analysis would be unlikely:

- 12 HDDV: for paved roads with < 5000 veh/day
- 19 HDDV: for collector type roads
- 23 HDDV: for principal and minor arterials
- 23 HDDV: for expressways and limited access roads

This guidance is therefore applied in the screening of potential PM<sub>2.5</sub> impacts.

**Sulfur Dioxide.** Oxides of sulfur (SO<sub>2</sub>) are respiratory irritants associated with the combustion of sulfur-containing fuels (such as heating oil and coal). SO<sub>2</sub> is a precursor to acid rain and to PM<sub>2.5</sub>, both of which create damage to individual health and the environment. This pollutant is typically associated with large industrial operations but can also result from much smaller sources. All NYSDEC sulfur dioxide monitoring sites have remained in compliance with the New York State/Federal annual mean standard for over twenty years consecutively. As the proposed school will use clean burning natural gas for its HVAC heating and hot water systems, SO<sub>2</sub> is not a pollutant of particular concern.

**Greenhouse Gases.** Greenhouse gases (GHGs) trap heat in the atmosphere, creating what is called the greenhouse effect. Some GHGs, such as carbon dioxide (CO<sub>2</sub>), occur naturally and are emitted to the atmosphere through natural processes and human activities, while other GHGs are created and emitted solely through human activities. Levels of several important greenhouse gases have increased by about 25 percent since large-scale industrialization began around 150 years ago. During the past 20 years, about ¾ of human-made CO<sub>2</sub> emissions were from burning fossil fuels. The principal GHGs that enter the atmosphere from human activities are CO<sub>2</sub>, CH<sub>4</sub> (methane), N<sub>2</sub>O (nitrous oxide), and fluorinated gases. Stationary sources, such as the proposed project's HVAC systems, can sometimes generate significant portions of GHGs into the atmosphere. While GHGs are necessary to life since they keep the planet's surface warmer than it otherwise would be, as concentrations of GHGs increase, the earth's temperature also continues to increase. This is commonly called the global warming effect. Therefore, because of the global nature of GHG emissions, GHGs are potential pollutants of concern.

**De Minimus Criteria.** In addition to the Federal and State CO standards, New York City has developed *de minimus* criteria to assess the significance of project related impacts on local air quality. These criteria set the minimum change in eight-hour average carbon monoxide concentration that constitutes a significant environmental impact. The criteria are defined as follows:

- An increase of 0.5 parts per million (ppm) or greater in the maximum eight hour concentration if the projected future baseline ambient concentration is between 8.0 and 8.5 ppm.

- An increase of more than half the difference between the baseline concentrations and the eight-hour standards when no action concentrations are below eight ppm.

**Attainment Status/State Implementation Plan (SIP).** The Clean Air Act (CAA), as amended in 1990, defines non-attainment areas as geographic regions that have not met one or more of the NAAQS. When an area within a state is designated as non-attainment by the USEPA, the state is required to develop and implement a State Implementation Plan (SIP), which describes how it will meet the NAAQS under deadlines established by the CAA. New York City has been designated as non-attainment area for ozone and PM<sub>2.5</sub> but as an attainment area for CO. Violations of the CO standard have not been recorded at the NYSDEC monitoring sites for several years. As part of its ongoing effort to maintain its attainment designation for CO, New York State has committed to the implementation of area-wide and site-specific control measures to continue to reduce CO levels.

On February 13, 2004, New York State formally recommended that the USEPA designate New York City as non-attainment for PM<sub>2.5</sub>; the USEPA made their final non-attainment designation for PM<sub>2.5</sub> on December 17, 2004. On September 8, 2005, the USEPA proposed specific requirements that state and local governments have to meet as they implement the national ambient air quality standards for PM<sub>2.5</sub>. On September 21, 2006, the USEPA tightened the 24-hour fine particle standard from 65 micrograms per cubic meter ( $\mu\text{g}/\text{m}^3$ ) to 35  $\mu\text{g}/\text{m}^3$ , but retained the current annual fine particle standard at 15  $\mu\text{g}/\text{m}^3$ . In addition, effective September 17, 2006, the USEPA has revoked the current annual PM<sub>10</sub> standard based on a lack of evidence that links health problems to long-term exposure to coarse particle pollution. On October 2009, USEPA issued a final Federal Register notice designating areas of “nonattainment” and “unclassifiable/attainment” of the 24-hour NAAQS for PM<sub>2.5</sub>. These designations went into effect on December 14, 2009, 30 days after publication in the Federal Register on November 13, 2009. The NY-NJ-CT metropolitan area (22 counties across 3 states...population 19 million) was formally designated as a “nonattainment” area for the PM<sub>2.5</sub> NAAQS on January 6, 2010. Each state is required to submit its PM<sub>2.5</sub> SIP within three years of the effective designation date which is December 14, 2012. A state must demonstrate attainment of the NAAQS within 5 years of the effective designation date (December 14, 2014) unless it applies for a five year extension.

Ozone SIP revisions have been submitted to the USEPA over the past several years. A November 1992 NYSDEC submission to the USEPA provided SIP revisions which addressed the minimum air quality control requirements that were established by the CAA. In November 1993, a revision was submitted which documented how a 15% reduction in ozone precursors would be achieved by the end of 1996. Subsequent SIP revisions took into consideration the need to incorporate alternative procedures in order to reach a final ozone attainment status. On April 15, 2004, the USEPA officially designated the New York City portion of the NY-NJ-CT Metropolitan area as moderate non-attainment for the new 8-hour ozone standard (effective June 15, 2004). The USEPA revoked the 1-hour standard on June 15, 2005, so that New York State can focus attention on attaining the stricter 8-hour standard. However, the very specific control measures for the 1-hour standard included in the SIP will be required to stay in place until the 8-hour standard is attained. A new SIP for ozone was to be adopted by the state no later than June 15, 2007, with a target attainment deadline of June 15, 2010. However, on June



20, 2007, the USEPA proposed to strengthen the national ambient air quality standards for ground-level ozone. The proposed revisions reflect new scientific evidence about ozone and its effects on people and public welfare. The USEPA was to issue final standards by March 12, 2008 with the following estimated implementation schedule (this is offered for information, as the schedule has been delayed):

- By June 2009: States make recommendations for areas to be designated attainment and nonattainment.
- By June 2010: the USEPA makes final designations of attainment and nonattainment areas. Those designations would become effective 60 days after publication in the Federal Register.
- 2013: State Implementation Plans, outlining how states will reduce pollution to meet the standards, are due to the USEPA (three years after designations).
- 2013 to 2030: States are required to meet the standard, with deadlines depending on the severity of the problem.

On April 29, 2009, the USEPA signed seven Federal Register notices taking two separate types of action on State 1997 8-hour ozone nonattainment planning requirements. In six separate notices, USEPA is proposing to disapprove seven ozone attainment demonstrations and, in one additional notice, USEPA is making two findings of failure to submit ozone attainment demonstrations. The NY-NJ-CT Metropolitan area is included on this disapproval list but the State of New York is not included on the disapproval list because they requested a higher nonattainment classification for the New York City nonattainment area. A higher reclassification would change the attainment date to June 2013. The state concluded that the air quality data and the modeling in their SIP did not show attainment by the June 2010 attainment date. At this time, the multi-state New York City ozone nonattainment area cannot be reclassified until Connecticut and New Jersey also request the higher classification.

In January 2010, the USEPA extended the deadline to promulgate ozone designations by one year to March 12, 2011. As of January 22, 2011, the USEPA expects to finalize initial area designations for the 2008 NAAQS by mid-2012. In addition, the USEPA also proposed to strengthen the national ambient air quality standards for ground-level ozone. Ground-level ozone is a primary component of smog. The proposed revisions are based on scientific evidence about ozone and its effects on people and sensitive trees and plants. The USEPA accepted comments for 60 days following publication of the proposal in the Federal Register. The USEPA proposed that the level of the 8-hour primary standard, which was set at 0.075 ppm in the 2008 final rule, should instead be set at a lower level within the range of 0.060 to 0.070 parts per million (ppm).

### A. EXISTING CONDITIONS

NYSDEC operates a network of monitoring stations throughout the state to measure ambient air quality with the results published on an annual basis. NYSDEC's 2009 Air Quality Report identifies existing air quality levels for the project area based on data from the monitoring stations nearest the proposed project. Background air quality levels for the project area are shown in Table 16-2. Selected locations represent available background sites closest to the project area.

Table 16-2: Monitored Ambient Air Quality Data

| Pollutant                                    | Location         | Units             | Period  | Concentrations |         |                | Number of Exceedences of Federal Standard |           |
|--|------------------|-------------------|---------|----------------|---------|----------------|---|-----------|
|  |                  |                   |         | Mean           | Highest | Second Highest | Primary                                   | Secondary |
| CO   | Queens College 2 | ppm               | 8-hour  | -              | 1.9     | 1.7            | 0   | 0         |
|  |                  |                   | 1-hour  | -              | 3.1     | 2.8            | 0   | 0         |
| SO <sub>2</sub>                              | Queens College 2 | ppm               | Annual  | 0.0035         | -       | -              | 0   | -         |
|  |                  |                   | 24-hour | -              | 0.020   | 0.019          | 0   | -         |
|  |                  |                   | 3-hour  | -              | 0.035   | 0.034          | -   | 0         |
| Respirable Particulates (PM <sub>10</sub> )  | Queens College 2 | µg/m <sup>3</sup> | 24-hour | -              | 56      | 46             | 0   | 0         |
| Respirable Particulates (PM <sub>2.5</sub> ) | PS 314           | µg/m <sup>3</sup> | Annual  | 11.3           | -       | -              | 0   | 0         |
|  |                  |                   | 24-hour | 28.0           | 33.5    | 30.2           | 0   | 0         |
| NO <sub>2</sub>                              | Queens College 2 | µg/m <sup>3</sup> | Annual  | 0.021          | -       | -              | 0   | 0         |
| Lead (Pb)                                    | JHS 126          | µg/m <sup>3</sup> | 3-month | -              | .019    | .012           | 0   | 0         |
| O <sub>3</sub>                               | Susan Wagner     | ppm               | 1-hour  | -              | .096    | .082           | 0   | 0         |
|  |                  |                   | 8-hour  | 0.74           |         |                | 1   | 1         |

Source: New York State Air Quality Report, Ambient Air Monitoring Systems, Annual 2009 Report

### B. THE FUTURE WITHOUT THE PROJECT

**Background Concentrations.** Mobile source modeling of CO concentrations at intersections usually account solely for emissions from vehicles on nearby streets, but not for overall pollutant levels. Therefore, background pollutant concentrations must be added to modeling results to obtain total pollutant concentrations at the prediction site.

Conservative background values were obtained from NYCDEP for Kings County. The eight-hour CO background concentrations are two parts per million (ppm) for the existing year and two ppm for the build year of 2015. As no data are available for years past 2007, it was determined that the existing year would be used for the build year background to create a more conservative analysis. Typically, the background level would be expected to decrease as more federally mandated lower-emission vehicles enter the vehicle fleet and older, higher polluting

vehicles are retired. One-hour values were not supplied by NYCDEP as the agency believes that the one-hour standard is not in jeopardy of being violated in the five boroughs of New York City.

In the No Build condition, as noted in the traffic analysis, there would not be a sufficient number of new vehicular trips to meet the CEQR screening criteria for detailed analysis (less than 170 new trips through any intersection) and no additional analysis is required.

### C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

**Air Quality Screening Analyses - Mobile Sources.** The proposed school is located in an area of Brooklyn, New York which is predominantly comprised of residential and small commercial land uses. In particular, there are several large residential apartment buildings which surround the proposed school site. As outlined in the *CEQR Technical Manual*, actions that would result in the generation of 170 or more peak-hour vehicle trips at an intersection may cause adverse air quality impacts and require a detailed air quality analysis for CO and PM<sub>10</sub>. Based on the data obtained from the traffic studies associated with this project, the maximum number of project-generated vehicles at any one intersection would be 129. This increase would occur during the AM peak period at the intersection of Coney Island and Caton Avenues. Because the number of project-generated vehicles would not exceed 170 at any of the nearby intersections, no further analysis for CO is required.

As described above, the NYSDEC and NYCDEP have developed interim guidelines for determining potential project-related PM<sub>2.5</sub> impacts. With respect to the traffic intersections being studied for the proposed project, the guidelines indicate that projects generating more than 23 HDDV trucks (or buses) at an intersection during the peak hour have the potential to cause adverse air quality impacts, with respect to PM<sub>2.5</sub>, and would thus require a detailed analysis. While the proposed school project would result in the generation of a small number of school buses and delivery vehicles, not all of them would be HDDVs. Accordingly, the traffic data show that the number of project-generated HDDVs (trucks and buses) would not exceed 23 during the peak hours at any of the traffic intersections. Therefore, the project does not meet the PM<sub>2.5</sub> screening criteria, and would not be expected to cause any adverse PM<sub>2.5</sub> impacts. No further analysis of this pollutant is required.

**Air Quality Screening Analyses - Stationary Sources.** According to the *CEQR Technical Manual*, a stationary source air quality screening should take into consideration information such as land use, fuel type, stack height and square footage of the development, to determine if a project has the potential to create stationary source air quality impacts. Based on the future operation of the proposed school's heating and hot water systems, the school was evaluated as a stationary source pollutant emitter. Since there are two large residential apartment buildings (of equal or greater height to that of the proposed school) in the vicinity of the proposed school structure, as per guidance in the *CEQR Technical Manual*, emissions from the school's heating and hot water systems must be assessed to determine the likelihood of an impact on the surrounding community.

The proposed school building would be five stories high and have a total area of approximately 106,175 gsf. It is assumed that the school would use natural gas to run its heating and hot water systems and is assumed to have rooftop generator units, which power the building's HVAC systems, at a height of 76 feet above ground level. Based on the application of these assumptions to the *CEQR Technical Manual* screening nomographs for non-residential buildings, it was determined that buildings both taller than the school and within 70 feet of the proposed project site could be adversely impacted. However, there are no buildings taller than the proposed school building within 70 feet of the school site. Therefore, it is unlikely that emissions from the proposed school's heating system would negatively impact the surrounding neighborhood. As a result, no significant air quality impacts are expected.

Also of concern are existing emission sources (such as manufacturing, processing plants or large emission sources) in the study area which could potentially impact the proposed project. However, field reconnaissance of the surrounding area did not find any manufacturing or processing plant emission sources within 400 feet of the proposed project. In addition, there are no major pollutant sources within 1,000 feet of the proposed project site. As a result, no impacts on the proposed project are expected and no further analysis is required.

**Air Quality Screening Analyses - Greenhouse Gases (GHGs).** According to the *CEQR Technical Manual*, a greenhouse gas emissions assessment is required for projects that would result in development of 350,000 sf or greater unless the building usage is particularly energy intense such as a data processing center or a health care facility. The proposed school project will be considerably smaller than 350,000 sf and is subsequently not considered an energy-intensive source; therefore, a detailed greenhouse gas assessment is not required.

**Conformity with the State Implementation Plan.** Impacts to air quality from the proposed school facility are not expected, and therefore, the project as formulated would be consistent with the New York SIP for the control of carbon monoxide.

Based on the foregoing analyses, the proposed school would have no adverse effect on surrounding air quality due to either project-induced traffic or its HVAC systems. In addition, existing stationary source emissions in the immediate vicinity of the project site would not have a detrimental effect on the health of students or staff at the proposed school.

## CHAPTER 17: NOISE

An analysis was conducted to assess potential noise impacts which could result from the construction and operation of the proposed PS/IS 437, a new public school located in the Prospect Park South section of Brooklyn on the block bounded by Kermit Place, Caton Avenue, East 8<sup>th</sup> Street, and East 7<sup>th</sup> Street. The analysis was performed in accordance with guidelines contained in the *CEQR Technical Manual*.

One issue of concern is the potential for existing noise sources (in particular from vehicular activity) to affect student activities within the proposed educational facility. Potential noise impacts on the surrounding community by the new school's operations could also result from project-related increases in vehicular activity, noise from the three school playgrounds, as well as stationary components of the facility's mechanical systems.

**Noise Fundamentals.** Noise within a community can come from man-made sources such as automobiles, trucks, buses, aircraft, and construction equipment, as well as industrial, commercial, transportation, and manufacturing facilities. Environmental noise can also originate from natural sources such as animals, insects and wind. Table 17-1 lists some typical activities, their noise levels, and the effects that they have on humans.

Noise levels, which are measured in units called decibels (dB), relate the magnitude of the sound pressure to a standard reference value. While the noise values of certain loud activities can approach 135 dB, normally encountered sounds lie in the range of 40 to 120 dB.

Noises contain sound energy at different frequencies whose range depends on the individual noise source. Human hearing does not register the sound levels of all noise frequencies equally, and reduces the impression of high and low-pitched sounds. Over the normal range of hearing, humans are most *sensitive* to sounds produced with frequencies in the range of 200 Hz to 10,000 Hz. To replicate the response of the human ear to noise, the noise levels at different frequencies must be adjusted using a process referred to as A-weighting. Under such a process, the resulting noise level, commonly expressed as an A-weighted decibel (dBA), will automatically compensate for the non-flat frequency response of human hearing.

Noise levels from human activities also vary widely over time. The equivalent noise level, represented by the  $L_{eq}$  descriptor, represents the time-varying noise level produced over a random period of time, as a single number over a specified period of time. This represents the equivalent steady noise level, which, over a given period, contains the same energy as the time-varying noise during the same period. The most common time period used for the equivalent noise level is one hour, represented as  $L_{eq}(h)$ . This descriptor is commonly used to express readings and results from noise measurements, predictions, and impact assessments. Other descriptors often used in noise analyses are  $L_{10}$  and  $L_{dn}$ .  $L_{10}$  is defined as the sound pressure level exceeded ten percent of the time and is often used to describe noise generated from traffic sources. It is also used as a noise descriptor for the CEQR Noise Exposure standards shown in Table 17-2.  $L_{dn}$  is the day-night equivalent sound level, defined as a 24-hour continuous  $L_{eq}$  with a ten dB adjustment added to all hourly noise levels recorded between the hours of 10 PM and 7 AM.  $L_{dn}$  is often used in the analysis of both aircraft and train noise. However, as described in the *CEQR Technical Manual*, since the proposed project is a school with no

overnight usage, the one-hour  $L_{eq}$  or  $L_{10}$  descriptors are used as they would be most appropriate in describing the study areas noise environment.

Table 17-1: Common Noise Levels

| COMMON<br>OUTDOOR NOISES                     | Sound<br>Pressure<br>Level<br>(dBA) | COMMON<br>INDOOR NOISES                              |
|--|-------------------------------------|--|
| Jet Flyover at 1000 ft                       | 110                                 | Rock Band at 15 feet                                 |
| Gas lawnmower at 3 feet                      | 100                                 | Inside NYC Subway Train                              |
| Diesel truck at 50 feet                      | 90                                  | Food Blender at 3 feet<br>Garbage disposal at 3 feet |
| Noisy urban setting - daytime                | 80                                  | Shouting at 3 feet                                   |
| Gas lawnmower at 100 feet<br>Commercial area | 70                                  | Vacuum cleaner at 10 feet<br>Normal speech at 3 feet |
| Quiet urban setting - daytime                | 60                                  | Large business<br>office                             |
| Quiet urban setting - nighttime              | 50                                  | Dishwasher - next room<br>Small theater              |
| Quiet suburban setting - nighttime           | 40                                  | Large conference room and library                    |
| Quiet rural - nighttime                      | 30                                  | Bedroom at night<br>Large concert hall (background)  |
|  | 20                                  | Broadcast and recording studio                       |
|  | 10                                  | Threshold of hearing                                 |
|  | 0                                   |  |

A few general relationships with respect to noise levels may be helpful in understanding the decibel scale:

- Doubling of the noise energy produces a three dB increase in noise level. A three dB increase is normally the smallest change in sound levels that are perceptible to the human ear.
- A ten dB increase in noise level corresponds to a tenfold increase in noise energy; however, a listener would only judge a ten dB increase as being twice as loud.
- A 20 dB increase would result in a “dramatic change” in how a listener would perceive the sound.

**CEQR Noise Impacts Thresholds.** NYCDEP has established standards for noise exposure at sensitive receptors resulting from the implementation of a project. These standards are based on a daytime threshold noise level of 65 dBA which should not be significantly exceeded. The impact thresholds are described below:

- A significant impact would occur if the daytime period noise level significantly exceeds 65 dBA.
- An increase of five dBA or greater over the No Build noise level would be an impact if the No Build noise level is 60 dBA or less.
- If the No Build noise level is 62 dBA or more, a three dBA increase or greater would be considered significant.
- A significant impact would occur during the nighttime period (defined by CEQR standards as being between 10 PM and 7 AM) if there is a change in noise levels of three dBA or more.

**CEQR Noise Exposure Standards.** NYCDEP has also promulgated standards that apply to a proposed project if it is also a sensitive receptor such as a residence, hospital, or school. In addition, NYCDEP has established four categories of acceptability based on receptor type and land use for vehicular traffic, rail, and aircraft-related noise sources. The categories include “generally acceptable,” “marginally acceptable,” “marginally unacceptable,” and “clearly unacceptable.” Identified in Table 17-2 are attenuation values and external noise exposure standards as they relate to traffic, aircraft, and rail noise.

**SCA Noise Criteria.** SCA has developed a criterion of an increase of five dBA over the existing noise level as the impact criterion for noise from project-generated traffic and playgrounds. The level of five dBA was selected because it is an increase that is clearly perceptible to the public, and represents a change at which sporadic complaints about excessive noise may be registered.

Table 17-2: Noise Exposure Standards for Use in City Environmental Impact Review<sup>1</sup>

| Receptor type   | Time Period  | Acceptable General External Exposure   | Airport Exposure <sup>3</sup> | Marginally Acceptable General External Exposure | Airport Exposure <sup>3</sup> | Marginally Unacceptable General External Exposure | Airport Exposure <sup>3</sup>                              | Clearly Unacceptable General External Exposure | Airport Exposure <sup>3</sup> |
|---|--------------|--|-------------------------------|---|-------------------------------|---|--|--|-------------------------------|
| 1. Outdoor area requiring serenity and quiet <sup>2</sup>   |              | $L_{10} \leq 55$ dBA                   | $L_{dn} \leq 60$ dBA          |   | $60 < L_{dn} \leq 65$ dBA     |   | (i) $65 < L_{dn} \leq 70$ dBA, (ii) $70$ dBA $\leq L_{dn}$ |  | $L_{dn} \leq 75$ dBA          |
| 2. Hospital, Nursing Home   |              | $L_{10} \leq 55$ dBA                   |                               | $55 < L_{10} \leq 65$ dBA                       |                               | $65 < L_{10} \leq 80$ dBA                         |  | $L_{10} > 80$ dBA                              |                               |
| 3. Residence, residential hotel or motel  | 7 AM - 10 PM | $L_{10} \leq 65$ dBA                   |                               | $65 < L_{10} \leq 70$ dBA                       |                               | $70 < L_{10} \leq 80$ dBA                         |  | $L_{10} > 80$ dBA                              |                               |
|   | 10 PM - 7 AM | $L_{10} \leq 55$ dBA                   |                               | $55 < L_{10} \leq 70$ dBA                       |                               | $70 < L_{10} \leq 80$ dBA                         |  | $L_{10} > 80$ dBA                              |                               |
| 4. School, museum, library, court, house of worship, transient hotel or motel, public meeting room, auditorium, out-patient health facility   |              | Same as Residential Day (7 AM - 10 PM) |                               | Same as Residential Day (7 AM - 10 PM)          |                               | Same as Residential Day (7 AM - 10 PM)            |  | Same as Residential Day (7 AM - 10 PM)         |                               |
| 5. Commercial or office   |              | Same as Residential Day (7 AM - 10 PM) |                               | Same as Residential Day (7 AM - 10 PM)          |                               | Same as Residential Day (7 AM - 10 PM)            |  | Same as Residential Day (7 AM - 10 PM)         |                               |
| 6. Industrial, public areas only <sup>4</sup>   | Note 4       | Note 4                                 | Note 4                        | Note 4  | Note 4                        |   |  |  |                               |
| <p><b>Source:</b><br/>New York City Department of Environmental Protection (adopted by NYCDEP for use in CEQR-1983)</p> <p><b>Notes:</b></p> <ol style="list-style-type: none"> <li>(i) In addition, any new activity shall not increase the ambient noise level by 3 dBA or more:</li> <li>1. Measurements and projections of noise exposures are to be made at appropriate heights above site boundaries as given by ANSI Standards; all values are for the worst hour in the time period.</li> <li>2. Tracts of land where serenity and quiet are extraordinarily important and serve an important public need and where the preservation of these qualities is essential of the area to serve its intended purpose. Such areas could include amphitheaters, particular parks or portions of parks or open spaces dedicated or recognized by appropriate local officials for activities requiring special qualities of serenity and quiet. Examples are grounds for ambulatory hospital patients and patients and residents of sanitariums and old-age homes.</li> <li>3. One may use FAA-approved Land contours supplied by the Port Authority, or the noise contours may be computed from the federally approved INM Computer Model using flight data supplied by the Port Authority of New York and New Jersey.</li> <li>4. External Noise Exposure standards for industrial areas of sounds produced by industrial operations other than operating motor vehicles or other transportation facilities are spelled out in the New York City Zoning Resolution, Sections 42-20 and 42-21. The referenced standards apply to M1, M2, and M3 manufacturing districts and to adjoining residence districts (performance standards are octave band standards).</li> </ol> |              |  |                               |   |                               |   |  |  |                               |



**NYC Noise Code.** Shown in Table 17-3 are allowable noise levels by octave band. According to the noise code, no person shall cause or permit a sound source operating with any commercial or business enterprise to exceed these designated decibel levels within the assigned octave bands. These criteria, as they relate to the proposed project, would apply to noise from the project's HVAC systems or other outdoor machinery.

**Table 17-3: New York City Noise Code**

| Octave Band Frequency (Hz) | Maximum Sound Pressure Levels (dB) as measured within a receiving property as specified below   |  |
|----------------------------|---|--|
|                            | Residential Receiving Property for mixed-use buildings and residential buildings (as measured within any room of the residential portion of the building with windows open, if possible). | Commercial Receiving Property (as measured within any room containing offices within the building with windows open, if possible). |
| 31.5                       | 70  | 74   |
| 63                         | 61  | 64   |
| 125                        | 53  | 56   |
| 250                        | 46  | 50   |
| 500                        | 40  | 45   |
| 1000                       | 36  | 41   |
| 2000                       | 34  | 39   |
| 4000                       | 33  | 38   |
| 8000                       | 32  | 37   |

Source:

Section 24-232 of the Administrative Code of the City of New York, as amended December 2005.

#### A. EXISTING CONDITIONS

The proposed school site is located on Caton Avenue between East 7<sup>th</sup> and East 8<sup>th</sup> Streets. The neighborhood consists of single- and multi-family residential land uses as well as small commercial uses. There are no surface rail lines in the immediate vicinity of this project. A depressed section of the Prospect Expressway (Ocean Parkway) is located within one block of the proposed school. As a result, the major sources of existing community noise come primarily from automobile traffic. The heaviest existing traffic volumes are along Caton Avenue, but roadway noise is audible from the Prospect Expressway. Very light traffic exists along East 7<sup>th</sup> and East 8<sup>th</sup> Streets. There are no major stationary sources of noise in the study area.

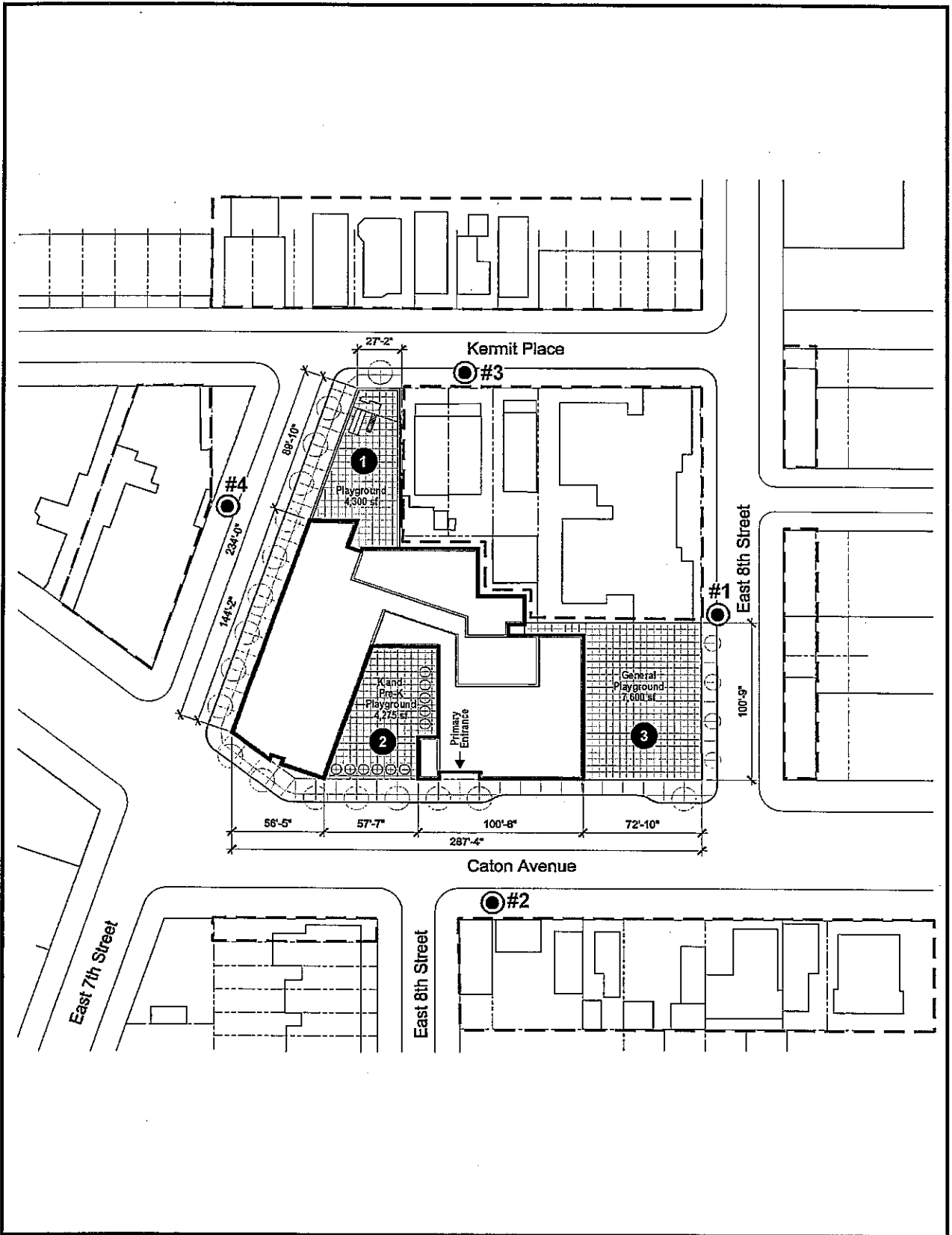
**Noise Monitoring.** To determine the influence of existing traffic noise, one-hour noise measurements were conducted at four locations representative of existing or future sensitive locations and were situated along roadways where the greatest project-generated increases in traffic volumes are likely to occur. All monitoring sites were representative of residential land uses and monitors were situated at or near the property line. Locations were monitored for the AM, Midday, and PM peak time periods on March 15 and 17, 2011. The AM and PM peak periods were defined as 7:45-8:45 AM and 3:00-4:00 PM, respectively. These time periods are

the peak hours when the majority of existing and future project-generated traffic would be passing these locations. The Midday period was defined as 12:00-1:00 PM. This represents the time period when students would be utilizing the proposed school playgrounds. Weekday AM, Midday and PM noise monitoring takes into account the peak workweek and school traffic. The duration of all measurements was 20 minutes to ensure that a representative measurement was obtained. During measurements, simultaneous traffic counts were taken. The noise descriptors recorded during field measurements included  $L_{eq}$  and  $L_{10}$ . Table 17-4 shows the results of the noise monitoring program. Figure 17-1 shows the location of all four noise monitoring sites in relationship to the surrounding residential land use and the three proposed playground areas on the school site.

Noise measurements were taken with a Larson & Davis Model 820 Type I sound level meter. A windscreen was placed over the microphone for all measurements. The meter was properly calibrated for all measurements using a Larson & Davis Model Cal250 calibrator. There were no significant variances between the beginning and ending calibration measurements. Weather conditions during the measurements consisted of sunny skies and temperatures of approximately 45 degrees Fahrenheit on March 15, 2011 and overcast weather with temperatures of approximately 45 degrees on March 17, 2011.

Traffic and classification counts at each location were conducted concurrently with the noise monitoring. Traffic and classification counts are used to calculate the maximum hourly Passenger Car Equivalent (PCEs). PCEs are used to account for the different types of motor vehicles (i.e., cars, trucks etc.) and their varying levels of sound. According to the *CEQR Technical Manual*, the relationships used for calculating PCEs are as follows: 1 automobile is equivalent to 1 PCE; 1 medium truck is equivalent to 13 PCEs; 1 bus is equivalent to 18 PCEs; and 1 heavy truck is equivalent to 47 PCEs. In other words, the noise level produced by a medium truck would be the same as that from 13 cars and, the noise level from a heavy truck would be equivalent to that of 47 cars.

The noise monitoring results indicate that noise levels for the studied peak traffic periods along Caton Avenue are noticeably louder (i.e., more than three dB louder) than noise levels collected at the other three monitoring locations. The elevated noise levels along Caton Avenue are a direct result of the high traffic volumes along Caton Avenue which include significant bus and truck traffic. Consequently, the highest monitored  $L_{10}$  noise level of 70.7 dBA was recorded along Caton Avenue. According to Table 17-2, this represents a "Marginally Unacceptable" noise exposure for existing sensitive receptors along Caton Avenue. The remaining three noise monitoring locations along East 7<sup>th</sup> Street, East 8<sup>th</sup> Street, and Kermit Place are all influenced primarily by low level street traffic noise. As a result, the monitored noise levels for each peak traffic period are very similar. The maximum monitored  $L_{10}$  noise level for these three locations was 66.6 dBA along East 8<sup>th</sup> Street. Based on Table 17-2, this level indicates a "Marginally Acceptable" noise exposure for nearby sensitive noise receptors. However, along both Kermit Place and East 7<sup>th</sup> Street, the maximum  $L_{10}$  noise levels would be below 65 dBA and would therefore be within the "Acceptable" acceptable noise exposure range.



**Legend**

- Noise Monitoring Site
- ① Proposed Playground
- [ ] Residential Land Use

Scale: NTS

Source: NYC SCA June 2, 2011



**Figure 17-1: Noise Analysis**

*Proposed PS/IS 437  
Caton Avenue, Brooklyn*

*New York City  
School Construction Authority*

Table 17-4: PS/IS 437 Monitored Peak Hour Noise Levels

| <b>Site#1: East 8<sup>th</sup> Street<br/>(Residential Apartment Building)</b> |                          |                          |                          |                          |
|--|--------------------------|--------------------------|--------------------------|--------------------------|
| Time of Day  | L <sub>eq</sub><br>(dBA) | L <sub>10</sub><br>(dBA) | L <sub>50</sub><br>(dBA) | L <sub>90</sub><br>(dBA) |
| AM   | 59.3                     | 62.3                     | 56.4                     | 53.7                     |
| Midday   | 61.5                     | 65.3                     | 57.8                     | 52.9                     |
| PM   | 63.6                     | 66.6                     | 57.3                     | 52.5                     |
| <b>Site#2: Caton Avenue<br/>(Private Residence)</b>                            |                          |                          |                          |                          |
| Time of Day  | L <sub>eq</sub><br>(dBA) | L <sub>10</sub><br>(dBA) | L <sub>50</sub><br>(dBA) | L <sub>90</sub><br>(dBA) |
| AM   | 67.5                     | 70.7                     | 64.7                     | 59.2                     |
| Midday   | 65.3                     | 69.2                     | 62.6                     | 56.6                     |
| PM   | 66.2                     | 69.5                     | 63.4                     | 57.1                     |
| <b>Site#3: Kermit Place<br/>(Private Residence)</b>                            |                          |                          |                          |                          |
| Time of Day  | L <sub>eq</sub><br>(dBA) | L <sub>10</sub><br>(dBA) | L <sub>50</sub><br>(dBA) | L <sub>90</sub><br>(dBA) |
| AM   | 60.6                     | 64.1                     | 58.3                     | 53.3                     |
| Midday   | 54.3                     | 56.6                     | 51.9                     | 49.3                     |
| PM   | 57.2                     | 58.2                     | 53.4                     | 50.9                     |
| <b>Site#4: East 7<sup>th</sup> Street<br/>(Residential Apartment Building)</b> |                          |                          |                          |                          |
| Time of Day  | L <sub>eq</sub><br>(dBA) | L <sub>10</sub><br>(dBA) | L <sub>50</sub><br>(dBA) | L <sub>90</sub><br>(dBA) |
| AM   | 60.6                     | 64.1                     | 58.1                     | 53.3                     |
| Midday   | 59.4                     | 60.0                     | 53.9                     | 50.3                     |
| PM   | 61.9                     | 62.6                     | 56.6                     | 52.4                     |

## B. THE FUTURE WITHOUT THE PROJECT

In the No Build condition, as noted in the traffic analysis, there would not be a sufficient number of new vehicular trips to double the passenger car equivalents through any intersection. The *CEQR Technical Manual* threshold for detailed analysis would not be met. Therefore, the No Build condition is not expected to result in any substantial change to noise levels over the existing conditions.

## C. PROBABLE IMPACTS OF THE PROPOSED PROJECT

Potential mobile source impacts of the proposed project could result from increases in project-related traffic. Potential stationary source noise could result from the project's playgrounds. Therefore, both potential mobile and stationary source impacts were assessed.

**Mobile Source Noise Impact Screening.** To determine whether a significant noise impact would occur (requiring the implementation of a rigorous noise analysis), a screening analysis (as per CEQR guidelines) for noise impacts was conducted for the AM and PM traffic periods. According to CEQR guidelines, to cause a significant noise impact, the project would have to induce traffic that would at least double the existing Passenger Car Equivalents (PCEs) near any sensitive receptor. If the PCEs more than doubled along studied traffic routes from the existing to the build scenario, the site was selected for further analysis. This doubling of PCEs is the minimum increase in traffic volume that would result in a three dB increase in the corresponding noise level.

Under future conditions, traffic volume data for the proposed project indicate that the addition of future project traffic would not result in a doubling of the existing PCEs within the traffic network (see Chapter 15, "Traffic and Transportation, Pedestrians and Parking"). Table 17-5 shows the results of the screening.

Since none of the noise locations in Table 17-5 would fail the screening assessment, no further analysis of traffic related noise is required.

Table 17-5: PS/IS 437 Noise Screening Analysis Results

| Site#1: East 8 <sup>th</sup> Street<br>(Between Caton Avenue and Kermit Place)                |               |                      |                  |
|---|---------------|----------------------|------------------|
| Time of Day   | Existing PCEs | Project Induced PCEs | Traffic Doubled? |
| AM  | 162           | 41                   | No               |
| PM  | 345           | 38                   | No               |
| Site#2: Caton Avenue<br>(Between East 7 <sup>th</sup> Street and East 8 <sup>th</sup> Street) |               |                      |                  |
| Time of Day   | Existing PCEs | Project Induced PCEs | Traffic Doubled? |
| AM  | 5340          | 140                  | No               |
| PM  | 3981          | 123                  | No               |
| Site#3: Kermit Place<br>(Between East 7 <sup>th</sup> Street and East 8 <sup>th</sup> Street) |               |                      |                  |
| Time of Day   | Existing PCEs | Project Induced PCEs | Traffic Doubled? |
| AM  | 90            | 41                   | No               |
| PM  | 42            | 33                   | No               |
| Site#4: East 7 <sup>th</sup> Street<br>(Between Caton Avenue and Kermit Place)                |               |                      |                  |
| Time of Day   | Existing PCEs | Project Induced PCEs | Traffic Doubled? |
| AM  | 213           | 41                   | No               |
| PM  | 48            | 33                   | No               |

**Stationary Source - Playground Noise Assessment.** The proposed school would include three separate playgrounds for student recreation, as shown on Figure 17-1. Two of the three playgrounds would be for general student usage while the remaining one would only be used by pre-kindergarten and kindergarten students. Noise impacts generated by each of the proposed school playgrounds were determined using assessment procedures contained in the "SCA Playground Noise Study"<sup>2</sup> produced for the SCA. For the purposes of this assessment, the methodology is based on assumed worst case noise levels of 69.3 dBA for the AM period, 71.4 dBA for the Midday (recess) period, and 62.9 dBA for the PM period; all measured at the property line of a typical elementary school playground. These noise levels were derived from numerous monitoring programs conducted for the SCA at several playgrounds within New York City. The noise prediction methodology also takes into account the geometric spreading

<sup>2</sup> AKRF - SCA Playground Noise Study (1992) and Development of Noise Assessment Method for School Playground Noise (2006)

and consequent dissipation of sound energy with increasing distance from a typical playground noise source to a sensitive noise receiver. Based on this methodology, the potential impact of playground noise was considered at sensitive noise receivers located closest to the three playgrounds. In addition, only the Midday (recess) period was analyzed as the assessment locations would not be influenced by fluctuations in peak hour traffic noise.

As shown on Figure 17-1, each playground could potentially impact several residential locations. Therefore, the potential noise impact related to each playground was assessed separately. For Playground #1 (located on the northern portion of the project site), the closest affected residence would be the apartment building located at 625 Caton Avenue between Kermit Place and Caton Avenue, and several homes along Kermit Place between East 7<sup>th</sup> and East 8<sup>th</sup> Streets. For analysis purposes, the apartment building at 625 Caton Avenue would be approximately 54 feet from the property line of Playground #1. Potential noise impacts could occur at the 35 windows on the east façade of the building. In addition, the private representative residence at 46 Kermit Place would also be affected by Playground #1 and would be located only ten feet from the proposed playground. This residence would have eight windows on its west façade; four windows would be on each of its two floors. In addition, the private residence at 39 Kermit Place, located 50 feet from the playground, would have six windows on its south façade with a clear line of sight to the playground area; three windows would be on each of its two floors. Subsequently, future school-related noise impacts from Playground #1 were considered at these three representative properties.

For Playground #2 (located on the southwestern portion of the project site), the closest affected residence would be the property located at 98 East 8<sup>th</sup> Street at the corner of Caton Avenue. This home would be located approximately 95 feet from the playground. Six first floor windows and three second floor windows would be potentially affected. Future school-related noise impacts from Playground #2 were considered at this one representative property.

For Playground #3 (located on the southeastern portion of the project site), the closest affected residence would be the apartment building at 70 East 8<sup>th</sup> Street, which immediately abuts the northern boundary of the playground fence line. The south face of the building contains 60 windows which could be affected including ten windows on each of the six floors. In addition, residences are also located at 825 Caton Avenue (along East 7<sup>th</sup> Street) which is approximately 57 feet from the playground, and across Caton Avenue (at 816 Caton Avenue) which is approximately 105 feet from the playground. Potentially, five windows on the second floor of 825 Caton Avenue would be affected while two windows would be affected at 816 Caton Avenue. Future school-related noise impacts from Playground #3 were considered at these three properties.

For all three playgrounds, the assessment for the sensitive receptor locations mentioned above was performed for the Midday peak period to determine potential noise impacts. The Midday peak period represents the most sensitive period with respect to potential playground noise impacts. Ambient noise conditions at these potentially affected properties were represented by the existing noise measurement shown in Table 17-4.

Based upon measurements and acoustical principles, noise levels are assumed to decrease by the following values at specified distances from the playground boundary: 4.8 dBA at 20 feet, 6.8 dBA at 30 feet, and 9.1 dbA at 40 feet. For all distances between 40 and 300 feet, a 4.5 dBA drop off per doubling of distances from the playground boundary was assumed. As shown in Tables 17-6 to 17-8, the total Build noise level at representative residential receivers was calculated by logarithmically adding the adjusted future playground noise to the No Build traffic noise level. As described above in the traffic noise screening section, future No Build traffic levels would result in an insignificant increase in future noise levels over the existing ambient noise levels. Therefore, future No Build noise levels were assumed to be identical to existing noise levels. Based on the overall playground assessment, the increase in the future project noise levels for two representative residences at 46 Kermit Place and 70 East 8<sup>th</sup> Street, would exceed the five dBA SCA impact criteria during the Midday period.

**Table 17-6: Playground #1**  
**Expected Noise Impact Summary (noise levels are  $L_{eq}$  reported in dBA)**

| Representative Location | Time of Day | Existing Traffic Noise | Total No Build Noise | Build Playground Noise <sup>1</sup> | Total Build Noise | Decibel Change in Noise Due to School |
|-------------------------|-------------|------------------------|----------------------|-------------------------------------|-------------------|---------------------------------------|
| 625 Caton Avenue        | Midday      | 59.4                   | 59.4                 | 60.4 (-11db)                        | 63.0              | 3.6                                   |
| 46 Kermit Place         | Midday      | 54.3                   | 54.3                 | 68.9 (-2.5db)                       | 69.0              | 14.7                                  |
| 39 Kermit Place         | Midday      | 54.3                   | 54.3                 | 60.4 (-11db)                        | 63.0              | 3.6                                   |

<sup>1</sup> When applicable, future playground noise levels were reduced by to account for distance drop-off. The numbers of decibels attributed to the distance drop-off are shown in parentheses.

**Table 17-7: Playground #2**  
**Expected Noise Impact Summary (noise levels are  $L_{eq}$  reported in dBA)**

| Representative Location        | Time of Day | Existing Traffic Noise | Total No Build Noise | Build Playground Noise <sup>1</sup> | Total Build Noise | Decibel Change in Noise Due to School |
|--------------------------------|-------------|------------------------|----------------------|-------------------------------------|-------------------|---------------------------------------|
| 98 East 8 <sup>th</sup> Street | Midday      | 65.3                   | 65.3                 | 57.4(-14dB)                         | 66.0              | 1.3                                   |

<sup>1</sup> When applicable, future playground noise levels were reduced by to account for distance drop-off. The numbers of decibels attributed to the distance drop-off are shown in parentheses.



**Table 17-8: Playground #3  
Expected Noise Impact Summary (noise levels are  $L_{eq}$  reported in dBA)**

| Representative Location        | Time of Day | Existing Traffic Noise | Total No Build Noise | Build Playground Noise <sup>1</sup> | Total Build Noise (BD + NB) | Decibel Change in Noise Due to School |
|--------------------------------|-------------|------------------------|----------------------|-------------------------------------|-----------------------------|---------------------------------------|
| 70 East 8 <sup>th</sup> Street | Midday      | 61.5                   | 61.5                 | 71.4 (0db)                          | 71.8                        | 10.3 <sup>2</sup>                     |
| 825 Caton Avenue               | Midday      | 61.5                   | 61.5                 | 60.4 (-11dB)                        | 64.0                        | 2.5                                   |
| 816 Caton Avenue               | Midday      | 65.3                   | 65.3                 | 56.4 (-15dB)                        | 65.8                        | 0.5                                   |

<sup>1</sup> When applicable, future playground noise levels were reduced by to account for distance drop-off. The numbers of decibels attributed to the distance drop-off are shown in parentheses.

<sup>2</sup> Only applicable to windows on the first, second and third floors. Windows located above the third floor level would be far enough above the playground, such that the increase in noise level would be less than the SCA playground impact criteria of 5 dBA.

**NYC Noise Code and SCA Noise Impact Criteria.** The proposed school's HVAC equipment, along with any other project-related mechanical devices, would be designed to meet the NYC Noise Code standards described in Table-17-3.

Two of the three playgrounds to be developed on the proposed school site (Playgrounds #1 and #3) are expected to increase noise levels at the adjoining residences over the No Build by ten dBA. This change in noise levels would exceed SCA's criterion of significance of a five dBA increase over the No Build condition at 46 Kermit Place, between East 7<sup>th</sup> and East 8<sup>th</sup> Streets, and at 70 East 8<sup>th</sup> Street, between Kermit Place and Caton Avenue.

**School Interior Noise Levels.** As shown in Table 17-4, the maximum  $L_{10}$  noise exposure experienced by the proposed school would be 70.7 dBA. This noise level includes the effect of traffic noise from local streets. Based on the CEQR noise exposure standards, the school's exterior noise exposure would be in the marginally unacceptable category. To reduce the exterior noise exposure level to the required interior noise level of 45 dBA or below, attenuation measures (e.g., double glazed windows) would be incorporated into the new school building's design and construction. Standard double-glazed windows are available which would result in the required attenuation value of 26 dBA.<sup>3</sup> In addition, a well-insulated facility can provide reduction of another ten dBA.<sup>4</sup> As a result, the proposed school would not experience any noise exposure impacts as defined in Table 17-2.

<sup>3</sup> U.S. Department of Housing and Urban Development - *The Noise Guidebook*

<sup>4</sup> Wyle Research Report - *Sound Insulation Methods for New Residential Construction Exposed to Aircraft Noise*

**D. PROPOSED IMPROVEMENT MEASURES**

To address the potential playground noise impacts to the adjoining residences where playground noise would increase noise levels by five dBA, the SCA would make available to the owners of the apartment building at 70 East 8<sup>th</sup> Street, storm or sound-attenuating windows and alternative ventilation for the bottom three floors. Only 30 windows on the south face of the six-story apartment building, fronting the proposed General Playground (Playground #3) on the project site, would be replaced. Likewise, for the property owners of 46 Kermit Place, eight storm or sound-attenuating windows and alternative ventilation would be offered for the two floors of windows on the west face of the building. These measures would reduce the impact of playground noise upon the two affected residential properties.

## CHAPTER 18: CONSTRUCTION-RELATED IMPACTS

The anticipated construction period for the proposed project is expected to be approximately 30 months. The assessment of construction-related impacts is related to build conditions for the proposed project. This section summarizes the potential impacts that could result from the construction of a new school facility. To minimize overall adverse impacts during construction activities, the project would be planned, scheduled and staged to minimize disruption to existing traffic, the abutting neighborhoods and the environment. To the maximum extent practicable, construction staging would take place within the project site. Some adverse impacts related to construction activities may be unavoidable, but the duration and severity of such impacts would be minimized by utilizing best management practices during construction. Materials and practices that are typically used during construction activities to minimize impacts are briefly described below.

**Construction Materials and Equipment.** Materials deliveries would be made primarily from Caton Avenue, a major roadway in this area, and directly to the site via East 7<sup>th</sup> and East 8<sup>th</sup> Streets, which are local streets with low traffic volumes. It is expected that there would be adequate storage available on the project site for the storage of construction materials, and that the public thoroughfares adjacent to the project site would not be closed or impeded for significant periods of time for this purpose.

Standard construction equipment such as pavers, haul trucks, scrapers, loaders, spreaders, and rollers would be used to move and consolidate soil, pave, and supply and remove construction materials from the site. Backhoes and cranes may be needed to install drainage facilities and other utilities, and dig footings for structures, as well as for relocation of any on-site utilities. During the construction phase of the project, the areas of the project site proposed for the playgrounds would most likely be used as a staging area for equipment and construction materials.

**Construction Impacts on Traffic and Transportation, Pedestrians, and Parking.** Traffic and transportation operations in the study area may be affected by the movement of construction equipment, materials, and construction workers to and from the site on a daily basis. Movement and repositioning of oversized machinery and/or materials may result in temporary lane or street closures. There could result in limited short-term increased congestion within the vicinity of the project site. To avoid unnecessary construction-related traffic within the project area, construction vehicles would be limited to designated routes and would be kept in the designated staging area. An average of 50 construction personnel is expected to be working on the project site for the duration of the construction period.

**Construction Impacts on Air Quality.** During construction, particulate emissions would temporarily increase due to the generation of fugitive dust and mobile source emissions. The following standard dust control measures would be undertaken as necessary:

- Minimizing the period and extent of area being exposed or re-graded at any one time.
- Spraying construction areas and haul roads with water, especially during periods of high wind or high levels of construction activity.

- Minimizing the use of vehicles on unpaved surfaces.
- Covering or spraying material stockpiles and truck loads.

Fugitive Dust Emissions. Fugitive dust is airborne particulate matter, generally of a relatively large particle size. Construction-related fugitive dust would be generated by concrete demolition, haul trucks, concrete trucks, delivery trucks and earth-moving vehicles operating around construction sites. This would be due primarily to particulate matter being resuspended ("kicked up") by vehicle movement over paved and unpaved roads and other surfaces, dirt tracked onto paved surfaces from unpaved areas at access points, and material blown from areas of exposed soils.

Generally, the distance particles drift from their sources depends on their size, emission height, and wind speed. Small particles (30- to 100-microns) can travel several hundred feet before settling to the ground, depending on wind speed. Most fugitive dust, however, is made up of relatively large particles (greater than 100 microns in diameter). Given this relatively large size, these particles tend to settle within 20 to 30 feet of their source. The application of various control measures during construction demolition activities would be employed to minimize the amount of construction dust generated. These measures would include applying water or other suitable moisture-retaining agents on dirt roads, covering haul trucks carrying loose materials, or treating materials likely to become airborne and contribute to air pollution if left untreated.

Mobile Source Emissions. CO is the principal pollutant of concern when considering localized air quality impacts of motor vehicles. Since emissions of CO from motor vehicles increase with decreasing vehicle speed, disruption of traffic during construction could result in short-term elevated concentrations of CO from the temporary reduction of roadway capacity and the increased queue lengths. To minimize the amount of emissions generated, maintenance and protection of traffic patterns would be implemented during construction to limit disruption of traffic and to ensure that adequate roadway capacity is available to general traffic during peak travel periods. It is also noted that peak movement of construction workers to and from the site would coincide with shift changes, and would precede most traffic movements by about one hour, thus minimizing the potential for mobile source emissions.

Construction Noise Impacts. Noise impacts during construction would include noise from construction equipment operation and from construction vehicles traveling in and out of the project site. It is expected that most construction workers would travel by automobile. The construction noise impact on sensitive receptors near the project site depends upon the type and amount of construction equipment as well as the distance from the construction site. Typical noise levels of construction equipment are given in Table 18-1. The noise emission levels for construction equipment are measured at 50 feet (15.2 meters), and decrease over distance.

Table 18-1: Typical Noise Emission Levels for Construction Equipment

| Equipment Item                  | Noise Level at 50 feet (dBA) |
|---------------------------------|------------------------------|
| Air Compressor                  | 81                           |
| Asphalt Spreader (paver)        | 89                           |
| Asphalt Truck                   | 88                           |
| Backhoe                         | 85                           |
| Bulldozer                       | 87                           |
| Compactor                       | 80                           |
| Concrete plant                  | 83                           |
| Concrete spreader               | 89                           |
| Concrete mixer                  | 85                           |
| Concrete vibrator               | 76                           |
| Crane (Derrick)                 | 88                           |
| Delivery Truck                  | 88                           |
| Diamond Saw                     | 90                           |
| Dredge                          | 88                           |
| Dump truck                      | 88                           |
| Front end Loader                | 84                           |
| Gas-driven Vibra-compactor      | 76                           |
| Hoist                           | 76                           |
| Jackhammer                      | 88                           |
| Line Drill                      | 98                           |
| Motor Crane                     | 83                           |
| Pile Drive/extractor            | 101                          |
| Pump                            | 76                           |
| Roller                          | 80                           |
| Shovel                          | 82                           |
| Truck                           | 88                           |
| Tug                             | 85                           |
| Vibratory Pile Driver/extractor | 89                           |

Source: Patterson, W., N., R.A. Ely and S. M. Swanson, "Regulating of Construction Activity Noise," Bolt Beranek and Newman, Inc., Report 2887, for the Environmental Protection Agency, Washington, D.C., November 1974.

Construction noise is regulated by the New York City Noise Control Code and by the USEPA noise emission standards for construction equipment. These requirements mandate that certain classifications of construction equipment and motor vehicles meet specified noise emissions standards; that except under exceptional circumstances, construction activities be limited to weekdays between the hours of 7:00 AM and 6:00 PM; and that construction material be handled and transported in such a manner as to not create unnecessary noise. It is understood that the proposed construction site is located in a predominantly residential neighborhood. All reasonable means would be undertaken to avoid unnecessary noise. Sensitivity to the residential buildings on the project block and the nearby residences in the project study area

would be maintained to the maximum extent practicable for the duration of the construction period. Because the project site is of adequate size to accommodate construction staging on site, construction activities would be limited to the project site. For the proposed school facility, construction impacts would be temporary. As a result, significant adverse noise impacts would not result.

**Construction Impacts on Water Quality.** The foremost potential construction impacts on water resources are soil erosion and sedimentation, which could occur due to grading activities. Exposed soils from these activities could erode during rainfall events, and possibly affect the existing storm sewer systems located on and adjacent to the site. A soil erosion control plan would be implemented during construction activities. Potential contamination of groundwater could possibly occur as a result of leaking construction equipment and/or temporary on-site sanitary storage facilities. Proper maintenance procedures on the construction site would avoid most leaks and mishaps. Any spills (oil, gasoline, brake fluid, transmission fluid) would be contained immediately and disposed of properly, off-site.

**Hazardous Waste.** Local, state, and federal regulations governing hazardous waste, particularly the Resource Conservation and Recovery Act (RCRA) and the New York Standards Applicable to Generators of Hazardous Waste, would be implemented during construction of the proposed project.

**Asbestos Removal.** Any asbestos-containing materials (ACM) contained in potential buried structures on site would be identified and properly managed during construction activities. Regulations as per the New York City Asbestos Control Program require that all applicants for demolition and/or building permits must determine whether friable ACM would be disturbed or removed as a result of construction or demolition activities. If asbestos is present, the applicant must submit an asbestos inspection report and an abatement plan. A New York City-certified asbestos handler must perform all work in accordance with stringent procedures to avoid the emission of asbestos in the air.

## Appendix A: Agency Correspondence

Correspondence to the New York City Police Department (February 3, 2011)

Correspondence to the New York City Fire Department (February 3, 2011)  
Correspondence from the New York City Fire Department (February 24, 2011)

Correspondence to the New York State Office of Parks, Recreation and Historic Preservation (March 28, 2011)  
Correspondence from the New York State Office of Parks, Recreation and Historic Preservation (April 27, 2011)  
Correspondence to the New York State Office of Parks, Recreation and Historic Preservation (July 15, 2011)  
Correspondence from the New York State Office of Parks, Recreation and Historic Preservation (July 21, 2011)

Correspondence to the New York State Department of Environmental Conservation - Division of Fish, Wildlife & Marine Resources (February 3, 2011)  
Correspondence from the New York State Department of Environmental Conservation - Division of Fish, Wildlife & Marine Resources (February 15, 2011)



February 3, 2011

Commanding Officer – Deputy Inspector John Sprague  
66<sup>th</sup> Precinct  
5822 16<sup>th</sup> Avenue  
Brooklyn, NY 11204

**Attention:** Deputy Inspector John Sprague

**Reference:** Proposed New 757-seat Primary/Intermediate School in Prospect Park South, Brooklyn

**Subject:** Police Protection Services for the Proposed 757-Seat Primary/Intermediate School on Caton Avenue (Block 5321 – Lots 44, 64 and 73), Brooklyn, New York

**STV Project No.:** 4013949

Dear Deputy Inspector Sprague:

The New York City School Construction Authority (SCA) has contracted STV Incorporated to perform an environmental assessment for the proposed construction of a new 757-seat primary/intermediate school facility on Caton Avenue in the Prospect Park South section of Brooklyn (Kings County). The school project site is located on Block 5321, Lots 44, 64 and 73, bounded by Kermit Place to the north, Caton Avenue to the south, East 8<sup>th</sup> Street to the east, and East 7<sup>th</sup> Street to the west.

As part of the environmental assessment, we seek the opinion of the 66<sup>th</sup> Precinct as to whether or not the proposed project will adversely impact the ability of the New York City Police Department to provide police protection to its service area. The attached maps show the project site located on Caton Avenue on Block 5321, Lots 44, 64 and 73 in Brooklyn, New York (Kings County).

Should you have any questions, please contact me at (212) 614-3471. Thank you for your assistance in this matter.

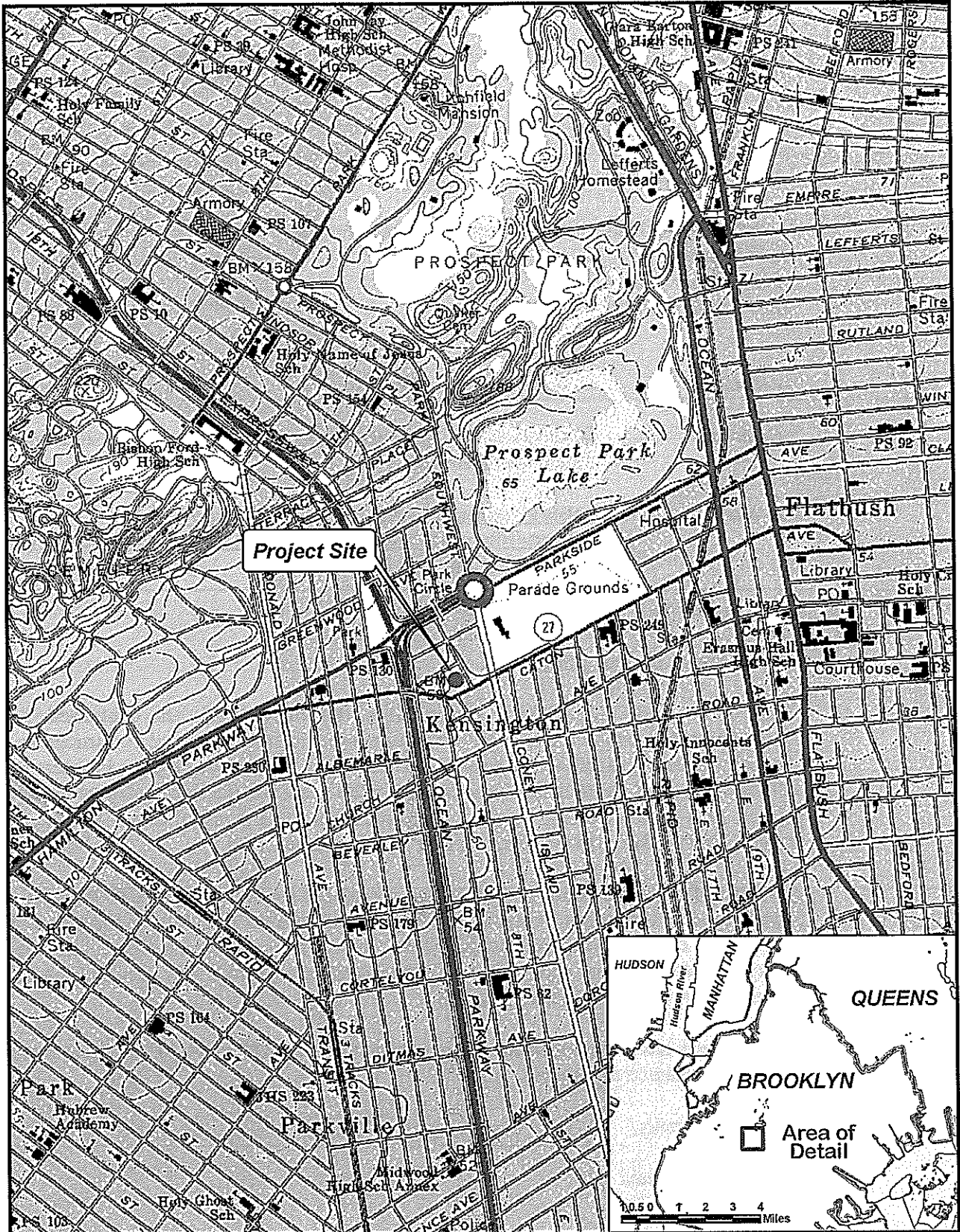
Very truly yours,

*STV Incorporated*

A handwritten signature in black ink, appearing to read "Cade Hobbick".

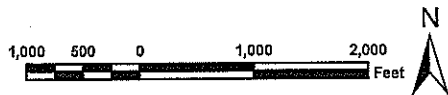
Cade Hobbick, AICP  
Senior Environmental Planner





**Legend**

● Project Site



Source: USGS Topographic Map, quad o40073f8

**Project Location**

*Proposed 757-Seat PS/IS  
Caton Avenue, Brooklyn*

*New York City  
School Construction Authority*



February 3, 2011

Mr. Robert Sweeney, Chief of Operations  
New York City Fire Department  
Bureau of Operations  
9 Metrotech Center  
Brooklyn, NY 11201

**Attention:** Robert Sweeney, Chief of Operations

**Reference:** Proposed New 757-seat Primary/Intermediate School in Prospect Park South, Brooklyn

**Subject:** Fire Protection Services for the Proposed 757-Seat Primary/Intermediate School at Caton Avenue (Block 5321, Lots 44, 64 and 73), Brooklyn, New York

**STV Project No.:** 4013949

Dear Mr. Sweeney:

The New York City School Construction Authority (SCA) has contracted STV Incorporated to perform an environmental assessment for the proposed construction of a new 757-seat primary/intermediate school facility on Caton Avenue in the Prospect Park South section of Brooklyn (Kings County). The school project site is located on Block 5321, Lots 44, 64 and 73, bounded by Kermit Place to the north, Caton Avenue to the south, East 8<sup>th</sup> Street to the east, and East 7<sup>th</sup> Street to the west.

As part of the environmental assessment, we seek the opinion of the New York City Fire Department as to whether or not the proposed project will adversely impact the ability of the New York City Fire Department to provide fire protection to its service area. The attached maps show the project site located on Caton Avenue on Block 5321, Lots 44, 64 and 73 in Brooklyn, New York (Kings County).

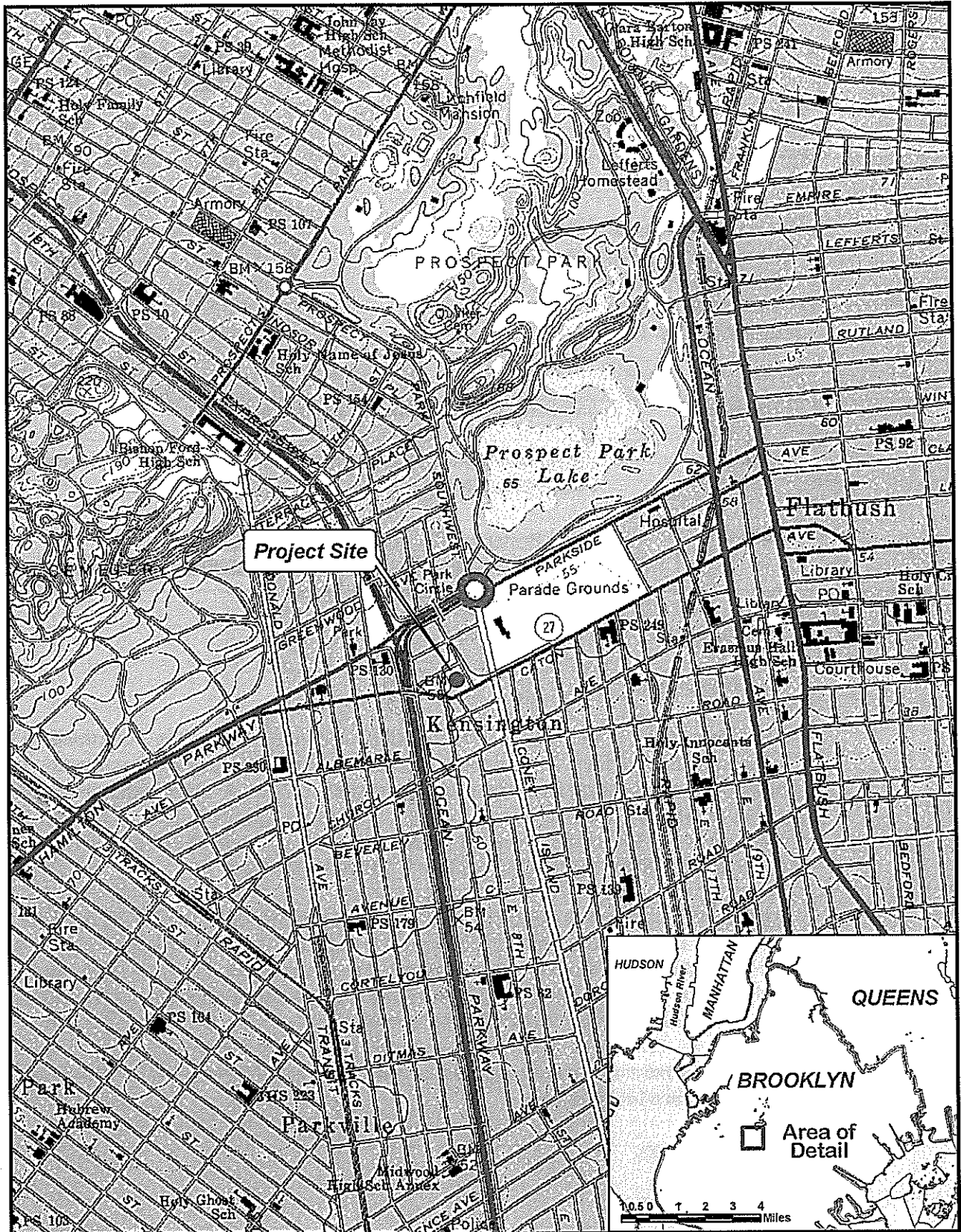
Should you have any questions, please contact me at (212) 614-3471. Thank you for your assistance in this matter.

Very truly yours,

*STV Incorporated*

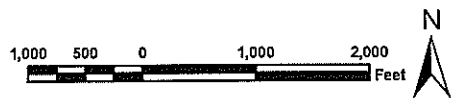
A handwritten signature in black ink, appearing to read 'Cade Hobbick', written over a horizontal line.

Cade Hobbick, AICP  
Senior Environmental Planner



**Legend**

● Project Site



Source: USGS Topographic Map, quad o40073f8

**Project Location**

*Proposed 757-Seat PS/IS  
Caton Avenue, Brooklyn*

*New York City  
School Construction Authority*



## FIRE DEPARTMENT

9 METROTECH CENTER

BROOKLYN, N.Y. 11201-3857

ROBERT F. SWEENEY  
*Chief of Operations*  
Bureau of Operations

Room 7W-4

February 24, 2011

STV Incorporated  
225 Park Avenue South  
New York, NY 10003-1604  
Attn: Cade Hobbick, AICP

Re: Fire Protection Services  
Proposed Primary/Intermediate School  
Caton Avenue and Kermit Place  
Borough of Brooklyn

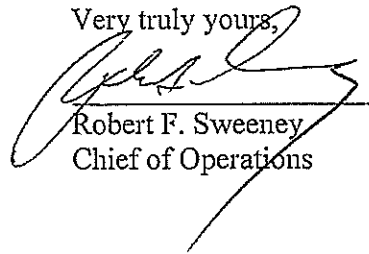
Dear Cade Hobbick,

The Fire Department has done a preliminary review of the above referenced project. Our response to the questions you had about fire protection service to the school is as follows:

1. E-240, E-281, E-282, E-248, L-147, L-148, B-48 are the units assigned on the first alarm to respond to the school.
2. The first arriving units to arrive for a reported fire at this location would be Approximately 3-4 minutes under normal circumstances.
3. Under normal circumstances, it is not likely there would be an increased demand for Additional services.
4. It is assumed this new building would be a Class 1 building with sprinklers and Standpipes which would not require additional manpower or equipment. In the event that this building has any exemptions from the present building and fire codes, this consideration would have to be re-evaluated.
5. Before construction is to commence, it is required that the FDNY be provided with Four sets of building and hydrant plans showing street access, street widths, and location of water mains, standpipes, fire hydrants, and sprinkler Siamese connections.

This letter is not Fire Department approval for this proposal, as we have not received plans for review. The Fire Department has no plans at this time to make any changes in stations or equipment in the area of the school. If you have any questions please call Captain James Ahrens at (718) - 855-8571.

Very truly yours,

A handwritten signature in black ink, appearing to read 'R. Sweeney', is written over a horizontal line. The signature is fluid and cursive, with a long horizontal stroke extending to the right.

Robert F. Sweeney  
Chief of Operations

# HISTORICAL PERSPECTIVES INC.



3/28/11

Douglas Mackey  
New York State Office of Parks, Recreation, and Historic Preservation  
Bureau of Historic Preservation  
Pebbles Island, P.O. Box 189  
Waterford, NY 12188

RE: New York City School Construction Authority  
Proposed New 757-Seat PS/IS  
Caton Avenue, Brooklyn  
Block 5321 – Lots 44, 64 and 73

Dear Mr. Mackey,

The New York City School Construction Authority (SCA) proposes construction of a new PS/IS facility for District 15 in Brooklyn. The new school is intended to serve 757 students with approximately 75 teachers and staff. The site is generally bounded by Kermit Place to the north, East 7<sup>th</sup> Street to the west and Caton Avenue to the south and lies somewhat south and west of Prospect Park and the Parade Grounds. See the enclosed USGS Brooklyn quad for site location.

Moving forward with the new school building design requires filing certain CEQRA related environmental reports, including an EAF. In order to comply with applicable state standards, an evaluation of cultural resources must be included with the EAF filing. In compliance with the review process, HPI has been requested to evaluate the proposed Caton Avenue school site for potential sensitivity of both archaeological resources and historic resources if such review is deemed necessary by the State Office of Parks, Recreation and Historic.

HPI requests a cultural resources site review of the proposed Caton Avenue school parcel from your office. Such a review will indicate whether an archaeological documentary study and/or an historic resources evaluation must be conducted in order for the project to move forward.

Please do not hesitate to call me directly if you have any questions regarding this request. Thank you,

Cece Saunders  
203-226-7654

cc: K. Markunas, OPRHP  
M. MacQueen, STV

**P.O. Box 3037 • Westport • Connecticut • 06880**





585

SHORE PARKWAY INTERCHANGE 7 2.9 MI

201000 FEET

57'30"

589

(CONEY ISLAND) 54-6265 III SW

Map prepared, edited, and published by the Geological Survey  
 in cooperation with New York Department of Transportation

SCALE

# HISTORICAL PERSPECTIVES INC.



7/15/11

Ruth L. Pierpont  
New York State Office of Parks, Recreation, and Historic Preservation  
Bureau of Historic Preservation  
Peebles Island, P.O. Box 189  
Waterford, NY 12188

RE: New York City School Construction Authority  
Proposed New 757-Seat PS/IS  
Caton Avenue, Brooklyn  
Block 5321 – Lots 44, 64 and 73  
Project No. 11PR02787

Dear Ms. Pierpont,

Thank you for your letter of April 27, 2011 requesting additional information about the New York City School Construction Authority (SCA) proposed new PS/IS facility on Caton Avenue in Brooklyn. Specifically, your letter asked for

- a full project description showing area of potential effect,
- clear, original photographs of buildings/structures 50 years or older within the project area, and
- clear, original photographs of the surroundings looking out from the project site in all directions, keyed to a site map.

This response is being sent to provide your office with these items.

The New York City School Construction Authority (SCA) proposes to construct a new primary and intermediate school (PS/IS) facility, to be known as PS/IS 437, on Caton Avenue in the Prospect Park South section of Brooklyn. The proposed school would provide approximately 757 seats for students in grade levels pre-kindergarten through eight within Community School District (CSD) No. 15. In order to develop the new school facility, SCA would acquire Lots 44, 64, and 73 on Block 5321 for the proposed school site. The project site is located on the block bounded by Kermit Place to the north, Caton Avenue to the south, East 8<sup>th</sup> Street to the east, and East 7<sup>th</sup> Street to the west (Figure 1). The irregularly shaped project site has 287 feet of frontage on Caton Avenue, 234 feet on East 7<sup>th</sup> Street, 101 feet on East 8<sup>th</sup> Street, and 27 feet on Kermit Place. The portions of the site without street frontage adjoin the rear yards of existing residential buildings that front Kermit Place and East 8<sup>th</sup> Street. The project site contains approximately 0.85 acres (37,065 sf).

The proposed action would entail the acquisition of three vacant lots (Lots 44, 64, and 73) on Block 5321, and construction of a new primary and intermediate school facility. According to the current design scheme that has been selected by the SCA, the proposed new school facility would be a five-story building, plus cellar. The school's main entrance would be located on Caton Avenue (see Figure 2). The new PS/IS 437 would provide approximately 757 seats for grade levels pre-kindergarten through eight,

**P.O. Box 3037 • Westport • Connecticut • 06880**

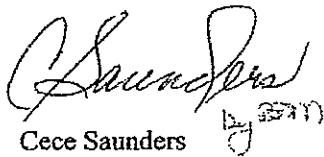


and would contain classrooms for grade levels pre-kindergarten through eight, special education classrooms, a gymnasium (gymnasium/auditorium), a kitchen and student dining area, a staff lunch room, a gymnasium, a library, music and art rooms, science rooms, reading and speech resource rooms, medical office space, administrative office space, and storage. Three playgrounds would be provided on site including a 4,300 sf playground on the northern portion of the project site, a 7,600 sf general playground on the southeastern portion of the project site, and a 4,275 sf Early Childhood (kindergarten and pre-kindergarten) playground on the southwestern portion of the project site.

Figure 3 shows the locations of photographs for the site. There are no structures on the project site lots (Photographs 1-3). A wooden fence surrounds Lots 44 and 73, while a chain link fence surrounds Lot 64. The surrounding area contains a mixture of row houses, some detached houses, large multiple-story brick apartment buildings, and low-rise commercial buildings (Photographs 4-12).

Please do not hesitate to call me directly if you have any questions regarding this request. Thank you,

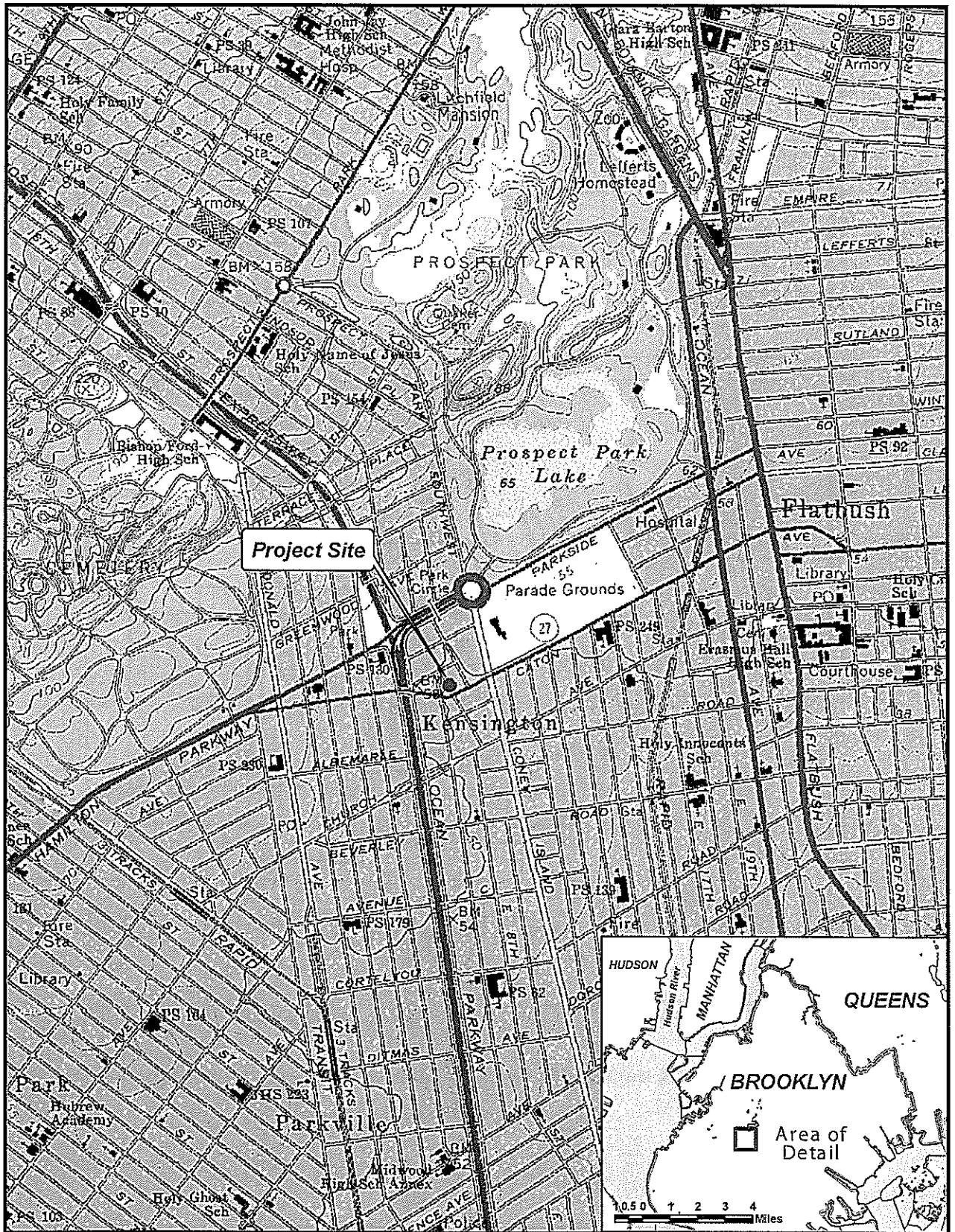
Sincerely,

A handwritten signature in cursive script, appearing to read "Cece Saunders". To the right of the signature, there is a small handwritten mark that looks like "by STM".

Cece Saunders  
203-226-7654

✓ cc: M. MacQueen, STV

**P.O. Box 3037 • Westport • Connecticut • 06880**



**Legend**

● Project Site

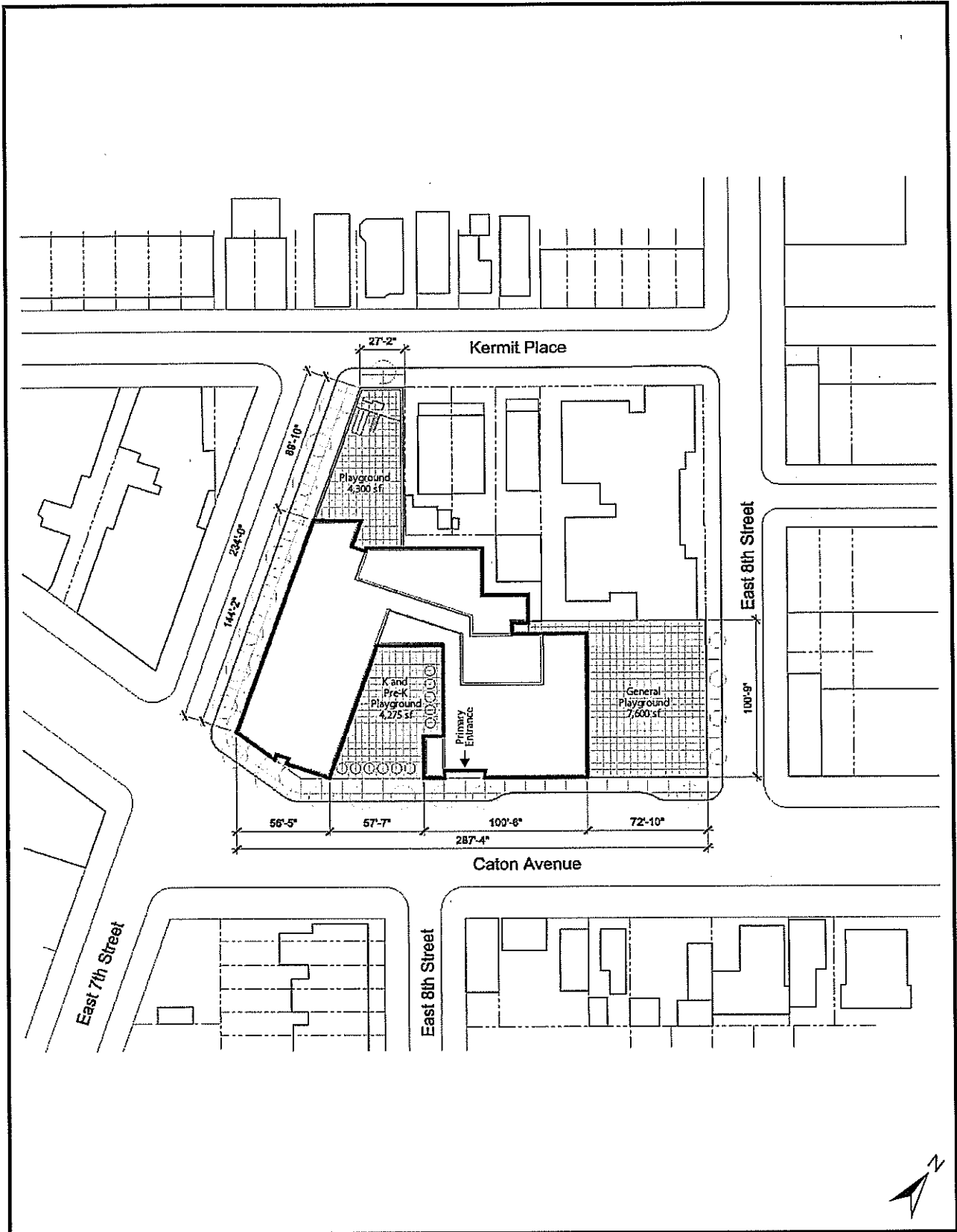


Source: USGS Topographic Map, quad o40073f8

**Figure 1: Project Location**

*Proposed PS/IS 437  
Caton Avenue, Brooklyn*

*New York City  
School Construction Authority*

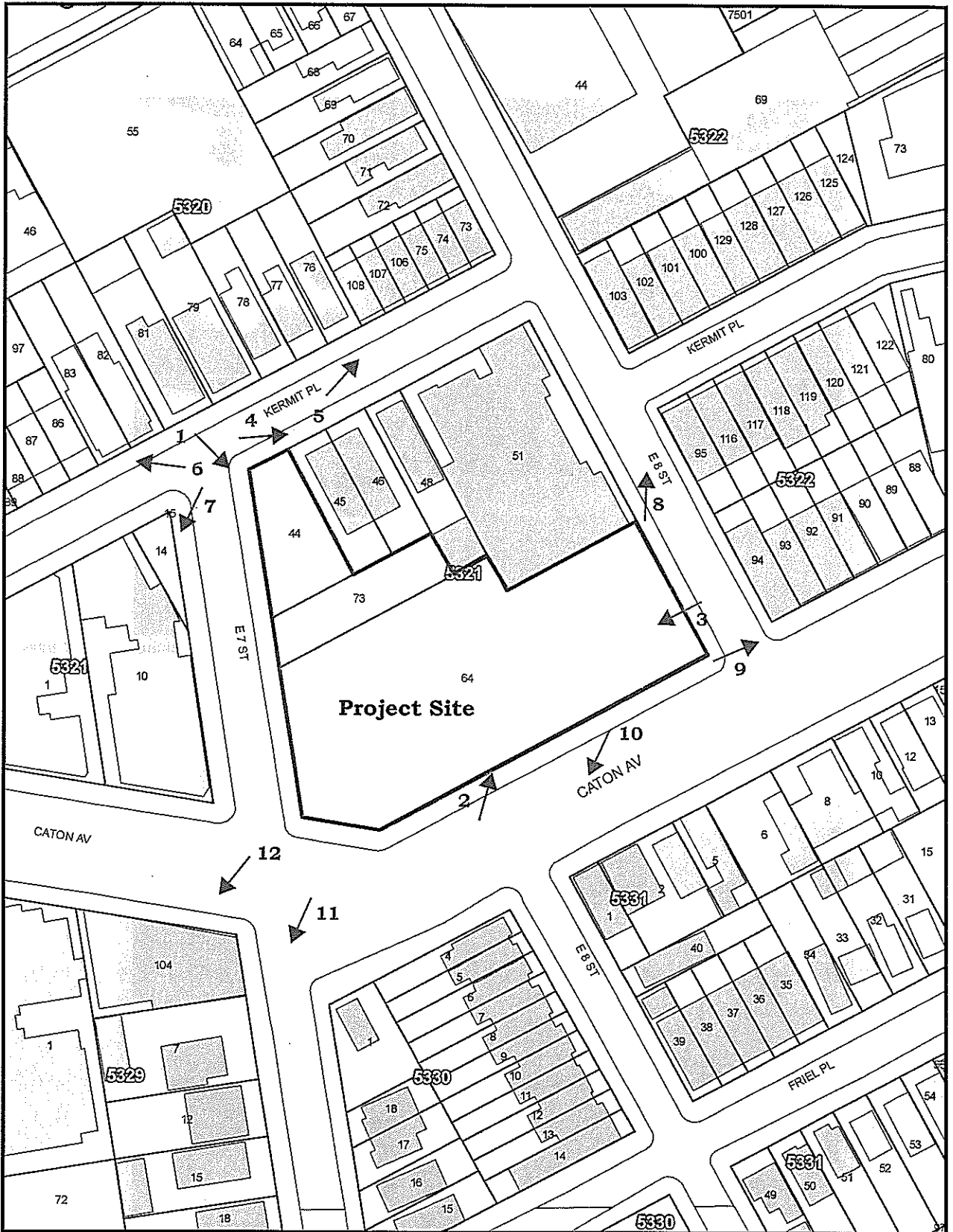


**Figure 2: Proposed Project Plan**

*Proposed PS/IS 437  
Caton Avenue, Brooklyn*

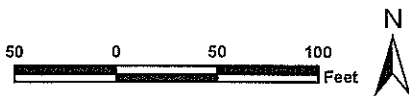
*New York City  
School Construction Authority*

Scale: NTS  
Source: NYC SCA June 2, 2011



*Figure 3: Photo Key*

*Tax Map with Building Footprints*



*Proposed PS/IS 437  
Caton Avenue, Brooklyn*

*New York City  
School Construction Authority*

Source: NYC Department of City Planning MapPLUTO 2009



Photograph 1: Project site showing Lots 44 and 73 surrounded by wooden fence. View looking southeast from intersection of Kermit Place and East 7<sup>th</sup> Street.



Photograph 2: Project site showing Lot 64 enclosed by chain link fence in foreground and wooden fence in background. View looking northeast from Caton Avenue sidewalk.





Photograph 3: Project site showing Lot 64 interior. View looking west from East 8<sup>th</sup> Street near Caton Avenue.



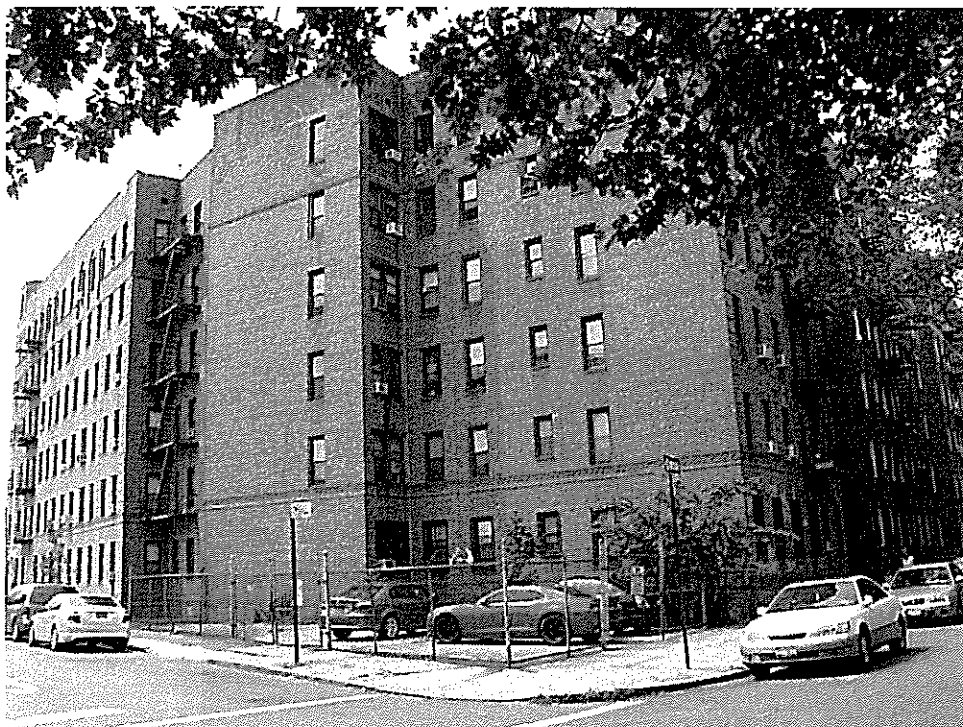
Photograph 4: Row houses and apartment building on south side of Kermit Place adjacent to project site. View looking west from intersection of Kermit Place and East 7<sup>th</sup> Street.



Photograph 5: Row houses on north side of Kermit Place across from project site. View looking northeast from Kermit Place.



Photograph 6: Row houses on north side of Kermit Place across from project site. View looking northwest from Kermit Place.



Photograph 7: Multiple story apartment building on East 7<sup>th</sup> Street between Kermit Place and Caton Avenue, across from project site. View looking southwest from intersection of Kermit Place and East 7<sup>th</sup> Street.



Photograph 8: Buildings on blocks east of project site. View looking north from East 8<sup>th</sup> Street.





Photograph 9: Buildings on blocks east of project site. View looking northeast from intersection of East 8<sup>th</sup> Street and Caton Avenue.



Photograph 10: Buildings on south side of Caton Avenue across from project site. View looking southwest from Caton Avenue.



Photograph 11: Buildings on East 7<sup>th</sup> Street south of Caton Avenue, across from project site. View looking southwest from intersection of East 7<sup>th</sup> Street and Caton Avenue.



Photograph 12: Commercial buildings on south side of Caton Avenue at East 7<sup>th</sup> Street across from project site. View looking southwest from intersection of Caton Avenue and East 7<sup>th</sup> Street.



Andrew M. Cuomo  
Governor

Rose Harvey  
Commissioner

**New York State Office of Parks,  
Recreation and Historic Preservation**

Historic Preservation Field Services Bureau • Peebles Island, PO Box 189, Waterford, New York 12188-0189

518-237-8643

July 21, 2011

www.nysparks.com

Cece Saunders  
Historical Perspectives, Inc.  
P.O. Box 3037  
Westport, Connecticut 06880-9998

Re: NYCSA  
Proposed new 757-seat PS/IS on Caton Avenue  
Kermit Pl., East 7th St., Caton Ave.  
(Block 5321)  
BROOKLYN, Kings County  
11PR02787

Dear Ms. Saunders:

Thank you for requesting the comments of the Field Services Bureau of the Office of Parks, Recreation and Historic Preservation (OPRHP). We have reviewed the project in accordance with the New York State Historic Preservation Act of 1980 (Section 14.09 of the New York Parks, Recreation and Historic Preservation Law). These comments are those of the Field Services Bureau and relate only to Historic/Cultural resources. They do not include potential environmental impacts to New York State Parkland that may be involved in or near your project. Such impacts must be considered as part of the environmental review of the project pursuant to the State Environmental Quality Review Act (New York Environmental Conservation Law Article 8) and its implementing regulations (6 NYCRR Part 617).

Based upon this review, it is the OPRHP's opinion that your project will have No Impact upon cultural resources in or eligible for inclusion in the State and National Register of Historic Places.

If further correspondence is required regarding this project, please be sure to refer to the OPRHP Project Review (PR) number noted above.

Sincerely,

Ruth L. Pierpont  
Acting Deputy Commissioner for Historic Preservation



February 3, 2011

New York State Department of Environmental Conservation  
Division of Fish, Wildlife & Marine Resources  
New York Natural Heritage Program  
625 Broadway, 5<sup>th</sup> Floor  
Albany, NY 12233-4757

**Attention:** Tara Salerno, Information Services

**Reference:** Proposed New 757-seat Primary/Intermediate School in Prospect Park South, Brooklyn

**Subject:** Rare, Endangered and Threatened Species Information in the Vicinity of the Proposed 757-Seat Primary/Intermediate School on Caton Avenue (Block 5321 – Lots 44, 64 and 73), Brooklyn, New York

**STV Project No.:** 4013949

Dear Ms. Salerno:

The New York City School Construction Authority (SCA) has contracted STV Incorporated to perform an environmental assessment for the proposed construction of a new 757-seat primary/intermediate school facility on Caton Avenue in the Prospect Park South section of Brooklyn (Kings County). The school project site is located on Block 5321, Lots 44, 64 and 73, bounded by Kermit Place to the north, Caton Avenue to the south, East 8<sup>th</sup> Street to the east, and East 7<sup>th</sup> Street to the west.

As part of the environmental assessment, occurrences of rare, threatened and endangered species in the project area must be identified. The following is to request information from the New York Natural Heritage Program to establish the presence of such species in the project area and within one-half mile of the project area. The attached maps show the project site located on Caton Avenue on Block 5321, Lots 44, 64 and 73 in Brooklyn, New York (Kings County).

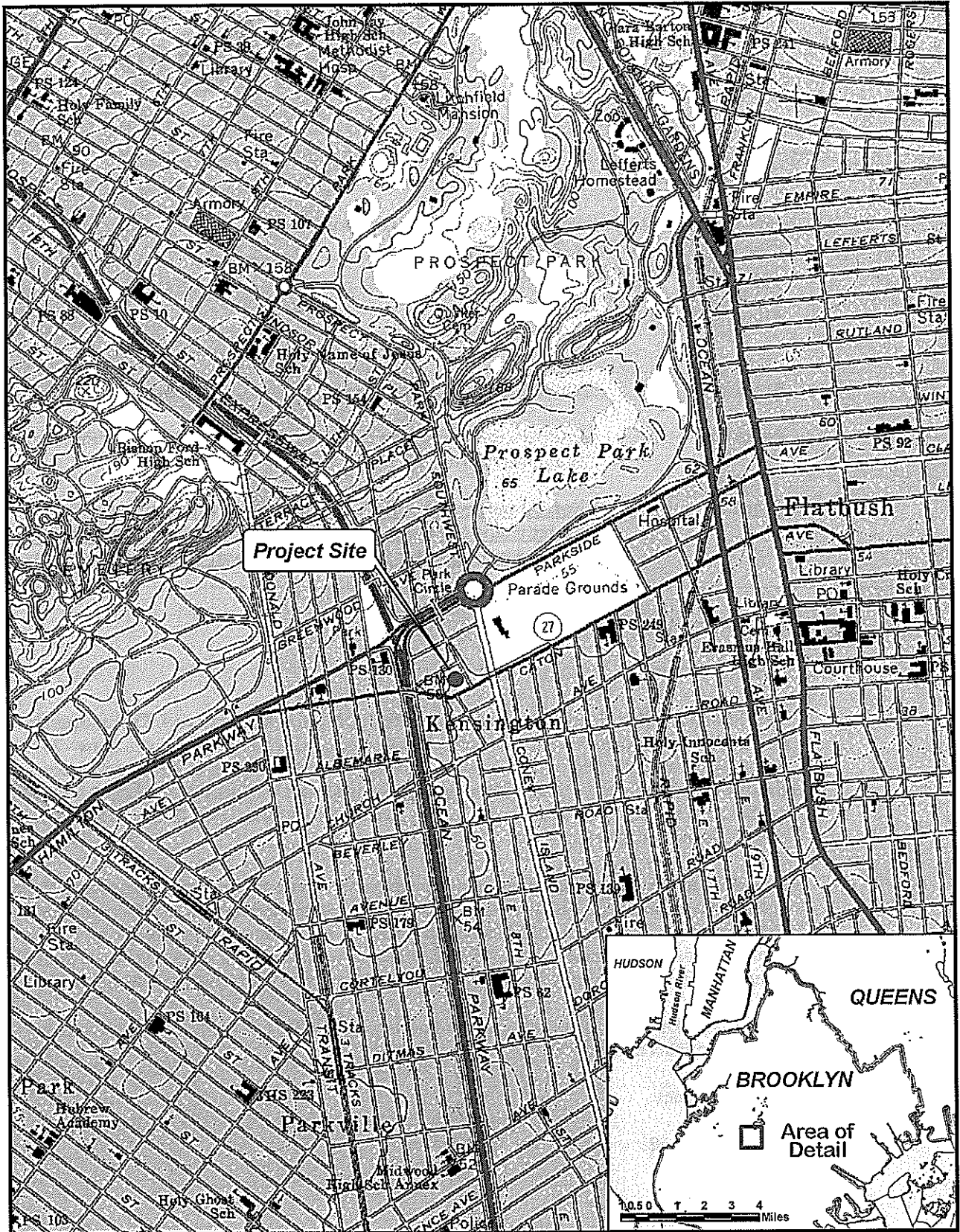
Should you have any questions, please contact me at (212) 614-3471. Thank you for your assistance in this matter.

Very truly yours,

*STV Incorporated*

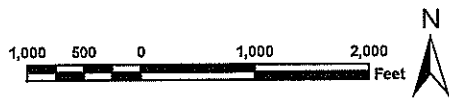
A handwritten signature in black ink, appearing to read "Cade Hobbick".

Cade Hobbick, AICP  
Senior Environmental Planner



**Legend**

● Project Site



Source: USGS Topographic Map, quad o40073f8

**Project Location**

Proposed 757-Seat PS/IS  
Caton Avenue, Brooklyn

New York City  
School Construction Authority

**NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION**  
**Division of Fish, Wildlife & Marine Resources**  
**New York Natural Heritage Program**  
625 Broadway, 5<sup>th</sup> Floor, Albany, New York 12233-4757  
**Phone:** (518) 402-8935 • **Fax:** (518) 402-8925  
**Website:** [www.dec.ny.gov](http://www.dec.ny.gov)



Joe Martens  
Acting Commissioner

February 15, 2011

Cade Hobbick  
STV Incorporated  
225 Park Avenue South  
New York City, NY 10003-1604

Dear Mr. Hobbick:


In response to your recent request, we have reviewed the New York Natural Heritage Program database with respect to an Environmental Assessment for the proposed New School – Prospect Park South, site as indicated on the map you provided, located on Caton Avenue, Brooklyn, Kings County.

Enclosed is a report of rare or state-listed animals and plants, significant natural Communities, and other significant habitats, which our databases indicate occur, or may occur, on your site or in the immediate vicinity of your site. For most sites, comprehensive field surveys have not been conducted; the enclosed report only includes records from our databases. We cannot provide a definitive statement as to the presence or absence of all rare or state-listed species or natural communities. This information should not be substituted for on-site surveys that may be required.

The enclosed report may be included in documents that will be available to the public. However, any enclosed maps displaying locations of rare species are considered sensitive information, and are intended only for the internal use of the recipient; they should not be included in any document that will be made available to the public, without permission from the New York Natural Heritage Program.

The presence of the plants and animals identified in the enclosed report may result in this project requiring additional review or permit conditions. For further guidance, and for information regarding other permits that may be required under state law for regulated areas or activities (e.g., regulated wetlands), please contact the appropriate NYS DEC Regional Office, Division of Environmental Permits, as listed at [www.dec.ny.gov/about/39381.html](http://www.dec.ny.gov/about/39381.html).

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

Sincerely,  
  
Tara Salerno, Information Services  
New York Natural Heritage Program

Enc.  
cc: Region 2

# 139

## Natural Heritage Report on Rare Species and Ecological Communities



NY Natural Heritage Program, NYS DEC, 625 Broadway, 5th Floor,  
Albany, NY 12233-4757  
(518) 402-8935

~The information in this report includes only records entered into the NY Natural Heritage databases as of the date of the report. This report is not a definitive statement on the presence or absence of all rare species or significant natural communities at or in the vicinity of this site.  
~Refer to the User's Guide for explanations of codes, ranks and fields.  
~Location maps for certain species and communities may not be provided 1) if the species is vulnerable to disturbance, 2) if the location and/or extent is not precisely known, 3) if the location and/or extent is too large to display, and/or 4) if the animal is listed as Endangered or Threatened by New York State.

## Natural Heritage Report on Rare Species and Ecological Communities



### VASCULAR PLANTS

#### *Lemna perpusilla*

Minute Duckweed NY Legal Status: Endangered  
Federal Listing:  
Last Report: 1992-08-25  
County: Kings  
Town: New York City (Kings County)  
Location: Prospect Park Lake  
General Quality and Habitat: A lake in a park.

NYS Rank: S1 - Critically imperiled  
Global Rank: G5 - Secure  
EO Rank: Extant

Office Use  
3300

1 Records Processed

More detailed information about many of the rare and listed animals and plants in New York, including biology, identification, habitat, conservation, and management, are available online in Natural Heritage's Conservation Guides at [www.acris.nynhp.org](http://www.acris.nynhp.org), from NatureServe Explorer at <http://www.natureserve.org/explorer>, from NYSDEC at <http://www.dec.ny.gov/animals/7494.html> (for animals), and from USDA's Plants Database at <http://plants.usda.gov/index.html> (for plants).

More detailed information about many of the natural community types in New York, including identification, dominant and characteristic vegetation, distribution, conservation, and management, is available online in Natural Heritage's Conservation Guides at [www.acris.nynhp.org](http://www.acris.nynhp.org). For descriptions of all community types, go to <http://www.dec.ny.gov/animals/29384.html> and click on Draft Ecological Communities of New York State.






# Natural Heritage Map of Rare Species and Ecological Communities

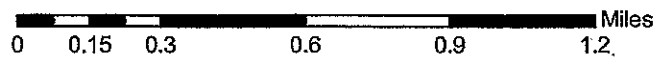
Prepared February 8, 2011 by the NY Natural Heritage Program, NYS DEC Albany, NY



### Legend

-  Project Site
-  NY Natural Heritage Program Database Records
-  Minute Duckweed

1:24,000



This map, and the locations that are displayed, are considered sensitive information, and are intended for the internal use of the recipient; they should not be included in any document that will be made available to the public, without permission from NY Natural Heritage. Some records listed in the accompanying report may not be shown on this map. Please see the report for details.



**THE COUNCIL  
THE CITY OF NEW YORK**

Appearance Card

I intend to appear and speak on Int. No. 40522 Res. No. \_\_\_\_\_

in favor  in opposition

Date: 11/16/11

(PLEASE PRINT)

Name: Jeremy Laster

Address: 6107 Ave T, Bklyn

I represent: CB7/Bklyn

Address: 4201 4th Ave Bklyn

**THE COUNCIL  
THE CITY OF NEW YORK**

Appearance Card

I intend to appear and speak on Int. No. \_\_\_\_\_ Res. No. \_\_\_\_\_

in favor  in opposition

Date: 11/16/11

(PLEASE PRINT)

Name: KENRUCK ON

Address: 30-30 Hudson Ave

I represent: NYC School Construction Authority

Address: \_\_\_\_\_

**THE COUNCIL  
THE CITY OF NEW YORK**

Appearance Card

I intend to appear and speak on Int. No. \_\_\_\_\_ Res. No. \_\_\_\_\_

in favor  in opposition

Date: 11-16-11

(PLEASE PRINT)

Name: CINDY MURPHY

Address: 185 Prospect PK SW #307

I represent: PS 130 - The Parkside School (Parents)

Address: 70 Ocean Parkway

Please complete this card and return to the Sergeant-at-Arms

**THE COUNCIL  
THE CITY OF NEW YORK**

Appearance Card

I intend to appear and speak on Int. No. \_\_\_\_\_ Res. No. \_\_\_\_\_

in favor  in opposition

Date: \_\_\_\_\_

(PLEASE PRINT)

Name: James Elbertfeld

Address: \_\_\_\_\_

I represent: School Construct Authority

Address: 30-30 Thomson Ave L.I.C.

Please complete this card and return to the Sergeant-at-Arms

**THE COUNCIL  
THE CITY OF NEW YORK**

Appearance Card

I intend to appear and speak on Int. No. \_\_\_\_\_ Res. No. \_\_\_\_\_

in favor  in opposition

Date: \_\_\_\_\_

(PLEASE PRINT)

Name: Greg Shaw

Address: 30-30 Thomson Ave

I represent: NYS School Construction Authority

Address: 30-30 Thomson Ave LIC NY

Please complete this card and return to the Sergeant-at-Arms