

NOTICE OF COMPLETION OF THE FINAL ENVIRONMENTAL IMPACT STATEMENT

January 13, 2009

West 44th Street and Eleventh Avenue Rezoning

Project Identification:

CEQR No. 09HPD022M
ULURP Nos. 100051ZMM
N100052ZRM
100053ZSM
100054ZSM
100055HAM

Lead Agency:

New York City Department of Housing
Preservation and Development (HPD)
100 Gold Street
New York, NY 10038

Contact Person:

Patrick Blanchfield, AICP
Director, Environmental Planning Unit, HPD

SEQRA Classification: Type I

Pursuant to City Environmental Quality Review (CEQR), Mayoral Executive Order No. 91 of 1977, and the regulations of Article 8 of the State Environmental Conservation Law, State Environmental Quality Review Act, as found in 6 NYCRR Part 617, a Final Environmental Impact Statement (FEIS) has been prepared for the action described below. Copies of the FEIS are available for public inspection at the office of the undersigned.

A Notice of Completion for the Draft Environmental Impact Statement (DEIS) was issued on August 5, 2009 and a public hearing on the DEIS was held at Spector Hall, 22 Reade Street, New York, New York on December 2, 2009 in conjunction with the City Planning Commission's (CPC) hearing pursuant to the Uniform Land Use Review Procedure (ULURP). Comments on the DEIS were accepted by HPD until December 14, 2009. The FEIS reflects all substantive comments made on the DEIS during the public hearing and subsequent comment period and additional analysis conducted subsequent to the completion of the DEIS.

A. PROJECT DESCRIPTION

The proposal involves an application by the New York City Department of Housing Preservation and Development (HPD; the "applicant"), on behalf of the project sponsor, 44th Street Development LLC, for several discretionary actions (collectively, the "Proposed Actions") including the disposition of City-owned property, zoning map and text amendments, special permits, and designation of an Urban Development Action Area and the approval of an Urban Development Action Area Project ("UDAAP").



The Proposed Action would facilitate the development of affordable and market-rate housing, retail space, and the relocation and expansion of the existing P.S. 51 public school (collectively, the “Proposed Project”) on Block 1073, Lot 1 (the “Project Site”) in the Clinton neighborhood of Manhattan Community District 4. The Proposed Project would complement the ongoing residential redevelopment of Manhattan’s west side and enliven an underutilized site with much needed affordable housing, retail space, and a new and larger replacement school, as described below.

In addition to the actions identified above, the Proposed Actions include site plan approval for the relocation and expansion of P.S. 51 within the Project Site. The school would be constructed by the New York City School Construction Authority (SCA) and maintained by the New York City Department of Education (DOE). The existing P.S. 51 school building would remain in operation until the new school facility is completed on the Project Site. Once the new school facility is completed, DOE would surrender the existing school and the building would be converted to residential use. The SCA, an Involved Agency, is the applicant for the site selection action and would be responsible for the design and construction of the school on the Project Site. However, as stated above, all development on the Project Site is herein collectively referred to as the “Proposed Project.” Under the terms of its enabling legislation, the SCA must comply with the State Environmental Quality Review Act (SEQRA; Part 617 of Title 6 of New York Code of Rules and Regulations) and Section 14.09 of the New York State Historic Preservation Act of 1980.

The project sponsor may seek tax-exempt bonds for the residential component of the Proposed Project through the New York State Housing Finance Agency’s (HFA) 80/20 Housing Program. At this time, no commitment to fund the Proposed Project has been made by the HFA. Therefore, HFA is an Involved Agency and would have to comply with SEQRA and Section 14.09 of the New York State Historic Preservation Act in the event that funding is provided.

Implementation of the Proposed Actions requires discretionary approvals from the CPC, the City Council, and other related actions subject to the City’s Uniform Land Use Review Procedure (ULURP)¹. Therefore, the Proposed Actions are subject to environmental review pursuant to SEQRA and New York City’s Executive Order 91 of 1977, as amended, establishing City Environmental Quality Review (CEQR). HPD, as CEQR Lead Agency, has determined that an Environmental Impact Statement (EIS) be prepared to examine and disclose the potential environmental impacts of the Proposed Actions.

The Proposed Project would result in residential buildings of varying heights. At the western end of the block would be Building A, a 7-story, roughly C-shaped base with frontage on West 44th Street, West 45th Street, and Eleventh Avenue. Above the base would be a tower. The center portion of the tower, which would be located on the southwest corner of West 45th Street and Eleventh Avenue would rise to 31 stories. From this central tower, a 12- to 28-story wing of the tower would extend eastward along West 45th Street, and a 30-story wing would extend southward along Eleventh Avenue, ranging from 28 to 31 stories. The project’s retail component would be located on the ground-floor of this building’s Eleventh Avenue frontage.

¹ The relocation and expansion of P.S. 51 on the Project Site would require site plan approval by the Mayor and City Council pursuant to the requirements of the New York City School Construction Authority Act and would not be subject to ULURP.



Adjacent to Building A (described above) to the east, located midblock, would be Building B, a mid-rise structure with 100 percent of its units qualifying as affordable housing. A seven-story base of this building would front West 44th Street, and a nine-story base would front West 45th Street. The tower portion of Building B would rise to 14 stories and extend north-south through the site and east along West 45th Street. An approximately 10,700-square-foot landscaped open space would be provided within the interior of the western portion of the Project Site, which will be available for use by residents of Buildings A and B.

East of the mid-rise portion of Building B on West 45th Street, the existing five-story school (P.S. 51) would be converted to residential use. All of the units in the converted P.S. 51 building would be market rate. P.S. 51 would be relocated to a new building on the southern portion of the block, with its main entrance moving from West 45th Street to West 44th Street. The expanded and relocated school building would rise to a height of five stories and would contain approximately 630 seats, an increase from its current 276-seat capacity. A new playground for P.S. 51 would occupy an area north and west of the new school. As described above, the existing school on the Project Site would remain operational until the new school is constructed. Once the new school building is completed, the DOE would surrender the existing school, which would be converted to residential use.

East of the existing and proposed schools is the existing Amtrak rail cut. A platform would be constructed above the Amtrak railroad right-of-way to facilitate the construction of two 14-story residential buildings, one on West 44th and one on West 45th Streets (Buildings CN and CS). Between the buildings would be an open area for residents. All of the units within Buildings CN and CS would qualify as affordable housing.

Under the terms of its enabling legislation, the SCA must comply with the requirements of SEQRA. As part of the Proposed Project, SCA would incorporate measures into the design of the new school building or its standard operating procedures for design and construction to preclude significant adverse impacts associated with historic resources, hazardous materials, pedestrian safety, air quality, and noise as follows:

- **Historic Resources:** The SCA would develop and implement Construction Protection Plans (CPP) for P.S. 51 and the nearby former Houbigant Building in consultation with the New York State Offices of Parks, Recreation, and Historic Preservation (OPRHP) and the New York City Landmarks Preservation Commission (LPC) prior to construction. The CPP(s) would follow the requirements established in the Department of Building's (DOB) *TPPN #10/88*, concerning procedures for the avoidance of damage to adjacent historic structures from nearby construction. It would also follow the guidelines set forth in Section 523 of the *CEQR Technical Manual*, including conforming to LPC's *Guidelines for Construction Adjacent to a Historic Landmark* and *Protection Programs for Landmark Buildings*.

A Letter of Resolution, which identifies these measures to avoid adverse impacts from the construction of the new P.S. 51, would be executed among OPHRP, SCA, HPD, and 44th Street Development LLC prior to any construction activities on the Project Site.

- **Hazardous Materials:** The SCA has conducted a Phase II Environmental Site Investigation to confirm subsurface conditions. Based on the findings of the Phase II Environmental Site Investigation, the SCA would develop management plans (e.g., soil management plan, groundwater management plan, Construction Health and Safety Plan (CHASP), etc.) to address



any hazardous materials that may be encountered during construction of the new school. The management plans prepared by SCA would be separate from the Remedial Action Plan (RAP) and CHASP prepared by West 44th Street Development, LLC for the remainder of the Proposed Project, but would include comparable measures to protect the health and safety of construction workers, school staff and students, and the public in general during construction and subsequent occupancy.

- **Pedestrian Safety:** The SCA would provide safety measures at the intersection of West 45th Street and Tenth and Eleventh Avenues and at the West 44th Street and Eleventh Avenue intersection. Specifically, “School X-ing” pavement markings would be provided for the Eleventh Avenue southbound and West 44th Street eastbound approaches to this intersection, and the east, west, and north crosswalks of this intersection are to be striped as school crosswalks.
- **Air Quality:** The SCA would ensure that the heating, ventilating and air conditioning (HVAC) systems of the new school use either No. 2 fuel oil or natural gas. If the new school utilizes No. 2 fuel oil for HVAC, boiler exhaust stacks on the building must be located at least 60 feet from the building lines of residential buildings B and C; if the new school utilizes natural gas, boiler exhaust stacks on the building must be located at least 47 feet from the building lines of residential Buildings B and C.
- **Noise:** The SCA would incorporate well sealed double-glazed windows and central air conditioning into the design of the new P.S. 51 to achieve the minimum required window-wall attenuation level of 30 dBA.

The measures are described in greater detail in the Chapter 7, “Historic Resources,” Chapter 11, “Hazardous Materials,” Chapter 16, “Transit and Pedestrians,” Chapter 17, “Air Quality,” and Chapter 18, “Noise,” of the FEIS. With these measures included as part of the SCA’s proposal for the new P.S. 51 facility on the Project Site, no significant adverse impacts would occur.

Separate from the measures that would be incorporated in the design of the new school by the SCA, the residential component of the Proposed Project includes measures related to historic resources, hazardous materials remediation, air quality, and noise attenuation that will be included as part of the Proposed Project to preclude the potential for significant adverse impacts. These measures are described in greater detail below.

As shown in **Table 1** below, the Proposed Project would include up to 1,350 residential units, up to 17,500 gross square feet (gsf) of retail, and a school consisting of 97,850 gsf. Of the residential units, at least 600 and up to 700 would be affordable housing and the remainder (up to 650) would be market rate.

The proposed replacement school facility would be designed to support pre-kindergarten through eighth grade instructional needs, but grade ranges will be confirmed by the DOE closer to the date of occupancy. For the purposes of analysis, it is assumed that the new P.S. 51 would contain 630 seats for elementary and intermediate grades (kindergarten through eighth grade).



Table 1
Development Program

| Use | Size | |
|--|------------------------|-------------|
| Residential | 1,350 DU | 119,177 GSF |
| School | 630 Seats ¹ | 97,850 GSF |
| Retail | 17,500 GSF | |
| Accessory Parking | 204 Spaces | |
| Notes: | | |
| DU – dwelling units | | |
| ¹ The existing school contains 276 elementary seats. The proposed school would be expanded by 354 seats for a total of 630 elementary and intermediate seats. | | |

The residential component would have a vehicular entrance on West 45th Street and pedestrian entrances on both West 44th and West 45th Streets. The expanded school would have its entrance on West 44th Street. The ground floor retail would be accessed from Eleventh Avenue. A total of up to 204 off-street, accessory parking spaces would be provided for the residential units and ground floor retail in a below-grade garage on the Project Site. The garage would have access from a ramp located midblock that has access from West 45th Street. Deliveries for the buildings would be from the curbside of West 44th and West 45th Streets as well as Eleventh Avenue.

The project sponsor and the SCA plan to begin construction in late 2010, with completion of all of the project components in 2013.

PURPOSE AND NEED

The Proposed Actions would facilitate the development of affordable and market-rate housing, retail space, and the relocation and expansion of P.S. 51. The Proposed Actions would complement the ongoing residential redevelopment of Manhattan’s West Side and enliven an underutilized site with much-needed affordable housing, retail space, and a new expanded school facility that could accommodate elementary and intermediate levels. It would be consistent with the City’s public policy of providing increased housing to meet the needs of its population.

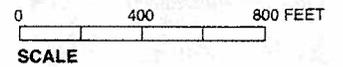
The current school facilities on the Project Site date back to 1905 and were originally planned as an annex to a since-demolished school building. The current facilities are programmatically limited and outmoded. As described in Chapter 4, “Community Facilities and Services” of the FEIS, elementary schools in Community School District 2 are currently operating at or above capacity. The Proposed Actions would result in the creation of a new, state-of-the art school facility with additional capacity on the Project Site. P.S. 51 would be expanded by approximately 354 seats to contain 630 seats.

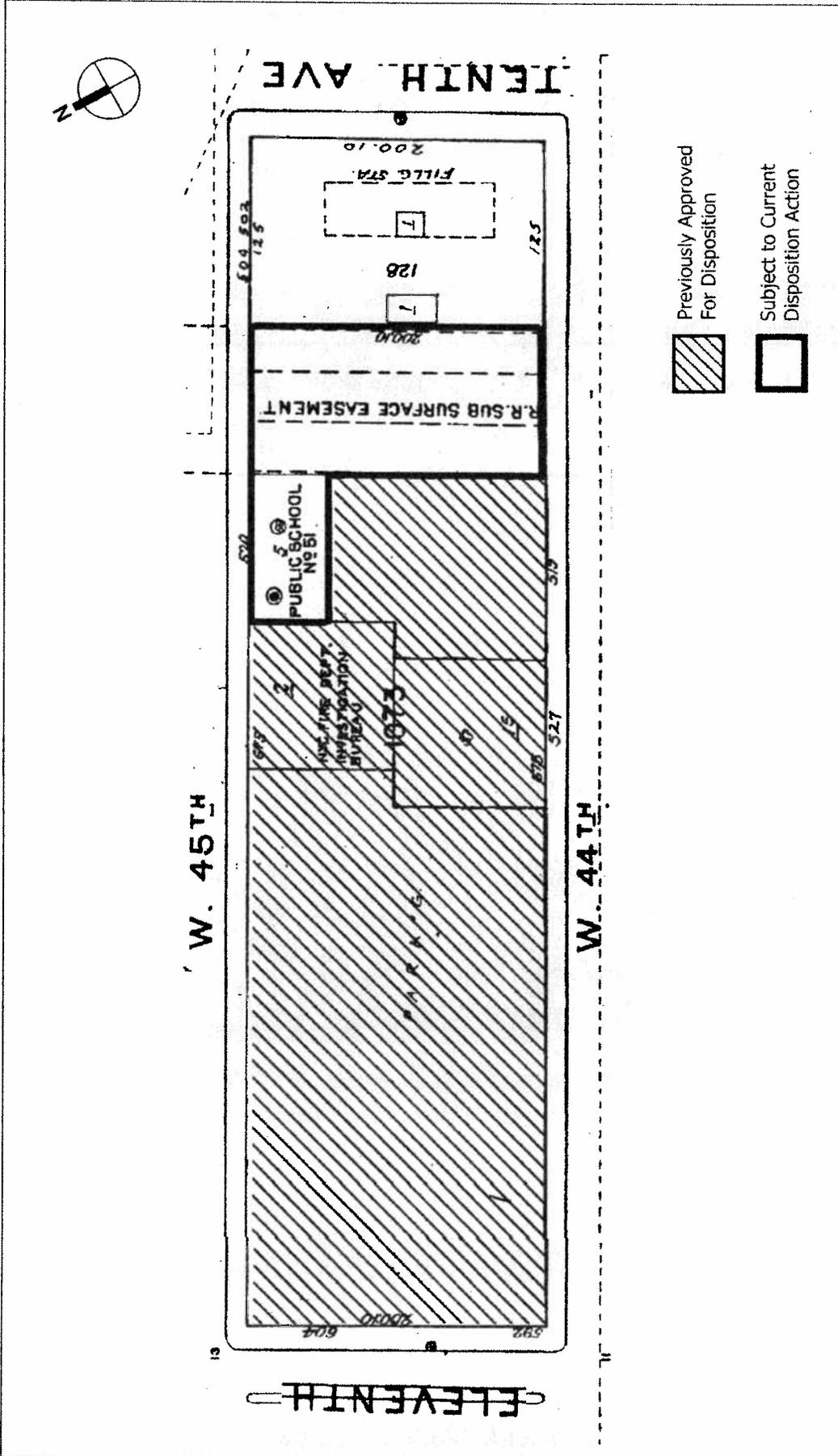
The Project Site is well-suited to accommodate the proposed mixed-use development. However, the requested bulk waivers, described below, are required to develop the project as currently proposed, in order to accommodate the dual public purpose of providing affordable housing and a new, expanded school on the same site. In addition, the development on the Project Site is somewhat constrained by the presence of the Amtrak rail cut. The proposed residential, community facility, and retail uses would be compatible with the existing uses in the surrounding area. The Proposed Actions would continue the trend of residential development in the area and would provide new retail and community facility uses to an area with a growing residential population. It would also replace the existing school facilities with new modern facilities and provide additional elementary and intermediate school capacity in Community School District 2.





 Project Site

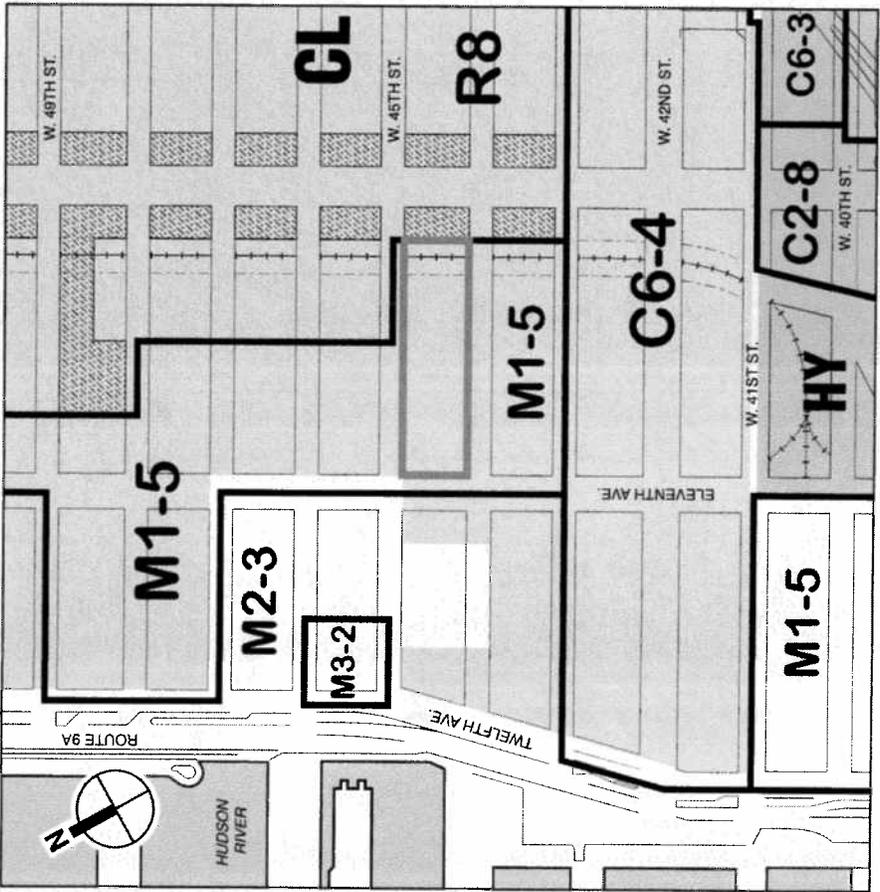




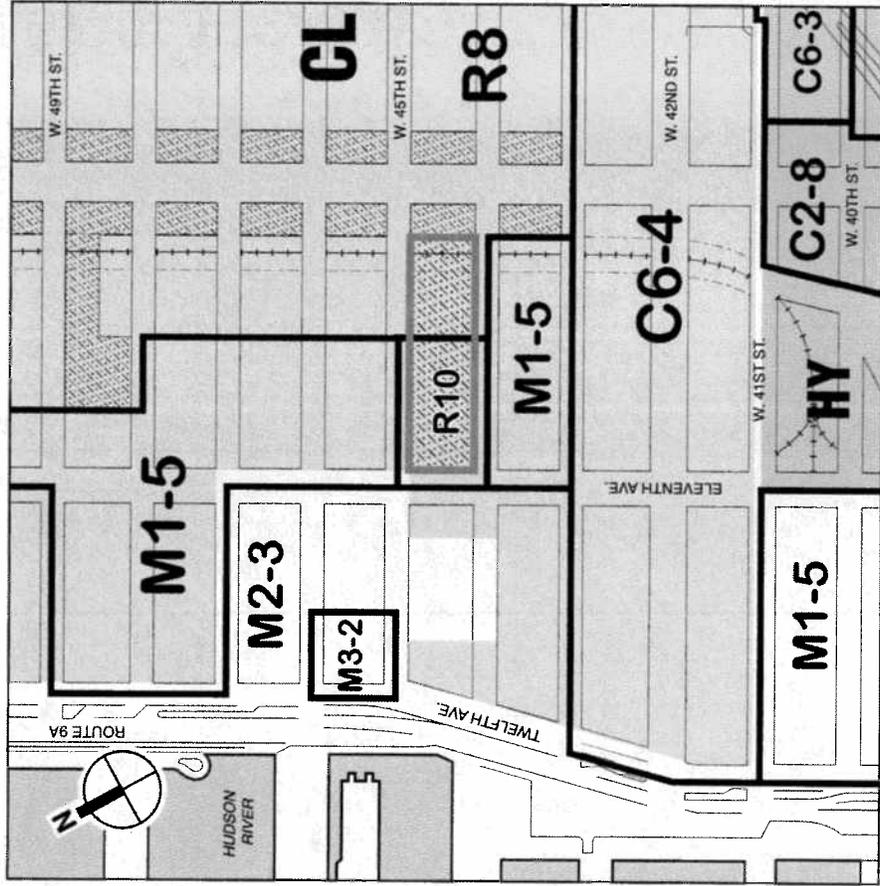
Previously Approved
For Disposition

Subject to Current
Disposition Action

Disposition Map



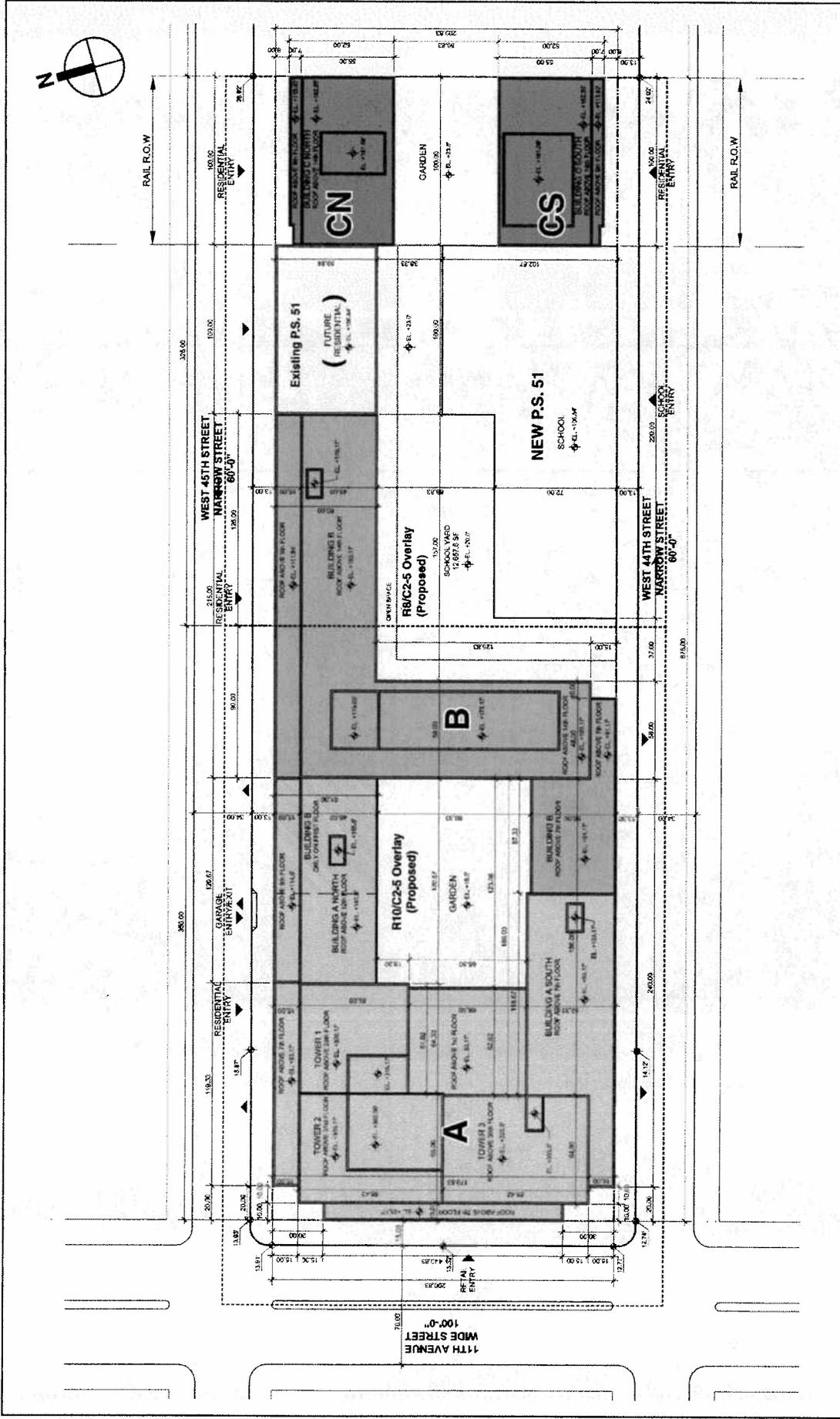
EXISTING



PROPOSED

-  Project Site
-  Zoning District Boundary
-  C1-5 Overlay
-  C2-5 Overlay
-  CL Clinton Special Purpose District
-  HY Hudson Yards Special Purpose District

Existing and Proposed Zoning



DESCRIPTION OF THE PROPOSED ACTIONS

The Proposed Actions would involve the following actions by the CPC, which are subject to ULURP:

- **Disposition of City-owned Property and UDAAP Designation:** HPD is seeking disposition authority for certain portions of the Project Site (Block 1073, Lot 1), herein referred to as the “Disposition Area,” consistent with the Proposed Action’s ULURP application. In conjunction with the disposition of City-owned property to the project sponsor to facilitate the development of affordable housing, HPD is seeking project approval and designation of the Disposition Area as an Urban Development Action Area Project (UDAAP).

The Disposition Area is described as two portions of Block 1073, Lot 1. One portion is an approximately 100-foot-wide rail cut for an Amtrak railroad right-of-way, which extends from West 44th Street to West 45th Street, at the eastern end of the Project Site. The other portion is an existing elementary school building, P.S. 51, located on West 45th Street, directly west of the rail cut. The school building measures approximately 100 feet in width and extends south into Lot 1 to a depth of approximately 59 feet. The disposition of the areas discussed above would be restricted to the bulk requirements of the General Large-Scale Development special permit, as discussed below.

Disposition approval is only required for the aforementioned Disposition Area because the balance of the Project Site previously received disposition approval in 2001 as part of a ULURP application for a 14-story, 700,000 square foot television studio production facility, known as “Studio City” (C 010137 ZSM and C010136 PMM). Studio City also included a request for a General Large-Scale Development special permit (C 010138 ZSM) under the New York City Department of City Planning’s (DCP) proposed unified bulk text amendments. This application was withdrawn when the unified bulk text amendments were also withdrawn. Although approved by the CPC and the City Council, Studio City was never constructed.

As discussed above, a separate action would occur on the portion of the Project Site to facilitate the construction of a new and larger school building on West 44th Street. The SCA would seek approvals of the proposed school facility’s site plan from the City Council and Mayor under Sections 1731 and 1732 of the Public Authorities Law. The building footprint for the new school is along West 44th Street, to the south of the existing school building. This area of the Project Site is excluded from HPD’s Disposition Area and HPD is not seeking UDAAP designation for it.

- **Zoning Map Amendment:** HPD is proposing a zoning map amendment to change the zoning of the Project Site from an M1-5 district to R8 and R10 zoning districts. It is also proposed to map a C2-5 commercial overlay over the entire Project Site. The existing M1-5 zoning district generally permits light industrial, commercial, and limited community facility uses (residential uses are not permitted in M1-5 zoning districts). Manufacturing and commercial uses have a maximum FAR of 5.0 and community facilities have a maximum FAR of 6.5. There are no height limits in M1-5 districts, and building heights and setbacks are governed by the sky exposure plane. There are no parking requirements in M1-5 zoning districts. The proposed R8 district generally allows residential uses with a maximum FAR of 6.02 and community facility uses with a maximum FAR of 6.5. The proposed R10 district generally allows residential and community facility uses, each with a maximum FAR of 10.0, but with utilization of the Inclusionary Housing (IH) Bonus, a



maximum residential FAR of 12.0 is allowed in R10 districts. The C2-5 commercial overlay allows for commercial uses with a maximum FAR of 2.0.

- **Zoning Text Amendment:** HPD is proposing a zoning text amendment to designate a portion of the Project Site as an Inclusionary Housing designated site, as follows: Currently, pursuant to the definition of lower income housing in Section 23-911, lower income housing provided under the Inclusionary Housing program may include standard units assisted under city, state or federal programs only within Inclusionary Housing designated areas. Therefore, to allow the Project Site's proposed Inclusionary Housing to include such assisted dwelling units, it is proposed to amend Section 96-82 to define the R10 portion of the Project Site as an Inclusionary Housing designated area within Manhattan's Special Clinton District.

- **Special Permit to Establish a General Large-Scale Development:** Pursuant to ZR Section 74-74, the CPC may establish General Large-Scale Developments (GLSD), within which, pursuant to Section 74-743 (a), the CPC may permit modifications of the applicable bulk regulations, including the distribution of floor area, dwelling units, lot coverage and open space without regard for zoning lot lines or district boundaries; and the location of buildings without regard for the applicable yard and court distance between buildings, or height and setback requirements. The GLSD special permit would apply to the entire Project Site. The modifications being requested are as follows:

1) Modification of rear-yard equivalent requirements:

The modification of the rear yard equivalent requirements of ZR Sections 23-532 and 33-283 is requested in order to provide a larger building footprint, thus maximizing the affordable housing provided on the Project Site. The modification will also allow for lower building heights, maintaining the Clinton neighborhood character. Modification of the rear yard equivalent requirements is hereby limited to three locations on the through lot portion of the Project Site:

- a) The portion of Tower 1 of Building A, located within the through lot portion of the Project Site, encroaches into the required rear yard equivalent. In this location, it is therefore requested to reduce the required residential rear yard equivalent for a distance of 39.33 feet.
- b) A portion of the L-shaped Building B (located midblock on the Project Site), extends across the rear yard equivalent area, requiring a waiver of the residential rear yard equivalent for a distance of 58 feet.
- c) An approximately 100-foot-wide portion of the new school building encroaches into the rear yard equivalent area to allow the new school's gymnasium to contain a regulation sized basketball court. In this location, it is requested to reduce the required residential and community facility rear yard equivalents to 38.3 feet from 60 feet and 40 feet, respectively.



2) Modification of height and setback requirements:

Pursuant to ZR Sections 23-632 and 33-431, in R8 and R10 districts (and C2-5 districts mapped with R8 and R10 districts), the maximum permitted street wall height is 85 feet, above which, a minimum initial setback of 20 feet on a narrow street and 15 feet on a wide street is required. In addition, any building must set back under a sky exposure plane having a vertical to horizontal ratio of 2.7 to 1 on a narrow street and 5.6 to 1 on a wide street. Pursuant to Section 23-663(a), above a height of 125 feet, a rear setback of 20 feet must be provided from the rear yard (or rear yard equivalent) line. Pursuant to Section 74-743(a)(2), the CPC may permit the location of buildings within a GLSD without regard for the applicable height and setback regulations. Modification of the applicable height and setback requirements of Sections 23-632 and 33-431 are being requested specifically for residential buildings A, B, CN, and CS, as described in more detail below.

Building A

Modification of the applicable height and setback requirements are being requested to:

- a) Allow the street wall of Building A North (fronting West 45th Street to the east of Tower 1), to be 97.75 feet in height, exceeding the maximum street wall height of 85 feet by 12.75 feet; and to allow the initial setback distance above the street wall height to be 15 feet, five feet less than the initial setback of 20 feet required along narrow streets;
- b) Allow the initial setback distance along Eleventh Avenue for Towers 2 and 3 to be 10 feet, five feet less than the required minimum of 15 feet along wide streets;
- c) Allow the initial setback distance along West 44th and West 45th Streets for Towers 1, 2, and 3 to be 15 feet, five feet less than required 20 feet along narrow streets;
- d) Allow Towers 1, 2, and 3 to penetrate the sky exposure plane above a height of approximately 140 feet on West 44th and West 45th Streets and approximately 155.59 feet on Eleventh Avenue; and
- e) Waive the rear setback above a height of 125 feet requirement for the rear wall of Tower 1 (the rear wall of Tower 1 will rise without setback from the ground to a height of 285 feet);

Building B

Modification of the applicable height and setback requirements are being requested to:

- a) Allow the street wall along West 45th Street to be 89.67 feet in height, exceeding the maximum street wall height of 85 feet by 4.67 feet (the street wall along West 44th Street will be 69 feet in height, which is within the requirement);
- b) Allow the initial setback distance along both West 44th Street and West 45th Streets to be 15 feet, five less than the required 20 feet along narrow streets;
- c) Allow the front wall of the building to penetrate the sky exposure plane above a height of 106 feet;



- d) Waive the rear setback above a height of 125 feet requirement for the portion of the building within the rear yard equivalent area.

Buildings CN and CS (over the rail cut)

Modification of the applicable height and setback requirements are being requested to:

- a) Allow the street wall of Building CN along West 45th Street to be 87.67 feet in height, exceeding the maximum street wall height of 85 feet by 2.67 feet;
- b) Allow the street wall of Building CS along West 44th Street to be 89.92 feet in height, exceeding the maximum street wall height of 85 feet by 4.92 feet;
- c) Allow the initial setback distance along both West 44th Street and West 45th Streets to be 15 feet, five less than the required 20 feet along narrow streets;
- d) Allow both buildings to penetrate the sky exposure plane above a height of approximately 145 feet; and
- e) Waive the rear setback above a height of 125 feet requirement for the rear walls of both buildings. The rear wall of buildings CN and CS will rise without setback from the ground to heights of 135.77 and 138.02 feet, respectively.

3) Modification of the minimum distance between buildings requirement:

Pursuant to Section 23-711, for buildings having a maximum building height greater than 50 feet, the minimum distance between a residential building and any other building on the zoning lot is 50 feet where only one of the buildings walls contains legally required windows (i.e., windows required for residential dwelling units). Pursuant to Section 74-743(a)(2), the CPC may permit the location of buildings within a GLSD without regard for the applicable distance between buildings regulations. This modification is being requested to:

- a) Reduce the minimum distance between the east-facing wall on the through-lot portion of Building B (which will have legally required windows) and the west-facing wall of the new school building (which, although it may have windows, will not have legally required windows) to 37 and 47 feet from the minimum required 50 feet; and
- b) Reduce the minimum distance between the north-facing wall of the new school building (which will not have legally required windows) and the south-facing wall of the existing P.S. 51 building (which will be retained and converted to residential use) to 47 feet from the minimum required 50 feet.

4) Modification of the open space requirement:

Pursuant to Section 23-142, in R8 districts, the amount of open space required to be provided is determined by the applicable open space ratio (OSR) associated with the height factor for the building(s) on the zoning lot. Pursuant to Section 74-743(a)(1), the CPC may



permit the distribution of the total required open space within a GLSD without regard for zoning district boundaries.

For purposes of determining the applicable OSR, the height factor for the buildings in the R8 portion of the Project Site is 11, the associated OSR is 8.9 and the required open space is 25,008 square feet. However, because only 10,445 square feet of the required open space can be located in the R8 portion of the Project Site, a modification of the open space requirement of Section 23-142 is requested to allow the remaining required open space to be located in the R10 portion of the Project Site. The Proposed Project will provide a total of 28,596 square feet of open space on the Project Site, approximately 3,600 square feet more than required. In addition to the required open space, the new playground proposed in conjunction with the new school building, will provide an additional 12,500 square foot open space area on the Project Site.

- **Special Permit for Construction above a Railroad Right-of-Way:** As discussed above, the Proposed Actions include the development two residential buildings over the existing Amtrak right-of-way. HPD is seeking approval by the CPC of a special permit to construct portions of the Proposed Project (buildings CN and CS) above an active railroad right-of way pursuant to ZR Section 74-681 (Development within or over a railroad or transit right-of-way or yard) of the New York City Zoning Resolution.

OTHER ACTIONS

- **School Site Plan Approval:** The relocation and expansion of P.S. 51 on the Project Site would require site plan approval by the Mayor and City Council pursuant to the requirements of the New York City School Construction Authority Act. (For more information, see “Coordination with Other Review Processes,” below, in section D, “Environmental Review Process.”)
- **State Financing:** Implementation of the Proposed Actions may require approval for financing from the New York State Housing Finance Agency (HFA) through its 80/20 Housing Program.
- **State Pollution Discharge Elimination System (SPDES) Permit:** Construction resulting from the Proposed Actions would require a SPDES permit for stormwater discharges associated with construction activities issued by the New York State Department of Environmental Conservation (DEC).
- **Amtrak:** The construction of project components above the rail cut would require administrative approval by AMTRAK.
- **Letter of Resolution:** As discussed in Chapter 7 “Historic Resources,” a Letter of Resolution (LOR) among HPD, 44th Street Development LLC, the SCA, and the New York State Office of Parks, Recreation and Historic Preservation (OPRHP) would be executed prior to the conveyance of the residential portion of the Project Site to West 44th Street Development LLC and prior to all construction activities (including the construction of the new school). The LOR includes the steps that would be undertaken to consult with OPRHP to minimize or mitigate any adverse impacts related to archaeological or architectural resources on the Project Site. The LOR is legally binding and a property covenant would be recorded to require the measures stipulated in the LOR once the residential portion of the land is conveyed to West 44th Development LLC. A



draft of the LOR is currently under review at the Law Department. The LOR would be executed prior to the start of construction.

- **Restrictive Declaration:** In connection with the GLSD special permit, the sponsor would record a Restrictive Declaration that would cover the Project Site. The CPC approval for the “Disposition Area” (discussed above) would be contingent upon the execution and recording of a Restrictive Declaration upon closing, which would be approved by the CPC and bind the project sponsor and its successors or assigns to the bulk requirements contained in the GLSD special permit. The Restrictive Declaration would bind the development of both parcels (the Disposition Area and the balance of the Project Site) to the GLSD special permit.

Lastly, the Land Disposition Agreement (LDA) between HPD and the project sponsor would require compliance with the bulk requirements contained in the GLSD for both the “Disposition Area” and the balance of the Project Site.

B. ENVIRONMENTAL ANALYSIS FRAMEWORK

The EIS has been prepared pursuant to City Environmental Quality Review (CEQR). As the Proposed Project is located in New York City, and involves actions (zoning map change and special permits) requiring compliance with ULURP, the environmental assessment methodologies employed in this EIS are consistent with those of the *CEQR Technical Manual*. The environmental review provides a means for decision-makers to systematically consider environmental effects along with other aspects of project planning and design, and to identify and, when practicable, avoid or minimize significant adverse environmental effects. HPD has assumed the lead agency role for this proposal.

An EIS analyzes the effects of a proposed action on its environmental setting in the year that the project would be completed. It is assumed that the Proposed Project would begin construction in late 2010 and be completed by 2013. Thus, 2013 is the analysis year for the Proposed Actions. For all technical areas that require detailed analysis, the assessment in this EIS includes a description of existing conditions, an assessment of conditions in 2013 without the Proposed Actions, assuming continued use of the site in its current state but accounting for other relevant changes in the area, and an assessment of conditions for the same year with completion of the Proposed Project. The identification and evaluation of impacts of the Proposed Actions are based on the change between the future without and with the Proposed Actions, and where significant adverse impacts have been identified, mitigation measures are proposed. As described below, the Proposed Actions would result in significant adverse impacts related to traffic, which would be fully mitigated.

EXISTING CONDITIONS

The Project Site (Block 1073, Lot 1) is located in the Clinton neighborhood of Community District 4 in Manhattan. The Project Site comprises most of the block bounded by West 44th Street to the south, Tenth Avenue to the east, West 45th Street to the north, and Eleventh Avenue to the west. It is currently zoned as an M1-5 manufacturing district, and is also within the Special Clinton District (CL). M1-5 zoning districts generally permit light industrial, commercial, and limited community facility uses. Manufacturing and commercial uses have a maximum floor-area ratio (FAR) of 5.0, and community



facilities have a maximum FAR of 6.5. There are no height limits in M1-5 districts, and building heights and setbacks are governed by the sky exposure plane. The CL is generally between 41st and 58th Streets west of Eighth Avenue. The CL was created to preserve and strengthen the residential character of the Clinton community by maintaining a broad mix of incomes and ensuring that the community is not adversely affected by new development.

Current land uses on the Project Site include a 300-space public parking lot with access from Eleventh Avenue and West 45th Street, a New York City Police Department (NYPD) parking lot, Elias Howe School (P.S. 51), a vacant warehouse (527 West 44th Street), and a horse stable (Shamrock Stables at 522 West 45th Street). All of the parcels are owned by the City of New York (the public parking and stables are leased to their current operators).

The eastern boundary of the Project Site, 125 feet west of Tenth Avenue, comprising the easternmost 100 feet of the Project Site includes an open rail cut, with tracks for Amtrak's Empire Line located approximately 30 feet below grade. Amtrak's operation of the Empire Line through the property is permitted through an easement between the City and Amtrak. A gas station is located on a separate property (Block 1073, Lot 28) along Tenth Avenue immediately east of the rail cut. The area above an elevation of 15.60 feet on West 44th Street and above an elevation of 17.64 feet on West 45th Street (air space over the rail cut) is part of the Project Site, but the gas station parcel is not part of the Project Site.

FUTURE CONDITION WITHOUT THE PROPOSED ACTION

Absent the Proposed Actions in 2013, it is assumed that no changes would occur to the Project Site and existing conditions would remain.

As discussed in the FEIS, there are a number of developments expected to be completed within the ¼-mile study area by the 2013 build year in the Future Without the Proposed Actions. In addition, development projects expected to be completed within the ½-mile study area are also described in the FEIS, as they are relevant to the No Build sections of other analysis areas.

Within the ¼-mile study area, two utility projects are under construction: the 42,655-square-foot (sf) Consolidated Edison substation at 700 Eleventh Avenue, and a below-grade City water tunnel shaft with at-grade access at 705 Tenth Avenue. There are also a number of residential projects under construction or planned for the study area that would add approximately 3,380 residential units. The largest residential project, Riverplace II, will have 1,349 units at Eleventh Avenue between West 41st and West 42nd Streets. A 1,000-unit residential building with 37,950 sf of retail will be developed at West 43rd Street between Eleventh and Twelfth Avenues.

There are three hotel projects in the ¼-mile study area: 90 hotel rooms are anticipated for 548 West 48th Street; Hotel Vu, with 222 hotel rooms, is under construction at 653 Eleventh Avenue; and a mixed-use project with 250 hotel rooms is expected at Tenth Avenue between West 41st and West 42nd Streets.

As a result of the Hudson Yards Rezoning, development is ongoing in the southern portion of the study area, to create a mixed-use community with new commercial and residential space, and a substantial amount of new open space.



FUTURE CONDITION WITH THE PROPOSED ACTION

In the future condition with the Proposed Action (Build Condition), an increase in residential development is expected to occur in the Clinton neighborhood of Manhattan, with the introduction of approximately 1,350 dwelling units and 630 school seats to the Project Site. Additionally, approximately 17,500 square feet of retail floor area and 204 accessory parking spaces are expected in the future with the Proposed Actions.

C. PROBABLE IMPACTS OF THE PROPOSED ACTIONS

The Proposed Actions have the potential to result in significant adverse impacts associated with traffic. Measures proposed to mitigate these impacts are discussed below. Implementation of provisions required through the LDA between HPD and 44th Street Development LLC would preclude the potential for significant adverse historic resources, hazardous materials, noise, and air quality impacts that could result from the Proposed Actions. In addition, SCA, as an Involved Agency, has committed to specific design and pre-construction considerations (described above) that would preclude the potential for significant adverse historic resources, hazardous materials, noise, air quality, and pedestrian impacts from the new and expanded PS 51 on the Project Site.

LAND USE, ZONING, AND PUBLIC POLICY

Overall, the Proposed Actions would not have any significant adverse impacts on land use, zoning, and public policy. The Proposed Actions would introduce new uses to an underutilized site which would be compatible with and complementary to the mixed-use nature of the surrounding neighborhood. It would map new residential zoning districts consistent with districts found in the surrounding area, and would further several of the City's stated public policies concerning land use, affordable housing, and sustainability. The Proposed Actions would result in beneficial effects associated with replacing the current land use at the Project Site with new residential and retail uses along with a new and expanded school.

LAND USE

The Proposed Actions would change the existing manufacturing zoning designation on the Project Site to a zoning designation that would permit residential and commercial uses. While the Proposed Actions would dramatically alter the land use on the Project Site by permitting its redevelopment with high-density residential and retail uses, these new uses would be compatible with and complementary to surrounding land uses. P.S. 51 would be relocated and expanded as part of the Proposed Actions, but this would not result in a new community facility use on the Project Site because the Project Site is currently occupied by a school. The expanded school would support the growing residential community in Clinton. The new land uses introduced as part of the Proposed Actions would be similar to and compatible with existing development in the area. Therefore, the Proposed Project would not result in a significant adverse impact on land use.

ZONING

The Proposed Project would require zoning map and text amendments and special permits. The site is currently zoned as an M1-5 manufacturing district and is located in an excluded area of the Special



Clinton District. With the Proposed Actions, the zoning would be changed to R8 and R10 residential districts with a C2-5 commercial overlay. The proposed zoning would be consistent with neighborhood trends of residential development at increasing densities, including several projects near West 42nd Street. Although the proposed density would be substantially greater than is currently permitted, higher-density R8 districts (and C2-8, which is an R10 equivalent commercial district) are found in the area surrounding the Project Site. Furthermore, the R8 and R10 districts would permit the development of up to 700, but no less than 600, affordable dwelling units, which would be consistent with the goals of the Special Clinton District. The proposed zoning text amendments would apply only to the Project Site and would not have the potential to affect future zoning actions in the surrounding area. The special permit would establish a General Large-Scale Development, which would allow development to occur in accordance with a project-specific site plan approved by the CPC. Therefore, the Proposed Actions would not result in significant adverse impacts on the surrounding area.

PUBLIC POLICY

The Proposed Actions would be consistent with the public policies affecting the Project Site and surrounding area. The Proposed Actions would rezone the Project Site from a manufacturing district to a residential district to facilitate the development of affordable housing, which is consistent with the objectives of the New Housing Marketplace Plan to target certain underutilized areas for redevelopment.

The Proposed Actions would also be consistent with the housing initiatives of PlaNYC 2030 in that it would pursue transit-oriented development and land use and zoning changes to direct growth toward areas with transit infrastructure, develop underused areas to knit neighborhoods together, deck over a rail line, and expand Inclusionary Housing.

The Project Site is located outside the Clinton Urban Renewal Area, but the Proposed Project would be consistent with the URA objectives, including providing high quality housing (including affordable housing), retail, community facility uses, and maximizing land use. Therefore, the Proposed Actions would not result in significant adverse impacts related to public policy.

SOCIOECONOMIC CONDITIONS

As discussed below, the Proposed Actions would not result in significant adverse impacts associated with the five socioeconomic areas of concern contained in the *CEQR Technical Manual*.

DIRECT RESIDENTIAL DISPLACEMENT

Since the Project Site does not contain any dwelling units, the Proposed Actions would not directly displace a residential population.

DIRECT BUSINESS DISPLACEMENT

The Proposed Actions would not result in significant adverse impacts due to direct business displacement. The Proposed Actions would directly displace two businesses currently located on the Project Site: a public parking lot, with an estimated 10 employees; and a horse stable, with an estimated 10 employees. While the potentially displaced businesses both contribute to the City's economy and therefore have



economic value, they do not have substantial economic value to the City or region as defined by CEQR. Study area businesses and consumers are not dependent upon the potentially displaced businesses for their business or consumer needs, and the potentially displaced businesses do not substantially contribute to neighborhood character in a socioeconomic sense. Parking services are available to residents, visitors, and consumers at other locations within the study area. As discussed in greater detail below, the loss of the horse stable and its 10 employees would not adversely affect neighborhood character, and would not result in the displacement of other area businesses which in turn could alter the character of the neighborhood.

INDIRECT RESIDENTIAL DISPLACEMENT

The Proposed Actions would not result in significant adverse impacts due to indirect residential displacement. By 2013, the Proposed Actions would increase the study area's population by an estimated 2,606 residents, or a 9.7 percent increase over the Future without the Proposed Actions condition.² Approximately half of these residents (between 1,255 and 1,448 residents) would live in the 650 to 750 market-rate units contemplated under the Proposed Actions. The remaining half (1,158 to 1,351 residents) would be living in the 600 to 700 affordable units contemplated under the Proposed Actions. Given the diversity of incomes and unit prices that would be introduced (which includes a substantial amount of affordable housing), the Proposed Actions would not generate a dramatic demographic shift that could substantially affect area rents or the socioeconomic characteristics of the study area population.

INDIRECT BUSINESS AND INSTITUTIONAL DISPLACEMENT

The Proposed Actions would not result in significant adverse impacts due to indirect business or institutional displacement. The Proposed Actions would introduce a combination of residential, neighborhood retail, and community facility uses, none of which would be new economic activities in the study area. The study area has a well-established residential market. Since 2000, there have been approximately 2,703 units built in the study area, and there are plans for an additional 3,380 units by 2013 in the Future Without the Proposed Actions. The overall study area trend toward residential development, and the economic activities associated with residential demand, would occur irrespective of the Proposed Actions.

ADVERSE EFFECTS ON SPECIFIC INDUSTRIES

The Proposed Actions would not result in significant adverse impacts on any specific industry in New York City. The two potentially displaced businesses located on the Project Site represent two different industries, and their employees account for only a small fraction of the total employment within their respective employment sectors. The parking industry, and all industries that rely on parking, would remain viable in the Future with the Proposed Actions. The horse-drawn carriage industry, centered along Central Park South, also would remain viable in the Future with the Proposed Actions. Conservatively assuming that the displaced stable is not relocated, many of the horses could be boarded at other stables in Manhattan. The overall loss of stable capacity may reduce the total number of horse-drawn carriage operators, but not to a level that would jeopardize the viability of the horse-drawn carriage industry in the City as sufficient capacity would continue to exist in the Future with the Proposed Actions. The impact on the horse-drawn carriage industry would not be significant, and would not have an adverse effect on the broader New York City tourism industry.

² Project-generated population estimate is based on the study area's average household size (1.93 persons per household) from the 2000 Census.



COMMUNITY FACILITIES AND SERVICES

As discussed below, the Proposed Actions would not result in significant adverse impacts related to public schools, libraries, health care facilities, publicly-funded daycare services, and fire and police protection services.

PUBLIC SCHOOLS

The Proposed Actions would provide for relocation and expansion of P.S. 51 within the Project Site. The new school facility would be designed to support pre-kindergarten through eighth grade instructional needs, but grade ranges would be confirmed by the DOE closer to the date of occupancy. For the purposes of analysis, it is assumed that the school would have 630 total student seats, consisting of approximately 353 elementary seats and 277 intermediate seats. This reflects an elementary seat increment of 77 seats over the existing capacity of 276 elementary seats. In both the Future without and with the Proposed Actions, elementary schools in the ½-mile study area would be substantially over capacity. The 77 additional elementary seats introduced by the Proposed Project would partially offset the 162 project-generated elementary students, and the one percent increase in the utilization rate of elementary schools in the ½-mile study area or in Community School District (CSD) 2 would not constitute a significant adverse impact as defined by CEQR.

For intermediate schools, the increase in student seats from the Proposed Actions (277 seats) more than offsets the project-generated students (54 intermediate students). Therefore, the Proposed Actions would improve the intermediate school utilization rates of both the study area and CSD 2, and there would not be a significant adverse impact on intermediate schools.

The Proposed Actions would generate fewer than 150 new high school students; therefore, a quantified assessment of high school seats is not required by CEQR.

LIBRARIES

In 2013, as a result of the Proposed Actions, the Columbus Branch Library catchment area population would increase by 2 percent. The increase in population would be below the CEQR analysis threshold of 5 percent that could result in a significant adverse impact. Therefore, the Proposed Actions would not cause a noticeable change in the delivery of library services to the Columbus Branch catchment area.

HEALTH CARE FACILITIES (OUTPATIENT)

The analysis considers the Proposed Actions' impacts on St. Luke's Roosevelt Hospital, the nearest major medical facility. The Proposed Actions could increase the number of emergency room visits by approximately 1 percent. The increase is below the CEQR analysis threshold of 5 percent that could result in a significant adverse impact. Therefore, no significant adverse impacts on area hospitals are anticipated as a result of the Proposed Actions.



PUBLICLY-FUNDED DAY CARE CENTERS

According to analysis methodologies issued by the Mayor's Office of Environmental Coordination in December 2009, a detailed analysis of the Proposed Project's impact on publicly-funded day care facilities should be performed if a project would generate more than 20 children that would be eligible for these services. This threshold is based on the number of low- income and low- to moderate- income units within a proposed project, and the threshold for projects in Manhattan is 169 low- to moderate-income units. Since the Proposed Actions would result in 268 low- to moderate-income units, a detailed analysis was prepared.

The analysis considers the potential impacts of the Proposed Actions on publicly-funded day care facilities within a 2-mile radius of the Project Site. Since children up to the age of 6 are the primary users of these services, the methodology is focused on this age cohort. In Manhattan, a rate of 0.115 children up to age 6 per low- or low-moderate income unit is used to determine the number of daycare-eligible children generated by a proposed action. The Proposed Actions would introduce 31 children under the age of 6 who would be eligible for publicly funded day care. These new children represent 4.8 percent of the existing capacity of day care centers in the study area (640 slots). This does not exceed the CEQR threshold of an increase of more than 5 percent, and, therefore, no significant adverse impacts to publicly-funded day care would occur as a result of the Proposed Actions.

FIRE AND POLICE PROTECTION SERVICES

The Proposed Actions would not directly displace any fire or police protection services, and therefore a significant adverse impact on these services would not occur. The Proposed Actions would remove a 50-space parking lot located on the Project Site that is used for vehicle storage by NYPD's Traffic Enforcement Division. NYPD is working to identify a new location to park these vehicles. As these are considered non-emergency vehicles, their relocation from the Project Site would not adversely affect NYPD operations.

OPEN SPACE

As discussed below, the Proposed Actions would not result in significant adverse impacts to open space.

DIRECT EFFECTS

The Proposed Actions would not result in the physical loss of publicly accessible open space. Furthermore, based on the shadows, air quality, and noise analyses of the EIS, the Proposed Actions would not result in any other direct effects on open spaces within the study area.

INDIRECT EFFECTS

The active and passive open space ratios in the Future with the Proposed Actions decline by 5.9 percent and 5 percent, respectively, and would be below DCP's recommended ratios for residents and workers. However, the *CEQR Technical Manual* recognizes that DCP's goals are not feasible for many areas of the City, and they are not considered impact thresholds. In addition, there are a number of active open space resources located within close proximity of the study area that are well utilized by study area residents



that are not accounted for in the quantitative analysis, most notably Central Park and larger portions of Hudson River Park that extend well beyond the study area. Finally, since the total open space ratio would decline by less than 5 percent, the analysis concludes that Proposed Actions would not result in significant adverse impacts on open space.

SHADOWS

Incremental shadows from the Proposed Project would fall on portions of Hudson River Park and the adjacent Route 9A Bikeway early in the morning during the fall, winter, and early spring, and on a small area of the Hudson River in the winter. The new shadows would be limited in extent and duration and would not result in significant adverse impacts to these resources.

HISTORIC RESOURCES

As discussed below, the Proposed Actions would not result in significant adverse impacts to historic resources.

ARCHAEOLOGICAL RESOURCES

The Proposed Actions would not result in significant adverse impacts to archaeological resources. Portions of the Project Site, which would be disturbed for construction of the Proposed Project, were determined sensitive for potential historic-period archaeological resources in a Phase 1A Documentary Study. These include the former rear yard areas of historic Lots 8-11, 54-57, 61A, 61, 61-½, 63, and 64 (concentrated in the western portion of the Project Site) and in the original P.S. 51 building's side yard areas. The Phase 1A study recommended that Phase 1B archaeological testing be undertaken to determine to presence or absence of such resources. In a letter dated April 9, 2009, the New York City Landmarks Preservation Commission (LPC) concurred with the Phase 1A conclusions and recommendations. The New York State Office of Parks, Recreation and Historic Preservation (OPRHP) also concurred with the Phase 1A recommendations for Phase 1B archaeological testing, as stated in a letter dated May 7, 2009.

Prior to testing, a testing protocol for the original P.S. 51 building's side yard areas was prepared on August 12, 2009 in consultation with LPC and OPRHP. Phase 1B archaeological testing was subsequently undertaken for these areas and was summarized in "Phase 1B Archaeological Testing Report PS 51/44th Street and Eleventh Ave, B 1073, L 1 (Part) Manhattan, New York," dated September 2009. The report was submitted to LPC and OPRHP. LPC concurred with the report's findings in a letter dated November 6, 2009 and has no further archaeological concerns.

Similarly, prior to testing of the former rear yard areas of historic Lots 8-11, 54-57, 61A, 61, 61-½, 63, and 64 (which would be occupied with Buildings A and B), a testing protocol would be prepared in consultation with LPC and OPRHP and Phase 1B archaeological testing would be undertaken in accordance with this protocol in the archaeologically sensitive areas. Based upon the results of the Phase 1B investigation, LPC or OPRHP may require measures to salvage potential archaeological resources. Therefore, with the above testing and compliance measures, no significant adverse impacts to archaeological resources are expected to occur with the Proposed Actions.



ARCHITECTURAL RESOURCES

To avoid potential inadvertent adverse impacts to P.S. 51 and the nearby former Houbigant Building from construction-related work, a Construction Protection Plan (CPP) would be developed in consultation with OPRHP and LPC prior to construction that would follow the requirements established in the DOB's *Technical Policies and Procedures Notice (TPPN) #10/88*, concerning procedures for the avoidance of damage to adjacent historic structures from nearby construction. The CPP would also follow the guidelines set forth in section 523 of the *CEQR Technical Manual*, including conformance with LPC's *New York City Landmarks Preservation Commission Guidelines for Construction Adjacent to a Historic Landmark* and *Protection Programs for Landmark Buildings*.

The conversion of P.S. 51 to residential use has not yet been designed, and could result in significant adverse impacts to this historic resource if the adaptive reuse would require the removal of significant historic or architectural features. Since the Proposed Project involves actions by a state agency, the proposed alterations to P.S. 51, which is eligible for listing on the S/NR, would require review by OPRHP. The project sponsor, or its successors or assigns would, therefore, consult with OPRHP regarding the proposed changes to P.S. 51 as design plans proceed.

The process by which this consultation would be undertaken will be established in a Letter of Resolution (LOR) that includes the measures that would be undertaken to consult with OPRHP to minimize or mitigate the potential for significant adverse impacts by the Proposed Actions. These measures include the following stipulations:

- Prior to the start of construction, Phase 1B archaeological testing would be undertaken in the rear yards of historic Lots 8-11, 54-57, 61A, 61, 61-½, 63, and 64 to further assess the site's potential to yield archaeological resources. A sensitivity map has been prepared to indicate those areas for which further investigation is recommended. In advance of testing, an archaeological testing protocol would be prepared in consultation with LPC and OPRHP.
- Because the Proposed Project involves state actions and the existing P.S. 51 is S/NR-eligible, 44th Street Development LLC, the project sponsor, or its successors or assigns would consult with OPRHP regarding proposed changes to P.S. 51 as design plans for the building's conversion to residential use proceed. The LOR will specify the points in the design process at which consultation with OPRHP would occur.
- 44th Street Development LLC and SCA would develop and implement CPP(s) for P.S. 51 and the former Houbigant Building in consultation with OPRHP and LPC prior to construction. The CPP(s) would follow the requirements established in the DOB's *TPPN #10/88*, concerning procedures for the avoidance of damage to adjacent historic structures from nearby construction. It would also follow the guidelines set forth in Section 523 of the *CEQR Technical Manual*, including conformance with LPC's *Guidelines for Construction Adjacent to a Historic Landmark* and *Protection Programs for Landmark Buildings*.

Parties to the LOR include HPD, 44th Street Development LLC, the SCA, and OPRHP. The LOR would be executed prior to the conveyance of the residential portion of the Project Site to West 44th Street Development LLC and prior to all construction activities (including the construction of the new school). The LOR is legally binding and a property covenant would be recorded to require the measures once the residential portion of the land is conveyed to West 44th Development LLC. A draft of the LOR is



currently under review at the Law Department. As discussed above, the LOR would be executed prior to the start of construction.

The LDA between HPD and 44th Street Development LLC would also include provisions related to historic resources as part of the Proposed Project, including future coordination with OPRHP and LPC. With the aforementioned measures incorporated in the Proposed Project, including the LOR, significant adverse impacts would not occur.

URBAN DESIGN/VISUAL RESOURCES

The Proposed Actions would not result in any significant adverse impacts to the urban design and visual resources. The Proposed Project would result in beneficial effects to urban design as it would replace a largely underutilized site with new residential buildings along with a new and expanded school. The analysis below summarizes the urban design conditions and visual resources of both the Project Site and secondary study area by 2013. As described below, the Proposed Project would alter the current urban design of the Project Site in relation to three of the five urban design elements assessed under CEQR: Building bulk, use and type, building arrangement, and streetscape elements. No changes to block form and street pattern, street hierarchy, and natural features would occur on the Project Site as a result of the Proposed Project.

BUILDING BULK, USE, AND TYPE

Although the new residential buildings, the new school building, and the conversion of P.S. 51 to residential use would change the uses on the Project Site, the Proposed Project would be consistent with the existing residential and institutional uses in the study area. The proposed buildings would range in height from a new five-story school building on West 44th Street to a new residential building on Eleventh Avenue with a seven-story base and taller 28-, 30-, and 31-story components oriented closest to the building's Eleventh Avenue street frontage. The other three new residential buildings would have 7- and 9-story bases with overall heights of 14 stories. The new residential buildings would be of a greater bulk and would have larger footprints than the existing warehouse, stable, and school building on the Project Site. However, the new residential buildings would be similar in bulk, massing, and materials to the variety of existing buildings in the study area, including larger buildings like the mid-block 11-story former warehouse immediately north of the Project Site at 539 West 45th Street and the 43-story residential building at the southeast corner of West 43rd Street and Eleventh Avenue.

The new residential building proposed along Eleventh Avenue would be oriented with its tallest components along Eleventh Avenue, a wide primary thoroughfare through the west side of Manhattan. Several tall residential buildings north and south of the Project Site in the study area, including a residential building with 43 stories, are already located along Eleventh Avenue. The renovation and conversion of the existing P.S. 51 building into residential use would not affect the bulk or use of buildings in the study area. The new buildings would be faced in brick and would have both punched rectangular windows and glass curtain wall components. The new buildings would contribute to the variety of building bulk, height, massing, and materials that already characterize the study area and would not adversely affect building uses, bulk, or type in the study area.

BUILDING ARRANGEMENT

The arrangement of the proposed buildings on the Project Site would create uninterrupted frontages on the Project Site's West 44th Street and West 45th Street elevations and on Eleventh Avenue. The lower



height bases of each building would be built to the sidewalk and would be similar in height to some of the shorter buildings in the study area. Most of the proposed buildings on the Project Site would be arranged parallel to West 44th and West 45th Streets, however a portion of through-lot Building B would be arranged perpendicular to these streets. The Proposed Project would not affect building arrangements in the study area.

BLOCK FORM AND STREET PATTERN

The Proposed Project would be constructed on an existing block and would not alter the street patterns or block shapes in the study area. Therefore, there would be no significant adverse impacts to these urban design features as a result of the Proposed Project.

STREETSCAPE ELEMENTS

The Proposed Project would change the streetscape of the study area immediately surrounding the Project Site. Like the existing P.S. 51, the five proposed buildings would be built to the sidewalk. The new buildings and the renovated P.S. 51 would contribute to an enlivened streetscape in the study area near the Project Site as they would add to the study area new, active ground-floor uses with increased pedestrian activity. The new buildings would create continuous streetwalls along West 44th and West 45th Streets and Eleventh Avenues where none currently exist on the Project Site. The new streetwall would be consistent with continuous streetwalls elsewhere in the study area.

The new residential and school buildings would be designed to be compatible with other nearby buildings by using cladding materials, windows, and façade treatments that would complement the existing masonry buildings in the study area. The seven- and nine-story bases of the new buildings would visually minimize the perceived height of the buildings from the study area closest to the new buildings. The setbacks would also relate to the lower heights of nearby buildings. The taller components of the new residential buildings would be oriented along Eleventh Avenue where other tall buildings are visible in views north and south on Eleventh Avenue in the study area and visible farther away. The study area is already characterized by buildings of varying heights, faced in different cladding materials, and dating from different construction periods. Therefore, there would be no significant adverse impacts to the streetscape of the study area as a result of the Proposed Project.

STREET HIERARCHY

The Proposed Project would not alter any streets in the study area and, therefore would not affect the study area's street hierarchy.

NATURAL FEATURES

The Proposed Project would not affect natural features in the study area. Therefore, there would be no significant adverse impacts to natural features as a result of the Proposed Project.

VISUAL RESOURCES

Views in the study area closest to the Project Site would be somewhat altered by the Proposed Project, as the new buildings would replace the one-story vacant warehouse, two-story stable, parking lot, and Amtrak rail cut with four new residential buildings and a new school building. The new residential



buildings would be taller than the existing buildings on the Project Site and the new school building would be of a height similar to the existing school on the Project Site. The new buildings, including the new school building and the renovated existing P.S. 51, would alter some views in the study area closest to the Project Site.

The Proposed Project would not obstruct any existing views north and south on Tenth Avenue, views south on Eleventh Avenue, and views on the east-west streets in the study area. Views south on Eleventh Avenue would be altered as the Proposed Project would obstruct some existing views to the skyscrapers of Times Square, a visual resource, located outside the study area to the southeast. Views west from West 45th Street and Eleventh Avenue to the USS Intrepid, a visual and historic resource, would be somewhat altered by the presence of the new buildings, however, these views would not be obstructed. Views to the aircraft carrier would also remain available from more distant vantage points on West 45th Street east of the Project Site and other vantage points outside the study area to the west. The context of the other historic resources in the study area, described above, that are visible in views near the Project Site would also be somewhat altered by the new buildings on the Project Site. However, these changes would not be adverse as these historic buildings are already located among a variety of older and newer buildings of varying heights. The Proposed Project would not affect views to any natural resources. Further, the Proposed Project would not obstruct any views west on the east-west streets in the study area that include the western bank of the Hudson River in the distance. Therefore, the Proposed Project would not cause a significant adverse affect on visual resources in the study area.

In summary, the Proposed Actions would not result in significant adverse impacts to urban design and visual resources. On the contrary, it would result in substantial improvement to urban design conditions by providing new residential and mixed-use development with ground floor retail and a new and expanded public school to the Clinton neighborhood of Manhattan.

NEIGHBORHOOD CHARACTER

No significant adverse impacts on neighborhood character would result in the future with the Proposed Actions. The Proposed Actions would not directly displace any land uses or result in differing land uses so as to adversely affect surrounding land use. The proposed buildings would be primarily residential, consistent with neighborhood redevelopment trends, and would be consistent in bulk and scale to nearby developments. The design of the Proposed Project includes the placement of the tallest portion of the Proposed Project along a wide avenue (Eleventh Avenue) and the use of streetwall heights and setbacks to preserve the mid-rise “feel” along the streetscapes adjacent to the Project Site. The renovation and conversion of P.S. 51 to residential use would not result in a significant adverse impact to this historic resource. The Proposed Actions would not change the socioeconomic characteristics of the study area and would not result in a significant increase in neighborhood traffic or noise.

The Proposed Project would result in beneficial effects to neighborhood character by making land use on the Project Site consistent with residential and mixed residential/commercial uses located in areas to the north and east of the Project Site in the Clinton neighborhood. As discussed above in “Land Use, Zoning, and Public Policy” and “Urban Design/Visual Resources,” the Proposed Actions would result in beneficial effects to land use and urban design conditions by replacing an underutilized site with new development that respects the prevailing urban design conditions and is consistent with land use characteristics of the surrounding neighborhood.



NATURAL RESOURCES

The Project Site is fully developed and is not viable habitat for species of concern. Incremental shadows from the Proposed Project would fall across a small area of the Hudson River next to the shore for only about 45 minutes or less in winter. This limited extent and duration of additional shadow would not result in a significant adverse impact to the biota of the river. On the other analysis days (March/September; May/August, and June), the new buildings would not result in an incremental increase in shadows on the Hudson River. Therefore, the Proposed Actions would not result in significant adverse impacts on natural resources.

HAZARDOUS MATERIALS

A Phase I Environmental Site Assessment (ESA) was prepared for the Project Site in November 2008. The Phase I ESA identified recognized environmental conditions (RECs) on the Project Site including potential underground and above-ground storage tanks, asbestos containing materials, lead-based paint, and urban fill of unknown origin.

To characterize subsurface conditions prior to construction, a Subsurface (Phase II) Investigation was undertaken on the residential portions of the Project Site, including the collection and laboratory analysis of soil and groundwater samples. Low levels of contamination were found in the western portion of the Project Site nearby a potential tank location. Any tanks encountered would be uncovered, investigated and removed (along with any associated contaminated soil) in accordance with applicable regulatory requirements.

The results of the Phase II testing for the residential portion of the Project Site would be reviewed and approved to the satisfaction of the New York City Department of Environmental Protection (DEP). Subsequent testing (if any), remedial measures and construction safety measures would also be reviewed and approved by DEP. If warranted, elements of the Remedial Action Plan (RAP) would include detailed soil management plans outlining the excavation and removal of contaminated soil along with the importing of clean fill, and details of the installation of a vapor barrier or sub-slab depressurization system (if required). Elements of the Construction Health and Safety Plan (CHASP) would include general site safety rules, including the appropriate levels of protection that should be followed by on-site workers, industrial hygiene monitoring, material safety data sheets, dust suppression measures, air monitoring procedures and response, and identification of the nearest medical facility to the site. Following the conclusion of any remediation activities on the residential portions of the Project Site, a Professional Engineer (P.E.) certified Closure Report documenting that all remedial requirements have been properly implemented would be submitted to HPD and DEP for review and acceptance. The measures to avoid the potential impacts from hazardous materials during and after construction on the residential portions of the Project Site (including the existing P.S. 51 site) would be incorporated into the LDA between HPD and 44th Street Development LLC.

The SCA conducted a Phase II Environmental Site Investigation to confirm subsurface conditions on the portion of the Project Site to be used for construction of the new P.S. 51 school building. Based on the findings of the Phase II Environmental Site Investigation, the SCA would develop management plans (e.g., soil management plan, groundwater management plan, CHASP, etc.) to address any hazardous materials that may be encountered during construction of the new school. The management plans prepared by SCA would be separate from the remainder of the Proposed Project and would include

comparable measures to protect the health and safety of construction workers, school staff and students, and the public in general during construction and at the time of occupancy.



The measures identified above for both the project sponsor, 44th Street Development LLC, and the SCA would be included as part of the Proposed project to preclude the potential for significant adverse impacts due to hazardous materials on the Project Site.

INFRASTRUCTURE

As discussed below, the Proposed Actions would not result in significant adverse impacts related to infrastructure.

WATER SUPPLY

In the Future with the Proposed Actions, total water usage on the Project Site would be an estimated 521,350 gpd, resulting in a net increase of approximately 506,074 gallons per day (gpd) over anticipated water usage in the Future without the Proposed Actions. This total demand would be an insignificant portion of New York City's average daily demand of 1.2 billion gpd and would not have a significant adverse impact on the City's ability to adequately deliver water to Manhattan or the rest of New York City.

SANITARY SEWAGE

Sanitary sewage flows in the Future with the Proposed Actions at the Project Site would be approximately 311,481 gpd, a net increase of approximately 302,993 gpd from flows projected in the Future without the Proposed Actions. This increase would not result in a significant adverse impact to the North River Water Pollution Control Plant (WPCP) nor cause it to exceed its design capacity or SPDES permit flow limit. Thus, the North River WPCP would continue to adequately treat wastewater effluent. It is noted that adding the growth from the Proposed Actions to the projected flows is conservative, since the DEP flow projections already take into account population and employment growth within the North River WPCP service area.

STORMWATER

The Proposed Actions would result in an overall decrease in pervious area on the Project Site. Based on New York City Department of Environmental Protection guidance, stormwater runoff from the Project Site would increase by 5 percent (from a coefficient of 0.88 in the existing condition to a coefficient of 0.93 in the build condition), assuming no on-site retention. The Proposed Project would also result in an increase in sanitary sewer disposal. However, the proposed residential development on the Project Site would comply with stormwater retention requirements of the New York City Building Code, and it is anticipated that these measures would result in minimal or no increase in stormwater runoff as compared to existing conditions. The Proposed Actions would not result in any significant adverse impacts to the combined sewer system, conveyance systems (i.e. regulators, outfalls) or the City's wastewater treatment services.



SOLID WASTE

The Proposed Actions would not result in any significant adverse impacts on solid waste and sanitation services. While implementation of the Proposed Actions would generate 60,617 pounds per week of solid waste, the sanitation systems serving the Project Site would have adequate capacity to meet the projected increases in solid waste generation. The New York City Department of Sanitation (DSNY) would provide solid waste and sanitation services for the proposed residential units and school. Private carters provide solid waste and sanitation services to the proposed retail use. The Proposed Actions would increase the volume of solid waste and recyclables but would not put a substantial burden on New York City's public and private solid waste management services.

ENERGY

It is estimated that the Project Site would use approximately 165,106 million BTUs (48,343 megawatt hours) of energy annually in the future with the Proposed Actions, an additional increase of approximately 162,819 million BTUs when compared to conditions in the Future without the Proposed Actions. This new demand would represent less than 1 percent of the City's forecasted peak summer load of 35,651 MW in 2013, and an infinitesimal amount of the City's forecasted annual energy requirements for 2013, and therefore is not expected to be a significant impact on energy systems.

The Proposed Actions would create an increased demand on energy systems including electricity and gas. However, relative to the capacity of these systems and the current levels of service within New York City, these increases in demand are minor. Electrical and gas connections are readily available in the local streets. Any new development under the Proposed Actions would be required to comply with the New York State Conservation Construction Code. For these reasons, the Proposed Actions are not expected to adversely impact energy systems.

TRAFFIC AND PARKING

The traffic and parking analysis includes eight signalized intersections along Tenth and Eleventh Avenues:

- Eleventh Avenue at West 42nd, West 43rd, West 44th, and West 45th Streets;
- Tenth Avenue at West 42nd, West 43rd, West 44th, and West 45th Streets.

Three weekday peak hours (AM, midday, and PM) were analyzed to determine whether the Proposed Actions would cause any significant adverse traffic impacts at these intersection locations. The respective peak hours used for analysis are 8 AM to 9 AM, 12 PM to 1 PM, and 5 PM to 6 PM. These peak hours of existing traffic correspond with the peak hours of project-generated trips, and therefore have been selected as the analysis periods for the Proposed Actions.

The Proposed Actions would result in significant adverse traffic impacts at four intersections (at the Tenth Avenue intersections with West 42nd and West 45th Streets, and at the Eleventh Avenue intersections with West 44th and West 45th Streets) during the AM, midday and PM peak hours. There would be no significant adverse parking impacts.



TRIP GENERATION

Travel demand forecasts for different uses estimate person trips by transportation modes and vehicle trips during typical weekday peak hours: 8 AM to 9 AM, 12 PM to 1 PM and 5 PM to 6 PM. **Table 2** presents the transportation planning assumptions used to estimate the trips generated by the Proposed Project.

Overall, including balanced taxi trips, the Proposed Project would yield net increments of 1,405, 1,477, and 1,426 person trips, and 203, 149, and 163 vehicle trips during the AM, midday, and PM peak hours, respectively.

TRIP GENERATION - RESIDENTIAL USE

The daily rate of 8.075 trips per dwelling unit (2001 *CEQR Technical Manual*) was used to estimate the total trips generated from the Proposed Actions' residential components. Modal split and vehicle occupancy rates from the *250 East 57th Street Redevelopment FEIS (2008)* were used. These rates yield 992, 510, and 1,166 person trips, and 58, 32, and 57 vehicle trips (autos and deliveries) during the AM, midday, and PM peak hours, respectively (see **Tables 3 and 4**).

TRIP GENERATION - GROUND-FLOOR RETAIL USE

Travel demand assumptions for the retail were obtained from the 2001 *CEQR Technical Manual* and from the *No. 7 Subway Extension – Hudson Yards Rezoning and Development Program FGEIS (2004)*. A trip generation rate of 205 person trips per 1,000 square feet was used with a 25 percent linked trip rate, resulting in 26, 580, and 260 person trips, and 0, 10, and 4 vehicle (auto and delivery) trips during the AM, midday, and PM peak hours, respectively. Summaries of these trip generation estimates are shown in **Tables 3 and 4**.

Table 2
Weekday Trip Generation Factors

| Rates | Residential | | | PS/IS - Students | | | PS/IS - Faculty | | | Local Retail | | |
|-----------------------|-------------------------|--------------------|--------------------|-----------------------------|--------------------|--------------------|------------------------------|--------------------|--------------------|-------------------------------|--------------------|--------------------|
| Person Trips | | | | | | | | | | | | |
| Daily Trip Rate | 8.075 / DU ¹ | | | 2 / Seat ² | | | 2.0 / Staff ² | | | 205.0 / 1,000 SF ¹ | | |
| Link Trip Credit | - | | | - | | | - | | | 25% ¹ | | |
| Modal Split | AM ² | MD ² | PM ² | AM ² | MD ² | PM ² | AM ² | MD ² | PM ² | AM ⁵ | MD ⁵ | PM ⁵ |
| Auto | 5.2% | 5.2% | 5.2% | 6.2% | 6.2% | 6.2% | 5.0% | 5.0% | 5.0% | 2.0% | 2.0% | 2.0% |
| Taxi | 8.3% | 8.3% | 8.3% | 1.7% | 1.7% | 1.7% | 5.0% | 5.0% | 5.0% | 3.0% | 3.0% | 3.0% |
| Subway | 28.0% | 28.0% | 28.0% | 0.0% | 0.0% | 0.0% | 50.0% | 50.0% | 50.0% | 6.0% | 6.0% | 6.0% |
| Bus/School Bus | 16.1% | 16.1% | 16.1% | 3.9% | 3.9% | 3.9% | 25.0% | 25.0% | 25.0% | 6.0% | 6.0% | 6.0% |
| Walk Only | 42.4% | 42.4% | 42.4% | 88.2% | 88.2% | 88.2% | 15.0% | 15.0% | 15.0% | 83.0% | 83.0% | 83.0% |
| Vehicle Occ. | AM | MD | PM | AM | MD | PM | AM | MD | PM | AM | MD | PM |
| Auto | 1.08 ³ | 1.08 ³ | 1.08 ³ | 1.72 ² | 1.72 ² | 1.72 ² | 1.20 ² | 1.20 ² | 1.20 ² | 1.65 ⁵ | 1.65 ⁵ | 1.65 ⁵ |
| Taxi | 1.40 ² | 1.40 ² | 1.40 ² | 1.22 ² | 1.22 ² | 1.22 ² | 1.40 ² | 1.40 ² | 1.40 ² | 1.40 ⁵ | 1.40 ⁵ | 1.40 ⁵ |
| Temporal | AM | MD | PM | AM | MD | PM | AM | MD | PM | AM | MD | PM |
| Distribution | 9.1% ¹ | 4.7% ¹ | 10.7% ¹ | 50.0% ² | 50.0% ² | 0.0% ² | 50.0% ² | 50.0% ² | 0.0% ² | 1.0% ¹ | 21.6% ¹ | 9.6% ¹ |
| In | 15.0% ² | 50.0% ² | 70.0% ² | 100% ² | 0.0% ² | 50.0% ² | 100% ² | 0.0% ² | 50.0% ² | 50.0% ⁵ | 50.0% ⁵ | 50.0% ⁵ |
| Out | 85.0% | 50.0% | 30.0% | 0.0% | 100.0% | 50.0% | 0.0% | 100% | 50.0% | 50.0% | 50.0% | 50.0% |
| Delivery Trips | | | | | | | | | | | | |
| Daily Trip Rate | 0.06 / DU ⁴ | | | 0.0 / 1,000 SF ² | | | 0.70 / 1,000 SF ⁷ | | | 0.70 / 1,000 SF ⁵ | | |
| Temporal | AM | MD | PM | AM | MD | PM | AM | MD | PM | AM | MD | PM |
| Distribution | 12.2% ⁴ | 8.7% ⁴ | 1.0% ⁴ | 0.0% ² | 0.0% ² | 0.0% ² | 9.6% ³ | 11.0% ³ | 1.0% ³ | 7.7% ⁵ | 11.0% ⁵ | 1.0% ⁵ |
| In | 50% | 50% | 50% | 50% | 50% | 50% | 50% | 50% | 50% | 50% | 50% | 50% |
| Out | 50% | 50% | 50% | 50% | 50% | 50% | 50% | 50% | 50% | 50% | 50% | 50% |

Sources: (1) New York City Mayor's Office of Environmental Coordination, *City Environmental Quality Review Technical Manual (2001)*
 (2) *250 East 57th Street Redevelopment FEIS (2008)* (3) U.S. Census 2000
 (4) *Coliseum Redevelopment Project Final Supplemental Environmental Impact Statement (1997)*
 (5) *No. 7 Subway Extension – Hudson Yards Rezoning and Development Program FGEIS (2004)*



**Table 3
 Proposed Project Person Trips by Mode**

| Use | Auto | | Taxi | | Subway | | Bus/School Bus | | Walk Only | | Total | | |
|---------------------------------|-----------|-----------|-----------|-----------|------------|------------|----------------|------------|------------|------------|------------|------------|--------------|
| | In | Out | In | Out | In | Out | In | Out | In | Out | In | Out | Total |
| WEEKDAY AM PEAK HOUR | | | | | | | | | | | | | |
| Residential | 8 | 44 | 12 | 70 | 42 | 236 | 24 | 136 | 63 | 357 | 149 | 843 | 992 |
| School – Students | 22 | 0 | 6 | 0 | 0 | 0 | 14 | 0 | 312 | 0 | 354 | 0 | 354 |
| School – Teachers | 2 | 0 | 2 | 0 | 16 | 0 | 8 | 0 | 5 | 0 | 33 | 0 | 33 |
| Local Retail | 0 | 0 | 0 | 0 | 1 | 1 | 1 | 1 | 11 | 11 | 13 | 13 | 26 |
| Total | 32 | 44 | 20 | 70 | 59 | 237 | 39 | 137 | 391 | 368 | 549 | 856 | 1,405 |
| WEEKDAY MIDDAY PEAK HOUR | | | | | | | | | | | | | |
| Residential | 13 | 13 | 21 | 21 | 72 | 72 | 41 | 41 | 108 | 108 | 255 | 255 | 510 |
| School – Students | 0 | 22 | 0 | 6 | 0 | 0 | 0 | 14 | 0 | 312 | 0 | 354 | 354 |
| School – Teachers | 0 | 2 | 0 | 2 | 0 | 16 | 0 | 8 | 0 | 5 | 0 | 33 | 33 |
| Local Retail | 6 | 6 | 9 | 9 | 17 | 17 | 17 | 17 | 241 | 241 | 290 | 290 | 580 |
| Total | 19 | 43 | 30 | 38 | 89 | 105 | 58 | 72 | 349 | 666 | 545 | 932 | 1,477 |
| WEEKDAY PM PEAK HOUR | | | | | | | | | | | | | |
| Residential | 43 | 18 | 67 | 29 | 229 | 98 | 132 | 56 | 346 | 148 | 817 | 349 | 1,166 |
| School – Students | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| School – Teachers | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Local Retail | 3 | 3 | 4 | 4 | 8 | 8 | 8 | 8 | 107 | 107 | 130 | 130 | 260 |
| Total | 46 | 21 | 71 | 33 | 237 | 106 | 140 | 64 | 453 | 255 | 947 | 479 | 1,426 |

Note: Student Auto Trips are Auto Drop-off/Pick-up trips and Student bus trips are school bus trips.

**Table 4
 Proposed Project Vehicle Trips by Type**

| Use | Auto | | Taxi | | Delivery/School Bus | | Total | | |
|---------------------------------|-----------|-----------|-----------|-----------|---------------------|----------|-----------|------------|------------|
| | In | Out | In | Out | In | Out | In | Out | Total |
| WEEKDAY AM PEAK HOUR | | | | | | | | | |
| Residential | 7 | 41 | | | 5 | 5 | 12 | 46 | 58 |
| School – Students | 13 | 13 | | | 1 | 1 | 14 | 14 | 28 |
| School – Teachers | 1 | 0 | | | 1 | 1 | 2 | 1 | 3 |
| Local Retail | 0 | 0 | | | 0 | 0 | 0 | 0 | 0 |
| Total | 21 | 54 | 57 | 57 | 7 | 7 | 85 | 118 | 203 |
| WEEKDAY MIDDAY PEAK HOUR | | | | | | | | | |
| Residential | 12 | 12 | | | 4 | 4 | 16 | 16 | 32 |
| School – Students | 13 | 13 | | | 1 | 1 | 14 | 14 | 28 |
| School – Teachers | 0 | 1 | | | 1 | 1 | 1 | 2 | 3 |
| Local Retail | 4 | 4 | | | 1 | 1 | 5 | 5 | 10 |
| Total | 29 | 30 | 38 | 38 | 7 | 7 | 74 | 75 | 149 |
| WEEKDAY PM PEAK HOUR | | | | | | | | | |
| Residential | 40 | 17 | | | 0 | 0 | 40 | 17 | 57 |
| School – Students | 0 | 0 | | | 0 | 0 | 0 | 0 | 0 |
| School – Teachers | 0 | 0 | | | 0 | 0 | 0 | 0 | 0 |
| Local Retail | 2 | 2 | | | 0 | 0 | 2 | 2 | 4 |
| Total | 42 | 19 | 51 | 51 | 0 | 0 | 93 | 70 | 163 |

Note: 1. This table presents inbound and outbound taxi trips for the project as a whole rather than by a particular land use. Taxi trips are not assigned to a particular land use because taxi trips are assumed to be shared among all the land uses in the Project Site. Taxi trips are balanced to account for some arriving empty and leaving full, some arriving full and leaving empty, and some arriving and leaving full.
 2. School student auto trips are drop-off/pick-up trips.



TRIP GENERATION - SCHOOL USE

The Project Site is currently occupied by a 238-seat Primary School serving grades kindergarten through 5. In the future with the Proposed Actions a new, expanded school building would be built on the site and would serve a total of 630 students in grades kindergarten through 8th grade. The resulting increment of 354 students was analyzed for trip generation purposes. The additional 354 elementary school students were estimated to require an additional 32 teachers and administrative staff, using an established student to faculty ratio of 11 to 1. The trip generation estimates were developed based on rates presented in the *250 East 57th Street Redevelopment FEIS (2008)*.

Auto trips associated with the school were divided into two categories. Travel by teachers and administrative staff was assumed to be similar to other journey-to-work type trips, with vehicles assigned to the on-site parking garage. Students who travel via auto, however, were assumed to be dropped off or picked up. These trips have similar characteristics as some taxi trips that arrive full and depart empty, or vice versa, in that each one-way trip would be considered two auto trips. As shown in **Tables 3 and 4**, the faculty/staff were estimated to generate 33, 33, and 0 person trips, and 3, 3, and 0 vehicle trips during the AM, midday, and PM peak hours, respectively. The 354 students would yield 354, 354, and 0 person trips, and 38, 38, and 0 vehicle trips during the same time periods, respectively.

The vehicle trips described above do not include taxi trips as inbound and outbound taxi trips were calculated for the project as a whole rather than by a particular land use. Taxi trips are not assigned to a particular land use because taxi trips are assumed to be shared among all the land uses in the Project Site. Taxi trips are balanced to account for some arriving empty and leaving full, some arriving full and leaving empty, and some arriving and leaving full.

TRIP DISTRIBUTION

Origin and destination patterns for project-generated vehicular trips were developed based on journey-to-work travel patterns from the *2000 U.S. Census*. Based on this information, approximately 40 percent of the projected trips were distributed to points east within Manhattan and towards Queens and Long Island, 32 percent to points north of the Project Site within Manhattan and in northern New York State, New Jersey and the Bronx. The remaining 28 percent was distributed to points south of the Project Site including the southern tip of Manhattan, southern New Jersey and Brooklyn. This travel pattern was used to distribute project-generated vehicular trips throughout the study area street network.

VEHICLE TRIP ASSIGNMENT

Based on the results of the trip distribution, auto trips were assigned to the study area intersections based on logical routes of travel. These associated vehicle trips were assigned to the on-site parking garage. This garage, with a capacity of 204 spaces, would adequately accommodate the entire project-generated demand in the AM, midday, and PM peak hours and would accommodate most of the project-generated demand in the overnight.

Taxi and school drop-off and pick-up trips were assigned to the site's block faces, and delivery vehicles were routed to and from the Project Site via New York City Department of Transportation (DOT) designated truck routes. It should be noted that the trips associated with the existing parking lot on the Project Site were not



removed from the traffic study area street network or reassigned to other locations for a more conservative impact analysis.

The existing school pick-ups and drop-offs are mainly facilitated on West 45th Street at its existing entrance. The proposed project would relocate this entrance to West 44th Street. There are currently No Standing 7 AM to 4 PM school day regulations on both blocks in front of the school (for approximately 85 feet on West 45th Street and 120 feet on West 44th Street). These regulations would continue to facilitate future pick-up and drop off activities on the two streets.

TRAFFIC VOLUMES AND LEVEL OF SERVICE

Within the study area, peak hour traffic volumes would experience increases along the primary access and egress routes to the Project Site, with the Eleventh Avenue intersections at West 44th and West 45th Streets incurring the highest incremental increases in traffic volume.

Capacity and level-of-service (LOS) analyses were performed for the study area intersections using the future build peak hour traffic volumes. **Table 5** on the following page compares the No Build and Build service levels for these intersections.



Table 5
2013 No Build and 2013 Build Conditions LOS Summary

| Int / App | AM Peak Hour | | | | | | | | Midday Peak Hour | | | | | | | | PM Peak Hour | | | | | | | | | | |
|---|---------------|------|-------------|-----|------------|------|-------------|-----|------------------|-----|-------------|-------|------------|-----|-------------|-------|---------------|-----|-------------|------|------------|-----|-------------|------|-------|---|---|
| | 2013 No Build | | | | 2013 Build | | | | 2013 No Build | | | | 2013 Build | | | | 2013 No Build | | | | 2013 Build | | | | | | |
| | Ln | V/C | Delay (SPV) | LOS | Ln | V/C | Delay (SPV) | LOS | Ln | V/C | Delay (SPV) | LOS | Ln | V/C | Delay (SPV) | LOS | Ln | V/C | Delay (SPV) | LOS | Ln | V/C | Delay (SPV) | LOS | | | |
| Tenth Avenue and West 42nd Street | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| EB | LT | 1.66 | 341.2 | F | LT | 1.70 | 359.7 | F | + | LT | 2.06 | 529.5 | F | LT | 2.14 | 562.7 | F | + | LT | 1.79 | 400.6 | F | LT | 1.82 | 415.1 | F | + |
| WB | T | 0.41 | 26.0 | C | T | 0.41 | 26.0 | C | | TR | 1.23 | 145.8 | F | TR | 1.24 | 151.2 | F | + | T | 0.53 | 27.7 | C | T | 0.53 | 27.7 | C | |
| | R | 1.16 | 129.4 | F | R | 1.18 | 137.2 | F | + | | | | | | | | | | R | 0.60 | 35.1 | D | R | 0.63 | 36.3 | D | |
| NB | LT | 0.82 | 17.7 | B | LT | 0.83 | 18.0 | B | | LTR | 0.79 | 16.7 | B | LTR | 0.80 | 17.0 | B | | L | 0.18 | 10.1 | B | L | 0.20 | 10.5 | B | |
| | R | 0.35 | 13.7 | B | R | 0.35 | 13.7 | B | | | | | | | | | | | T | 0.66 | 14.0 | B | T | 0.66 | 14.1 | B | |
| | | | | | | | | | | | | | | | | | | | R | 0.35 | 13.4 | B | R | 0.35 | 13.4 | B | |
| INT | | | 77.5 | E | | | 82.2 | F | | | | 102.4 | F | | | 108.4 | F | | | | 70.2 | E | | | 73.1 | E | |
| Tenth Avenue and West 43rd Street | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| EB | L | 0.02 | 17.0 | B | L | 0.02 | 17.0 | B | | L | 0.02 | 17.1 | B | L | 0.02 | 17.1 | B | | L | 0.02 | 17.1 | B | L | 0.02 | 17.1 | B | |
| WB | TR | 0.28 | 19.5 | B | TR | 0.28 | 19.6 | B | | TR | 0.44 | 21.7 | C | TR | 0.45 | 21.9 | C | | TR | 0.39 | 20.9 | C | TR | 0.40 | 21.0 | C | |
| NB | LT | 1.00 | 36.0 | D | LT | 1.02 | 41.0 | D | | LT | 0.96 | 27.2 | C | LT | 0.97 | 29.5 | C | | L | 0.11 | 9.5 | A | L | 0.14 | 10.0 | B | |
| | | | | | | | | | | | | | | | | | | | T | 0.75 | 15.6 | B | T | 0.76 | 15.8 | B | |
| INT | | | 34.3 | C | | | 38.9 | D | | | | 26.4 | C | | | 28.3 | C | | | | 16.3 | B | | | 16.5 | B | |
| Tenth Avenue and West 44th Street | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| EB | LT | 0.48 | 26.1 | C | LT | 0.56 | 27.9 | C | | LT | 0.30 | 23.1 | C | LT | 0.35 | 23.7 | C | | LT | 0.43 | 25.2 | C | LT | 0.50 | 26.4 | C | |
| NB | T | 0.85 | 14.9 | B | T | 0.86 | 15.4 | B | | TR | 0.96 | 23.9 | C | TR | 0.97 | 25.6 | C | | TR | 0.77 | 12.5 | B | TR | 0.78 | 12.8 | B | |
| | R | 0.58 | 14.2 | B | R | 0.58 | 14.2 | B | | | | | | | | | | | | | | | | | | | |
| INT | | | 16.2 | B | | | 16.9 | B | | | | 23.8 | C | | | 25.4 | C | | | | 14.1 | B | | | 14.6 | B | |
| Tenth Avenue and West 45th Street | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| WB | TR | 0.96 | 60.4 | E | TR | 1.01 | 73.6 | E | + | TR | 0.89 | 50.0 | D | TR | 0.94 | 58.7 | E | + | TR | 1.12 | 113.4 | F | TR | 1.22 | 151.2 | F | + |
| NB | LT | 0.89 | 17.4 | B | LT | 0.92 | 19.5 | B | | LT | 0.90 | 18.5 | B | LT | 0.93 | 21.0 | C | | L | 0.16 | 7.7 | A | L | 0.31 | 9.9 | A | |
| | | | | | | | | | | | | | | | | | | | T | 0.73 | 12.4 | B | T | 0.73 | 12.5 | B | |
| INT | | | 24.4 | C | | | 28.4 | C | | | | 23.5 | C | | | 27.0 | C | | | | 28.7 | C | | | 35.8 | C | |
| Eleventh Avenue and West 42nd Street | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| EB | TR | 0.69 | 28.2 | C | TR | 0.69 | 28.2 | C | | TR | 0.54 | 25.1 | C | TR | 0.54 | 25.1 | C | | TR | 0.63 | 26.8 | C | TR | 0.63 | 26.8 | C | |
| WB | L | 0.38 | 17.7 | B | L | 0.38 | 17.7 | B | | L | 0.42 | 17.1 | B | L | 0.42 | 17.1 | B | | L | 0.59 | 22.6 | C | L | 0.59 | 22.6 | C | |
| | LT | 0.36 | 14.7 | B | LT | 0.36 | 14.7 | B | | LT | 0.49 | 16.5 | B | LT | 0.49 | 16.5 | B | | LT | 0.39 | 15.0 | B | LT | 0.39 | 15.0 | B | |
| SB | LT | 0.72 | 23.5 | C | LT | 0.74 | 24.0 | C | | LT | 0.73 | 23.7 | C | LT | 0.74 | 24.2 | C | | LT | 0.61 | 21.0 | C | LT | 0.61 | 21.1 | C | |
| | R | 0.10 | 16.2 | B | R | 0.11 | 16.2 | B | | R | 0.27 | 18.4 | B | R | 0.28 | 18.5 | B | | R | 0.30 | 18.7 | B | R | 0.30 | 18.8 | B | |
| INT | | | 23.1 | C | | | 23.4 | C | | | | 21.8 | C | | | 22.0 | C | | | | 21.2 | C | | | 21.3 | C | |
| Eleventh Avenue and West 43rd Street | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| WB | LT | 0.30 | 22.5 | C | LT | 0.30 | 22.5 | C | | LT | 0.62 | 35.1 | D | LT | 0.62 | 35.1 | D | | LT | 0.55 | 33.3 | C | LT | 0.55 | 33.3 | C | |
| SB | T | 0.38 | 8.5 | A | T | 0.39 | 8.5 | A | | TR | 0.36 | 3.6 | A | TR | 0.37 | 3.7 | A | | TR | 0.41 | 3.8 | A | TR | 0.41 | 3.9 | A | |
| | R | 0.19 | 8.1 | A | R | 0.21 | 8.3 | A | | | | | | | | | | | | | | | | | | | |
| INT | | | 10.7 | B | | | 10.7 | B | | | | 10.1 | B | | | 10.0 | B | | | | 8.9 | A | | | 8.8 | A | |
| Eleventh Avenue and West 44th Street | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| EB | LTR | 0.98 | 67.3 | E | LTR | 1.04 | 84.3 | F | + | LTR | 0.90 | 60.1 | E | LTR | 0.95 | 68.7 | E | + | LTR | 1.10 | 110.0 | F | LTR | 1.17 | 135.0 | F | + |
| SB | L | 0.16 | 7.5 | A | L | 0.18 | 7.7 | A | | L | 0.06 | 6.1 | A | L | 0.08 | 6.1 | A | | L | 0.08 | 6.2 | A | L | 0.10 | 6.3 | A | |
| | T | 0.85 | 18.1 | B | T | 0.88 | 19.9 | B | | T | 0.74 | 13.6 | B | T | 0.76 | 14.1 | B | | T | 0.84 | 17.0 | B | T | 0.85 | 17.6 | B | |
| INT | | | 28.9 | C | | | 34.2 | C | | | | 22.5 | C | | | 24.7 | C | | | | 34.8 | C | | | 40.8 | D | |
| Eleventh Avenue and West 45th Street | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| WB | LTR | 1.02 | 76.3 | E | LTR | 1.19 | 134.6 | F | + | LTR | 1.16 | 133.6 | F | LTR | 1.29 | 185.4 | F | + | LTR | 1.22 | 157.9 | F | LTR | 1.35 | 212.6 | F | + |
| NB | L | 0.06 | 12.9 | B | L | 0.11 | 14.6 | B | | L | 0.03 | 6.2 | A | L | 0.05 | 6.5 | A | | L | 0.04 | 6.4 | A | L | 0.06 | 6.8 | A | |
| | T | 0.07 | 11.7 | B | T | 0.07 | 11.8 | B | | T | 0.01 | 5.7 | A | T | 0.01 | 5.7 | A | | T | 0.02 | 5.8 | A | T | 0.02 | 5.8 | A | |
| SB | T | 0.88 | 23.7 | C | T | 0.89 | 24.6 | C | | TR | 0.77 | 14.7 | B | TR | 0.78 | 15.0 | B | | T | 0.78 | 15.0 | B | T | 0.79 | 15.2 | B | |
| | R | 0.20 | 10.4 | B | R | 0.20 | 10.4 | B | | | | | | | | | | | R | 0.03 | 5.9 | A | R | 0.03 | 5.9 | A | |
| INT | | | 35.1 | D | | | 52.8 | D | | | | 40.6 | D | | | 54.8 | D | | | | 43.1 | D | | | 57.1 | E | |

Notes:
 EB = Eastbound; WB = Westbound; NB = Northbound; SB = Southbound; INT = Intersection.
 L = Left-Turn; T = Through; R = Right-Turn.
 V/C = Volume to Capacity; SPV = Seconds per Vehicle; LOS = Level of Service.
 + Indicates a significant adverse impact



IMPACT CRITERIA

According to the criteria presented in the *CEQR Technical Manual*, impacts are considered significant (identified by the “+” symbol in the analysis summary table) and require examination of mitigation if they result in an increase of 5 or more seconds of delay in a lane group over No Build levels beyond mid-LOS D. For No Build LOS E, a 4-second increase in delay is considered significant. For No Build LOS F, a 3-second increase in delay is considered significant. Also, if the No Build LOS F condition already corresponds with a delay in excess of 120 seconds, an increase of 1.0 or more seconds of delay is considered significant, unless the proposed project generates fewer than five vehicle trips through that intersection in the peak hour. In addition, impacts are considered significant if levels of service deteriorate from acceptable LOS A, B, or C in the No Build condition to marginally unacceptable LOS D (a delay in excess of 45 seconds, the midpoint of the LOS D range of delay), or unacceptable LOS E or F in the future Build condition. The above sliding scale is applicable only if the Proposed Actions are projected to generate five or more vehicle trips throughout the affected approach movement or lane group at the analysis intersections in the peak hour.

SIGNIFICANT ADVERSE IMPACTS

Based on CEQR criteria, significantly impacted locations were identified and summarized by peak analysis period, as follows. During the AM and midday peak hours, the Proposed Actions would result in five significantly impacted lane groups at four intersections. During the PM peak hour, there would be four significantly impacted lane groups at four intersections. (The parenthetical numbers in the following sections indicate the increase in delay as compared to the No Build condition.)

AM Peak Hour

- *Tenth Avenue and West 42nd Street:* The eastbound approach would worsen within LOS F and increase in average delay from 341.2 to 359.7 (18.5) spv. The westbound right turn movement would worsen within LOS F and increase in average delay from 129.4 to 137.2 (7.8) spv.
- *Tenth Avenue and West 45th Street:* The westbound approach would worsen within LOS E and increase in average delay from 60.4 to 73.6 (13.2) spv.
- *Eleventh Avenue and West 44th Street:* The eastbound approach would deteriorate from LOS E to LOS F and increase in average delay from 67.3 to 84.3 (17.0) spv.
- *Eleventh Avenue and West 45th Street:* The westbound approach would deteriorate from LOS E to LOS F and increase in average delay from 76.3 to 134.6 (58.3) spv.

Midday Peak Hour

- *Tenth Avenue and West 42nd Street:* The eastbound approach would worsen within LOS F and increase in average delay from 529.5 to 562.7 (33.2) spv. The westbound approach would worsen within LOS F and increase in average delay from 145.8 to 151.2 (5.4) spv.
- *Tenth Avenue and West 45th Street:* The westbound approach would deteriorate from LOS D to LOS E and increase in average delay from 50.0 to 58.7 (8.7) spv.
- *Eleventh Avenue and West 44th Street:* The eastbound approach would worsen within LOS E and increase in average delay from 60.1 to 68.7 (8.6) spv.
- *Eleventh Avenue and West 45th Street:* The westbound approach would worsen within LOS F and increase in average delay from 133.6 to 185.4 (51.8) spv.



PM Peak Hour

- *Tenth Avenue and West 42nd Street:* The eastbound approach would worsen within LOS F and increase in average delay from 400.6 to 415.1 (14.5) spv.
- *Tenth Avenue and West 45th Street:* The westbound approach would worsen within LOS F and increase in average delay from 113.4 to 151.2 (37.8) spv.
- *Eleventh Avenue and West 44th Street:* The eastbound approach would worsen within LOS F and increase in average delay from 110.0 to 135.0 (25.0) spv.
- *Eleventh Avenue and West 45th Street:* The westbound approach would worsen within LOS F and increase in average delay from 157.9 to 212.6 (54.7) spv.

PARKING

Parking demand from the Proposed Project would be accommodated primarily at the proposed on-site parking garage. A parking accumulation analysis, shown in **Table 6**, was performed to estimate hourly demand and identify the Proposed Project’s peak vehicle accumulation. Based on the *2000 U.S. Census*, the residential use would generate the majority of the parking demand from the Proposed Project, with approximately 211 spaces overnight, and would result in a 7-space parking shortfall during the overnight peak hour over the proposed 204-space on-site accessory parking garage. However, all project-generated auto trips (except pick-ups and drop-offs) were assigned to the site’s proposed driveway location for a more conservative analysis. The 7 vehicle overflow during the overnight peak parking period would be accommodated at off-street public parking facilities in the vicinity of the Project Site.

Table 6
Proposed Plan Weekday Parking Accumulation

| Time Begin | Residential | | | Local Retail | | | School - Staff | | | Total |
|------------|-------------|-----|------|--------------|-----|------|----------------|-----|------|-------|
| | In | Out | Acc. | In | Out | Acc. | In | Out | Acc. | |
| Mid. | 5 | 4 | 211 | 0 | 0 | 0 | 0 | 0 | 0 | 211 |
| 1 AM | 2 | 2 | 211 | 0 | 0 | 0 | 0 | 0 | 0 | 211 |
| 2 AM | 1 | 1 | 211 | 0 | 0 | 0 | 0 | 0 | 0 | 211 |
| 3 AM | 1 | 1 | 211 | 0 | 0 | 0 | 0 | 0 | 0 | 211 |
| 4 AM | 1 | 1 | 211 | 0 | 0 | 0 | 0 | 0 | 0 | 211 |
| 5 AM | 1 | 1 | 211 | 0 | 0 | 0 | 0 | 0 | 0 | 211 |
| 6 AM | 2 | 1 | 212 | 0 | 0 | 0 | 0 | 0 | 0 | 212 |
| 7 AM | 2 | 19 | 195 | 0 | 0 | 0 | 0 | 0 | 0 | 195 |
| 8 AM | 7 | 41 | 161 | 0 | 0 | 0 | 1 | 0 | 0 | 162 |
| 9 AM | 6 | 29 | 138 | 0 | 0 | 0 | 0 | 0 | 0 | 139 |
| 10 AM | 7 | 20 | 125 | 0 | 0 | 0 | 0 | 0 | 0 | 126 |
| 11 AM | 9 | 13 | 121 | 1 | 0 | 1 | 0 | 0 | 0 | 123 |
| Noon | 12 | 12 | 121 | 4 | 4 | 1 | 0 | 0 | 0 | 123 |
| 1 PM | 12 | 12 | 121 | 3 | 3 | 1 | 0 | 0 | 0 | 123 |
| 2 PM | 11 | 11 | 121 | 2 | 2 | 1 | 0 | 0 | 0 | 123 |
| 3 PM | 14 | 14 | 121 | 2 | 1 | 2 | 0 | 0 | 0 | 124 |
| 4 PM | 23 | 15 | 129 | 1 | 1 | 2 | 0 | 0 | 0 | 132 |
| 5 PM | 40 | 17 | 152 | 2 | 2 | 2 | 0 | 1 | 0 | 154 |
| 6 PM | 32 | 18 | 166 | 1 | 2 | 1 | 0 | 0 | 0 | 167 |
| 7 PM | 31 | 13 | 184 | 1 | 1 | 1 | 0 | 0 | 0 | 185 |
| 8 PM | 13 | 6 | 191 | 1 | 1 | 1 | 0 | 0 | 0 | 192 |
| 9 PM | 11 | 4 | 198 | 0 | 1 | 0 | 0 | 0 | 0 | 198 |
| 10 PM | 12 | 5 | 205 | 0 | 0 | 0 | 0 | 0 | 0 | 205 |
| 11 PM | 9 | 4 | 210 | 0 | 0 | 0 | 0 | 0 | 0 | 210 |

Note: Acc. = Accumulation
Source: Based on travel demand estimates



In the future Build condition, the Proposed Project would displace the 300 public parking spaces currently on the Project Site as well as 50 spaces used by the traffic enforcement unit of the New York City Police Department (NYPD). In the future with the Proposed Actions, the displacement of 300 public parking spaces from the Project Site would result in an overall increase in utilization rates in study area parking facilities. As shown in **Table 7**, the overall utilization rates of the off-street parking facilities in the study area would increase to approximately 93, 104, 79, and 49 percent (with 207, 0, 635 and 1,513 available spaces) during the AM, midday, PM, and overnight hours, respectively. As in the No Build condition, on-street parking in the area is expected to be at or near capacity during most of the day under the future without the Proposed Actions.

Table 7
Build Parking Condition

| | No Build Condition | | | | Build Condition | | | | | | |
|-------------------|--------------------|------------------|------------------|-------------|-------------------------|----------------------------|----------------|------------------------|------------------------|------------------|-------------|
| | Total Capacity | Estimated Demand | Spaces Available | Utilization | Public Spaces Displaced | New Public Spaces Provided | Total Capacity | Build Increment Demand | Total Estimated Demand | Spaces Available | Utilization |
| Weekday AM | 3,292 | 2,785 | 507 | 85% | 300 | 0 | 2,992 | 0 | 2,785 | 207 | 93% |
| Weekday Midday | 3,292 | 3,101 | 191 | 94% | 300 | 0 | 2,992 | 0 | 3,101 | -109 | 104% |
| Weekday PM | 3,292 | 2,357 | 935 | 72% | 300 | 0 | 2,992 | 0 | 2,357 | 635 | 79% |
| Weekday Overnight | 3,292 | 1,472 | 1,820 | 45% | 300 | 0 | 2,992 | 7 | 1,479 | 1,513 | 49% |

According to the *CEQR Technical Manual*, for proposed actions within the Manhattan Central Business District (CBD) (the area south of 61st Street), the inability of the proposed project or the surrounding area to accommodate projected future parking demands would generally be considered a parking shortfall, but is not deemed to be a significant impact. The unsatisfied demand for parking spaces in the study area in the midday peak hour would result in vehicles parking outside the immediate area and motorists walking extended distances to their destination or taking mass transit. Thus, due to the Project Site's location within the Manhattan CBD, the 109-space shortfall in the midday peak hour in the future with the Proposed Actions would not be considered a significant parking impact.

TRAFFIC SAFETY

Accident data for the study area intersections were obtained from the New York State Department of Transportation (NYSDOT) for the time period between January 1, 2005 and June 30, 2008. The data obtained quantify the total number of reportable accidents (involving fatality, injury, or more than \$1,000 in property damage), fatalities, and injuries during the study period, as well as a yearly breakdown of pedestrian- and bicycle-related accidents at each location. According to the *CEQR Technical Manual*, a high pedestrian accident location is one where there were five or more pedestrian-related accidents in any year of the most recent three-year period for which data are available.

During this period, a total of 227 reportable accidents, one (1) fatality, 160 injuries, and 37 pedestrian-related accidents occurred at the study area intersections. A rolling 12 month total of accident data identifies one study area intersection as a high pedestrian accident location in the 2005 to 2008 period: West 42nd Street at Tenth Avenue.



A review of the accident history at Tenth Avenue and West 42nd Street indicates that 5 of 7 pedestrian-related accidents were caused by drivers failing to yield the right of way during turning movements. In all but one accident, the pedestrian was lawfully crossing with the signal. Tenth Avenue and West 42nd Street is striped with regular crosswalks on all approaches and there are no signs warning either pedestrians to wait for a walk phase or automobiles to yield to pedestrians. Field observations of conditions at this intersection were conducted to identify specific geometric and operational issues and to determine whether measures could be recommended to improve pedestrian safety. It is expected that the installation of high-visibility crosswalks on all four approaches and signs warning turning vehicles to yield to pedestrians on the westbound and northbound approaches could further enhance pedestrian safety at this location. Furthermore, there were five total accidents involving pedestrians (2) or bicycles (3) at Eleventh Avenue and West 42nd Street in 2006. These occurrences, however, appear to be outliers since there was only one pedestrian-related accident in 2005 and no pedestrian or bicycle-related accidents in both 2007 and 2008. This intersection is also painted with high-visibility crosswalks on its east, west, and north crossings, which further accommodate the safety of pedestrian flow.

To accommodate walk trips to the school on the project site, school crosswalks are present at the Tenth Avenue and West 44th Street, Tenth Avenue and West 45th Street, and Eleventh Avenue and West 45th Street intersections. There are also school crossing pavement markings on Tenth Avenue, Eleventh Avenue, and West 44th Street. With the main school entrance proposed to be relocated to West 44th Street, it is recommended that similar school crosswalks be added to the Eleventh Avenue and West 44th Street intersection.

TRANSIT AND PEDESTRIANS

The Proposed Actions would generate an estimated 1,717, 1,789, and 1,426 person trips during the weekday AM, midday, and PM peak hours, respectively. These trips would include 296, 194, and 343 subway trips, 184, 138, and 204 bus trips, and 1,071, 1,327, and 708 walk only trips over the same time periods. Analysis was prepared to determine the potential impacts of these new trips on subway and bus service as well as sidewalks, corners, and crosswalks near the Project Site. The results show that the Proposed Actions would not result in significant adverse impacts to subway station control areas or stairways, bus operations, or pedestrian circulation.

An examination of the area's roadways revealed that several school safety measures are already in place to enhance safety along pedestrian paths for students. For example, most of the crosswalks at Tenth Avenue and West 44th Street, Tenth Avenue and West 45th Street, and Eleventh Avenue and West 45th Street are striped for school crossing. In addition, roadways approaching these intersections have "School X-ing" pavement markings. With the existing school entrance relocated to West 44th Street, it is recommended that the same safety treatments be implemented for the Eleventh Avenue and West 44th Street intersection. Specifically, it is recommended that "School X-ing" pavement markings be provided on the Eleventh Avenue southbound and West 44th Street eastbound approaches and that the east, west, and north crosswalks are striped as school crosswalks.

Consistent with these recommendations, the SCA would provide safety measures at the intersection of West 45th Street and Tenth and Eleventh Avenues and at the West 44th Street and Eleventh Avenue intersection. Specifically, "School X-ing" pavement markings would be provided for the Eleventh Avenue southbound and West 44th Street eastbound approaches to this intersection, and the east, west, and north crosswalks of this intersection are to be striped as school crosswalks.



AIR QUALITY

The Proposed Actions would not result in significant adverse impacts to air quality.

The maximum predicted pollutant concentrations and concentration increments from mobile sources with the Proposed Actions and from the accessory parking garage would be below the applicable criteria for determining the significance of potential impacts. There would be no significant adverse air quality impacts from industrial facilities in the vicinity of the Project Site on future sensitive receptors. To preclude the potential for significant adverse air quality impacts from the heating, ventilation, and air conditioning (HVAC) system of the proposed school, the New York City School Construction Authority (SCA) would incorporate specifications on fuel use and stack placement as part of the Proposed Project and per its environmental review requirements under the State Environmental Quality Review Act:

- **Relocated and Expanded P.S. 51:** Any new development on this property must ensure that the heating, ventilating and air conditioning stack(s) utilize either No. 2 fuel oil or natural gas. If development on this property utilizes No. 2 fuel oil for the heating, ventilating and air conditioning, boiler exhaust stacks on this property must be located at least 60 feet from the building lines of Buildings B and C; if the development utilizes natural gas, boiler exhaust stacks on the property must be located at least 47 feet from the building lines of Buildings B and C to avoid any potential significant air quality impacts.

To avoid potential significant adverse impacts from the HVAC systems associated with the proposed residential buildings, the LDA between HPD and 44th Street Development LLC would include the following requirements for the Proposed Project:

- **Building A:** Any new development on this property must ensure that exhaust stack(s) for the building's heating, ventilating and air conditioning system be located on the roof of the tallest portion of the building to avoid any potential significant air quality impacts.
- **Existing School/Future Residential Building:** Any new development on this property must ensure that the heating, ventilating and air conditioning stack(s) utilize either No. 2 fuel oil or natural gas, and boiler exhaust stacks on this property must be located at least 30 feet from adjacent buildings, Buildings B and C, to avoid any potential significant air quality impacts.

The LDA between HPD and West 44th Street Development LLC would also require the developer to ventilate diesel locomotive emissions through vents located on the roofs (or through a combined HVAC venting system on the roofs) of Buildings CN and/or CS. The measure would be required through the LDA and would be included as part of the Proposed Project.

NOISE

The Proposed Actions would not result in significant adverse noise impacts.

The *CEQR Technical Manual* has set building attenuation levels for buildings, based on exterior L10(1) noise levels, in order to maintain interior noise levels of 45 dBA L10(1) or lower for residential and community facility (school) uses. Based on the existing noise levels around the Project Site as presented



in **Table 8** below, proposed building facades along West 45th Street, Tenth Avenue, and West 44th Street would require 30 dBA of window-wall attenuation, proposed building facades along the interior school courtyard would require 32 dBA of window-wall attenuation, and proposed building facades along Eleventh Avenue would require 35 dBA of window-wall attenuation.

Table 8
Existing Noise Levels at Sites 1, 2, 3, and 4 (in dBA)

| Site | Measurement Location | Time | L _{eq} | L ₁ | L ₁₀ | L ₅₀ | L ₉₀ |
|------|---|------|-----------------|----------------|-----------------|-----------------|-----------------|
| 1 | West 45th Street between 10th and 11th Avenues | AM | 67.7 | 75.1 | 71.4 | 65.1 | 62.7 |
| | | MD | 68.2 | 74.5 | 72.1 | 65.9 | 63.9 |
| | | PM | 67.1 | 74.4 | 71.2 | 64.3 | 62.0 |
| 2 | 11th Avenue between West 44th and West 45th Streets | AM | 72.7 | 78.6 | 76.7 | 70.7 | 67.6 |
| | | MD | 70.6 | 76.6 | 73.7 | 69.1 | 66.4 |
| | | PM | 69.4 | 74.0 | 72.1 | 68.4 | 66.4 |
| 3 | West 44th Street between 10th and 11th Avenues | AM | 67.6 | 74.0 | 71.0 | 65.6 | 63.4 |
| | | MD | 68.9 | 74.2 | 71.8 | 67.2 | 65.6 |
| | | PM | 66.0 | 70.6 | 68.0 | 65.3 | 63.8 |
| 4 | West 44th Street Adjacent to Train Tracks | AM | 68.2 | 73.5 | 71.2 | 67.0 | 64.3 |
| | | MD | 67.1 | 72.9 | 70.3 | 65.7 | 63.1 |
| | | PM | 66.7 | 71.9 | 69.5 | 65.6 | 63.9 |

Note: Field measurements were performed by AKRF, Inc. on November 18, 19, and 20, 2008.

The proposed buildings would be designed with a composite Outdoor-Indoor Transmission Class (OITC) to meet these attenuation requirements. New residential buildings would include well sealed double-glazed windows and an alternative means of ventilation (PTAC units) in all living rooms, bedrooms, and dining rooms to achieve a maximum interior noise environment of 45 dBA under closed window conditions. The new P.S. 51 would include well sealed double-glazed windows and central air conditioning. With these measures incorporated as part of the Proposed Project, the composite window/wall attenuation would provide sufficient attenuation to achieve the CEQR requirements. In addition, the building mechanical system (i.e., heating, ventilation, and air conditioning systems) would be designed to meet all applicable noise regulations and to avoid producing levels that would result in any significant increase in ambient noise levels. The attenuation requirements for the residential portion of the Proposed Project would be incorporated into the LDA between HPD and 44th Street Development LLC. SCA is obligated to comply with the attenuation specifications for the new school per its environmental review requirements under SEQRA.

A vibration analysis was undertaken to identify the potential impacts of continued railroad operations through the Project Site on the future residents and students of the new P.S. 51. Vibration measurements were made at two receptor locations—one on West 45th Street between Tenth Avenue and Eleventh Avenue and one located at the center of the railroad overpass on West 44th Street between Tenth and Eleventh Avenues. Based on the measured vibration levels, a properly designed building would not be significantly impacted by vibration.

CONSTRUCTION

The Proposed Actions would result in construction activities within the Project Site for a period of approximately 48 months, including 36 months for construction of the new school and residential buildings and another 12 months for conversion of the existing school to residential use. Construction activities would comply with the New York City Noise Code, which regulates the hours of construction



and times when noisy equipment can be used. The project sponsor and the SCA would implement dust control measures in accordance with the New York City Air Pollution Control Code and other applicable local, state, and federal regulations. It is also anticipated that some contractors working on the Project Site would use diesel emission reduction technologies such as ultra low-sulfur diesel fuel, diesel particulate filters, and Tier 1, 2, and 3 engines, and as early in the construction period as practicable, diesel-powered equipment would be replaced with electrical-powered equipment to the extent feasible. It is expected that the SCA would employ best available technologies and utilize ultra low-sulfur diesel fuel for construction vehicles in accordance with City and State requirements in connection with construction of the new school building, which will be constructed by the SCA and owned by the City of New York. Construction activities would be undertaken in accordance with an approved CHASP and RAP for soil disturbance that would include detailed procedures for managing both known contamination issues (e.g., fill) and any unexpectedly encountered contamination issues. Sediment and erosion control procedures would be identified in a Stormwater Pollution Prevention Plan and implemented during the construction activities to control runoff and pollutants from entering the stormwater system. A CPP would also be developed to avoid potential impacts, such as ground-borne vibration, falling debris, and damage from heavy machinery, on the existing P.S. 51 and the former Houbigant Building, which are S/NR-eligible historic resources on and near the Project Site.

Construction activities may require that the curbside lanes of West 44th Street, Eleventh Avenue, and West 45th Street adjacent to the Project Site be closed for staging. However, rerouting of vehicular traffic is not anticipated since at least one moving lane would be maintained on these streets. Sidewalks immediately adjacent to the Project Site may also be closed, but access to the existing P.S. 51 would be maintained when school is in session. Where sidewalks are closed, pedestrians would either walk on the opposite side of the street or in a protected area within a portion of the roadway or the Project Site. The New York City Department of Transportation (NYCDOT) would be consulted to determine the appropriate protection measures to ensure vehicular and pedestrian safety during construction.

It is estimated that construction activities would generate up to 175 vehicle trips in the morning peak (6AM to 7AM) and 113 vehicle trips in the afternoon peak (3PM to 4PM). Delivery vehicles would travel to and from the Project Site using NYCDOT designated truck routes with local access along Tenth and Eleventh Avenues as well as West 44th and West 45th Streets. Since parking would not be provided on-site for construction workers, they would travel to and from nearby parking facilities and would then walk to the Project Site. While construction traffic would be dispersed throughout the area around the Project Site, construction activities have the potential to adversely affect traffic operations since certain locations are already operating at poor levels-of-service.

Construction activities would generate a peak demand for 161 parking spaces, which would occur from weekday morning to the afternoon. In combination with the removal of a 300-space lot from the Project Site, there would be a shortfall of parking during construction. The unsatisfied demand for parking spaces in the study area in the midday peak hour would result in vehicles parking outside the immediate area and motorists walking longer distances to their destination or taking mass transit.

Construction activities would not affect subway operations since no subway routes or stations are located on or adjacent to the Project Site. Bus service would be maintained near the Project Site during construction, and bus stops would not need to be relocated. Construction is expected to result in up to 454 new subway trips and 186 new bus trips from construction workers accessing the Project Site during the construction peak hours (6 AM to 7 AM and 3 PM to 4 PM). However, since these trips would be dispersed among the subway and bus routes that serve the Project Site and because the trips would occur



outside the typical commuter peak hours, it is anticipated that adequate capacity would be available to support these construction-period trips. Similarly, it is also expected that adequate capacity would be available to support construction-period pedestrian trips, particularly since they would arrive and depart outside the typical commuter peak hours.

As with other projects constructed over active railroad right-of-way, activities associated with the deck over the rail cut and residential buildings above would be closely coordinated with and approved by Amtrak. As there are two tracks along this right-of-way, tracks would alternate closing temporarily to allow for excavation, construction of foundation walls, and construction of the deck. In addition, flagmen would be present along the right-of-way during construction.

No significant adverse impacts are anticipated due to construction activities on the Project Site. However, construction activities have the potential to result in temporary adverse effects. Construction activities would be most intensive during the demolition, excavation, and core and shell phases. Once interior construction commences, effects on traffic, air quality, and noise would be much more limited. The SCA and 44th Street Development LLC would adhere to all applicable codes and regulations to avoid or minimize the adverse effects of construction on adjacent sensitive receptors, including P.S. 51. The SCA and West 44th Street Development LLC have agreed to participate in a task force comprised of the various stakeholders to address any ongoing concerns that may arise during the period of construction, including construction-related air, noise, and safety issues, and effects on the ongoing operations of P.S. 51.

PUBLIC HEALTH

The Proposed Action would not result in significant adverse public health impacts. Based on a preliminary screening analysis in accordance with the *CEQR Technical Manual* guidelines, it was determined that a full assessment of the Proposed Action's potential impacts on public health is not necessary and that no significant adverse impacts are expected as a result of the Proposed Action. The Proposed Action would incorporate noise attenuation, air quality (fuel and vent stack restrictions), and hazardous materials testing and remediation requirements through the LDA between HPD and 44th Street Development LLC.

MITIGATION

The Proposed Actions have the potential to result in significant adverse impacts related to traffic. The following section describes measures to fully mitigate these impacts.

TRAFFIC

The Proposed Actions would result in significant adverse impacts at four intersections during the 2013 Build AM, midday, and PM analysis peak hours. To mitigate these impacts, low-cost and readily implementable measures were explored, including: retiming of signal controls to increase green time for impacted movements, modifying existing parking regulations, and daylighting curb lanes at intersection approaches to provide additional travel lanes or turn pockets. The traffic mitigation measures were reviewed and approved by DOT, the implementing agency for the traffic mitigation measures. With these mitigation measures in place, the projected significant adverse traffic impacts would be fully mitigated.



Table 9
Recommended Traffic Mitigation Measures

| Intersection | Mitigation Measure | | |
|--------------------------------|---|---|---|
| | AM Peak Hour | Midday Peak Hour | PM Peak Hour |
| 10th Avenue & West 42nd Street | Shift one (1) second of green time from NB to EB/WB | Shift one (1) second of green time from NB to EB/WB | Shift one (1) second of green time from NB to EB/WB |
| 10th Avenue & West 45th Street | Shift two (2) seconds of green time from NB to WB | Shift two (2) seconds of green time from NB to WB | Shift three (3) seconds of green time from NB to WB |
| 11th Avenue & West 44th Street | Shift two (2) seconds of green time from SB to EB (during Mon-Fri 8:00am - 9:00am period only) | Shift one (1) second of green time from SB to EB (during All Other Times (AOT) Phasing) | Shift two (2) seconds of green time from SB to EB (during All Other Times (AOT) Phasing) |
| 11th Avenue & West 45th Street | Daylight south curb lane on westbound approach for 100 feet to create an exclusive left-turn lane | Daylight south curb lane on westbound approach for 100 feet to create an exclusive left-turn lane | Daylight south curb lane on westbound approach for 100 feet to create an exclusive left-turn lane |

ALTERNATIVES

A total of three alternatives were assessed to determine whether they would substantively meet the stated goals and objectives of the Proposed Actions while reducing or eliminating its adverse impacts:

- 1) The “No Action” Alternative would maintain the Project Site in its current condition and existing uses would remain.
- 2) The “Expansion of Existing P.S. 51” Alternative contemplated renovating and expanding the existing school building in response to concerns expressed during scoping by certain members of the public.
- 3) The “School over Rail Cut” Alternative contemplated construction of a new school building over the Amtrak rail cut in response to concerns expressed during scoping by certain members of the public.

NO ACTION ALTERNATIVE

The No Action Alternative would maintain the Project Site in its current condition and existing uses would remain. While the No Action Alternative would avoid all of the significant adverse environmental impacts of the Proposed Actions, it would not provide for an expanded school or new affordable housing. The No Action Alternative would not achieve the Proposed Actions’ purpose and need, which include enlivening an underutilized site with much-needed affordable housing, retail space, and a new and expanded school. In addition, under the No Action Alternative, the Project Site would remain contaminated and remediation would not occur.

EXPANSION OF EXISTING P.S. 51 ALTERNATIVE

Two alternatives, which were identified during public scoping for this EIS, were considered for the proposed school on the Project Site. The first alternative, “Expansion of Existing P.S. 51 Alternative” contemplated renovating and expanding the existing school building. This alternative and the Proposed Actions would increase school capacity in the district by providing another school facility on the Project Site. In other respects, overall effects and significant adverse impacts would be similar to those with the Proposed Project as the number of residential units and square footage of retail space would be generally



unchanged. There would continue to be significant adverse traffic impacts with similar mitigation measures considered.

Renovating the school for continued long term use would require extensive reconstruction; because given the age of the school, it does not meet many current design standards of SCA, such as central air conditioning and energy-efficiency measures. Also, renovation would require closing of the school for at least one or two school years, thereby relocating students and temporarily reducing the capacity of the district. The temporary impact on school capacity that would result from this alternative would not occur with the Proposed Actions.

With this alternative, a new wing would be added south of the existing school building. Since floor heights vary between the existing school and SCA's standard design, an expanded school could result in reduced efficiency of its layout and capacity as compared to a new school building. Furthermore, as described in the "Historic Resources" section above, the existing school is S/NR-eligible. Thus, as with the Proposed Actions, any alteration to the existing school building would need to be undertaken in consultation with OPHRP, and these alterations may increase the cost and schedule for the school as compared to the Proposed Actions.

The expansion of the existing school would require modifications to the site plan for residential uses, since the adaptive re-use of the school for residential purposes would not occur. It is anticipated that the overall unit count would be the same as for the Proposed Project, but bulk would have to be added to one of the other proposed residential buildings on the Project Site since dwelling units contained in the existing P.S. 51 building under the Proposed Actions would be distributed throughout the other buildings under this alternative.

The sale of the existing school building is critical to creating the funding required for construction of the new school. Consequently, retaining and renovating the existing school could jeopardize the overall financial feasibility of the Proposed Actions.

SCHOOL OVER RAIL CUT ALTERNATIVE

The second alternative involving the new school on the Project Site, the "School over Rail Cut" Alternative, contemplates placing the new school above the rail cut on the eastern side of the Project Site rather than within the existing school yard. Under this alternative, the rear yard of the existing school would instead provide for a portion of the residential development along West 44th Street. As the proposed development program could still be accommodated under the reconfigured site plan, this alternative would result in similar impacts on traffic as the Proposed Project.

Development of a school over the rail cut would orient the building north-south rather than east-west in order to meet the minimum footprint and space requirements. The school would also be constructed to the lot line such that classroom windows would front, in close proximity, the gas station to the east of the rail cut along Tenth Avenue. Furthermore, building over the rail cut would preclude the inclusion of a cellar level, resulting in a design of six stories above grade, which is not consistent with the SCA's design standards. Therefore, SCA considers development of the school over the rail cut to be infeasible.

UNAVOIDABLE ADVERSE IMPACTS

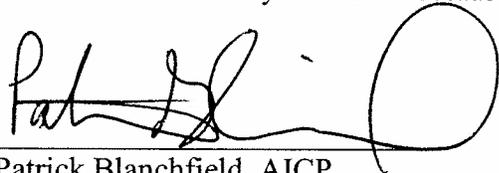
As described above, all of the significant adverse impact identified for traffic could be fully mitigated.

GROWTH INDUCING ASPECTS OF THE PROPOSED ACTION

The Proposed Actions would enable the development of 1,350 dwelling units, 17,500 square feet of retail space, and a 630-seat public school on a site located in the Clinton neighborhood of Manhattan. The Proposed Actions would result in the redevelopment of an underutilized site with market-rate and affordable housing, which is consistent with City initiatives to increase the housing supply and provide additional capacity for public schools. These uses would be compatible with the surrounding area and would contribute to the broader residential redevelopment of Clinton. No major new development is expected to be induced in the surrounding area as a result of the Proposed Actions.

IRREVERSIBLE AND IRRETREIVABLE COMMITMENT OF RESOURCES

There are a number of resources, both natural and built, that would be expended in the construction and operation of the Proposed Project that would occur as a result of the Proposed Actions. These resources include the building materials used in construction of the buildings; energy in the form of gas and electricity consumed during construction and operation of the buildings; and the human effort (time and labor) required to develop, construct, and operate various components of these developments. They are considered irretrievably committed because their reuse for some other purpose would not be possible.



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