Small Business Services

Robert W. Walsh
Commissioner

NOTICE OF COMPLETION
FINAL ENVIRONMENTAL IMPACT STATEMENT
for the
St. George Waterfront Redevelopment

Lead Agency:	New York City Department of Small Business Services 110 William Street, 7th Floor New York, NY 10038
CEQR Number:	13SBS001R
SEQR Classification:	Type I
Date Issued:	August 29, 2013
Location:	Block 2, Lots 1, 5, 10, and 20 Staten Island Community District 1

Pursuant to City Environmental Quality Review, Mayoral Executive Order 91 of 1977, as amended, and the City Environmental Quality Review Rules of Procedure found at Title 62, Chapter 5 of the Rules of the City of New York (CEQR), and the State Environmental Quality Review Act, Article 8 of the State Environmental Conservation Law and its implementing regulations found in Part 617 of 6 NYCRR (SEQRA), a Final Environmental Impact Statement (FEIS) has been prepared for the actions described below and is available for public inspection at the offices listed on the last page of this notice.

The New York City Department of Small Business Services (SBS) issued a Positive Declaration that the proposed project could have the potential to result in significant adverse impacts on October 11, 2012, and directed that a DEIS be prepared. The Environmental Assessment Statement and Draft Scope of Work were made available for public comment. To provide a forum for public comments on the Draft Scope of Work, a public scoping meeting was held on November 13, 2012 at 6:00 PM in the Music Hall of the Snug Harbor Cultural Center & Botanical Garden, Staten Island, New York. Written comments were accepted until December 10, 2012. After considering comments received during the public comment period, a Final Scope of Work was prepared and issued on May 7, 2013 that describes the analyses determined to be appropriate for inclusion in the DEIS.

A Notice of Completion for the DEIS was issued on May 15, 2013 and the document was circulated for review. A joint public hearing on the DEIS and the Uniform Land Use Review Procedure (ULURP) application was held on July 24, 2013 at Spector Hall, 22 Reade Street, New York, New York, 10007. The public comment period remained open until 5:00 PM on August 5, 2013. Relevant comments on the DEIS were considered in the preparation of the FEIS.

PROJECT DESCRIPTION

PROJECT IDENTIFICATION

The New York City Department of Small Business Services (SBS) is serving as lead agency for the environmental review of a proposed mixed-use development consisting of two sites along the St. George Waterfront that would be developed simultaneously. The project sites, referred to as the "North Site" and the "South Site," are located adjacent to and on either side of the Richmond County Bank Ballpark (the Stadium), the home of the Staten Island Yankees minor league baseball team, and just north of the Staten Island Ferry St. George Terminal (the Ferry Terminal). Both sites are developed with surface public parking operated by New York City Economic Development Corporation (NYCEDC) and New York City Department of Transportation (NYCDOT) serving the commuter needs associated with the Ferry Terminal and the intermittent need for public parking when the Stadium is in use.

The North Site would be developed with the New York Observation Wheel (Observation Wheel, or Wheel), an approximately 625-foot-tall observation wheel providing panoramic views of New York Harbor and New York City, a 95,100-gross-square-foot (gsf) Wheel Terminal Building with various commercial, retail (including merchandising and restaurants), exhibition space, theater space, and accessory uses, and approximately 950 public and accessory parking spaces and 12 bus spaces. The North Site development would incorporate a green roof design that would provide publicly accessible landscaped active and passive open space beginning at Richmond Terrace, spanning the parking structure and Wheel Terminal Building beneath it, and offering residents and visitors of Staten Island a new open space with vistas of New York Harbor. The proposal also calls for decking over but not eliminating the railroad right of way (RROW) located adjacent to the proposed North Site parcel. The North Site parcel does not include the RROW. However, the proposed North Site boundary extends south to Richmond Terrace as the developer intends to deck over the RROW. The South Site would be developed with the St. George Retail Development, which would include a 340,000 gsf terraced retail outlet center, a 130,000 gsf hotel, a 20,000 gsf catering facility, and approximately 1,250 public and accessory parking spaces. The South Site may be developed with an additional 25,000 gsf of retail space instead of the 20,000 gsf catering facility space and removing 5,000 gsf of back of house space (No Catering Facility Scenario). The South Site proposal calls for decking over but not eliminating the RROW located on the South Site.

In addition, a new waterborne transit landing may also be pursued as a third project component independent of the proposed North Site and South Site developments. The potential waterborne transit landing would be located adjacent to the Stadium at the end of the Wall Street Ramp. This potential waterborne transit would allow an additional means of travel to the project sites from landings in Manhattan, Brooklyn, Queens, and New Jersey.

These projects require a variety of ministerial and discretionary actions to implement, including tax lot subdivisions, adoption of a text amendment modifying the Special St. George District (ZR Section 128-00 *et seq.*) to add a new North Waterfront Subdistrict that will include the North Site and South Site within its boundaries, a zoning map amendment to reflect the extension of the Special St. George District, new special permits to establish development requirements in the new subdistrict that will also modify previous special permits for the Stadium, approval by the Public Design Commission, long-term lease and development agreements, authorization under Article 25 of the Environmental Conservation Law (ECL) would be required from the New York State Department of Environmental Conservation (NYSDEC) for the proposed development within the NYSDEC tidal wetlands Adjacent Area, and other local and state approvals would be required as necessary. A complete description of the anticipated actions and approvals is provided below in "Required Approvals."

PROJECT SITES

The project sites are located on Staten Island Block 2 along the waterfront in northern Staten Island's St. George neighborhood, which is the civic center and transportation hub of Staten Island. St. George has

served as the borough's civic center since the 1907 opening of Borough Hall, which is located across from the southernmost portion of the South Site on Richmond Terrace.

The proposed project sites encompass two separate waterfront parcels that would be defined through the creation of new tax lots and new zoning lots created from two large tracts: one that formerly served as the rail yard and was subsequently developed with the Stadium and adjacent parking areas, and a second that is developed with parking and the Ferry Terminal. Both proposed parcels are currently zoned M1-1 and currently serve as paved surface public parking lots for the Ferry Terminal and the Stadium. The project sites lie within a Coastal Zone as designated by the New York City Waterfront Revitalization Program.

NORTH SITE

The North Site parcel consists of an approximately 6.9-acre portion of Staten Island Block 2, Lot 20, which does not include the RROW. The proposed North Site parcel is under the jurisdiction of SBS. The Wheel developer intends to deck over the RROW. Including the area that would be decked over, the entire project site consists of an approximately 8.1-acre area. The proposed boundaries of the North Site are: to the north and northeast, Bank Street (an unmapped street that runs parallel to the shoreline); to the southeast, the Stadium; to the south, the retaining wall at Richmond Terrace (including the RROW at the base of the retaining wall); to the west, the boundary that Nicholas Street would form if it continued through across Richmond Terrace. The North Site currently hosts a surface parking lot with 816 spaces and a portion of the RROW.

SOUTH SITE

The South Site consists of an approximately 7.9-acre portion of Staten Island Block 2, Lot 20, as well as portions of Block 2, Lots 1, 5, and 10. The South Site currently hosts a surface parking lot with 754 spaces (that will increase to 810 spaces in the No-Action condition) and a portion of the RROW. The site is under the jurisdiction of NYCDOT, DCAS, MTA and its subsidiary the Staten Island Rapid Transit Operating Authority (SIRTOA), and SBS.

The proposed boundaries of the site are: to the north and northeast, Bank Street; to the east and southeast, the Ferry Terminal and related uses; to the south and southwest, the RROW and Richmond Terrace; and the Wall Street Ramp to the west and northwest. The South Site's proposed development includes the proposed decking over the RROW.

POTENTIAL WATERBORNE TRANSIT LANDING SITE

A waterborne transit landing may be included as part of the proposed project. The potential landing is currently envisioned as a single-bow, front- and side-loading floating barge that would be accessed from a gangway attached to the existing fixed pier that is adjacent to the Stadium at the end of the Wall Street Ramp. The potential landing would be a possible third project component that is not specifically tied to either the North Site or South Site developments.

Project Site Block and Lot, Jurisdiction, Acreage

Block	Lot	Jurisdiction	Project Site Acreage
North Site			
2	20	New York City Department of Small Business Services (SBS)	8.1[1]
South Site			
2	1	New York City Department of Transportation (NYCDOT)	1.8
2	5	Department of Citywide Administrative Services (DCAS)	2.0
2	10	Metropolitan Transportation Authority (MTA)/ Staten Island Rapid Transit Operating Authority (SIRTOA)[2]	2.0
2	20	New York City Department of Small Business Services (SBS)	2.1

Notes:

All properties owned by the City of New York. Appropriate jurisdiction transfers to SBS anticipated at or before project implementation.

[1]The North Site project site acreage of 8.1 acres includes the area above the RROW that is proposed to be decked over. The North Site parcel area, which does not include the RROW, is approximately 6.9 acres.

[2]The Staten Island Rapid Transit Company, a subsidiary of CSX, reserved "air rights" to the extent any exist, to the space commencing 23 feet above the top of the highest rail on Block 2, Lot 10.

PURPOSE AND NEED

The overall objective of the proposed project is to convert large paved surface parking lots located on prime waterfront property into a vibrant mixed-use area that capitalizes on existing transportation infrastructure, showcases views of the Manhattan skyline and New York Harbor, and supports the planning goals for St. George and Staten Island, while retaining the function of both sites as serving the commuter needs of the residents of Staten Island, while retaining the function of both sites as serving the commuter needs of the residents of Staten Island who depend on public parking in the vicinity of the Ferry Terminal in addition to the Stadium's parking needs. Proposed development goals include:

- Bolster economic development: The proposed project is intended to complement and bolster economic growth in St. George, Staten Island, and New York City by providing new job opportunities for local residents, attracting visitors from throughout the metropolitan region, and complementing existing economic uses including the Stadium, Ferry Terminal, and existing businesses in St. George.
- Create a New York City icon: The proposed Observation Wheel, situated in a prime viewing location, would attract millions of visitors each year from throughout the metropolitan region to St. George. The Observation Wheel has the potential to become a true New York City icon that would add a key point of interest to the New York City skyline.
- Enhance the "sense of place": The proposed project would help to revive the civic hub of the St. George neighborhood and provide Staten Island with an enhanced sense of place. It would also enhance the area as an attractive gateway to Staten Island, and would provide momentum for further development on nearby sites.
- Improve circulation: The proposed project includes plans to improve pedestrian and vehicular circulation on and around the project sites. The proposed project would also provide additional upland connections to Richmond Terrace and to the St. George Civic Center.
- Increase waterfront utilization: The proposed project would draw residents, workers, and visitors to the waterfront and enrich the existing North Shore Waterfront Esplanade.

- Incorporate sustainability: Transit-oriented development and the integration of sustainability principles in building and site design. The proposed project would use sustainable construction methods when possible in design and construction.
- Improve resiliency: The proposed project would also be designed and engineered for storm resilience.

PROPOSED DEVELOPMENT PLAN

The proposed project includes on the North Site a development with significant open spaces with various retail and commercial uses (Wheel Terminal Building), a 625-foot-tall Observation Wheel, and public and accessory parking; and on the South Site a terraced development including retail, a hotel, a catering facility, other support uses, and public and accessory parking.

NORTH SITE (NEW YORK WHEEL)

The North Site would be developed with the 625-foot-tall Observation Wheel. The 1,440-passenger Observation Wheel that would take passengers on a 38-minute ride, providing them with views of the Manhattan skyline, its waterways, the Statue of Liberty, Brooklyn, Queens, Staten Island, and New Jersey.

The Wheel would have the following main elements: legs, rim, spokes, hub, and capsules. Each of the Wheel's four legs would be about 13 feet in diameter. One leg would have a service elevator and the others would have stairways inside. The Observation Wheel's capsules would be firmly attached to the rim and would remain level relative to the ground, allowing visitors to remain upright and feel virtually no vibration while on the Wheel. The 72 spokes would be rods that would radiate from the Wheel's center, also called the hub. The 36 fully enclosed passenger capsules would carry up to 40 passengers each, for a maximum capacity of 1,440 passengers per ride. Based on a capacity of 80 percent and 1.61 rotations per hour, the theoretical hourly capacity is estimated at 1,855 passengers. Annual visitation for the Wheel is estimated at up to 3.0 million visitors per year.

The Wheel would require reserved tickets with timed entries. Visitors would purchase tickets at the ticketing area of the Wheel Terminal Building. It is expected that about 20 percent of visitors would purchase tickets online. The Wheel would meet ADA requirements. It would remain in constant motion, moving about 10 inches per second, allowing visitors to safely board and depart (the Wheel could be stopped when required). Passengers would board the Wheel from the pre-flight passenger deck, which would be located on the second floor of the Wheel Terminal Building. After the 38-minute ride, passengers would exit the Wheel onto the post-flight platform also located on the second floor of the Wheel Terminal Building.

At night, the Observation Wheel would be lighted to varying degrees, depending on the season and the scheduling of events, and would be visible within a context of nighttime views across the Harbor from Lower Manhattan and portions of the waterfronts of Brooklyn and New Jersey. There would be no lighting of the structure on the landside, and the wheel structure would be largely dark in views from the study area upland of Richmond Terrace. It is currently envisioned that LED lighting would be placed on the capsules, the rim, and on 72 cable spokes (or similar hub-to-rim catenaries) of the Observation Wheel. The lighting strategy would be highly directional, to shield the upland neighborhoods from direct lighting and to avoid sky glow, and would be designed and programmed to minimize environmental effects and to avoid navigation interference in the harbor or for area aviation traffic. Furthermore, all decorative lighting on the Observation Wheel would be reduced during the spring and fall bird migration period and greatly reduced or entirely suspended during periods of heavy fog or rain. The reflecting pool under the Observation Wheel, and paths on the green roof and surrounding the terminal and parking structures, would also be illuminated. There may also be fireworks displays at the site, both individually and in conjunction with games at the Stadium.

The Observation Wheel would be accessed from the 95,100 gsf Wheel Terminal Building, which would house amenities including 47,300 gsf of Wheel-related commercial space (including uses such as ticketing, office space specific to the Wheel and its commercial operations, coat check, etc.), 18,500 gsf of retail space (including eating and drinking establishments), a 7,600 gsf restaurant, 5,900 gsf of exhibition or wheel hall space, 4,200 gsf of theater space, and 11,600 gsf for back of house and mechanical space specific to the Wheel and its related commercial operations. The two, 120-seat theaters would show an approximately 5-minute long 4D movie focused on the visual history of New York City with an emphasis on bridges, tunnels, and monuments. A 4D film combines a 3D film on a curved screen with seating that is mechanically elevated to give the viewers a sensation of flying and being surrounded by the screen. It also employs some physical effects that occur in the theater with the film, which may include water misting, aroma and minor vibration.

Parking would be provided in a three-level public parking structure with an estimated capacity of 950 cars and 12 buses. This managed parking facility is required to provide 820 parking spaces to replace the existing capacity and to provide 130 additional spaces to meet the needs of the proposed development.

On the sloping roof of the public parking structure and Wheel Terminal Building, and at entrances along Bank Street and Richmond Terrace, would be 7.88 acres of open space, all of which would be publicly accessible with paths throughout the open space. The publicly accessible open space would include areas for passive recreation, including landscaped green spaces, walkways with benches, and scenic vantage points. There would be a 0.65-acre plaza on Richmond Terrace adjacent to the Stadium, as well as a 1.53-acre plaza and landscaped area that is proposed outside of the Bank Street entrance to the Terminal Building. A promenade would lead from Richmond Terrace to a 0.36-acre playground that would be surrounded by trees and a pathway at the southwest corner of the site. There would be another 5.34 acres of passive open space with a 0.56-acre garden surrounding sustainable features, pathways, and landscaping. In total, the North Site would include approximately 7.88 acres of publicly accessible open space. Approximately 2.18 acres of this public space (the two plazas serving the Terminal Building) would be open to the public 24/7. The remaining 5.70 acres of publicly accessible space on the roofs of the parking facility would have controlled access (open to the public from 6 AM to Midnight during the summer and from 7 AM to 10 PM during the winter).

Several elements of the North Site would focus on sustainability. Both the Observation Wheel and the Wheel Terminal Building would be designed to obtain Leadership in Energy and Environmental Design (LEED) Platinum certification. The Wheel Terminal Building would display an array of sustainability programs. Sustainability features on the green roofs are planned to include cylindrical wind turbines and a solar panel array area. The green roof, green infrastructure, as well as the implementation of best management practices such as sand filters and permeable pavement, would provide a stormwater management system that would meet the standard requirements of NYSDEC water quality treatment practices.

The proposed site plan for the North Site provides enhanced upland connections to Richmond Terrace and the St. George civic center. The RROW would be decked over to be level with Richmond Terrace and provide direct access to the North Site open space and to the Wheel Terminal Building. Connectivity between the waterfront and Richmond Terrace would also be provided with a pedestrian pathway that would start near Nicholas Street. A new pedestrian path along the eastern portion of the North Site would provide an enhanced connection between Richmond Terrace and the Bank Street Entrance Plaza. These pedestrian connections would allow greater connectivity between the waterfront and the neighborhood of St. George neighborhood.

In addition, with the proposed project, Bank Street would be widened from a 24-foot to a 30-foot roadway and would include a bike lane from Jersey Street to the easternmost boundary of the North Site. As part of the widening, improvements would be provided to replace or bring up to current standards key waterfront esplanade amenities including lampposts, tree plantings, catch basins, bike racks, benches, and areas of

storm-related damage to walkways and trees between the Postcards 9/11 Memorial and the end of the improved esplanade just north of the project site.

SOUTH SITE (ST. GEORGE RETAIL DEVELOPMENT)

The South Site would be developed with St. George Retail Development, which would include 340,000 gsf of high-end retail outlet space with between 50 and 125 retailers. Approximately 30,000 gsf of this retail space would be accessory eating and drinking establishments split between restaurant and fast food space. There would be four levels of retail, with the smallest amount of retail space on the lowest level adjacent to and facing Bank Street, gradually growing in size to the third and largest retail level, where there would be pedestrian connections with both Richmond Terrace and the Ferry Terminal bus platform. There would also be retail space on the fourth level, which is the proposed food and beverage/retail level. A 200-room, 130,000 gsf hotel would also be constructed on the South Site along Richmond Terrace. The hotel (including the rooftop mechanical space) would rise approximately 149 feet above Richmond Terrace and 177 feet above the base retail level. The South Site would also include a 20,000 gsf catering facility and 40,000 gsf of back of house and mechanical uses. Parking would be provided generally below the retail levels. There would be three levels of parking that would have an estimated capacity of approximately 1,250 spaces. This parking facility is required to replace 786 parking spaces. In addition, the parking facility would add additional spaces to meet the needs of the proposed development.

At night, it is envisioned that the hotel and landscaping on the South Site would be accented by uplighting; lighting would also be provided on storefronts, building façades, and imbedded within the landscaping. The elevations of the buildings would have signage that would be illuminated to identify the retail center, the hotel, the catering facility, and possibly individual tenants. Connective pathways between corridors would be highlighted to assist with wayfinding, and lighting from facades, soffits, and other building elements would be intended to give the site an iconic character. The lighting design would be mindful of adjacent waterfront, residential areas, and adjacent NYCDOT Ferry operations.

On the South Site, there would be pedestrian corridors traversing the South Site from Richmond Terrace to Bank Street and the waterfront. A central pedestrian corridor would bring pedestrians across the site traversing the east-west direction, connecting the Ferry Terminal's upper level and Bus Terminal to the open corridors and the Stadium. Landscaping on the South Site would provide a welcoming urban environment that would link the upland area to the Harbor. Landscaping would include planters and seating along the main north-south pedestrian corridor, planted buffers along Richmond Terrace, and vertical planters along Wall Street. There would also be a newly created pedestrian esplanade, the Bank Street Esplanade, which would be separated from the newly created service road by a small retaining wall. The proposed Bank Street Esplanade would prohibit vehicular access with the exception of emergency vehicles. The building structure would deck over the majority of the MTA property located on-site to make a street-level connection with Richmond Terrace.

The South Site has been designed around a retail "Italian hill town" that would provide views of the Harbor, enhance public access to the waterfront by stepping down from Richmond Terrace to the waterfront at Bank Street, and provide architectural interest. The proposed project has been designed to relate to its context, inviting pedestrians from across Richmond Terrace, the Stadium, the waterfront, and the Ferry Terminal. The proposed development would provide enhanced upland connections to Downtown St. George and the St. George civic center. In addition, the site plan was designed to provide visual connections between Downtown St. George and the waterfront.

The design of St. George Retail Development would have expansive open corridors to the water, contemporary materials reflective of the industrial waterfront, and a sustainable green roof visible from the Harbor. As discussed above, there would be four levels of retail, with the lowest and smallest retail level adjacent to and facing Bank Street, gradually rising up and growing in size to the third and largest retail level where there would be pedestrian connections with both Richmond Terrace and the Ferry Terminal bus platform. There would also be retail space on the fourth level, which is the proposed food and

beverage/retail level. The retail stores on the third and largest retail level would be located along open pedestrian promenades, visually and physically connecting Richmond Terrace and the civic center to the waterfront. The main promenade would provide a visual connection between the lower Ferry Terminal exit and the civic courtyard across Richmond Terrace. A pedestrian walkway would bring pedestrians across the site, connecting the Ferry Terminal's upper level and Bus Terminal to the open corridors and the Stadium.

With the proposed project, the portion of Bank Street fronting the South Site would be reconfigured to minimize vehicular pedestrian conflicts while providing a more generous public esplanade and maintaining NYCDOT and emergency vehicle access. The reconfigured service road, which would run alongside the edge of the bulkhead at the existing elevation of approximately +7 feet Staten Island Datum (SID), is intended to service the existing Ferry Terminal and would be open to NYCDOT and emergency vehicle use only. There would also be a newly created pedestrian esplanade, the Bank Street Esplanade, at an elevation of approximately +11 feet SID, placing it above the Federal Emergency Management Agency (FEMA) Best Available Flood Hazard Data (BAFHD) 100-year floodplain. The BAFHD maps were released by FEMA on July 2, 2013, for areas in New York City, including Staten Island.

The pedestrian esplanade would be separated from the newly created service road by a small retaining wall. The pedestrian esplanade is planned to incorporate a row of tree plantings, a mix of ground plantings, and a planted area on top of the retaining wall that would help conceal the grade change and service road beyond. The area would have a mixture of seating types with some fixed locational seating as well as additional moveable seating to provide flexibility to users of the space. The esplanade would vary in width from approximately 40 to 60 feet and an appropriate width is being maintained for fire and emergency access to the site as well and the NYCDOT facilities beyond.

The existing staircase from the Ferry Terminal to Bank Street would be reconfigured with the proposed project to accommodate the service road. The existing staircase has a ramp connected to its northern elevation that would be removed and replaced with an elevator that would be placed adjacent to the stair on its southern side. The landing and steps of the staircase would be reconfigured to provide additional width at the bottom of the stairs. Sustainability measures and green technologies would be incorporated on the South Site. The South Site would strive to achieve up to LEED Silver rating.

The proposed landscaping along the main north-south corridor would include planters and seating in order to create an open pedestrian boulevard while not obstructing the view corridor. In addition, the Central Plaza, an approximate 6,000-square-foot plaza, would be located adjacent to the main north-south corridor that would include trees and ground plantings, fixed and movable seating, as well as flexible space that can be utilized for possible events for the community. Also, as described above, the 11,000 to 12,000-square-foot Bank Street Esplanade would have plantings and seating. Landscaping along Richmond Terrace would maintain and replace or add, where necessary, to the existing street tree line along the edge of the sidewalk. Planted buffers would be provided along the valet area adjacent to the opening in the deck to the easement below in the southeast corner of the South Site. Additional planting would be included in the larger plaza areas on the edge of the South Site. Along Wall Street would be vertical planters or a green wall of planted vines to allow more space for pedestrian movement on the sidewalk.

NO CATERING FACILITY SCENARIO

It is possible that the project sites could be developed with a No Catering Facility Scenario. This scenario includes the same program on the North Site as the proposed project. On the South Site, this scenario removes the 20,000-square-foot catering facility and 5,000 square feet of back of house space. This space would be replaced with 25,000 square feet of retail space. The total square footage of this scenario is equal to the square footage of the proposed project.

POTENTIAL WATERBORNE TRANSIT LANDING SITE

Although the Wheel, St. George Retail Development, and existing Staten Island attractions would rely heavily on the Staten Island Ferry, there is also an opportunity to bring customers directly to these venues from locations other than the Battery in Lower Manhattan. Waterborne transit service may be provided to the potential waterborne transit landing site from a west side Midtown Manhattan location, Pier 11 or Pier 17 in Lower Manhattan, from other New York City boroughs, and from New Jersey.

If pursued in addition to the proposed North Site and South Site developments, the waterborne transit landing is envisioned to be a 2,700-square-foot single-bow, front- and side-loading floating barge. This barge would be accessed from an approximate 90-foot gangway that would be attached to the existing fixed pier located adjacent to the Stadium at the end of the Wall Street Ramp. A shelter for dock operations would be proposed on or near the existing pier. It is anticipated that service to the potential waterborne transit landing would run continuously during the hours of operation of the retail outlet center and the Wheel.

CIRCULATION AND PARKING

Access to the project sites would be from a combination of existing and modified vehicular, transit, and pedestrian circulation elements.

NORTH SITE

Vehicular Circulation

In the future with the proposed project, the North Site would continue to be accessed by Bank Street via Jersey Street (at the Richmond Terrace and Jersey Street Intersection). With the proposed project, Bank Street would be widened from a 24-foot roadway to a 30-foot roadway. The widened Bank Street would include a bike lane from Jersey Street to the easternmost boundary of the North Site. In addition, a proposed connection from Richmond Terrace at Nicholas Street would connect directly into the parking structure. Taxis, charter buses, and trucks would access the North Site via Bank Street and would load/unload in designated areas within the parking structure on the service drive.

Pedestrian Circulation

Pedestrians would circulate from the Ferry Terminal, potential waterborne transit landing, and the South Site along the Waterfront Esplanade to pass the Postcards 9/11 Memorial and arrive at the Wheel Terminal Building, where they could purchase tickets, board the Observation Wheel, shop at the retail stores, dine at the restaurants, or go to the theater and exhibition space. Pedestrians could also access the site from Richmond Terrace as there would be a deck over the RROW that would provide access to the North Site's open space and Wheel Terminal Building. There would be several pathways through the open space on the North Site. Pedestrian circulation between the waterfront and Richmond Terrace would be improved by the proposed Sunset Walk that would start near Nicholas Street. Also, a new pedestrian path along the eastern portion of the site would provide a connection between Richmond Terrace and the Bank Street Entrance Plaza.

SOUTH SITE

Vehicular Circulation

The South Site would be approached primarily by vehicles from Richmond Terrace and accessed by vehicles from the recently constructed ramp that is aligned with Wall Street. Vehicles could enter the parking structure at two entrances along the Wall Street Ramp. The secondary approach would be via Bank Street (at the Richmond Terrace and Jersey Street intersection). A valet/drop-off area for the hotel would be provided on Richmond Terrace, with access opposite Schuyler Street and egress south of the Wall Street Ramp, both via new curb-cuts on Richmond Terrace. The valet service, which is intended for the hotel and catering facilities, would have one entrance driveway and one exit driveway on Richmond Terrace. In addition to picking-up and dropping-off vehicles for valet parking, this area would also be used by taxis to pick-up and drop-off passengers at the site. Trucks would access the South Site via the Richmond Terrace and Wall Street Ramp and the Richmond Terrace and Jersey Street intersections and would load/unload in designated internal areas accessed from the Wall Street Ramp (for hotel, retail, and catering deliveries). The retail loading area would be in a designated internal area off of the Wall Street Ramp, with the entry point closer to Bank Street. The loading dock for the hotel would be in a designated internal area off of the Wall Street Ramp, with the entry point located closer to Richmond Terrace. The largest trucks would need to access the South Site via the Richmond Terrace/Wall Street intersection.

In addition, there would be a reconfigured Bank Street service road that would be open to NYCDOT and emergency vehicle use only. The reconfigured service road would run alongside the edge of the bulkhead at the existing elevation of approximately +7 feet SID. Adjacent to the service roadway would be a small retaining wall, planted buffer and railing, which would separate it from the proposed Bank Street Esplanade that would be at elevation of approximately +11 feet SID. The proposed Bank Street Esplanade would prohibit vehicular access with the exception of emergency vehicles.

Pedestrian Circulation

The South Site is designed to maximize pedestrian access onto and through the site. As discussed previously, there would be open pedestrian corridors traversing the South Site from Richmond Terrace to Bank Street and the waterfront. The main promenade would provide a visual connection between the lower Ferry Terminal exit and the civic courtyard across Richmond Terrace. A central pedestrian corridor would bring pedestrians across the site traversing in the east-west direction, connecting the Ferry Terminal's upper level and Bus Terminal to the open corridors of the retail development and provide new pedestrian routes to the Stadium. There would also be a newly created pedestrian esplanade, the Bank Street Esplanade, which would be separated from the newly created service road by a small retaining wall. This esplanade would serve as the connection between the Ferry Terminal and the project sites.

BICYCLE CIRCULATION

Bicycle circulation would also be encouraged at the project sites and would facilitate connectivity with bicycle paths on Richmond Terrace. A proposed bike path would be developed on the North Site that would start near Nicholas Street and would connect Richmond Terrace to the waterfront. In addition, Bank Street would be widened from a 24 foot roadway to a 30 foot roadway and would include a bike lane from Jersey Street to the easternmost boundary of the North Site. On the North Site, approximately 95 bicycle parking spaces would be provided in the parking structure. A bike rental is also part of the proposed project on the North Site. It is currently envisioned that if available, the proposed North Site bike rental would be part of the New York City Bike Share program. If this is not available, it is envisioned that the space would be occupied by a bike rental and service shop. On the South Site, approximately 119 bicycle parking spaces would be provided along the main north-south corridor near Bank Street.

PARKING

The proposed project would also provide public and accessory parking to replace the current supply of parking and to meet the needs of the proposed developments. On the North Site, the proposed project would provide 820 parking spaces to replace existing capacity and would add 130 spaces, all within a managed

public parking structure with a capacity for 950 cars and 12 buses that will be constructed west of the Observation Wheel. The parking structure would have three floors of parking. Cars would enter the parking structure from Bank Street and from the new vehicle ramp that would be provided at Nicholas Street. The shuttle service that is currently being provided between the surface parking lot on the North Site and the Ferry Terminal would be maintained.

On the South Site, parking would be provided in a three-level, approximately 1,250-car parking structure below the grade level of Richmond Terrace. Vehicles could enter the garage from two entrances located on Wall Street. It would replace 786 public parking spaces and would provide additional spaces to meet the needs of the proposed development.

Interim Parking During Construction

During construction, approximately 1,661 parking spaces would be provided through a combination of spaces on the North Site as well as spaces provided at multiple off-site locations. On the North Site, approximately 820 spaces would be provided throughout construction. During construction, the 820 parking spaces would be provided on the North Site at all times. The configuration and operation of the parking facility on the North Site would vary based on construction activities and would include a combination of surface parking, stackers, and a multi-level parking structure, with a combination of self-park and attendant parking. The shuttle service that currently transports commuters between the North Site and the Ferry Terminal would also be maintained during construction. In addition, the parking supply currently provided on the South Site would be provided at multiple off-site locations. For off-site parking that is not within approximately ⅓ mile from the Ferry Terminal or accessible by the SIRT or city bus, shuttle service would be provided between the temporary off-site parking locations and the Ferry Terminal.

SAFETY

NORTH SITE

The proposed Observation Wheel is designed with extensive life safety and emergency provisions. Power supply and control mechanisms would have redundancies incorporated into the design, and emergency generators would also be provided to provide another layer of emergency power for life and safety (i.e., ventilation and communications). An N+1 emergency generator system, which is also called parallel redundancy and is a safeguard to ensure that an uninterruptible power system is always available, would be provided to operate the Wheel in the event of a general power failure. The emergency generator system would be located outside of current or modified flood zones. At all times, there would be two security cameras to monitor activity in each capsule. In addition, each capsule would have an intercom that would allow instant communication with the operating staff in the control room which would be monitoring all activity on the Wheel. Each capsule would have fire and smoke detection sensors. If smoke is detected in a capsule, an alarm would be transmitted to the control room. In extreme circumstances, any capsule could be returned to the boarding platform in approximately seven minutes. The New York Fire Department would automatically be notified in the event of a fire.

In the event of an emergency, evacuation procedures have been developed to ensure safety of all visitors on the Wheel. Emergency measures include on-site personnel who would be trained to evacuate the Wheel as well as an on-site paramedic during all hours of operation. All evacuation and rescue modes would be part of the Wheel's design and documentation and would include Standard Operating Procedures (SOPs) for single capsule evacuation and total wheel evacuation where the Wheel could be rotated. In the highly unlikely event of the Wheel not being able to be turned under normal or emergency power, there would also be evacuation systems built into the capsules and the Wheel itself. These procedures would also be included in the Life Safety documentation. There would also be regular staff training and exercises based on the agreed SOPs and it is expected that the local emergency services would be heavily involved in these sessions.

The Wheel would monitor weather and would be closed when wind gusts of 40 mph are forecast at a height of 33 feet over the base. This is less due to danger and more to prevent rider discomfort. If there are riders aboard when this level of wind is observed, the Wheel would be evacuated, which would take up to 38 minutes. In addition, the Wheel is designed to absorb motion stress. It has a stable design with four tubular legs firmly planted on a platform with deeply sunk pilings. In extreme weather events, added precautions would be made to secure all capsule doors, and the drives and stabilizers on the rim would be locked.

Since the North Site is mostly in a defined FEMA flood zone, the site has been planned for that. The BAFHD 100-year flood elevations for the North Site and South Site is 12 feet NAVD88 (or 9.9 feet SID) towards the center of the sites and 11 feet NAVD88 (or 8.9 feet SID) on the portions of the sites that are closest to Richmond Terrace.

Due to the projected effects of climate change, and the proposed North Site location within the floodplain, habitable space would be built two feet above the BAFHD 100-year floodplain. Therefore, the proposed design would offer resilience for up to 2 feet of future sea level rise (above the BAFHD 100-year floodplain elevation), which is within the mid-range of sea level increase projected by the 2050s by the New York City Panel on Climate Change (NPCC). Although a surge of unusual proportions could flood the lower level of the Wheel Terminal Building and parking structure, all mechanical and electrical equipment would be located above the floodplain and/or would be housed in watertight enclosures designed to protect against such flooding disasters. In addition, the North Site would have almost 5 acres of green roof as well as a water capture system. This system would absorb the rainwater and filter/purify it and store it and, as required, release it on a controlled basis into the harbor as cleansed water.

SOUTH SITE

The South Site has also been designed for storm resilience based on the BAFHD 100-year floodplain of +12 feet (NAVD88), which equals approximately +9.9 SID. The proposed pedestrian access points, including access to retail, would be located at the lowest elevations on the project site on Bank Street above a minimum elevation of +11 feet SID, where possible. Additionally, flood barricades could be installed at the retail and garage entry points for additional protection.

Besides the retail stores with entrances on Bank Street (approximately 8 percent of the proposed retail development), the remainder of the retail and all of the hotel and catering uses are at least 13 feet above the BAFHD 100-year floodplain. Generators and the substation for the South Site development would be located well above the floodplain at a minimum elevation of +26 feet. Other equipment such as the water and fuel tanks would be located within the building furthest from the waterfront and would be waterproofed to protect against flooding.

The strategy for the parking garage is to reduce the potential for any water to enter, especially the lower level which is at elevation less than 7 feet SID. Pedestrian access points on the lowest level of parking and the loading/MTA access driveway would all slope up to elevation of a minimum of elevation +11 feet SID. There would be no public vehicle access points below elevation +13.7 feet SID on Wall Street and the pedestrian access points would be at elevation +11 feet SID. Access to the MTA and Ferry terminal areas need to be below the flood elevation due to existing grades, flood barricades would be deployed in these locations. The pedestrian garage access corridors would begin to slope down to the garage beyond the face of the project, and flood barricades could be deployed at these locations to provide an added layer of protection up to elevation +13 feet SID.

REQUIRED APPROVALS

The following City and State discretionary actions are necessary for both the North Site and South Site proposed projects to move forward:

ZONING MAP AMENDMENT

Sectional Map 21c would be amended to show the extension of the Special St. George District ("SG") to the shoreline to include the Ferry Terminal, the South Site, the Stadium and the North Site.

ZONING TEXT AMENDMENT TO ADD A NORTH WATERFRONT SUBDISTRICT TO THE SPECIAL ST. GEORGE DISTRICT

The Special St. George District text would be modified to add a new North Waterfront Subdistrict that would include the North Site and South Site, the Ferry Terminal, and the Stadium Sites. The Subdistrict text would provide new special permit provisions that would enable the proposed projects on the North Site and South Site to be developed. The proposed text would:

- Establish visual corridors specific to the Subdistrict;
- Provide maps governing development within the Subdistict; and
- Establish a special permit applicable to the Subdistrict that will govern development within the Subdistrict by modifying the existing Stadium special permits in the Subdistrict, establishing use regulations, including signs, transparency and parking, as well as bulk provisions permitting the distribution of floor area within the North Waterfront Subdistrict without regard for zoning lot lines, establishing yard requirements, permitting development located partially or entirely within a railroad or transit right-of-way or in railroad or transit air space.

NORTH SITE

DISPOSITION AND BUSINESS TERMS

- Site will be disposed of via a long-term lease pursuant to Section 1301(2)(g) of the New York City Charter.
- Disposition of property rights as needed including the possible transfer or conveyance of development rights to construct a deck and roadway over the RROW.

SPECIAL PERMIT

- A special permit pursuant to proposed zoning section 128-61 that will permit development of the North Site pursuant to the applicable provisions of the new special permit text and modify the previous special permits granted from the Stadium. This special permit would establish appropriate bulk and height and setback requirements, parking regulations, signage regulations, transparency regulations, yard regulations, planting area regulations and allow development to be located partially or entirely within a railroad or transit right-of-way or yard.

NYCDOT Actions and Approvals

- Curb cut to use Nicholas Street for both vehicular and pedestrian access.
- Potential revocable consent for structural connections to deck over the RROW.

NYSDEC Actions and Approvals

- NYSDEC consent for disturbance of soil beneath the cap for areas subject to Voluntary Cleanup Agreement (VCA) as per March 2006 *Operation, Maintenance and Monitoring Plan,* which set out the requirements for maintaining the site cap and building methane venting systems as well as health and safety requirements and approval of corrective measures, work plan, and site management plan.
- NYSDEC approval to amend deed restriction.
- NYSDEC Article 25 of the Environmental Conservation Law (ECL) Tidal Wetlands Permit.
    - Authorization to subdivide waterfront lots.
    - Authorization for development within the Adjacent Area.
    - Authorization for reconstruction of outfalls.

SOUTH SITE

DISPOSITION AND BUSINESS TERMS

- Site will be disposed of via a long term-lease pursuant to Section 1301(2)(g) of the New York City Charter.
- Disposition of property rights as needed including the possible transfer or conveyance of development rights over the RROW.

SPECIAL PERMIT

- A special permit pursuant to proposed zoning section 128-61 that will permit development of the South Site pursuant to the applicable provisions of the new special permit text and modify the previous special permits granted for the Stadium. This special permit would permit the distribution of floor area within the North Waterfront Subdistrict without regard for zoning lot lines and would establish appropriate bulk and height and setback requirements, yard requirements, parking regulations, signage regulations, transparency regulations, planting area regulations and allow development to be located partially or entirely within a railroad or transit right-of-way or yard.

NYCDOT Actions and Approvals

- Mid-block access on Richmond Terrace (e.g., street geometry change, new signals, and turning lanes) and two curb cuts for hotel access.
- Potential revocable consent for structural connections to access the site (including decking over RROW).
- Potential approvals for entrances to the garage from Wall Street.

NYSDEC Actions and Approvals

- NYSDEC consent for disturbance of soil beneath the cap for areas subject to VCA as per March 2006 *Operation, Maintenance and Monitoring Plan,* which set out the requirements for maintaining the site cap and building methane venting systems as well as health and safety requirements and approval of corrective measures, work plan, and site management plan.
- NYSDEC and/or New York City Department of Environmental Protection (NYCDEP) remedial action plan for portion of site not subject to prior VCA.
- NYSDEC approval to amend deed restriction.
- NYSDEC Article 25 of the ECL Tidal Wetlands Permit.
    - Authorization to subdivide waterfront lots.
    - Authorization for development within the Adjacent Area.

The zoning map amendment, the disposition actions and the request for the granting of special permits pursuant to the proposed text are subject to the City's Uniform Land Use Review Procedure (ULURP). The design of the proposed project would also require Public Design Commission (PDC) approval. The zoning text amendment, while technically not subject to ULURP would follow a review process similar to ULURP and proceed simultaneously with the other actions. Additional related actions would include permits and approvals from NYCDOT for proposed signal and roadway improvements and review and approval of construction drawings regarding construction adjacent to NYCDOT facilities, and NYSDEC for stormwater management during construction and operation. In addition, the proposed project would likely require an amended drainage plan which is subject to the approval of NYCDEP. Additional approvals could also be required from NYCDEP for the extension of sanitary sewer lines and/or storm sewers. Review may also be required by the Industrial Development Agency. Projects may also utilize city and state economic development grants and incentives as evaluated through the Consolidated Funding Application process. Actions may also be required for temporary barges during construction.

It is intended that state agencies, including MTA and NYSDEC would be in a position to make the required findings for their respective actions based on this environmental review. The lead agency has and will continue to coordinate with involved agencies.

Since the project sites lie within the designated boundaries of the City's coastal zone, the City's coastal zone management policies apply. The City Planning Commission (CPC), acting as the City Coastal Commission, must therefore make a consistency determination pursuant to these policies.

POTENTIAL WATERBORNE TRANSIT LANDING

If pursued in addition to the North Site and South Site developments, the following City and State discretionary actions are necessary for the potential waterborne transit landing to move forward:

Business Terms

- Approval of business terms pursuant to Section 1301(2)(f)

Waterfront Requirements

- Certification pursuant to ZR Section 62-811 to certify compliance with the requirements of waterfront public access area and visual corridors.
- Waterfront public access area, as may be required per ZR Sections 62-57 and 62-58.

NYSDEC Actions and Approvals

- Permit for disturbance of the bed or banks of a protected stream or other watercourse; permit for construction, reconstruction or expansion of docking and mooring facilities; and permit for excavation or placement of fill in navigable waters and their adjacent and contiguous wetlands per Section 608 of Title 6 of the New York Code of Rules and Regulations (NYCRR).
- Permit for constructing open pile catwalks and docks more than four feet in width; and installing a floating dock totaling more than 200 square feet in area per New York State's Section 661.5 of the Tidal Wetlands regulations within Title 6 of NYCRR.

New York State Department of State

- Coastal Consistency Determination

Construction and operation of the potential waterborne transit landing would also require licenses, compliance, and/or inspections which are "ministerial" actions under 6 NYCRR Section 617.5(c)(19) for which no environmental review is needed. SBS would review all maritime projects for compliance with New York City's Building Code and Zoning Resolution. NYCDOT would issue permits and licenses to private ferry operators. In addition, all ferry operators are required to comply with the Accessible Water Borne Commuter Services Facilities Transportation Act of the New York City Administrative Code, which outlines accessibility requirements for all ferry vessels and docks in New York City. The U.S. Coast Guard would require vessel and dock inspections. The waterborne transit landing would require a permit from the Army Corps of Engineers per Section 10 of the Rivers and Harbors Act.

PROBABLE IMPACTS OF THE PROPOSED PROJECT

LAND USE, ZONING, AND PUBLIC POLICY

The analysis finds that the proposed project would not have any significant adverse impacts on land use, zoning, or public policy. The proposed project would convert large surface parking lots located on prime waterfront property into a vibrant mixed-use area that capitalizes on existing transportation infrastructure, showcases views of New York Harbor and the Manhattan skyline, and supports the planning goals for St. George and Staten Island all without adversely affecting the sites' current role providing public parking for the Ferry Terminal and the Stadium. The proposed project capitalizes on St. George's status as a civic center and transportation hub and enhances the neighborhood by providing a major public attraction and improved access to the waterfront. With the proposed project, a zoning map amendment, a zoning text amendment,

and special permits pursuant to the amended text would be required. The Special St. George District text would be modified to add a new North Waterfront Subdistrict that would include the North Site, South Site, Ferry Terminal, and Stadium sites. These actions would be limited and specific to the above listed sites and would not result in potential changes in the broader area.

The proposed project serves local planning goals, as described in NYCEDC and DCP's *North Shore 2030* plan, to redevelop the St. George area with new public amenities and commercial space, as well as improve overall mobility throughout the area. Similarly, the proposed project serves the citywide planning goals concerning New York City's waterfront, as described in DCP's *Vision 2020: New York City Comprehensive Waterfront Plan*, to repurpose former industrial space with facilities that promote public access to and enjoyment of the waterfront. The potential waterborne transit landing would also be compatible with the surrounding transportation-related uses located adjacent to the project sites, and would have no impacts on land use, zoning, or public policy in the area.

The proposed project is generally consistent with transit-oriented development and the enhancement of transit options associated with the New York City Transit's (NYCT) North Shore Alternatives Analysis (NSAA). However, it is noted that should the Bus Rapid Transit (BRT) plan move forward, it would require a refinement of the bus terminus at St. George since the initial BRT plan shows terminal operations that would conflict with the South Site development plan. Currently, NYCT is conducting additional design work to identify alternative designs for BRT terminal operations at St. George. The project remains under active consideration.

SOCIOECONOMIC CONDITIONS

The analysis presented in this chapter finds that the proposed project would not result in significant adverse socioeconomic impacts. In accordance with *CEQR Technical Manual* guidelines, this analysis evaluates the proposed project against six specific elements that can result in significant adverse socioeconomic impacts: (1) direct displacement of residential population on a project site; (2) direct displacement of existing businesses on a project site; (3) indirect displacement of residential population in a study area due to increased rents; (4) indirect displacement of businesses or institutions in a study area due to increased rents; (5) indirect business displacement due to retail market saturation; and (6) adverse effects on specific industries.

DIRECT RESIDENTIAL DISPLACEMENT

A preliminary screening-level assessment finds that the proposed project would not result in significant adverse impacts due to direct residential displacement. The proposed project would redevelop two sites occupied by public parking lots, and would therefore not directly displace any residents. In addition, a waterborne transit landing may be constructed off of a fixed pier at the end of the Wall Street Ramp. The proposed waterborne transit landing would also not directly displace any residents.

DIRECT BUSINESS DISPLACEMENT

A preliminary assessment finds that the proposed project would not result in significant adverse impacts due to direct business displacement. The proposed project would be built on sites that are currently developed with public parking lots containing a total of 1,570 parking spaces (with an additional 56 spaces to be added to the South Site in the near future). The parking lots are operated by NYCEDC and NYCDOT and serve the commuter needs associated with the Ferry Terminal and the intermittent need for public parking when the Stadium is in use.

The commuter parking for Staten Island Ferry passengers and for Stadium events would be maintained throughout the proposed project's construction period at temporary facilities located both on- and off-site. Upon completion, the proposed project would replace the 1,626 parking spaces that would be on the project sites in the future without the proposed project and would provide for an additional 574 spaces and 12 spaces for buses to accommodate the demand generated by the proposed project. Area businesses, visitors, and commuters would continue to have access to parking, and therefore, the displacement of the existing lots would not adversely affect area market conditions.

In addition, a waterborne transit landing may be constructed off of a fixed pier at the end of the Wall Street ramp. The proposed waterborne transit landing would not directly displace any businesses.

INDIRECT RESIDENTIAL DISPLACEMENT

A preliminary screening-level assessment finds that the proposed project would not result in significant adverse impacts due to indirect residential displacement. The proposed project would not include any residential development, and therefore falls below the *CEQR Technical Manual's* 200-unit threshold warranting assessment.

INDIRECT BUSINESS DISPLACEMENT DUE TO INCREASED RENTS

A preliminary assessment finds that the proposed project would not result in significant adverse socioeconomic impacts due to indirect business displacement caused by increased rents. The proposed project would introduce a mix of uses, including retail, hotel, entertainment, and parking. Although the study area currently contains parking, an entertainment use (the Stadium) and local-serving retail, the proposed Observation Wheel (including the exhibition and theater space uses) and retail outlet center would introduce entertainment and retail uses of a larger scale, drawing visitors from across the region and beyond, and would operate throughout the day and year-round, in contrast to the Stadium which draws visitors from a smaller market area and only during baseball games in the season. Similarly, while the study area currently contains some retail uses, the type and scale of the proposed retail outlet center would represent new economic activities. The hotel and catering facility would also introduce new economic activities in the study area. The potential waterborne transit landing would not be a new economic activity due to the transportation-related uses that already exist in the study area.

In the aggregate, the new uses would draw new visitors and consumer expenditure potential to the study area, which in turn could lead to an increase in commercial property values and rents at some locations. While additional visitation to the study area is not expected to alter the commercial office market in the study area, some retail and industrial property owners may seek to locate new commercial tenants in order to capitalize on the change in market conditions. However, the potential for business displacement due to increased rents is limited, and would not adversely affect neighborhood conditions. Rather, project-generated visitation could lead to decreases in retail vacancy rates within the study area and a broader retail offering. Local area demand for neighborhood goods and services would continue to be met by businesses within and immediately surrounding the study area.

INDIRECT BUSINESS DISPLACEMENT DUE TO RETAIL MARKET SATURATION

A detailed analysis finds that the proposed project would not result in significant adverse neighborhood character impacts due to retail market saturation. The primary considerations that led to this finding are as follows:

- The customer base for the proposed project would be drawn from a wide geography, diffusing potential competitive effects. Because the retail outlet center would draw customers from across the City and beyond, the potential for individual existing shoppers' goods stores to be negatively affected by competition from the proposed project is limited. For the most part, proposed project retail sales coming from shoppers who live outside of Staten Island do not represent sales that might normally be captured by Local Trade Area stores in the existing condition or future without the project.
- The Staten Island Local Trade Area is currently underserved by retail stores offering shoppers' goods, particularly stores specializing in name brand, high-end merchandise. The proposed project would help to fill this gap in the retail market.
- Retail trade industry literature and market studies suggest that outlet shopping centers often complement, rather than compete with traditional shoppers' goods stores.
- Department stores and discount department stores distinguish themselves from outlet retail centers in a number of ways including greater diversity of merchandise, often including a combination of shoppers' goods and convenience goods, and a single check-out point, which many customers value for convenience and speed.

- Existing department stores on Staten Island do not serve as primary anchors to neighborhood retail concentrations. Therefore, smaller-scale neighborhood stores would not fail due to lack of retail traffic if one of the existing department or discount department stores were to close due to competition with the proposed project.

Overall, the proposed project would generate increased retail traffic that could benefit existing retail businesses in the Staten Island Primary Trade Area. While the possibility of some limited indirect business displacement due to competition cannot be ruled out, any displacement that might occur is expected to be minimal, would not jeopardize the viability of any neighborhood retail strips or concentration of stores offering similar products and, therefore, is not expected to result in significant adverse impacts on neighborhood character.

ADVERSE EFFECTS ON SPECIFIC INDUSTRIES

A preliminary assessment finds that the proposed project would not have the potential to have a significant adverse impact on any specific industries in the City. Direct displacement from the proposed project would be limited to the temporary loss of two public parking lots during construction but this parking capacity would be returned to the sites, along with new parking capacity intended to meet the demand generated by the proposed project. While some limited indirect business displacement cannot be ruled out, the businesses that could potentially be displaced do not represent a critical mass of businesses within any City industry or category of businesses and the goods and services offered by potentially displaced uses can be found elsewhere within the ¼-mile study area, Staten Island, and the City. Therefore, the proposed project would not affect the economic viability or substantially reduce employment in any industry or category of business.

COMMUNITY FACILITIES

The *CEQR Technical Manual* defines community facilities as public or publicly funded facilities, including schools, health care, day care, libraries, and fire and police protection services. Direct effects may occur when a proposed project physically alters or displaces a community facility. Indirect effects may result from increases in population that place additional demands on community facility service delivery. Overall, the proposed project would not result in significant adverse impacts on community facilities as the project would not result in a direct effect on any community facility, nor would it contain a residential component that would place additional demands on the service delivery of any community facility. In addition, as discussed in the chapter, it is not expected that the proposed project would adversely affect emergency access and response time.

OPEN SPACE

A preliminary analysis of the proposed projects' indirect effects on open space was conducted to determine the need for a detailed analysis. The preliminary analysis concluded that the proposed project would not result in a significant adverse impact on open space.

The open space analysis compared conditions with and without the proposed project. The No-Action condition shows a large open space ratio of 1.04 acres per 1,000 workers, a ratio that far exceeds the City's recommended guideline of 0.15 acres. This is based on the study area's immediate proximity to the North Shore Waterfront Esplanade and relatively low density of workers. With the proposed project's net increase of 7.81 acres of publicly accessible open space on the North Site and South Site, the ratio would increase to 2.17 acres per 1,000 workers. The proposed project also would not result in any significant adverse direct impacts to open space related to shadows, air quality, noise, or odors.

SHADOWS

Development on the North Site and South Site would create new incremental shadow on open space, natural, and cultural resources, but the analysis concluded that the proposed project would not result in any significant adverse shadow impacts. And although the Wheel on the North Site is considerably taller than surrounding existing development, the majority of the structure is essentially transparent. The design elements, including glass passenger capsules and a simple single connecting rim would allow for ample light

to pass through the Wheel and would minimize the creation of shadows. Nevertheless, this analysis is conservative as the shadow generated from the glass passenger capsules is treated like shadow from an opaque structure. It would be expected though that the partially translucent glass capsules would let fair amounts of light through and may not produce as much shadow as a completely opaque structure.

The extent and duration of shadows would vary greatly between resources. Shadows from either the North Site or South Site would cast shadow on portions of the North Shore Waterfront Esplanade and the Upper New York Bay in all seasons, from 1½ hours to nearly 9 hours. A majority of project-generated shadow would originate from the Observation Wheel. As discussed above the Wheel's design elements, including glass passenger capsules and a simple single connecting rim would make the Wheel mostly transparent. Resources affected by shadow from the glass passenger capsules would likely receive some sunlight rather than being entirely shaded. At no time would any of the resources affected on all analysis days be completely in shadow. New shadow from the two development sites on all other affected resources, including 93 St. Marks Place, the North Shore Esplanade, and the Richmond Terrace Greenstreets, would not occur in all seasons, would be short in duration, and would occur in the early morning. For these reasons, the proposed project would not result in significant adverse shadow impacts.

HISTORIC AND CULTURAL RESOURCES

Overall, this analysis concludes that the proposed project would not significantly adversely affect historic and cultural resources. There are no known or potential architectural resources located on the project sites. Therefore, the proposed project would not have any direct or indirect impacts on on-site architectural resources.

With the proposed project, the known and potential architectural resources in the study area would continue to be located in an area characterized by structures of different scales, architectural styles, and from different construction periods. No architectural resources in the study area would be destroyed, demolished, damaged, altered, or neglected. The proposed project would not replicate aspects of these architectural resources to create a false historical appearance, change the architectural resources such that they would become different visual entities, or isolate them from their setting. None of the known or potential architectural resources in the study area are located within 90 feet of the project sites, and thus the proposed project would not result in any direct impacts to any of the known or potential architectural resources in the study area.

Within the study area, the proposed development would be most notable from Richmond Terrace—given the roadway's wide width and adjacency to the project sites—and the proposed project would represent a significant change to the context of the architectural resources on the inland side of Richmond Terrace. However, the project would not be anticipated to significantly alter the visual prominence of these architectural resources. In their present condition as parking lots, the North and South Sites do not contribute to or enhance the setting of these resources, and thus the development of the project sites in and of itself would not represent a significant change to the context of the architectural resources on the inland side of Richmond Terrace.

Views to the resources on Richmond Terrace from certain portions of Bank Street and the waterfront esplanade could potentially be obscured by the proposed development; however, any development of these sites would be anticipated to limit such views as compared with those in existing conditions. In no case would views of the resources from these locations be fully obstructed. Furthermore, the design of the development on the South Site—long, narrow structures separated by walkways—is intended to maintain visual corridors through that portion of the South Site.

The Observation Wheel would be a unique but not incompatible visual element within the setting of the study area's known and potential architectural resources. Because of its open framework, the Observation Wheel would have less of a visual presence than a built structure of the same size. The visibility of the Observation Wheel in views to architectural resources in the surrounding area would be variable, based on intervening buildings, street trees and other landscaping and vegetation, as well as the screening effects of distance and the Wheel's light-colored metalwork. With the exception of the Observation Wheel, the

proposed development would not be visible in most views of the other known and potential architectural resources within and just outside of the study area.

These changes to the settings and views of the study area's architectural resources would not adversely affect the characteristics for which the historic properties meet or may meet New York State and National Registers of Historic Places (S/NR) and New York City Landmarks (NYCL) criteria.

URBAN DESIGN AND VISUAL RESOURCES

The proposed project would develop new buildings and structures, as well as new publicly accessible open space, where none currently exist. The proposed retail, commercial, hotel, and theater uses would be more active than and would enhance the pedestrian experience of the project sites more than the surface parking lots that would continue to exist in the No-Action condition. The proposed project also would provide enhanced connections to the upland areas. The proposed project would not result in changes to streets or open space resources on the project sites or in the surrounding area, with the following exceptions: the reconfiguration of Bank Street within the South Site to minimize vehicular pedestrian conflicts while providing a more generous public esplanade and maintaining NYCDOT and emergency vehicles, and the widening of Bank Street from a 24-foot roadway to a 30-foot roadway from Jersey Street to the easternmost boundary of the North Site.

While the proposed project would develop a tall structure on a portion of the North Site (the Observation Wheel), this structure would have an open framework, and the structures to be developed on the South Site would be low in scale. In comparison with the No-Action condition, the proposed project would notably alter the visual character of the surrounding study area, but this character is already changing through the various buildings currently under construction, which include tall buildings along Richmond Terrace. The proposed project also would enhance the visual character of the project sites as compared with the existing/No-Action conditions, and thus would enhance the pedestrian experience of the St. George waterfront. The proposed development is intended to become a notable element of, and enhancement to, the urban design and visual character of the Richmond Terrace corridor between Bay and Nicholas Streets.

With the exception of the Observation Wheel, the proposed development would not be particularly visible in most views within and just outside of the study area beyond the immediate Richmond Terrace frontage. The curving of Richmond Terrace north of Nicholas Street and the angling of Bay Street south of its connection to Richmond Terrace preclude most views of the proposed development—other than the Observation Wheel—from these portions of the study area. The proposed hotel on the South Site could potentially be somewhat visible in views north on Hyatt Street and Central Avenue. Views north along Bay Street and Bay Street Landing near the Ferry Terminal would include a portion of the proposed structures on the South Site, including the upper floors of the hotel. The addition of new structures in these views would not significantly alter the visual character of these portions of the study area and also would not screen or eliminate any views to visual resources.

The visibility of the Observation Wheel in surrounding views would be variable, based on intervening buildings, street trees and other landscaping and vegetation, as well as the screening effects of distance and the Wheel's light-colored metalwork. Because of its open framework, the Observation Wheel would have less of a visual presence than a built structure of the same size. Overall, the Observation Wheel would be a unique but not incompatible visual element within the setting of the study area's visual resources.

At night, the Observation Wheel would be lighted to varying degrees, depending on the season and the scheduling of events, and would be visible within a context of nighttime views across the Harbor from Lower Manhattan and portions of the waterfronts of Brooklyn and New Jersey. There would be no lighting of the structure on the land-side, and the wheel structure would be largely dark in views from the study area upland of Richmond Terrace. It is currently envisioned that LED lighting would be placed on the capsules, the rim, and the cable spokes of the Observation Wheel. The lighting strategy would be highly directional, to shield the upland neighborhoods from direct lighting and to avoid sky glow, and would be designed and programmed to minimize environmental effects and to avoid navigation interference in the Harbor and for area aviation traffic. Furthermore, all decorative lighting on the Observation Wheel would be reduced during

the spring and fall bird migration period and greatly reduced or entirely suspended during periods of heavy fog or rain. The reflecting pool under the Observation Wheel, and paths on the green roof and surrounding the terminal and parking structures, would also be illuminated. There may also be fireworks displays at the site, both individually and in conjunction with games at the Stadium.

On the South Site, it is currently envisioned that the hotel and landscaping would be accented by uplighting; lighting would also be provided on storefronts, building facades, and imbedded within the landscaping. The elevations of the buildings would have signage that would be illuminated to identify the retail center, the hotel, the catering facility, and possibly individual tenants. Connective pathways between corridors would be highlighted to assist with wayfinding, and lighting from facades, soffits, and other building elements would be intended to give the site an iconic character. The lighting design would be mindful of adjacent waterfront, residential areas, and adjacent NYCDOT Ferry Operations.

In summary, the proposed project would not result in any significant adverse impacts to urban design or visual resources.

NATURAL RESOURCES

The condition of water quality, aquatic biota, wetlands, floodplains, groundwater, and terrestrial natural resources within and near the project sites would remain generally unchanged with the proposed project. The proposed project would include mixed-use redevelopment of existing waterfront parking lots that presently contain minimal natural resources other than small areas of manicured lawn with trees, ruderal vegetation, and disturbance-tolerant wildlife species that are ubiquitous in urban areas. In addition, a waterborne transit landing may be pursued as a third project component independent of the proposed North Site and South Site developments. The potential waterborne transit landing would be established to service the project sites from New York Harbor.

The proposed project will increase the amount of impervious cover in NYSDEC-regulated tidal wetland Adjacent Area along the shoreline from 32 to 41 percent based on North Site development and the Bank Street Expansion Area (the rebuilding of the Ferry Terminal service road and public esplanade in front of the South Site will not change the level of impervious cover in the Adjacent Area). Since the existing condition already exceeds the regulated threshold of 20 percent, the project's tidal wetland permit will require a variance in the project's authorization under Article 25 of the ECL. In support of that variance, the implementation of green infrastructure and stormwater management measures in accordance with the Stormwater Pollution Prevention Plan(s) (SWPPPs) prepared for the proposed project will result in the discharge of stormwater with the proposed project that would not adversely affect water quality, NYSDEC littoral zone tidal wetlands, and aquatic biota in the vicinity of the stormwater outfalls discharging stormwater from the proposed project. Potential sediment suspension and harbor bottom disturbance during operation of the potential waterborne transit landing would not be expected to have significant adverse impacts to the Harbor's tidal wetlands, water quality, or aquatic biota..

With implementation of green roofs, the proposed project would result in a net increase in vegetation cover and diversity of wildlife habitat at the project sites, which would potentially benefit some wildlife such as insects and songbirds. However, the project sites would likely support the same community of urban-adapted wildlife as at present. Collisions of migrating birds with the Wheel would likely be rare with the anticipated implementation of certain lighting practices and restrictions. Threatened or endangered species with the potential to occur in the area are limited to transient sea turtles and sturgeon that may occasionally and briefly occur offshore from the project sites, because operation of the proposed project would not significantly affect water quality or habitat conditions in Upper New York Harbor in the vicinity of the project sites, there would be no direct or indirect effects on any individuals of these species. Overall, operation of the proposed project would not have significant adverse impacts to natural resources or floodplains in the area.

HAZARDOUS MATERIALS

Since a portion of the project sites and a portion of the Bank Street Expansion Area were previously remediated under a VCA with NYSDEC, continued compliance with the August 2005 *Restrictive*

Declaration would require NYSDEC approval of project plans relating to that portion as they relate to soil disturbance, handling of materials beneath the existing cap, and the need for vapor control beneath new buildings. As such, a comprehensive plan would be prepared for approval by NYSDEC that would describe appropriate health and safety procedures, soil management procedures, and new building vapor control designs, and would also include procedures for avoiding the generation of dust that could affect the surrounding community, as well as the monitoring necessary to ensure that no such impacts would occur. Following construction, the VCA Site would remain subject to NYSDEC oversight in accordance with an updated VCA Site Operation, Maintenance, and Monitoring Plan (OM&M) Plan.

For the North Site, South Site, and the Bank Street Expansion Area, impacts would be avoided by performing subsurface disturbance in accordance with a Remedial Action Plan (RAP) and Construction Health and Safety Plan (CHASP). These documents would be subject to NYCDEP approval (and NYSDEC jurisdiction for the portion previously remediated). The RAP would provide criteria for: appropriate clean fill importation; for allowable reuse of excavated site soils; and for handling, stockpiling, testing, transportation, and disposal of excavated materials, including any unexpectedly encountered contaminated soil and petroleum storage tanks, in accordance with applicable regulatory requirements. The RAP would also set out the requirements for vapor control beneath new buildings (i.e., a vapor barrier and a passive sub-slab depressurization system convertible to an active system if warranted based on future conditions). The CHASP would ensure that subsurface disturbance would be performed in a manner protective of workers, the public, and the environment including requirements for dust control and air monitoring.

For both sites and the Bank Street Expansion Area, a SWPPP would be implemented during construction in accordance with New York State Pollutant Discharge Elimination System (SPDES) General Permit for Stormwater Discharges from Construction Activity. During all dewatering required during subsurface work, water would be discharged in accordance with NYSDEC SPDES permitting requirements or NYCDEP Sewer Use Regulations. If necessary, the water would be pretreated prior to discharge. Finally, all excavated soil and fill materials requiring off-site disposal would be handled and disposed of in accordance with applicable regulatory requirements. Should contaminated soil and/or petroleum tanks be encountered, applicable regulatory requirements would be followed to address removal of the tanks and any associated soil or groundwater contamination. If historical petroleum tanks are discovered, they would be properly registered, if required, with NYSDEC and/or the New York City Fire Department.

Following completion of the subsurface disturbance in accordance with the above procedures and continued implementation of the engineering and institutional controls set out by the RAP and the VCA Site OM&M Plan, operation of the proposed project would not be associated with any significant potential for adverse effects.

INFRASTRUCTURE

The proposed project would result in an increased demand for water supply and an increase in sanitary sewage generation. These increases, however, would be minimal and would not significantly impact existing city infrastructure. Stormwater runoff discharge in the With-Action condition would be similar to runoff under the No-Action condition. As there are stormwater outfalls available to the project sites, through which stormwater runoff is directly discharged into New York Harbor, the City's stormwater conveyance infrastructure would not be affected. Overall, the proposed project would not result in any significant adverse impacts on the City's water supply, wastewater treatment, or stormwater conveyance infrastructure.

SOLID WASTE AND SANITATION SERVICES

According to the *CEQR Technical Manual*, a solid waste and sanitation services assessment is intended to determine whether a project has the potential to cause a substantial increase in solid waste production. The proposed project would generate approximately 174,028 pounds (approximately 87 tons) per week of municipal solid waste (MSW). Though this would be an increase compared with conditions in the future without the proposed project (the No-Action condition), it would be a negligible increase relative to the approximately 10,000 tons of MSW handled by commercial carters every day in New York City. The proposed project would not result in an increase in solid waste that would overburden available waste

management capacity. It would also not conflict with, or require any amendments to, the City's solid waste management objectives as stated in the City's Solid Waste Management Plan (SWMP). Therefore, the proposed project would not result in a significant adverse impact on solid waste and sanitation services.

ENERGY

The *CEQR Technical Manual* recommends a detailed analysis of energy impacts for projects that could significantly affect the transmission or generation of energy or that cause substantial new consumption of energy. Because the proposed project would not result in any of these conditions, a detailed assessment of energy impacts is not necessary. Nevertheless the *CEQR Technical Manual* recommends that a project's energy consumption be calculated and disclosed. Therefore, this analysis projects the amount of energy consumption required by the proposed project.

The proposed project is projected to generate demand for 164,483 million British Thermal Units (BTUs) of energy per year. The total incremental increase in energy consumption between the No-Action condition and the With-Action condition would be 150,527 million BTUs per year. The incremental demand produced by most projects would not create a significant impact on energy capacity, and detailed assessments are only recommended for projects that may significantly affect the transmission or generation of energy. The proposed project would generate an incremental increase in energy demand that would be negligible when compared with the overall demand within Con Edison's New York City and Westchester County service area.

TRANSPORTATION

This analysis examines the potential traffic, parking, transit, and pedestrian impacts, and an assessment of vehicular and pedestrian safety issues of the proposed project.

TRAFFIC FLOW AND OPERATING CONDITIONS

The proposed project would add a substantial number of vehicle trips to the study area. Of the intersections included in the traffic analysis, the proposed project is forecast to result in significant adverse traffic impacts in the 2016 Build year for the proposed project. Sixteen (16) locations in the study area are forecast to experience significant adverse traffic impacts attributable to the proposed project during one or more of the analyzed peak periods:

Weekday Midday Peak Hour (13 locations)

- Richmond Terrace and Staten Island Ferry Viaduct (cars)
- Richmond Terrace and Staten Island Ferry Viaduct (buses)
- Richmond Terrace and Wall Street
- Richmond Terrace and Jersey Street
- Bay Street and Victory Boulevard
- Bay Street and Vanderbilt Avenue
- Bay Street and School Road
- Victory Boulevard and Clove Road
- Victory Boulevard and Slosson Avenue
- Staten Island Expressway/I-278 (SIE) Eastbound (EB) Exit Ramp and Lortel Avenue and Slosson Avenue
- Willow Road East and Forest Avenue
- Forest Avenue and Jewett Avenue
- Richmond Terrace and Schuyler Street

For the No Catering Facility Scenario, significant adverse traffic impacts are forecast at the same locations during the Weekday MD peak hour.

Weekday PM Peak Hour (14 locations)

- Richmond Terrace and Staten Island Ferry Viaduct (cars)
- Richmond Terrace and Staten Island Ferry Viaduct (buses)
- Richmond Terrace and Wall Street
- Richmond Terrace and Jersey Street
- Bay Street and Victory Boulevard
- Bay Street and Vanderbilt Avenue
- Bay Street and Hylan Boulevard
- Bay Street and School Road
- Victory Boulevard and Clove Road
- Victory Boulevard and Slosson Avenue
- SIE EB Exit Ramp and Lortel Avenue and Slosson Avenue
- Willow Road East and Forest Avenue
- Forest Avenue and Jewett Avenue
- Richmond Terrace and Schuyler Street

For the No Catering Facility Scenario, significant adverse traffic impacts are forecast at the same locations during the Weekday PM peak hour.

Saturday Midday Peak Hour (13 locations)

- Richmond Terrace and Staten Island Ferry Viaduct (cars)
- Richmond Terrace and Staten Island Ferry Viaduct (buses)
- Richmond Terrace and Wall Street
- Richmond Terrace and Jersey Street
- Bay Street and Victory Boulevard
- Bay Street and Vanderbilt Avenue
- Bay Street and School Road
- Victory Boulevard and Clove Road
- Victory Boulevard and Slosson Avenue
- SIE EB Exit Ramp and Lortel Avenue and Slosson Avenue
- Willow Road East and Forest Avenue
- Forest Avenue and Jewett Avenue
- Richmond Terrace and Schuyler Street

For the No Catering Facility Scenario, significant adverse traffic impacts are forecast at the same locations during the Saturday MD peak hour.

Saturday PM Peak Hour (15 locations)

- Richmond Terrace and Staten Island Ferry Viaduct (cars)
- Richmond Terrace and Staten Island Ferry Viaduct (buses)
- Richmond Terrace and Wall Street
- Richmond Terrace and Hamilton Avenue
- Richmond Terrace and Jersey Street
- Bay Street and Victory Boulevard
- Bay Street and Vanderbilt Avenue
- Bay Street and School Road

- Victory Boulevard and Jersey Street
- Victory Boulevard and Clove Road
- Victory Boulevard and Slosson Avenue
- SIE EB Exit Ramp and Lortel Avenue and Slosson Avenue
- Willow Road East and Forest Avenue
- Forest Avenue and Jewett Avenue
- Richmond Terrace and Schuyler Street

For the No-Catering Facility Scenario, significant adverse traffic impacts are forecast at the same locations during the Saturday PM peak hour except the following four locations which would not have significant adverse impacts: Victory Boulevard/Jersey Street, SIE EB Exit Ramp/Lortel Avenue/Slosson Avenue, Willow Road East/Forest Avenue, and Forest Avenue/Jewett Avenue.

RAIL/SUBWAY FACILITIES

Under the With-Action condition, all Manhattan subway elements included in the transportation analysis are projected to operate at level of service (LOS) B or better during all peak hours with the exception of the northern platform stair at the south end of the downtown R platform at the Whitehall Street Station. During the Weekday PM peak hour, this stairway is projected to exceed capacity and would require widening based on a width increment threshold (WIT) of 6.80 inches. Therefore, a subway-related significant adverse impact is forecast during the Weekday PM peak hour at this stairway location.

For the No Catering Facility Scenario, the same subway-related significant adverse impact is forecast; however, the required widening is based on a WIT of 6.96 inches, a difference of 0.16 inches.

FERRY TERMINAL VERTICAL ELEMENTS

With the addition of project-generated trips, the stairs between the South Site and the St. George Ferry Terminal and the vertical elements within the Whitehall Ferry Terminal are expected to operate at LOS C or better during all peak hours. Therefore, there would not be any significant adverse impacts related to the ferry terminal vertical elements.

For the No Catering Facility Scenario, the stairs between the South Site and the St. George Ferry Terminal and the vertical elements within the Whitehall Ferry Terminal are expected to operate at the same LOS as the proposed project; therefore, there would not be any significant adverse impacts related to the ferry terminal vertical elements under this scenario.

FERRY LOAD LEVELS

The No-Action condition analysis indicates that the Staten Island Ferry is projected to exceed functional capacity on three landing cycles during the following peak hours: Saturday MD peak hour, Saturday PM peak hour (with a Staten Island Yankees Game), and Saturday PM peak hour (without a Staten Island Yankees Game). With the addition of project-generated ferry trips, the Staten Island Ferry could be significantly impacted based on the existing operational parameters and system throughput capacity determined by NYCDOT. However, the ferries themselves would have sufficient on-board licensed capacity to accommodate the projected ridership.

For the No Catering Facility Scenario, the Staten Island Ferry could be significantly impacted for the same peak hour landing cycles as the proposed project. The ferries themselves would have sufficient on-board licensed capacity to accommodate the projected ridership with the exception of the 3:00 PM landing cycle during the Saturday MD peak hour at the St. George Terminal.

FERRY TERMINAL WAITING AREAS

With the addition of project-generated ferry trips, the Staten Island Ferry terminal waiting areas are expected to have available capacity. Therefore, there would not be any significant adverse impacts related to the Staten Island Ferry terminal waiting areas.

For the No Catering Facility Scenario, the Ferry Terminal waiting areas would also have available capacity, and there would similarly not be any significant adverse impacts related to the Ferry Terminal waiting areas under this scenario.

PEDESTRIAN FACILITIES

Corners

Under the With-Action condition for the proposed project and No Catering Facility Scenario, all corners included in the transportation analysis are projected to operate at LOS C or better. Therefore, there would not be any corner-related significant adverse impacts.

Crosswalks

Under the With-Action condition for the proposed project and No Catering Facility Scenario, all crosswalks included in the transportation analysis are projected to operate at LOS D or better, with more than 19.5 square-feet per pedestrian (ft^2/p). Therefore, there would not be any crosswalk-related significant adverse impacts.

Sidewalks

Under the With-Action condition for the proposed project and No Catering Facility Scenario, all sidewalks included in the transportation analysis are projected to operate at LOS D or better, with pedestrian flows less than 8.5 pedestrians per foot per minute (PMF). Therefore, there would not be any sidewalk-related significant adverse impacts.

PARKING CONDITIONS

The proposed project would provide on-site public and accessory parking for up to 2,191 cars, with 950 on the North Site and up to 1,241 on the South Site (excluding 40 reserved for MTA use). These parking totals include the replacement of the existing parking supply on both sites that are used by the general public such as Staten Island Ferry commuters and Stadium visitors. The full project-generated demand would be accommodated on-site during all the peak hours for the proposed project, as well as the No Catering Facility Scenario. Modifications to Richmond Terrace as part of the project frontage and the addition of three new proposed taxi stands would eliminate approximately 22 on-street parking spaces and would result in an on-street parking deficit of 16 parking spaces during the Weekday MD peak hour. However, there would be sufficient off-street parking capacity to accommodate the on-street parking demand. Therefore, there would not be any parking-related significant adverse impacts.

VEHICULAR AND PEDESTRIAN SAFETY ASSESSMENTS

There were no study intersections classified as high vehicular or pedestrian/bicycle crash locations as per CEQR thresholds. Therefore, the project is not expected to impact to safety due to the increase in vehicle and pedestrian trips.

POST-OPENING SURVEYS

As requested by NYCDOT, post-opening surveys would be conducted at both sites to provide data on travel behavior as several of the proposed land uses, including the observation wheel and retail outlet center, are unique land uses within the New York City limits. The surveys would consist of in-person interviews that would ask visitors and employees how they traveled to the site and other related questions regarding origins, travel mode, vehicle occupancy, parking location, length of stay, main reason for trip and other attractions visited, and other factors of travel behavior. The surveys would also include total hourly and daily visitor and employee counts as well as parking occupancy counts. The final scope of work and sample survey questionnaire will be submitted to NYCDOT for review and approval prior to conducting the post-opening surveys.

AIR QUALITY

This analysis examines the potential for air quality impacts from the proposed project. Air quality impacts can be either direct or indirect. Direct impacts result from emissions generated by stationary sources at a development site, such as exhaust from fossil fuel-fired heating and hot water systems or emissions from parking garage ventilation. Indirect impacts are impacts that are caused by nearby existing stationary sources or by emissions from on-road vehicle trips generated by the proposed project or other changes to future traffic conditions due to the proposed project.

The maximum predicted pollutant concentrations and concentration increments from the proposed projects' mobile and stationary sources such as the heating and hot water systems and the potential waterborne transit landing would be below the corresponding guidance thresholds and ambient air quality standards. Carbon monoxide (CO) concentrations from the proposed projects' parking facilities would also be below the corresponding guidance thresholds and ambient air quality standards. There are no permitted industrial sources identified within the study area; therefore, there would be no potential for significant adverse impacts on air quality with the proposed project. Therefore, there would be no potential for significant adverse impacts on air quality with the proposed project.

GREENHOUSE GAS EMISSIONS

The GHG emissions that would be generated as a result of the proposed project—and measures that would be implemented to limit those emissions—are presented in this analysis, along with an assessment of the proposed project's consistency with the citywide GHG reduction goal. The analysis also identifies measures that would be taken to increase the resilience of the proposed project to the potential effects of climate change.

The proposed project would result in annual GHG emissions of 19,787 metric tons of carbon dioxide emissions (CO_2e). Of that amount, approximately 8,076 metric tons of CO_2e would be emitted by the proposed project as a result of grid electricity use and fuel consumption in on-site energy systems, while the remainder would be emitted as a result of project generated vehicle trips. The proposed project would strive to obtain the United States Green Building Council's (USGBC) LEED certification, including Platinum for the North Site and up to Silver for the South Site. Specific sustainable measures would be incorporated into the design and construction of the proposed project to qualify for LEED rating, which would decrease potential GHG emissions. Based on the sustainable measures that would be included, the proposed project would be consistent with the City's emissions reduction goal.

The proposed project's design would include features to improve resiliency to climate change, including sea level rise of up to 2 feet, which is within the likely range of sea level increase projected through the 2050s by the New York City Panel on Climate Change (NPCC).

NOISE

The noise analysis for the proposed project consists of three components—a screening analysis to determine whether traffic generated by the proposed project would have the potential to result in significant noise impacts; an analysis to determine whether the proposed project's Wheel-related activities (i.e., operation of the Wheel) would have the potential to result in significant noise impacts; and an analysis to determine the level of building attenuation necessary to ensure that the proposed project's interior noise levels satisfy applicable interior noise criteria.

With the proposed project completed in 2016, the increase in $L_{eq(1)}$ noise levels would be less than 3 dBA at all five receptor sites. Changes of these magnitudes would be considered imperceptible to barely perceptible, and they would be below the CEQR threshold for a significant adverse impact. In terms of CEQR Noise Exposure Guidelines, noise levels at receptor sites 1, 2, and 3 would remain in the "marginally unacceptable" category, noise levels would remain above the 55 dBA $L_{10(1)}$ noise level guideline for outdoor areas requiring serenity and quiet provided in the *CEQR Technical Manual* noise exposure guidelines at receptor Site 4, and noise levels would remain in the "marginally acceptable" category at Site 5. These values are based on the predicted $L_{10(1)}$ values.

For the open space locations (i.e., North Shore Waterfront Esplanade), existing noise levels are currently above the 55 dBA $L_{10(1)}$ *CEQR Technical Manual* noise level for outdoor areas. While the proposed project would exacerbate these exceedances, the noise levels would remain comparable to noise levels in portions of other public open spaces in this area (i.e., Tompkinsville Play Center, Lieutenant Lia Park/Nicholas Lia Memorial Park, Mahoney Playground, and Davis Playground). This condition would also be expected for the new open spaces that would be created by the proposed project. Although the 55 dBA $L_{10(1)}$ guideline is a worthwhile goal for outdoor areas requiring serenity and quiet, this relatively low noise level is typically not achieved in parks and open space areas in New York City. Therefore, the change is not considered a significant adverse impact and no mitigation is proposed.

In terms of noise attenuation, the *CEQR Technical Manual* has set noise attenuation quantities for buildings based on exterior $L_{10(1)}$ noise levels, and in order to maintain interior noise levels of 45 dBA $L_{10(1)}$ or lower for residential or hotel uses and 50 dBA $L_{10(1)}$ or lower for commercial uses. The west facing facades of the North and South Sites (including the hotel) would require noise attenuation of between 28 and 31 dBA.

PUBLIC HEALTH

The EIS analyses did not identify significant adverse impacts in the areas of hazardous materials, water and sewer infrastructure, noise, and air quality as a result of the proposed project; therefore, there are no potential public health impacts from exposure to air- or waterborne pollutants or noise. Standard solid waste management and removal procedures would be followed with the proposed project; therefore, there are no public health impacts from exposure to pests.

The proposed project would result in significant adverse traffic impacts at 16 locations; all but two of these significant adverse traffic impacts could be fully mitigated through alterations to signal timing and other traffic management practices. They are the intersections of Richmond Terrace and Staten Island Ferry Viaduct (cars) and Richmond Terrace and the Staten Island Ferry Viaduct (buses). The impact at the intersection of Richmond Terrace and Staten Island Ferry Viaduct (cars) would be partially mitigated during all four peak hours.

Although the unmitigated traffic impact that would result from the project would remain unmitigated, and the partially mitigated impact would remain partially mitigated, they do not generate a potential public health impact, since detailed air quality analyses did not identify any significant adverse impacts as a result of the proposed project. Therefore, there is no impact to public health associated with the partially mitigated significant adverse traffic impacts.

In summary, this screening analysis concludes that no significant impacts to public health are expected as a result of the proposed project.

NEIGHBORHOOD CHARACTER

As defined in the *CEQR Technical Manual*, neighborhood character is an amalgam of various elements that give neighborhoods their distinct "personality." These elements may include a neighborhood's land use, socioeconomic conditions, open space, historic and cultural resources, urban design and visual resources, shadows, transportation, and noise. Not all of these elements affect neighborhood character in all cases; a neighborhood usually draws its distinctive character from a few defining elements. This analysis considers the effects of the proposed project on the neighborhood character of the study area, and relies on the analyses of the components of neighborhood character (i.e., land use, socioeconomic conditions, open space, historic and cultural resources, urban design, visual resources, shadows, transportation, and noise) as analyzed elsewhere in the EIS.

The study area can be described by a diverse set of elements, including its mix of transportation, open space, and institutional uses, the Stadium, and its location on the waterfront offering views of the New York Harbor. No one defining feature would be considered critical to the character of the neighborhood. Rather, the various localized features contribute to it. Overall, the proposed project would result in a positive effect on the neighborhood character in the study area. The proposed project would enhance the area as an attractive gateway to Staten Island. The project sites would be more inviting and appealing to visit with new

landscaping as well as passive and active open space. The proposed project would improve connectivity between the waterfront and the upland areas, which would be beneficial to the neighborhood. The proposed project would not create a significant adverse impact on neighborhood character. To the contrary, neighborhood character would be improved by replacing large surface parking lots with new active, mixed-use development.

CONSTRUCTION

The results of the construction analyses for each technical area are discussed in more detail below.

TRANSPORTATION

Traffic

Construction staging on the North Site would allow commuters to continue to park on-site and access the site from Bank Street, which is expected to remain open during construction. Access to the site from Richmond Terrace at Wall Street would not be available throughout the entire construction period; however, as part of the proposed project, a new driveway to provide access to a new parking structure located on the North Site would be provided on Richmond Terrace at Nicholas Street and would be coordinated with the opening of the temporary parking structure to maximize access to the on-site parking during construction. Construction of the South Site would require that all existing commuter parking located on this site be temporarily relocated off-site to parking locations that have public transit (bus and/or Staten Island Railroad [SIR]), shuttle, or pedestrian access to the Ferry Terminal. Construction workers would also be encouraged to park off site through the use of incentives. Although the off-site parking facilities would be located along routes currently used to travel to the project sites and existing travel patterns would generally be maintained, a detailed traffic analysis was conducted for the Weekday AM (6:00 to 7:00 AM) and Weekday PM (6:00 to 7:00 PM) peak hours.

Access for Ferry Terminal operations (NYCDOT, FDNY, deliveries, etc.) would be provided from the north side of the Ferry Terminal through the construction site while the Bank Street reconstruction is occurring and via Bank Street while the South Site is under construction. A plan for providing access would be provided to NYCDOT for review and approval prior to construction.

A significant adverse traffic impact is expected at the intersection of Richmond Terrace and Jersey Street after the end of the second quarter of 2015. This impact can be mitigated by advancing the proposed mitigation at this location, as described below in "Mitigation Measures." The proposed mitigation includes eliminating the northbound/southbound leading left-turn phase and reallocating 3 seconds of green time to the eastbound lead phase, 6 seconds of green time to the eastbound/westbound phase, and 2 seconds of green time to the northbound/southbound phase.

Transit

The projected construction workers and commuters who would park in temporary off-site parking facilities would be distributed among various bus routes, the SIR, and Staten Island Ferry. Since the projected increase in trips on any one bus route would be fewer than 50 trips during the peak construction period, a detailed bus line-haul analysis was not required. However, since more than 200 new passengers would be added to the SIR during the peak construction period, a detailed line-haul analysis and stairway analysis at the Stapleton and St. George SIR stations were conducted. The SIR is projected to continue to operate under capacity during the peak construction period; therefore, the SIR would not be significantly impacted during construction. The stairways at the Stapleton and St. George SIR stations are projected to operate at LOS C or better during the peak construction period; therefore the SIR stairways would not be significantly impacted during construction.

Pedestrians

New pedestrian trips generated during the construction period would consist of construction workers and commuters who would park in temporary off-site parking facilities. Since the incremental construction pedestrian trips traveling between the Ferry Terminal and the development sites would be less than the

proposed project and no pedestrian impacts are expected in the With-Action condition, and fewer than 200 new peak hour pedestrian trips would be added to any one pedestrian element between the temporary/other off-site parking facilities and the Ferry Terminal during the construction period, no construction-related pedestrian impacts are expected during the peak construction period.

During the first two quarters of 2014, the segment of Bank Street adjacent to the South Site and the Ferry Terminal stairs would be temporarily closed. For the duration of this closure, people who typically walk along Bank Street and use the Ferry Terminal stairs would need to walk along Richmond Terrace to travel between the parking facility and the Staten Island Ferry St. George Terminal. Seven pedestrian elements were analyzed for the temporary stair closure condition, and all were found to operate at LOS C or better with the exception of the east sidewalk on the south leg of the Richmond Terrace and Wall Street intersection, which is projected to operate at LOS E during the Weekday AM peak hour and LOS D (worse than mid-LOS D) during the Weekday PM peak hour. As the Ferry Terminal stairs would only be closed for a period of less than six months, this temporary impact would not be considered significant.

Parking

During construction, 820 parking spaces would be provided on the North Site at all times. The configuration and operation of the parking facility on the North Site would vary based on construction activities and would be provided by surface parking, stackers, and/or a multi-level parking structure (depending on the construction phase), with a combination of self-park and attendant parking. The shuttle service that currently transports commuters between the North Site and the Ferry Terminal would also be maintained during construction. The parking supply currently provided on the South Site would be relocated to several off-site parking facilities during construction. For off-site parking that is not walking distance to the Ferry Terminal or accessible by the SIR or city bus, shuttle service would be provided between the temporary off-site parking locations and the Ferry Terminal. The commuter and construction worker parking demand would be accommodated within the on- and off-site parking facilities; therefore, no construction-related parking impacts are expected.

AIR QUALITY

No significant adverse air quality impacts would be expected at any sensitive receptor locations due to on-site and off-site construction activities of the proposed project. To ensure that the construction of the proposed project would result in the lowest practicable diesel particulate matter (DPM) emissions, the project would implement an emissions reduction program for all construction activities, including: diesel equipment reduction; clean fuel; best available tailpipe reduction technologies; utilization of newer equipment; source location; dust control; and idle restriction.

Overall, the most intense construction activities (excavation and foundation work) in terms of air pollutant emissions would be less than two years. Based on the sizes of the proposed project buildings and the nature of the construction work involved in the Wheel installation, construction activities for the proposed project would not be considered out of the ordinary in terms of intensity and, in fact, emissions would be lower due to the emission control measures that would be implemented during construction of the proposed project. In addition, the project sites are generally located at some distance away from residential uses, with the nearest residences along Richmond Terrace approximately 135 feet west of the North Site. Such distance between the emissions sources and these sensitive locations would result in enhanced dispersion of pollutants and, therefore, potential concentration increments from on-site sources at such locations would be reduced. The nearest sensitive locations are the North Shore Esplanade, located to the south of the North Site, and the North Shore Waterfront Esplanade, located to the north of the North and South Sites. However, these esplanade locations are for transient use and people would not be expected to be present for extended durations. The Stadium, the home of the Staten Island Yankees minor league baseball team, is located between the project sites. However, most of the baseball games would occur during weeknights or weekends when limited construction activities are expected for the proposed project. Therefore, construction activities would not likely impair the enjoyment of Stadium users. Furthermore, the construction would not result in increases in vehicle volumes higher than those identified in the operational condition and, therefore, an off-site construction mobile source analysis is not warranted.

Based on analysis of all of the factors affecting construction emissions, on-site and off-site construction activities due to the proposed project would not result in any significant adverse impact on air quality.

NOISE AND VIBRATION

Noise

Noise associated with the proposed project's construction activities would not result in any significant adverse impacts. Construction on the project sites would include noise control measures as required by the New York City Noise Control Code, including both path and source controls.

The nearest sensitive locations are the North Shore Esplanade, located to the south to the North Site, and the North Shore Waterfront Esplanade, located to the north of the North and South Sites. The nearest residences are located approximately 135 feet west of the North Site and are separated from the project site by Richmond Terrace. The construction of the proposed project would be expected to last a total of approximately three years but the most noise-intensive construction activities (excavation and foundation work) would last for only a portion of this duration, taking approximately 16 months for the North Site and approximately 12 months for the South Site, with 10 months of overlapping excavation and foundation activities between the project sites. Consequently, exceedances of the *CEQR Technical Manual* noise impact criteria that would occur at the esplanades and residential receptors during the noisiest work would not be expected to occur continuously for 24 months. The Stadium is located between the project sites. However, most of the baseball games would occur during weeknights or weekends when limited construction activities are expected for the proposed project. Therefore, construction activities would not be expected to impair the enjoyment of Stadium users.

Therefore, based on these factors, no significant adverse noise impacts would be expected at any sensitive receptor locations from the proposed construction activities.

Vibration

The proposed project is not expected to result in significant adverse construction impacts with respect to vibration. Use of construction equipment that would have the most potential to exceed the 65 vibration decibels (VdB) criterion at sensitive receptor locations (e.g., equipment used during pile driving) would be perceptible and annoying, but would not have the potential to result in any architectural damage. For limited time periods, perceptible vibration levels may be experienced at receptor locations near the construction sites such as the North Shore Esplanade and the North Shore Waterfront Esplanade. However, the operations which would result in these perceptible vibration levels would only occur for finite periods of time at any particular location and, therefore, the resulting vibration levels, while perceptible, would not result in any significant adverse impacts.

OTHER TECHNICAL AREAS

Land Use and Neighborhood Character

Construction activities would affect land use on the project sites but would not alter surrounding land uses. As is typical with construction projects, during periods of peak construction activity there would be some disruption, predominantly noise, to the nearby area. There would be construction trucks and construction workers coming to the construction sites. There would also be noise, sometimes intrusive, from building construction and Wheel installation as well as trucks and other vehicles backing up, loading, and unloading. These disruptions would be temporary in nature and would have limited effects on land uses within the study area, particularly as most construction activities would take place within the project sites or within portions of sidewalks, curbs, and travel lanes of public streets immediately adjacent to the construction sites. Overall, while the construction at the sites would be evident to the local community, the limited duration of construction would not result in significant or long-term adverse impacts on local land use patterns or the character of the nearby area.

Socioeconomic Conditions

Construction activities associated with the proposed project would not result in any significant adverse impacts on socioeconomic conditions. Construction of the proposed project would not block or restrict

access to any facilities in the area, including the Ferry Terminal, or affect the operations of any nearby businesses, including the Stadium. Lane closures are not expected to occur in front of entrances to any existing or planned retail businesses, and construction activities would not obstruct major thoroughfares used by customers or businesses. Utility service would be maintained to all businesses. Overall, construction of the proposed project is not expected to result in any significant adverse impacts on surrounding businesses.

Construction would create direct benefits resulting from expenditures on labor, materials, and services, and indirect benefits created by expenditures by material suppliers, construction workers, and other employees involved in the construction activity. Local businesses, such as eating and drinking establishments, and convenience stores, would benefit from the presence of several hundred construction workers during the construction period. Construction also would contribute to increased tax revenues for the City and State, including those from personal income taxes.

Community Facilities

While construction of the proposed project would result in temporary increases in traffic during the construction period, access to and from any facilities in the area would not be affected during the construction period. In addition, the construction sites would be surrounded by construction fencing and barriers that would limit the effects of construction on nearby facilities. Construction workers would not place any burden on public schools and would have minimal, if any, demands on libraries, child care facilities, and health care. Construction of the proposed project would not block or restrict access to any facilities in the area, and would not materially affect emergency response times significantly. The New York City Police Department (NYPD) and the New York City Fire Department (FDNY) emergency services and response times would not be materially affected due to the geographic distribution of the police and fire facilities and their respective coverage areas.

Open Space

Construction of the proposed project would occur in close proximity to the North Shore Esplanade and the North Shore Waterfront Esplanade. Both open spaces are expected to remain open during the entire construction period, and access to these open spaces would be maintained.

Construction activities would be conducted with the care mandated by the close proximity of several open spaces to the proposed project. Dust control measures—including watering of exposed areas and dust covers for trucks—would be implemented to ensure compliance with the New York City Air Pollution Control Code, which regulates construction-related dust emissions. At times over the course of the entire construction period, construction activities such as excavation and foundations would generate noise that could affect the enjoyment of nearby open space users, but such noise effects would be temporary. In addition, fences around the project sites would partially shield the open spaces from construction activities. As described above in "Noise," elevated noise levels are not predicted to occur for two or more consecutive years at open space receptors immediately adjacent to the project sites during construction. Therefore, construction of the proposed project would not result in significant adverse impacts on open space.

Historic and Cultural Resources

Historic and cultural resources include both archaeological and architectural resources. There are no known or potential architectural resources located on the project sites. Therefore, the proposed project would not have any direct or indirect impacts on on-site architectural resources. None of the known or potential architectural resources in the study area are located within 90 feet of the project sites. Therefore, the proposed project would not result in any construction-related impacts to any of the known or potential architectural resources in the study area.

Hazardous Materials

The North Site, the northern half of the South Site, and the southern half of the Bank Street Expansion (south of St. Peter's Place) were previously remediated under a VCA with NYSDEC as a part of the Stadium project. For the VCA Site, compliance with the August 2005 *Restrictive Declaration* would require

NYSDEC approval of project plans as they relate to soil disturbance, handling of materials beneath the existing cap, and the need for vapor control beneath new buildings. As such, a comprehensive plan would be prepared for approval by NYSDEC that would describe appropriate health and safety procedures, soil management procedures (including stockpiling, testing and disposal), and new building vapor control designs (which could include vapor barriers and/or passive venting systems). It would also include procedures for avoiding the generation of dust that could affect the surrounding community, as well as the monitoring necessary to ensure that no such impacts occur. For the North and South Sites, construction impacts would be avoided by performing subsurface disturbance in accordance with a RAP and CHASP. These documents would be subject to NYCDEP-approval and/or NYSDEC jurisdiction. The RAP would provide the appropriate clean fill importation criteria and criteria for allowable reuse of excavated site soils (whether in the uppermost layer of landscaped areas or elsewhere), handling, stockpiling, testing, transportation, and disposal of excavated materials, including any unexpectedly encountered contaminated soil and petroleum storage tanks, in accordance with applicable regulatory requirements. The need for vapor control beneath new buildings would also be addressed in the RAP. The CHASP would ensure that subsurface disturbance would be performed in a manner protective of workers, the public, and the environment.

Following completion of the subsurface disturbance in accordance with the above procedures and continued implementation of the engineering and institutional controls set out by the VCA OM&M Plan, no significant adverse impacts related to hazardous materials would be expected during construction of the proposed project.

Natural Resources

The condition of water quality, aquatic biota, wetlands, floodplains, and terrestrial natural resources within and near the project sites would remain generally unchanged following the proposed project. The project would include mixed-use redevelopment of existing waterfront surface parking lots that presently contain minimal natural resources other than small areas of manicured lawn with trees, ruderal vegetation, and disturbance-tolerant wildlife species that are ubiquitous in urban areas. A waterborne transit landing may be constructed from the project sites' armored shoreline into New York Harbor. In compliance with pollutant discharge elimination regulations, ground-disturbing activities during construction would be unlikely to have significant adverse impacts to groundwater resources. With sediment and erosion control measures in place, construction would not be expected to adversely impact these aquatic resources or wetlands. Construction of the potential waterborne transit would result in a permanent loss of approximately 42 square feet of benthic habitat due to installation of the piles, as well as 3,737 square feet of indirect effects due to shading (approximately 480 square feet of which would be within regulated tidal wetland) and temporary, localized sediment suspension, none of which would represent a significant adverse impact to the littoral zone tidal wetlands or water quality of Upper New York Harbor.

Bank Street would be widened by approximately 6 feet along the length of the North Site. The proposed 6-foot widening of Bank Street would add approximately 7,500 square feet of impervious surface as a result of the widening. In addition, Bank Street would also be widened from the westernmost boundary of the North Site to Jersey Street. With the proposed widening of Bank Street from the westernmost boundary of the North Site to Jersey Street, approximately 14,300 square feet of impervious surface would be added. The portion of Bank Street adjacent to the North Site is located within NYSDEC's regulated tidal wetland Adjacent Area and would require authorization under Article 25 of the ECL. These areas consist primarily of mowed lawn with trees; the loss of these areas would not have a significant adverse impact to wetlands or aquatic areas. There would be no street widening of Bank Street from the 9/11 Memorial to the South Site. Therefore, there would be no impacts to Adjacent Area on the South Site due to Bank Street widening. A small portion of the proposed NYCDOT service road near the South Site is within the tidal wetlands Adjacent Area and would require authorization under Article 25 of the ECL.

A portion of the North Site is also located within the NYSDEC-regulated tidal wetland Adjacent Area, the majority of which would be covered with impervious surface. Construction of the proposed project within

the NYSDEC tidal wetland Adjacent Area would require authorization from NYSDEC under Article 25 of the ECL.

The proposed water transport of materials comprising the Wheel, storage of these materials on storage barges, and construction of the Wheel using water-based construction equipment would not be expected to result in significant adverse impacts to water quality or aquatic resources of the Upper Bay. The mooring of construction barges would not result in adverse impacts to aquatic habitat due to shading. The mooring plan would require authorization by the United States Army Corps of Engineers (USACE) and NYSDEC. Obstructions to safe vessel operation would only be removed as necessary to permit safe vessel operation. Authorization for obstruction removal would be requested from USACE and NYSDEC as necessary. Any sediment resupsension caused by removal of obstructions would be minor, temporary, and confined to the immediate vicinity of the work.

Construction noise and activity would not cause significant adverse impacts to the community of urban-adapted wildlife species present. Threatened or endangered species with the potential to occur in the area are limited to transient sea turtles and sturgeon that may occasionally and briefly occur offshore from the project sites; because the proposed project would not significantly affect water quality or habitat conditions in Upper New York Harbor in the vicinity of the project sites, there would be no direct or indirect effects on any individuals of these species. Overall, construction of the proposed project would not have significant adverse impacts to natural resources or floodplains in the area, and may ultimately slightly improve water quality by increasing pervious surface coverage and improving stormwater capture.

ALTERNATIVES

Consistent with SEQRA and CEQR requirements, the EIS examines alternatives to the proposed project. The alternatives examined are the No Action Alternative, in which the proposed project would not be undertaken. The second alternative analyzed is the St. George Retail Development Only Alternative, which would include the same types and amounts of retail, hotel and catering space, and parking as currently proposed for the South Site but would not include the Observation Wheel, Wheel Terminal Building or its parking structure and rooftop open space as envisioned by the proposed project. The third alternative is the Wheel Only Alternative, which would develop the Wheel, Wheel Terminal Building and parking structure with its rooftop open space, but would not include the retail outlet center, hotel, catering uses, or parking as currently proposed for the South Site. This chapter also examines a No Unmitigated Traffic and Subway Impacts Alternatives, which examines alternatives that would avoid unmitigated significant adverse traffic impacts.

NO ACTION ALTERNATIVE

In the No Action Alternative, there would be no changes in the use of the project sites. Both the North Site and the South Site would remain surface public parking lots for the Ferry Terminal and the Stadium. In 2013, the reconstruction of the Wall Street Ramp between Richmond Terrace and Bay Street would increase the number of parking spaces on the South Site from 754 existing spaces to 810 spaces. Under the No Action Alternative, it is assumed that the waterborne transit landing would not be introduced.

Unlike the proposed project, the No Action Alternative would not result in the significant and adverse traffic impacts at 14 intersections nor the significant and unavoidable impact at 1 intersection or the partially mitigatable impact at 1 intersection caused by the proposed project. In addition, the No Action Alternative would not result in the potential significant and adverse transit impact on the northern platform/stairs to/from the downtown R platform at Whitehall Station. Under the No Action Alternative, the Staten Island Ferry is projected to be over functional capacity in 2016 independent of the proposed project. However, the No Action Alternative would not convert large surface parking lots located on waterfront property into a vibrant mixed-use area that capitalizes on existing transportation infrastructure, and would not result in the beneficial impacts that the proposed project would create in the areas of land use and public policy, socioeconomics, open space access, and stormwater management. In terms of neighborhood character, the

No Action Alternative would continue to limit the vitality and character of the St. George waterfront by leaving the surface parking lots in place and isolating the waterfront from Richmond Terrace and upland St. George. In comparison, the proposed project is expected to result in a positive effect on the neighborhood character in the study area, and would enhance the area as an attractive gateway to Staten Island.

ST. GEORGE RETAIL DEVELOPMENT ONLY ALTERNATIVE

The St. George Retail Development Only Alternative would develop the same types and amounts of retail, hotel, and catering space that would be introduced on the South Site in the future with the proposed project. This alternative would also provide parking to replace any parking displaced by project construction and additional parking to meet the needs of the proposed development. With either the St. George Retail Development Only Alternative or the Wheel Only Alternative, there could still be the potential addition of a waterborne transit landing, which would be located at the end of the Wall Street Ramp.

The St. George Retail Development Only Alternative would be configured with the same design and program as set forth in the proposed project—a 340,000-square-foot terraced retail outlet center, a 130,000-square-foot (200-room) hotel, and a 20,000-square-foot catering facility. Similar to the proposed project, the St. George Retail Development Only Alternative would also deck over (but not eliminate) the RROW located on that site. While the proposed project would contain an estimated 1,250 parking spaces on the South Site, it is possible that under the St. George Retail Development Only Alternative the 1,250 South Site parking spaces planned by the proposed project may be distributed between the North and South Sites.

With the St. George Retail Development Only Alternative, it is possible that additional retail and commercial development could be accommodated in lieu of the demand previously identified for the Wheel portion of the proposed project. If a larger project were contemplated, it would likely require supplemental environmental analysis with a scope of assessment determined if and when such a change is considered.

Unlike the proposed project, the St. George Retail Development Only Alternative would not result in as many significant and adverse but mitigated traffic impacts. Generally, the environmental impacts of the St. George Retail Development Only Alternative would be similar to that of the proposed project, but they would be of a lesser magnitude. The unmitigated traffic impact that would result from the proposed project would remain unmitigated under this alternative, and the partially mitigated traffic impact would remain partially mitigated.

The St. George Retail Development Only Alternative would not provide as many of the beneficial effects as expected with the proposed project. While this alternative would provide a net increase of 0.09 increase of passive open space on the South Site, it would not provide a net increase of 7.72 acres of new active and passive open space that would be introduced by the proposed project on the North Site. In addition, it would enhance upland connections only on the South Site. It would not redevelop the same expanse of prime waterfront property, and would therefore not support local planning goals to the same degree as the proposed project.

Without the Wheel, daily visitation to the project sites under the St. George Retail Development Only Alternative would likely be less than anticipated under the proposed project, and any benefit from increased retail traffic in the study area may be less pronounced. Similarly, without the Wheel, this alternative would result in less extensive or prominent views to and from architectural resources along Richmond Terrace. Because the St. George Retail Development Only alternative does not include the Observation Wheel, only the hotel portion of the development is anticipated to be visible in some views within or from just outside of the study area beyond the immediate Richmond Terrace frontage. The St. George Retail Development Only Alternative would be less visible in longer views toward the project sites than would the proposed project. The lighting program on the South Site that would be introduced with the proposed project would be introduced with this alternative; however, no lighting would be introduced on the North Site. The lighting design on the South Site would be mindful of the adjacent waterfront, residential areas, and adjacent NYCDOT Ferry operations. Therefore, like the proposed project, the St. George Retail Development Only Alternative would not have a significant adverse impact on urban design and visual resources.

The St. George Retail Development Only Alternative would result in a lower net increase in vegetation cover that could potentially benefit some wildlife such as insects and songbirds. The increase in impervious surface would be smaller than that of the proposed project, but as discussed for the proposed project, the proposed NYCDOT service road near the South Site would be within the NYSDEC tidal wetlands Adjacent Area and would require authorization under Article 25 of the ECL. However, as with the proposed project, the St. George Retail Development Only Alternative, with the implementation of stormwater management measures, would not adversely affect water quality, aquatic biota, or NYSDEC littoral zone tidal wetlands of the Upper New York Harbor within the vicinity of the project site.

Similar to the proposed project, it is expected that the construction activities associated with the St. George Retail Development Only Alternative would result in significant adverse impacts with respect to vehicular traffic at the intersection of Richmond Terrace and Jersey Street after the end of the second quarter of 2015. Like the proposed project, this impact can be mitigated by advancing the proposed mitigation for the With-Action condition at this location.

Like the proposed project, the St. George Retail Development Only Alternative is expected to result in a positive effect on the neighborhood character in the study area, but to a lesser degree than the proposed project because it would only benefit the South Site since the North Site would remain a surface parking lot separating Richmond Terrace from the waterfront.

WHEEL ONLY ALTERNATIVE

The Wheel Only Alternative would be consistent with the proposed project including development of the North Site with the Observation Wheel, Wheel Terminal Building, and parking structure with a green roof and passive and active open space. With either the Wheel Only Alternative or with the St. George Retail Development Only Alternative, there could still be the potential addition of a waterborne transit landing. The Wheel Only Alternative would not include the retail outlet center, hotel, catering facility, or parking that would be introduced by the proposed project on the South Site.

The Wheel and Wheel Terminal Building under the Wheel Only Alternative would be the same as envisioned under the proposed project—a 625-foot-tall Observation Wheel, a 95,100-square-foot Wheel Terminal Building. Similar to the proposed project, the Wheel Only Alternative would also deck over (but not eliminate) the RROW located adjacent to the proposed North Site parcel. The Wheel Terminal Building in the Wheel Only Alternative would be the same as proposed under the proposed project, housing 47,300 square feet of commercial space, 18,500 square feet of retail space, an 7,600-square-foot restaurant, 5,900 square feet of exhibition or wheel hall space, 4,200 square feet of theater space, as well as 11,600 square feet of back of house and mechanical space. While there would be a net increase of 7.81 acres of active and passive open space with the proposed project, the Wheel Only Alternative would introduce a net increase of 7.72 acres of active and passive open space on the North Site.

Parking for the Wheel Only Alternative would either be provided exclusively on the North Site, in a three-level public parking structure as envisioned under the proposed project, or partially in structured parking on the North Site with the remainder provided in structured parking on the South Site.

Aside from any potential expanded parking area, the South Site in the Wheel Only Alternative would remain in its current condition. With the Wheel Only Alternative, there could still be the potential addition of a waterborne transit landing which would be located at the end of the Wall Street Ramp.

Like the proposed project, under the Wheel Only Alternative, Bank Street would be widened from a 24-foot roadway to a 30-foot roadway. The widened Bank Street would include a bike lane from Jersey Street to the easternmost boundary of the North Site.

Unlike the proposed project, the Wheel Only Alternative would not have as many significant and adverse but mitigated traffic impacts. Generally, the environmental impacts of the Wheel Only Alternative would be similar to that of the proposed project, but they would be of a lesser magnitude. The unmitigated impact that

would result from the proposed project would remain unmitigated under this alternative, and the partially mitigated impact would remain partially unmitigated.

Under the Wheel Only Alternative, the South Site would remain a surface parking lot, or possibly an expanded parking structure to accommodate a portion of the existing and project-generated parking demand. The Wheel Only Alternative would enhance upland connections on the North Site; however, it would not redevelop the same expanse of prime waterfront property as under the proposed project. As a result, this alternative would not support local planning goals to the same degree as the proposed project. It is noted that without the St. George Retail Development project, daily visitation to the project sites under the Wheel Only Alternative would likely be less than anticipated under the proposed project, and any benefit from increased retail traffic in the study area may be less pronounced. The Observation Wheel would be the most prominent visual element of the Wheel Only Alternative and of the proposed project. The lighting program on the North Site that would be introduced with the proposed project would be introduced with this alternative; however, no lighting would be introduced on the South Site. The lighting program that would be introduced by the proposed project on the North Site would be designed and managed to avoid new lighting on the land side portion thereby minimizing night lighting effects on the inland community. Therefore, like the proposed project, the Wheel Only Alternative would not have a significant adverse impact on urban design and visual resources. The Wheel Only Alternative would be more active and would enhance the pedestrian experience of the North Site compared with the existing condition, but such improvements would be more limited than under the proposed project, since the alternative would develop only the North Site, leaving the South Site as a surface parking lot. With the Wheel Only Alternative, it is also possible that there could be a shift of some of the commuter parking that is proposed on the North Site by building a new parking structure on the South Site that would accommodate all the existing South Site parking and a portion of the North Site spaces. This would permit a smaller and less complex parking structure to be built on the North Site, although it is still assumed that the Wheel Only Alternative would have a parking structure with its green roof and would provide 7.88 acres of active and passive open space.

With its green roof and open space, this alternative would result in a net increase in vegetation cover that would potentially benefit some wildlife. But overall, neither the Wheel Only Alternative nor the proposed project would have significant adverse impacts to natural resources or floodplains in the area, and with the implementation of stormwater management measures, the increase in impervious surface would not adversely affect water quality, aquatic biota, or NYSDEC littoral zone tidal wetlands of the Upper New York Harbor within the vicinity of the project site. As discussed for the proposed project, authorization under Article 25 of the ECL would be required from NYSDEC for the Wheel Only Alternative for development within the NYSDEC tidal wetlands Adjacent Area. The Wheel Only Alternative would still require the implementation of a best practices management and monitoring program for night lighting in order to minimize the potential for adverse impacts with night lighting of the Observation Wheel.

Similar to the proposed project, it is expected that the construction activities associated with the Wheel Only Alternative would result in significant adverse impacts with respect to vehicular traffic at the intersection of Richmond Terrace and Jersey Street after the end of the second quarter of 2015, but this impact would be limited to the Weekday PM period only. Like the proposed project, this impact can be mitigated by advancing the proposed mitigation for the With-Action condition at this location.

Finally, in terms of neighborhood character, the Wheel Only Alternative (with or without the potential waterborne transit landing) is expected to result in a positive effect on the neighborhood character in the study area, however to a lesser degree in comparison to the proposed project. The proposed project would enhance the area as an attractive gateway to Staten Island. Like the proposed project, 7.88 acres of publicly accessible active and passive open space would be introduced on the North Site further linking the St. George community with the waterfront. However, with the Wheel Only Alternative, the South Site would remain a surface parking lot (or possibly an expanded parking structure) separating Richmond Terrace from the waterfront.

NO UNMITIGATED TRAFFIC AND SUBWAY IMPACTS ALTERNATIVES

The proposed project would result in a significant and unavoidable traffic impact at the Richmond Terrace and Ferry Viaduct (buses) intersection and a partially mitigated traffic impact at the Richmond Terrace and Ferry Viaduct (cars) intersection. The proposed project would also result in a significant and unavoidable transit impact on the northern platform stairs to/from the downtown R platform at the Whitehall Station and could potentially result in significant and unavoidable transit impacts on the Staten Island Ferry. Since the ferry is projected to potentially be over functional capacity in 2016 independent of the proposed action, alternatives to the proposed project were explored that would allow for the mitigation of all traffic (vehicular) and transit (subway) impacts only.

To eliminate all unmitigatable traffic and subway impacts, the proposed project would have to be reduced to either of the following development programs:

- Eliminate the entire North Site project (Observation Wheel, open space, etc.) and the entire South Site with the exception of the 200-room hotel.
- Eliminate the entire South Site project (retail outlet center, hotel, catering facility, etc.), eliminate the Observation Wheel from the North Site, and reduce the restaurant from 15,000 gsf to 7,500 gsf.

Either of these development scenarios would result in a project of limited viability and would not fully achieve the City's goal to provide a comprehensive mixed-use development on both the North and South Sites. Neither alternative development scenario would redevelop the same expanse of prime waterfront property as under the proposed project. In addition, compared with the proposed project, the alternative development scenarios would only provide additional upland connections to Richmond Terrace and the St. George neighborhood on either the North Site or South Site. Therefore, these alternatives are not considered feasible, and no further analysis is warranted.

MITIGATION MEASURES

The preceding sections discuss the potential for significant adverse environmental impacts resulting from the proposed project. Measures have been examined to minimize or eliminate these anticipated impacts. These mitigation measures are discussed below.

TRAFFIC OPERATIONS

A number of elements in the study area would experience significant adverse traffic and transit impacts as a result of the proposed project under the reasonable worst-case transportation development scenario, including the No Catering Facility Scenario. In 2016, 16 locations in the study area are forecast to experience significant adverse traffic impacts attributable to the proposed project during one or more of the analyzed peak periods:

- *Richmond Terrace and Staten Island Ferry Viaduct (cars)* during the Weekday MD, Weekday PM, Saturday MD, and Saturday PM peak hours.
- *Richmond Terrace and Staten Island Ferry Viaduct (buses)* during the Weekday MD, Weekday PM, Saturday MD and Saturday PM peak hours.
- *Richmond Terrace and Wall Street* during the Weekday MD, Weekday PM, Saturday MD, and Saturday PM peak hours.
- *Richmond Terrace and Hamilton Avenue* during the Saturday PM peak hour.
- *Richmond Terrace and Jersey Street* during the Weekday MD, Weekday PM, Saturday MD, and Saturday PM peak hours.
- *Bay Street and Victory Boulevard* during the Weekday MD, Weekday PM, Saturday MD, and Saturday PM peak hours.

- *Bay Street and Vanderbilt Avenue* during the Weekday MD, Weekday PM, Saturday MD, and Saturday PM peak hours.
- *Bay Street and Hylan Boulevard* during the Weekday PM peak hour.
- *Bay Street and School Road* during the Weekday MD, Weekday PM, Saturday MD, and Saturday PM peak hours.
- *Victory Boulevard and Jersey Street* during the Saturday PM peak hour.
- *Victory Boulevard and Clove Road* during the Weekday MD, Weekday PM, Saturday MD, and Saturday PM peak hours.
- *Victory Boulevard and Slosson Avenue* during the Weekday MD, Weekday PM, Saturday MD, and Saturday PM peak hours.
- *SIE/I-278 EB Exit Ramp and Lortel Avenue and Slosson Avenue* during the Weekday MD, Weekday PM, Saturday MD, and Saturday PM peak hours.
- *Willow Road East and Forest Avenue* during the Weekday MD, Weekday PM, Saturday MD, and Saturday PM peak hours.
- *Forest Avenue and Jewett Avenue* during the Weekday MD, Weekday PM, Saturday MD, and Saturday PM peak hours.
- *Richmond Terrace and Schuyler Street* during the Weekday MD, Weekday PM, Saturday MD, and Saturday PM peak hours.

Under the No Catering Facility Scenario, the same locations in the study area are forecast to experience significant adverse traffic impacts with the following exceptions:

- *Victory Boulevard and Jersey Street* would not be impacted during any of the peak hours.
- *Staten Island Expressway/I-278 (SIE) Eastbound (EB) Exit Ramp and Lortel Avenue and Slosson Avenue* would be not be impacted during the Saturday PM peak hour.
- *Willow Road East and Forest Avenue* would be not be impacted during the Saturday PM peak hour.
- *Forest Avenue and Jewett Avenue* would be not be impacted during the Saturday PM peak hour.

Subject to review and approval by the relevant agencies, including NYCDOT, each of the above significant adverse impacts could be fully mitigated with the exception of the impact at the Richmond Terrace and Staten Island Ferry Viaduct (cars) and Staten Island Ferry Viaduct (buses) intersections (see below).

The proposed mitigation measures consist of:

- standard traffic capacity improvement measures, such as lane restriping, prohibiting turning movements, revised signal timing, and modified traffic signals;
- modifying and restriping the Wall Street Ramp. Conceptual plans have been reviewed by NYCDOT and agreed to in concept; however, further NYCDOT design review is required. The developer will address these issues and submit detailed construction drawings for the Wall Street Ramp and adjacent structure for NYCDOT review and approval;
- installation of new traffic signal at Richmond Terrace and Schuyler Street;
- reversing the street direction of Wall Street and Schuyler Street between Richmond Terrace and Stuyvesant Place; and
- Traffic Enforcement Agent (TEA) during Staten Island Yankee Saturday evening home games at Richmond Terrace and Hamilton Avenue.

The impacts at the intersections of Richmond Terrace with the Staten Island Ferry Viaduct (car) would be partially mitigated but would remain unmitigatable during all four peak hours, while the impacts at the

intersection of Richmond Terrace with the Staten Island Ferry Viaduct (bus) would remain unmitigatable during all four peak hours.

Richmond Terrace and Staten Island Ferry Viaduct (Cars)

This intersection would experience a significant impact in the eastbound left-turn lane group and southbound right-turn lane group during all four peak hours due to the addition of project generated traffic. The addition of a protected pedestrian/bicycle-only phase as part of the NYCDOT St. George Bay Street Improvement project at the St. George Ferry Terminal, implemented as part of the No-Action Condition, would result in increased delay for vehicles. The proposed addition of this new signal phase in the No-Action condition would improve pedestrian circulation at the expense of vehicular traffic, with an LOS F projected for the eastbound left-turn lane group in the No-Action condition for the Weekday PM and Saturday PM peak hours and for the southbound right-turn lane group in the No-Action condition for the Weekday PM peak hour. To partially mitigate the potential impacts, the signal timing would be reallocated as follows:

- Weekday MD peak hour: Shift 10 seconds from the southbound/westbound right-turn phase to the eastbound/southbound phase.
- Weekday PM peak hour: Shift 6 seconds from the southbound/westbound right-turn phase to the eastbound/southbound phase.
- Saturday MD peak hour: Shift 9 seconds from the southbound/westbound right-turn phase to the eastbound/southbound phase.
- Saturday PM peak hour: Shift 7 seconds from the southbound/westbound right-turn phase to the eastbound/southbound phase.

The same mitigation would be proposed for the No Catering Facility Scenario.

Richmond Terrace and Staten Island Ferry Viaduct (Buses)

This intersection would experience a significant impact in the westbound left-turn movement during the Weekday MD, Saturday MD, and Saturday PM peak hours and in the southbound through lane group during the Weekday PM peak hour. This intersection operates on the same signal controller as the Richmond Terrace and Staten Island Ferry Viaduct (cars), and with the proposed addition of a protected pedestrian phase for the No-Action condition, signal timing reallocation to mitigate project-related impacts is not feasible without creating new unavoidable impacts in other intersection lane groups. Therefore, this intersection could not be mitigated and the impacts are considered significant and unavoidable.

These impacts would also be considered significant and unavoidable under the No Catering Facility Scenario.

POST-OPENING MONITORING

In addition to the proposed mitigation measures, the applicants would conduct a monitoring plan when the proposed development is fully built and occupied. Before commencing the monitoring plan, the applicant would submit a detailed scope of work for NYCDOT review and approval.

The developers will be responsible for costs associated with the design and implementation of recommended improvements identified by the study and approved by NYCDOT in consultation with the developers and NYCEDC. Improvements, if warranted, would be limited to signal timing and/or signal head modifications to accommodate phasing changes, restriping, new or modified signage and parking regulation changes. NYCEDC will be responsible for other costs associated with the design and/or implementation of recommended improvements identified by the study and approved by NYCDOT in consultation with the developers and NYCEDC. These improvements, if warranted, would be limited to one traffic signal in addition to the signal already committed to as part of the proposed mitigation, and if warranted, up to 3 TEAs on weekday evenings and weekends during peak tourist/shopping periods of the year.

TRANSIT (STATEN ISLAND FERRY) OPERATIONS

As described in "Transportation," the No-Action condition analysis indicates that the Staten Island Ferry is projected to exceed operational capacity on three landing cycles during the following peak hours: Saturday MD peak hour, Saturday PM peak hour (with a Staten Island Yankees Game), and Saturday PM peak hour (without a Staten Island Yankees Game). The proposed project would potentially cause significant adverse impacts to Staten Island Ferry operations during single landing cycles in all four peak hours studied. The impacts noted are a function of the system throughput capacity determined by NYCDOT, which is limited by the width of the boarding aprons and the ability to process passengers during the 6.5-minute time window currently allotted in the printed schedules. Over time, the City will monitor operations to determine if future service changes or capital improvements are necessary.

Potential mitigation measures to partially or fully mitigate the projected issues include the following:

- Increase system capacity by increasing the width of the boarding aprons, which according to NYCDOT is currently the controlling factor in system capacity. Ferries would also need to be modified to accept the wider boarding aprons. According to NYCDOT, this measure would take approximately 8 to 10 years to implement and would require significant capital investment.
- Increase system capacity by increasing the frequency of sailings. This would reduce the number of passengers per sailing, but according to NYCDOT, would require a significant increase in operating cost for the Ferry and time to recruit and train requisite personnel.
- Make use of timed ticketing and/or variable pricing for the Observation Wheel to spread out visitor arrivals and encourage visitation during time periods when ferry ridership is lower.

As the feasibility of implementing any of the above measures has yet to be determined, the projected ferry impacts are currently considered to be unavoidable adverse impacts.

The City will work to develop potential mitigation measures to address these issues. Additionally, NYCEDC is exploring supplemental waterborne transit to provide additional transportation options, which could decrease the projected ridership on the Staten Island Ferry.

TRANSIT (SUBWAY PLATFORM STAIRWAY) OPERATIONS

As described in "Transportation," the With-Action condition analyses for the proposed project and the No Catering Facility Scenario indicate that the northern stair at the south end of the downtown R platform at the Whitehall Station is projected to exceed operational capacity during the Weekday PM peak hour. The mitigation measure necessary to mitigate this impact includes a widening of the stairway. In consultation with NYCT, widening of this stairway is infeasible due to the physical constraints of the subway station; a widened station stair would necessitate a widened platform, which in turn would require realigning the tracks and an expansion of the overall station envelope. Therefore, the projected subway stairway impact is considered to be a significant and unavoidable adverse impact.

CONSTRUCTION

Traffic

As detailed in "Construction," after the second quarter of 2015, when access to the development sites would be open on Richmond Terrace and Jersey Street, Nicholas Street, and Wall Street, a significant adverse traffic impact was identified at the Richmond Terrace and Jersey Street intersection during the Weekday PM peak hour of the peak construction period condition. This impact could be mitigated by advancing the proposed mitigation at this location.

AIR QUALITY

Mobile Sources

CO concentrations with the proposed traffic mitigation measures were determined for the 2016 With-Action year. The results indicate that the proposed project with the traffic mitigation measures would not result in any violations of the 8-hour CO standard. In addition, the increments in 8-hour average CO concentrations are small and consequently would not exceed the *de minimis* CO criteria.

PM_{10} concentrations with and without the proposed traffic measures were determined for the 2016 With-Action year. The results indicate that the vehicle trips generated by the proposed project with the traffic mitigation measures would not result in PM_{10} concentrations that would exceed the NAAQS.

Future maximum predicted 24-hour and annual average $PM_{2.5}$ concentration increments were also calculated. The results show that the daily and annual $PM_{2.5}$ increments are predicted to be well below the *de minimis* criteria. Therefore, there would be no potential for significant adverse impacts on air quality from vehicle trips generated by the proposed project with traffic mitigation measures.

There are no changes to the air quality impacts from the parking structures by the proposed project with the traffic mitigation measures.

Stationary Sources

There are no changes to the air quality impacts from the heating and hot water systems by the proposed project with the proposed traffic mitigation measures.

There are no changes to the air quality impacts from the potential waterborne transit landing by the proposed project with the traffic mitigation measures.

Cumulative Impacts

The cumulative daily $PM_{2.5}$ increments are predicted to be below the *de minimis* criteria. Therefore, there would be no potential for significant adverse impacts on air quality from the mobile and stationary sources.

UNAVOIDABLE ADVERSE IMPACTS

TRAFFIC

The proposed project would potentially result in significant adverse traffic impacts at a number of study area intersections. As discussed above, traffic mitigation measures would be employed at individual intersections to mitigate the adverse significant traffic impacts. The proposed mitigation measures consist of standard traffic capacity improvement measures, such as lane restriping, signal timing modifications and installation of new traffic signals at unsignalized intersections. However, even with these measures in place, some of the study area intersections would not be completely mitigated in the future conditions to within the significant impact thresholds. The City of New York will continue to coordinate with NYCDOT for the purposes of evaluating additional mitigation measures that may be available for these intersections.

Summary of Unavoidable Adverse Traffic Impacts, 2016

- Richmond Terrace and Ferry Viaduct (cars)- Weekday MD, Weekday PM, Saturday MD, Saturday PM
- Richmond Terrace and Ferry Viaduct (buses) – Weekday MD, Weekday PM, Saturday MD, Saturday PM

The intersection of Richmond Terrace and the Staten Island Ferry Viaduct (cars) would be partially mitigated during all four peak hours.

TRANSIT (STATEN ISLAND FERRY)

The proposed project would potentially result in significant adverse transit impacts on the Staten Island Ferry during all peak hours. As discussed in "Mitigation Measures," several options to mitigate ferry operations have been identified, but these measures pose significant cost and operational implications. As a result, feasibility of implementing these measures has yet to be determined. The City of New York will continue to assess these measures.

TRANSIT (SUBWAY)

The proposed project would potentially result in significant adverse transit impacts on the northern platform stair to/from the downtown R platform at the Whitehall Station during the Weekday PM peak hour. As discussed in "Mitigation Measures," NYCT has determined that widening this stairway is infeasible due to the physical constraints of the subway station; a widened stair would necessitate a widened platform, which in turn would require realigning the tracks and an expansion of the overall station envelope. Therefore, the projected subway stairway impact is considered to be a significant and unavoidable adverse impact.

GROWTH-INDUCING ASPECTS OF THE PROPOSED PROJECT

The term "growth-inducing aspects" generally refers to the potential for a proposed project to trigger additional development in areas outside the project site that would otherwise not have such development without the proposed project. The *CEQR Technical Manual* indicates that an analysis of the growth-inducing aspects of a proposed project is appropriate when the project:

- Adds substantial new land use, new residents, or new employment that could induce additional development of a similar kind or of support uses, such as retail establishments to serve new residential uses; and/or
- Introduces or greatly expands infrastructure capacity.

The proposed project would be limited to the project sites, which would be developed with mixed-use development that would include a retail outlet center, a hotel, catering facility, and public and accessory parking on the South Site and an Observation Wheel, Wheel Terminal Building with various commercial, retail (including merchandising and restaurants), exhibition space, theater space, public and accessory parking, and publicly accessible passive and active open space on the North Site. The proposed project would be compatible with, and supportive of, land use, zoning, and public policy initiatives in the area. It would convert large surface parking lots located on prime waterfront property into a vibrant mixed-use area that capitalizes on existing transportation infrastructure, showcases views of New York Harbor and the Manhattan skyline, and supports the planning goals for St. George and Staten Island all without denigrating the sites' current role as providing public parking for the Ferry Terminal and the Stadium. It would also generate increased retail traffic that could benefit existing retail businesses in the study area, the new uses would not be expected to induce additional notable growth outside the project sites. Finally, it would not include the introduction or expansion of infrastructure capacity (e.g., sewers, central water supply) that would result in indirect development. Therefore, the proposed project would not induce significant new growth in the surrounding area.

IRREVERSIBLE AND IRRETRIEVABLE COMMITMENT OF RESOURCES

There are a number of resources that would be expended in the construction and operation of the proposed project. The resources are considered irreversibly and irretrievably committed because their reuse for some purpose other than the proposed project would be highly unlikely. The proposed project constitutes an

irreversible and irretrievable commitment of the project sites as a land resource, as it renders the land infeasible for other purposes, at least in the near term.

These commitments of land resources and materials are weighed against the benefits of the proposed project. The proposed project would convert large surface parking lots located on prime waterfront property into a vibrant mixed-use area, would provide new job opportunities for local residents, attract visitors from throughout the metropolitan region, and complement existing economic uses including the Stadium, the Ferry Terminal, and existing businesses in St. George. The proposed project would create a New York City icon that would not only attract millions of visitors each year but would add a key point of interest to the New York City skyline.

In addition, the proposed project would introduce public amenities that would capitalize on the sites' unique qualities, particularly its views of New York Harbor and the Manhattan skyline and its transportation infrastructure. On the North Site, active and passive open space would be provided. Also, the proposed project's design, including rooftop open space on the North Site and open pedestrian promenades on the South Site, would improve the upland area's connection to the waterfront.

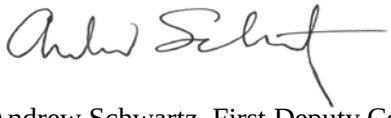
NEW YORK STATE ENVIRONMENTAL CONSERVATION LAW

This Notice of Completion for the Final Environmental Impact Statement for the St. George Waterfront Redevelopment has been prepared in accordance with Article 8 of the New York State Environmental Conservation Law.

CONTACT OFFICE

Requests for copies of this FEIS should be forwarded to the contact office, New York City Economic Development Corporation (Attention: Meenakshi Varandani), 110 William Street, New York, NY 10038, or by email at StGeorgeWaterfront@nycedc.com.

The FEIS is also available on the New York City Economic Development Corporation website:
http://www.nycedc.com/project/st-george-waterfront



Andrew Schwartz, First Deputy Commissioner
New York City Department of Small Business Services

August 29, 2013
Date