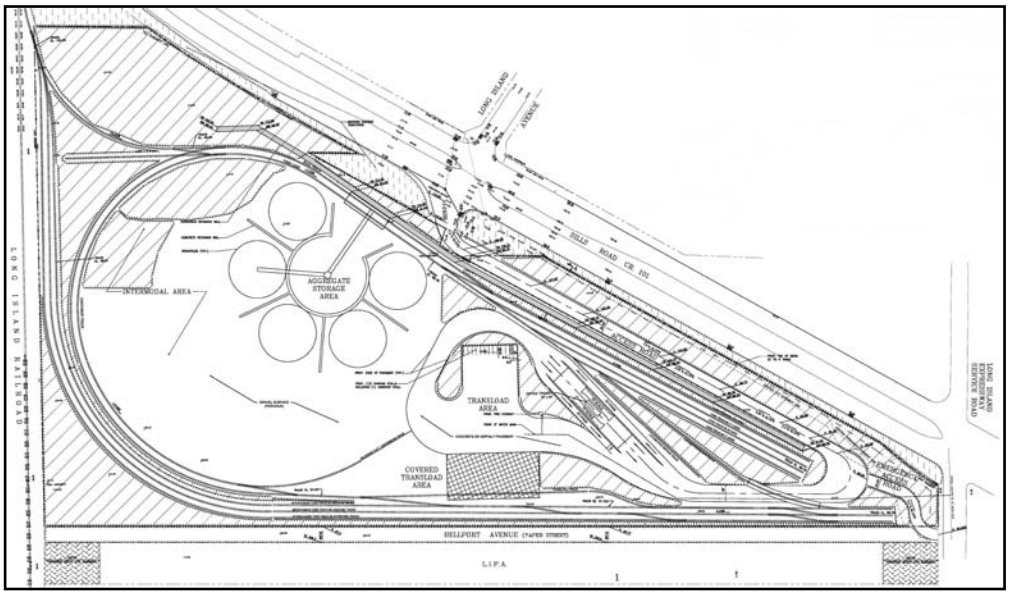
Decision I.D. #40969 **Service Date: July 26, 2010**
Comment Due Date: August 10, 2010

ENVIRONMENTAL ASSESSMENT

Finance Docket No. 35141

U S Rail Corporation
Construction and Operation Exemption
Brookhaven Rail Terminal



Prepared by:
Surface Transportation Board, Section of Environmental Analysis

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Washington, DC 20423
Telephone: 202-245-0301

SURFACE TRANSPORTATION BOARD
Washington, DC 20423
Office of Economics, Environmental Analysis, and Administration

July 26, 2010

Dear Reader:

The Surface Transportation Board's Section of Environmental Analysis (SEA) is pleased to provide you with the enclosed Draft Environmental Assessment (Draft EA) for U S Rail Corporation's (U S Rail) proposed construction and operation of an approximately 3.4-mile rail line and associated rail transfer facility in the Town of Brookhaven, Suffolk County, New York.

The Draft EA discusses the potential environmental impacts that could result from the construction and operation of the proposed rail line and facilities and includes SEA's preliminary recommendations for mitigating possible environmental effects. The Draft EA reflects SEA's independent analysis and considers the views of the public, as well as Federal, state, and local agencies.

Availability of the Draft Supplemental Environmental Impact Statement

SEA has distributed the Draft EA to all parties of record for this docket and the environmental distribution list, including key governmental agencies and other appropriate entities. SEA has made the Draft EA available for review at the Brookhaven Free Library, 273 Beaver Dam Road, Brookhaven, NY 11719. The entire document is also available on the Board's website at www.stb.dot.gov.

Public Comment and Review of the Draft Environmental Assessment

A notice will be published in the Federal Register announcing the availability of the Draft EA. The public and any interested parties are encouraged to make written comments on all aspects of the Draft EA. All comments must be postmarked no later than **August 10, 2010**. SEA will consider all timely comments in preparing the Final EA, which will include SEA's final conclusions on potential impacts and SEA's final recommendations, including mitigation. The Board will then make its final decision regarding this project and any environmental conditions it might impose. When considering whether to approve the proposed action, the Board will consider the potential environmental effects and the environmental mitigation it might impose on the project.

Please submit any comments on this Draft EA and the recommended environmental mitigation to the following address:

Troy Brady
Surface Transportation Board
395 E Street, SW
Washington, DC 20423
Attn: Docket No. FD 35141

Written comments may also be filed electronically on the Board's web site, www.stb.dot.gov, by clicking on the "E-FILING" link. Comments must be postmarked by **August 10, 2010**. Please refer to Finance Docket No. 35141 in all correspondence, including e-filings, addressed to the Board.

Thank you for your interest and participation in the environmental review process. If you have any questions regarding this EA or would like additional information about the environmental review process, please contact SEA's Project Manager for this project, Troy Brady, by phone at (202) 245-0301, fax at (202) 245-0454, or e-mail at troy.brady@stb.dot.gov.

Sincerely,

Victoria Rutson
Chief, Section of Environmental Analysis

SEA's Summary of Preliminary Major Conclusions

The Section of Environmental Analysis (SEA) at the Surface Transportation Board (Board) has concluded its preliminary review of the potential environmental impacts that could result from the proposed construction and operation of 18,000 feet (3.4 miles) of a new rail line at a site to known as the Brookhaven Rail Terminal (BRT), located in the Town of Brookhaven, Suffolk County, NY. The applicant, U S Rail Corporation (U S Rail), proposes to construct and operate both the new rail line and certain facilities on the 28-acre BRT site. Those facilities are: a rail switch connecting to the Long Island Rail Road (LIRR) mainline, 134 feet of track within the turnout, 200 feet of lead track on LIRR property, 100 feet of lead track on BRT property, and crushed stone aggregate handling and storage facilities consisting of an aggregate storage area, a freight storage area, and a transload area with truck scales. U S Rail's proposal would allow it to deliver crushed stone aggregate by rail from sources in upper New York State to its primary customer, the Sills Group, which uses crushed stone aggregate for road and building construction on Long Island, NY. According to U S Rail, its proposal would reduce the Sills Group's reliance on truck transportation of crushed stone aggregate throughout the New York City metropolitan region, including the communities of Port Jefferson and Port Washington.

Based on the information provided by the railroad, comments received to date, and independent analysis conducted by SEA, this Draft Environmental Assessment (EA) makes the following preliminary conclusions:

1. The proposed construction and operation of the new rail line by U S Rail would not significantly affect the quality of the human or natural environment, if the Board imposes the mitigation measures recommended in this Draft EA.

2. The construction and operation of the BRT facilities planned by U S Rail would not result in significant cumulative effects on the human or natural environment.

3. In this Draft EA, SEA examined two alternatives: U S Rail's proposed 18,000 feet (3.4 miles) of new rail line construction and operation on the BRT site, which U S Rail selected from four sites that it initially considered, and the No-Action alternative which would maintain the status quo. No other alternatives were considered because the proposed rail line and planned facilities would use essentially the entire 28-acre site, and there is no evidence suggesting that there would be a more appropriate location for the proposed rail line.

4. The area surrounding the proposed project site is industrial. Land uses include the Caithness Power Plant, a petroleum distributor, a greeting card company, an auto auction center, and a variety of other offices and warehouses. The Long Island Expressway (Interstate 495), County Road 101 (Sills Road) and a Long Island Power Authority transmission line right-of-way also border the proposed site.

5. The proposed site is located within the Town of Brookhaven's North Bellport Empire Zone, which provides financial incentives to attract new and expanded employment opportunities. Future land use plans call for additional industrial uses surrounding the project site.

6. The proposed site contains no wetlands, surface waters, important wildlife habitats, or historic structures or archaeological resources. The proposed site is located one-quarter of a mile from the nearest noise-sensitive receptors (residences and schools, etc).

7. Crushed stone aggregate is currently moved to the Sills Group facilities (Scatt Materials and Empire Asphalt plants) via a complex delivery system using rail, barge, and truck though the port towns of Port Jefferson and Port Washington. If approved and built, crushed stone aggregate would move by rail to the planned BRT site and then by truck to the two existing Sills Group facilities located on Long Island: Scatt Materials is located approximately 24 miles from the BRT site and Empire Asphalt is located approximately 13 miles from the BRT site. U S Rail's proposal would allow trucks to avoid Port Jefferson and Port Washington and use Interstate 495 (I-495) to access the BRT site.

8. The operation of approximately 6 trains per week, 3 inbound and 3 outbound, consisting of approximately 40 to 50 railcars would be delivered by New York & Atlantic Railway (NY&A) and handed off to U S Rail for BRT on-site movements. SEA's analysis shows that the addition of 6 trains per week would not result in a significant adverse impact.

9. The Town of Brookhaven's Division of Environmental Protection has completed an environmental review of the BRT proposal and site under New York's State Environmental Quality Review Act (SEQRA). That review concluded with a Negative Declaration Finding indicating that under SEQRA, the proposed project would not have a significant impact on the environment. On March 23, 2010, the

Town of Brookhaven voted unanimously to accept the results of the Negative Declaration Finding.

10. U S Rail and the Town of Brookhaven, among others, have entered into a "Stipulation of Settlement," committing to several mitigation measures for this site, including constructing a secondary egress in case of emergencies, dust control measures, height limits for buildings and aggregate piles, landscaping, noise reduction, 'dark sky friendly' lighting, and water control measures to protect the Nassau-Suffolk Sole Source Aquifer.

11. SEA is recommending three mitigation measures in this Draft EA to minimize potential environmental impacts. SEA's recommended conditions would require U S Rail to comply with the terms of both the SEQRA Negative Declaration Finding accepted by the Town of Brookhaven on March 23, 2006 and its "Stipulation of Settlement" agreement with the Town of Brookhaven and Sills Group which was filed with the Board on April 26, 2010. In addition, SEA is recommending mitigation requiring U S Rail to use best management practices to minimize erosion and to implement a spill prevention plan to further protect the Nassau-Suffolk Sole Source Aquifer.

Based on the information provided from all sources to date and the analysis presented in this Draft EA, and with the imposition of the mitigation recommended here, U S Rail's proposal is anticipated to have no significant environmental impacts. Therefore, the preparation of an EA for this case is appropriate and a full Environmental Impact Statement is unnecessary.

TABLE OF CONTENTS

APPENDICES

LIST OF TABLES

LIST OF FIGURES

LIST OF ACRONYMS

AADT	annual average daily traffic
BMP	best management practice(s)
Board	Surface Transportation Board
BRT	Brookhaven Rail Terminal
CAA	Clean Air Act
CO	carbon monoxide
C.F.R	Code of Federal Regulations
dBA	decibels
DNL	day-night average noise level
EA	environmental assessment
EIS	environmental impact statement
EO	Executive Order
EPA	U.S. Environmental Protection Agency
FEMA	Federal Emergency Management Agency
FHWA	Federal Highway Administration
FRA	Federal Railroad Association
FTA	Federal Transit Administration
FWS	U.S. Fish and Wildlife Service
I-495	Interstate 495, also known as the Long Island Expressway
Ldn	day-night average sound level
Leq	equivalent sound level
LIPA	Long Island Power Authority
LIRR	Long Island Railroad
LITRIM	Long Island Truck-Rail Intermodal Facility
mph	miles per hour
msl	mean sea level
NAAQS	National Ambient Air Quality Standards
NEPA	National Environmental Policy Act
NHPA	National Historic Preservation Act

NO_2	nitrogen dioxide
NRHP	National Register of Historic Places
NWI	National Wetlands Inventory
NY&A	New York & Atlantic Railway
NYC	New York City
NYMTC	New York Metropolitan Transportation Council
NYNHP	New York Natural Heritage Program
NYS	New York State
NYSDEC	New York State Department of Environmental Conservation
O_3	ozone
OPRHP	New York Office of Parks, Recreation, and Historic Preservation
OSHA	Occupational Safety and Health Administration
Pb	lead
PM	particulate matter
ppm	parts per million
SEA	Section of Environmental Analysis
SEQRA	State Environmental Quality Review Act
SHPO	State Historic Preservation Office
SO_2	sulfur dioxide
SPCC	spill prevention, control and countermeasures
TNM	Traffic Noise Model - FHWA
TSP	total suspended particulates
USACE	United States Army Corps of Engineers
U S Rail	United States Rail Corporation
U.S.C.	United States Code
US DOT	U.S. Department of Transportation
USGS	U.S. Geological Survey
VMT	vehicle miles traveled
VOCs	volatile organic compounds

GLOSSARY

Arterial street	A class of street that allows significant traffic movements for travel between major points and provides regional connectivity.
Attainment area	An area that EPA has classified as complying with the National Ambient Air Quality Standards (NAAQS) specified under the Clean Air Act.
Best Management Practice (BMP)	Technique that various parties (e.g., the construction industry) use to minimize or avoid adverse impacts to the environment. The Board may designate these techniques as mitigation measures.
Clean Air Act	The primary Federal law that protects the nation's air resources comprised of the Clean Air Act of 1970 and the subsequent amendments, including the Clean Air Act Amendments of 1990 (42 U.S.C. 7401–7671g). This act establishes a comprehensive set of standards, planning processes, and requirements to address air pollution problems and reduce emissions from major sources of pollutants.
Clean Water Act	The Federal Water Pollution Control Act Amendment of 1972 (33 U.S.C. 1251 et seq.) is the primary Federal law that protects the nation's waters (waters of the U.S.), including lakes, rivers, aquifers, and coastal areas and wetlands.
Collector street	Collector streets distribute trips between arterial streets and local streets and provide land access and traffic circulation within residential neighborhoods, commercial areas, and industrial areas.
Council on Environmental Quality (CEQ)	Federal agency responsible for developing regulations and guidance for federal agencies implementing the National Environmental Policy Act.
Criteria pollutant	Any of six emissions (lead, carbon dioxide, sulfur dioxide, nitrogen dioxide, ozone, and particulate matter) regulated under the Clean Air Act, for which area must meet national air quality standards.
Cultural resource	Any prehistoric or historic district, site, building, structure, or object that warrants consideration for inclusion in the National Register of Historic Places. A cultural resource that is listed in or is eligible for listing in the National Register of Historic Places is considered a historic property (or a significant cultural resource). The term could apply to any structure or resource more than 50 years old.
Cumulative effects	Impact on the environment which results from the incremental impact of the proposed action when added to other past, present, and reasonably foreseeable future actions, regardless of which agency (Federal or non-Federal) or person undertakes such actions. Cumulative impacts result from individually minor but collectively significant actions taking place over a period of time.

Decibel (dB):	A unit of noise measured on a logarithmic scale that compresses the range of sound pressures audible to the human ear over a range from 0 to 140, where 0 decibels represents sound pressure corresponding to the threshold of human hearing, and 140 decibels corresponds to a pressure at which pain occurs. A-weighted (dBA) refers to a weighting that accounts for the various frequency components in a way that corresponds to human hearing.
Endangered species	A species of plant or animal that is in danger of extinction throughout all or a significant portion of its range and is protected by state and/or federal laws.
Environmental Assessment (EA)	A document that the CEQ regulations implementing the National Environmental Policy Act requires Federal agencies to prepare for major projects or legislative proposal having the potential to significantly affect the environment. A tool for decisionmaking, it describes the positive and negative environmental effects of the undertaking and alternative actions and measures to eliminate potentially significant environmental impacts.
Environmental justice	SEA defines environmental justice as the mission discussed in Executive Order (EO) 12898 “Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations” (59 FR 7629, February 11, 1994). This EO directs Federal agencies to identify and address “disproportionately high and adverse human health or environmental effects” of their programs, policies, and activities on minority and low-income populations in the United States.
Local street	Local streets serve primarily to provide direct access to abutting land, serving local trip purposes, and access to the higher order street and highway system.
Mitigation	An action taken to prevent, reduce, or eliminate adverse environmental effects.
National Historic Preservation Act (NHPA)	The National Historic Preservation Act of 1966, as amended (16 U.S.C. 470-470 et seq.; P.L. 89- 665), is the basic legislation of the Nation's historic preservation program that established the Advisory Council on Historic Preservation and the Section 106 review process. Section 106 of the NHPA requires every Federal agency to "take into account" the effects of its undertakings on historic properties.
National Wetlands Inventory	An inventory of wetland types in the U.S. compiled by the U.S. Fish and Wildlife Service.
National Environmental Policy Act (NEPA)	The National Environmental Policy Act of 1969, as amended (42 U.S.C.4321–4347; P.L. 91-190) establishes policy, sets goals, and provides means for carrying out the environmental policy of the nation. Its purpose is to provide for the establishment of a Council on Environmental Quality and to instruct Federal agencies on broad strategies for the consideration of the human environment in its actions and decisions.

Non-attainment area	An area that EPA has classified as not complying with at least one of the National Ambient Air Quality Standards promulgated under the Clean Air Act.
Proposed action	The proposal of U S Rail to construct and operate 18,000 feet (3.4 miles) of rail line and a rail freight facility on a 28-acre site in the Town of Brookhaven, Suffolk County, NY.
Rail transfer facility	A site consisting of tracks, lifting equipment, paved and/or unpaved areas, and a control point for the transfer (receiving, loading, unloading, and dispatching) of freight between a railroad and another mode of transport (in the case of BRT, the highway mode).
Threatened species	A species that is likely to become an endangered species within the foreseeable future throughout all or part of its range, and is protected by state and/or Federal law.

EXECUTIVE SUMMARY

Introduction

On August 7, 2008, U S Rail Corporation (U S Rail), an existing class III short line common carrier[1] located in Ohio, filed a petition for exemption[2] with the Surface Transportation Board (Board) under 49 U.S.C. § 10502. In its petition, U S Rail asks the Board to approve its proposal to construct and operate approximately 18,000 feet[3] (3.4 miles) of new rail line at a 28-acre site located in the Town of Brookhaven, Suffolk County, NY (Figures ES-1 and ES-2). According to U S Rail, the new rail line would connect with an existing passenger rail line of the Long Island Rail Road (LIRR) along which freight service is currently provided by the New York and Atlantic Railway (NY&A).

In addition to the construction and operation of the approximately 18,000 feet (3.4 miles) of rail line, U S Rail also proposes to construct related rail facilities. These facilities are a rail switch, the location of which would allow the new rail line to connect with the existing LIRR mainline; approximately 134 feet of track within the turnout;[4] an additional 200 feet of lead track[5] on LIRR property; another 100 feet of lead track on BRT property; and crushed stone aggregate (aggregate) handling and storage facilities consisting of an aggregate storage area, a freight storage area and a transload[6] area with truck scales.

As shown in Figure ES-3, the proposed 3.4 miles of rail line would loop around the facilities proposed by U S Rail, then would connect with the LIRR. (See Appendix A for detailed site plan). U S Rail's proposal is referred to in this Draft Environmental Assessment (EA) as the "Brookhaven Rail Terminal" or "BRT."

[1] A Class III railroad, as defined by the Board, is a railroad with annual operating revenue of less than $20 million, adjusted annually for inflation using the base year of 1991. Class III railroads are typically local short line railroads, serving a very small number of customers or industries over a limited distance.

[2] See Appendix B, Exhibit 1.

[3] In a filing dated May 25, 2010, U S Rail supplemented its original petition, filed on August 7, 2008, to include various revisions requested by the Town of Brookhaven and the Long Island Power Authority. The revisions included adding 7,000 feet of new track to U S Rail's original proposal of 11,000 feet of new rail line, bringing the total of proposed new rail to 18,000 feet, roughly 3.4 miles, which would be located entirely within the original site footprint. Other revisions included a screen wall, additional landscaping, an emergency access to Interstate 495South service road, and elimination of a previously proposed grade separated site entrance.

[4] A turnout is the track within the no-clearance zone emanating from the switch.

[5] A lead track is the primary rail line connecting a freight yard to the main line. Other track within the yard branch off from the lead track.

[6] Transloading is moving or shifting a commodity between two modes of transportation (generally truck to rail).

Figure ES-1 – *Regional Context*

The Board's licensing role differs with regard to the proposed new rail line and the proposed facilities discussed above. The Board, through the Interstate Commerce Act, must decide whether to license the new rail line. See 49 U.S.C. § 10901, 10502. The Board also has exclusive jurisdiction over rail facilities (under 49 U.S.C. § 10501(b)), but the construction and operation of rail facilities do not require prior approval from the Board under the Act. See 49 U.S.C. § 10906. In order to satisfy the Board's responsibilities under the National Environmental Policy Act (NEPA), this Draft EA examines the potential impacts of the proposed new rail line on a wide variety of environmental resource areas including air, water, noise, biological and historic resources, and environmental justice communities. The Draft EA examines the potential environmental effects of U S Rail's proposed rail facilities as a cumulative effect, as discussed in more detail below, even though the Board has no licensing role over the facilities proposed by U S Rail here.

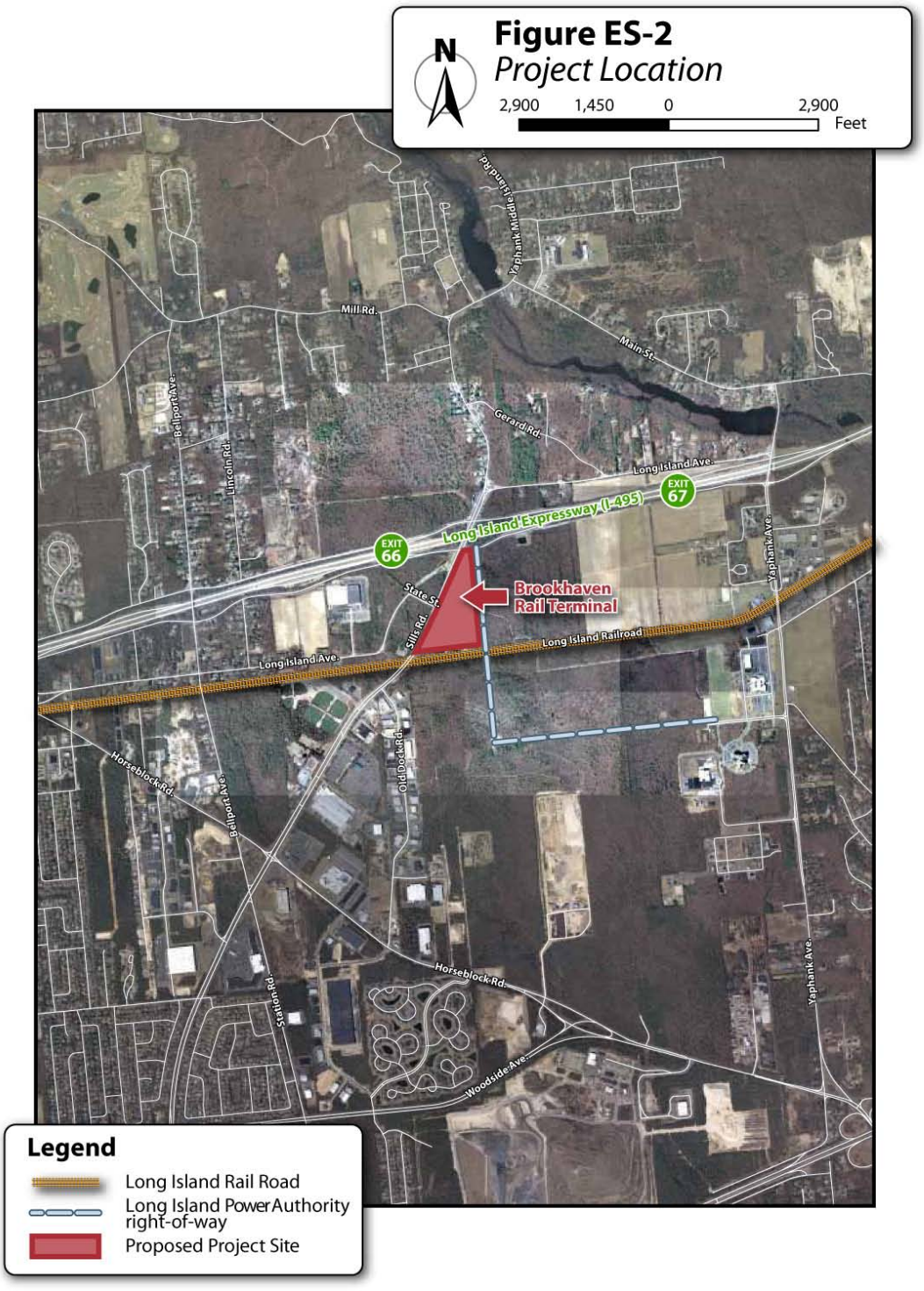


Figure ES-2
Project Location
N
2,900 1,450 0 2,900
Feet
Mill Rd.
Main St.
Gerard Rd.
Long Island Ave.
EXIT 67
Long Island Expressway (I-495)
EXIT 66
State St.
Sills Rd.
Brookhaven Rail Terminal
Long Island Railroad
Long Island Ave.
Horseblock Rd.
Old Dock Rd.
Station Rd.
Woodside Ave.
Yaphank Ave.
Legend
Long Island Rail Road
Long Island Power Authority right-of-way
Proposed Project Site

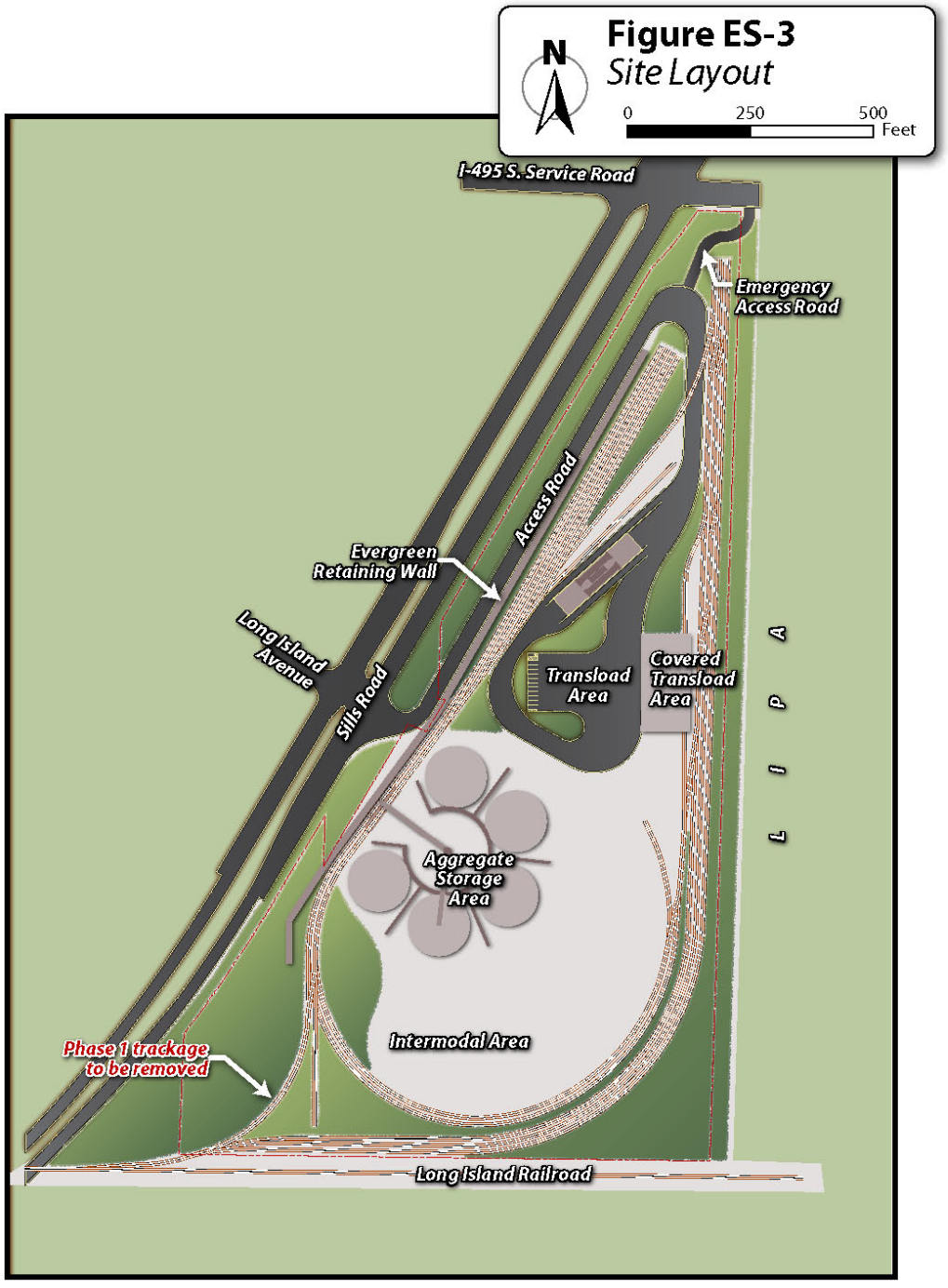


Figure ES-3
Site Layout
N
0
250
500
Feet
I-495 S. Service Road
Emergency Access Road
Access Road
Evergreen Retaining Wall
Long Island Avenue
Sills Road
Transload Area
Covered Transload Area
LIPA
Aggregate Storage Area
Intermodal Area
Phase 1 trackage to be removed
Long Island Railroad

According to U S Rail, the proposed construction and operation of the BRT would allow the applicant to provide an efficient means for delivering aggregate[7] via rail from sources in upper New York State (NYS) to its primary customer, the Sills Group, located on Long Island, NY. If approved, the project would reduce the Sills Group's reliance on truck transport of aggregate from the New York City area to Long Island.

Specifically, the BRT project — including the proposed rail line and the planned rail facilities — would allow delivery of up to 500,000 tons of aggregate annually for Sills Group's use in road and building construction on Long Island. Trucks currently use local roads to bring aggregate to Sills Group's existing facilities at the Scatt Materials plant and the Empire Asphalt plant, located 24 and 13 miles from the BRT site respectively. With the use of U S Rail's rail service at the BRT site, most of the necessary heavy truck traffic to access these plants would use Interstate 495 (I-495) and there would be no heavy truck traffic, related to Sills Group business activities, through Port Jefferson or Port Washington. The Sills Group would use 250,000 tons of the aggregate for Scatt Materials and Empire Asphalt, and would make the remaining 250,000 tons of aggregate available to currently unidentified, third party customers.

Rail operations would initially consist of an average of six trains per week; three inbound trains, each consisting of approximately 40 to 50 railcars of aggregate delivered to the BRT, and three outbound trains per week consisting of 40 to 50 empty railcars. NY&A would deliver the aggregate to the BRT over the LIRR, at which time the rail cars would be handed off to U S Rail for on-site rail movements.

The Board's Section of Environmental Analysis (SEA) prepared this Draft EA to identify and evaluate the potential environmental impacts associated with U S Rail's proposal. The Draft EA examines the potential impacts of the proposed new rail line on a wide variety of environmental resource areas including air, water, noise, biological and historic resources, and environmental justice (minority and low income) communities. The Draft EA also examines the potential cumulative effects of the construction of the facilities associated with the planned BRT. Through this Draft EA, SEA seeks to inform Federal, state, and local agencies, elected officials, Federally-recognized tribes, local communities, and the general public about the expected environmental effects of the proposal. To that end, this Draft EA describes the affected

[7] Aggregates are construction materials of crushed stone, sand and gravel. The single largest market for aggregates is road and street construction, including base and asphalt paving for highways, parking lots and other pavements. Other typical uses for aggregate material are concrete for homes and office buildings, and stone and gravel for soil erosion control projects.

environment, evaluates and compares the environmental effects of the proposed action and alternatives, and identifies mitigation measures that could lessen or eliminate potential environmental impacts.

After the close of the comment period on the Draft EA, which will extend to Tuesday, August 10, 2010, as discussed in detail below, SEA will prepare a Final EA in response to comments on the Draft EA. The Board will then issue a final decision, based on the entire environmental record, including the Draft EA, the Final EA, and all public and agency comments received, as well as the evidence submitted to the Board on the transportation merits. The Board will decide whether U S Rail's proposal should be approved, denied, or approved with mitigation, including environmental mitigation.

Draft Environmental Assessment Process

On February 20, 2009, U S Rail submitted a written request to SEA for a waiver of the preparation of an Environmental Impact Statement (EIS), which is normally required by the Board's regulations for rail line construction proposals.[8] SEA gathered preliminary information on potential environmental impacts that could result from the proposal. Information considered by SEA in making its decision whether to waive the EIS requirement and prepare an EA instead included the following:

- On October 14, 2008, SEA distributed consultation letters to 25 key Federal, state, and local agencies providing information about the proposed action, and requested information on the possible environmental effects of the proposed action. In response to these consultation letters, SEA received 11 responses from Federal, state, and local agencies.[9] The comments received identified several areas of interest, including, but not limited to: 1) federally listed and endangered species, 2) potential impacts to the Long Island Pine Barren Wildlife Habitat, 3) water use requirements, 4) potential impacts to the Nassau-Suffolk Sole Source Aquifer, 5) potential impacts to commuter and freight rail operations, 6) potential impacts to adjacent and regional roadways, 7) consistency with local land use plans, 8) potential noise impacts, 9) potential economic impact, 10) and potential cumulative effects. None of the commenters identified any potential significant

[8] See Appendix B, Exhibit 2.

[9] See Appendix C.

environmental impacts that could occur if the Board were to approve U S Rail's proposal, or requested preparation of an EIS.

- On January 12, 2009, SEA conducted a site visit of the project area. During the site visit, SEA observed the following:

  - The proposed rail construction project appeared to be consistent with local land use plans and would be located in an area zoned for industrial and commercial purposes.

  - The proposed site is bounded by the I-495 to the north, commercial/industrial businesses to the west, and a power generation facility to the south.

  - There are no known historical or archaeological sites.

  - The proposed site is located one-quarter of a mile from the nearest noise-sensitive receptors (residences and schools, etc).

  - The site does not contain any wetlands or surface waters.

  - There are no wildlife sanctuaries, refuges or National or state parks or forests located near the proposed site.

  - There are no hazardous materials, sites, or spills associated with the proposed site.

  - The proposed site is located in an area with the following existing noise sources: vehicular and rail traffic, industrial activities, and high voltage power transmission lines.

Based on what SEA learned, SEA granted a waiver in writing from the requirement to prepare an EIS on March 31, 2009,[10] but noted that should circumstances change or additional information come to light indicating that the potential environmental effects from the BRT

[10] See Appendix B, Exhibit 3.

proposal could be significant; SEA reserved the right to prepare a full EIS. In its waiver letter, SEA also indicated that preparation of an EA to comply with NEPA was appropriate because, based on the information available to date and with the imposition of mitigation measures, it appeared that the proposed action would not result in significant environmental impacts.

Gannett Fleming, Inc., an independent third party consultant, assisted SEA in the preparation of this Draft EA. The use of third-party consultants is permitted by the regulations of the President's Council on Environmental Quality (CEQ) at 40 C.F.R. § 1506.5(c) and the Board's own environmental regulations at 49 C.F.R. § 1105.4(j). A third-party consultant is a voluntary arrangement in which the consultant works under the agency's exclusive direction, control, and supervision, but is paid by the railroad applicant. U S Rail's request for the use of Gannett Fleming, Inc, as a third-party consultant was approved by SEA on June 4, 2008.[11]

Description of the Affected Environment

The proposed project is located in the Town of Brookhaven, Suffolk County, NY and involves a 28-acre parcel located immediately southeast of Exit 66 off I-495 (Figure ES-4). The proposed site is bounded by I-495 to the north, County Road (CR) 101 (Sills Road) to the west, the LIRR to the south, and a utility easement and vacant parcel to the east. Chapter 3 contains a detailed discussion of the affected environment.

Land use surrounding the proposed project site consists primarily of industrial uses including the Caithness Power Plant, a petroleum distributor, a greeting card company, an auto auction center, and a variety of other offices and warehouses. The proposed site is also located within the Town of Brookhaven's North Bellport Empire Zone which provides financial incentives to attract new and expanded employment opportunities. Future land use plans call for additional industrial uses surrounding the project site.

The proposed project site is a generally level site composed mainly of sand. No surface waters or wetlands exist within the proposed project site. However, the U.S. EPA (EPA) asked SEA to focus on potential contamination to groundwater because the BRT site is located over the Nassau-Suffolk Sole Source Aquifer. The proposed site does not provide quality habitat for wildlife due to previous clearing activities and the presence of adjacent industrial and infrastructure operations.

[11] See Appendix B, Exhibits 6 and 7.

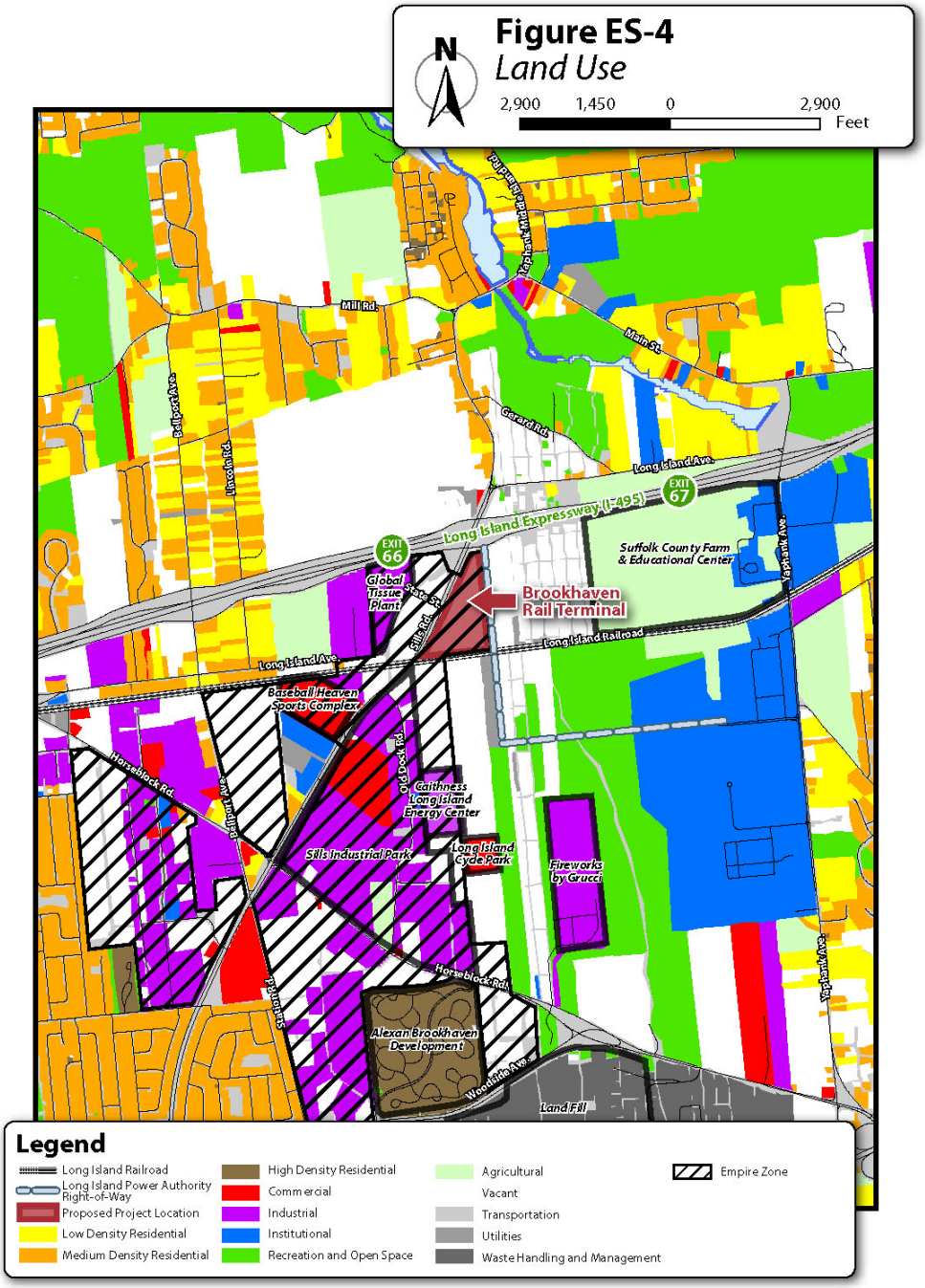


Figure ES-4
Land Use
N
2,900 1,450 0 2,900
Feet
Mill Rd.
Main St.
Bellport Ave.
Gerard Rd.
Long Island Ave.
EXIT 67
Long Island Expressway (I-495)
EXIT 66
Suffolk County Farm & Educational Center
Yaphank Ave.
Global Tissue Plant
State St.
Sills Rd.
Brookhaven Rail Terminal
Long Island Railroad
Baseball Heaven Sports Complex
Horseblock Rd.
Pidgeon Way
Caithness Long Island Energy Center
Sills Industrial Park
Long Island Cycle Park
Fireworks by Grucci
Alexan Brookhaven Development
Woodside Ave.
Land Fill
Legend
Long Island Railroad
Long Island Power Authority Right-of-Way
Proposed Project Location
Low Density Residential
Medium Density Residential
High Density Residential
Commercial
Industrial
Institutional
Recreation and Open Space
Agricultural
Vacant
Transportation
Utilities
Waste Handling and Management
Empire Zone

The proposed project site is within an EPA-designated non-attainment area for the 8-hour ozone and the 24-hour particulate matter $_{2.5}$ ($PM_{2.5}$) national ambient air quality standards. No hazardous materials, previous spills or waste sites are associated with the project site. Existing noise sources are vehicular and rail traffic sources, industrial activities, and high voltage power transmission lines.

Transportation infrastructure located near the proposed project site includes I-495, CR 101(Sills Road) and CR 16 (Horseblock Road), and the LIRR rail line. SEA has determined that the proposed additional 122 trucks per day[12] that would be generated by the proposed action would not substantially affect roadway capacity of I-495. This is because the proposed 122 trucks per day that would be generated would be inconsequential (an increase of less than 1 percent) relative to the average 143,390 vehicles per day that currently travel I-495 along the highway segment between Exits 52 and 66 that truck traffic generated by the BRT would use.[13]

Alternatives Considered

U S Rail considered four preliminary sites during the conceptual development of its proposed rail line and planned facilities (Figure ES-5). In evaluating these four sites, U S Rail considered five key criteria: proximity of the site to the regional highway network and the LIRR; a preferred site size of 20 or more acres; distance of the site from residential and other sensitive land uses; lack of rail operating barriers (e.g., height restrictions and at-grade crossings); and environmental impacts. Based on U S Rail's assessment of the five key criteria, it concluded that the proposed project site (the Sills Road site) was preferable to the other three sites assessed. A detailed discussion and comparison of the preliminary sites is provided in Chapter 2. With its project site determined, U S Rail then filed a petition for exemption with the Board seeking the Board's approval to construct and operate the 3.4 mile rail line and the planned BRT facilities.

In this Draft EA, SEA has examined two alternatives: the no-action alternative and the proposed action. Under the no-action alternative, environmental impacts associated with the construction and operation of the proposed BRT would not occur. In this scenario, Sills Group would continue to receive aggregate via truck from the towns of Port Jefferson and Port Washington.

[12] See Chapter 4, Section 4.9 for a detailed truck generation calculation.

[13] Calculated from New York State Department of Transportation, 2008 Traffic Data Report, Appendix E.


Figure ES-5
Alternative Sites Considered
N
2,900 1,450 0 2,900
Feet
East Main and River Road site
Sills Road site
Bellport Road site
Horseblock Road site
Long Island Expressway (I-495)
EXIT 66
EXIT 67
Long Island Railroad
Long Island Ave.
Mill Rd.
Main St.
Gerard Rd.
Lincoln Rd.
Sills Rd.
State St.
Old Dock Rd.
Bellport Ave.
Horseblock Rd.
Station Rd.
Woodside Ave.
Yaphank Ave.
Legend
Long Island Railroad
Long Island Power Authority right-of-way
Proposed Project Location

SEA also used the no-action alternative as a baseline to allow it to compare existing conditions against the proposed action to accurately assess the potential environmental benefits and impacts from construction and operation of the proposed action. No other alternatives were considered because the proposed rail line and planned facilities would use essentially the entire 28-acre BRT site, and there is no evidence that there would be a more appropriate location for the proposed rail line.

Having defined the alternatives that it would examine, SEA then carefully assessed the potential impacts that could result if the Board were to approve either the no-action or the proposed action alternative.

Specifically, SEA examined the following environmental resource areas:

- geology, soils, and climate;
- surface and ground water;
- air quality;
- vegetation and wetlands;
- endangered, threatened and rare species;
- noise (highway and rail);
- cultural resources;
- hazardous materials and waste sites;
- land use;
- population demographics;
- economics and employment;
- recreation;
- transportation (highway, rail and safety);
- environmental justice; and
- cumulative effects.

During its environmental review, SEA did not identify any significant impacts in the areas studied. Table ES-1 summarizes the results of SEA's analysis contained in this Draft EA.

In addition to the impacts described in Table ES-1, SEA determined in its environmental review that U S Rail's proposed project would have some beneficial effects on the environment.

These potential benefits include reductions in fuel consumption, air pollutant emissions, highway traffic, and highway accidents. Moreover, the Town of Brookhaven's Division of Environmental Protection completed an environmental review under the New York's State Environmental Quality Review Act (SEQRA) and, on March 23, 2010, made a Negative Declaration Finding.[14] The Negative Declaration Finding indicates that under SEQRA, the proposed project would not have a significant impact on the environment.

Summary of Potential Environmental Impacts of the Proposed Action

As summarized here and detailed in Chapter 4, SEA did not identify any significant impacts to the environmental resource areas examined in this Draft EA.

Table ES-1: Summary of Environmental Analysis Results

Impact Area	Result of Analysis	Type of Impact
Geology, Soils and Climate	The proposed project site is underlain by deep sand soils. Clearing and grading of the proposed project site would be required to provide necessary track slopes. SEA is recommending mitigation requiring U S Rail to use best management practices before and during construction to minimize soil erosion and sedimentation.	No significant negative impact
Surface and Ground Water	No surface waters are present on the proposed project site. The proposed project site is located over the Nassau-Suffolk Sole Source Aquifer. The commodities handled on the BRT site would consist primarily of crushed stone aggregate, which should present minimal threat to the aquifer. Nevertheless, to protect groundwater resources, U S Rail has committed to construct on-site stormwater basins to accommodate a five-inch rainfall and promote aquifer recharge. In addition, SEA is recommending mitigation requiring U S Rail to develop and implement a spill prevention, control and countermeasures (SPCC) plan to ensure protection of the aquifer in the event of an accidental spill.	No significant negative impact.
Air Quality	Projected increases in PM_{10} and $PM_{2.5}$ concentrations from the construction and operation of the BRT would have an insignificant impact under guidelines issued by New York State.	No significant negative impact

[14] See Appendix B, Exhibit 8.

Table ES-1: Summary of Environmental Analysis Results

Impact Area	Result of Analysis	Type of Impact
	By providing the opportunity to shift a portion of freight movement on Long Island from truck to rail, greenhouse gas emissions associated with these activities with the planned BRT in place could be reduced by approximately 65 percent.	Positive impact
	Greenhouse gas emission benefits are linked to the corresponding reduction in fuel consumption from the decrease in regional heavy truck travel.	Positive impact
Vegetation and Wetlands	U S Rail has committed in its "Stipulation of Settlement" with the Town of Brookhaven to landscape 30 percent of the project site using vegetation retention and additional, native species plantings after construction.	No significant negative impact
Endangered, Threatened and Rare Species	Because there is no suitable habitat at the proposed site, the proposed action would not affect federal or state listed endangered or threatened species.	No impacts
Noise	Highway Noise: The proposed project would increase local noise because local truck traffic around the BRT would increase by 61 loaded and 61 empty (or 122 total trucks) along portions of the roadway network between the BRT and Sills Group facilities. The increases in sound levels (Ldn) between the no-build and build conditions along these routes would range from 0.0 to 0.2 dBA for the worst-case noise conditions.[15] Given the existing traffic in this industrial area, the addition of 122 trucks is minimal and would not result in significant noise impact.	No significant negative impact

[15] For the noise analysis in this Draft EA, SEA used a "worst case" scenario, which assumed that all of the annual 500,000 tons of aggregate and associated truck traffic would be distributed to Sills Group facilities exclusively (50% to the Scatt Materials plant and 50% to the Empire Asphalt plant). However, as Sills Group is proposing to use only 250,000 tons annually and distribute the remaining 250,000 tons to unidentified third-party customers, actual truck traffic and associated noise levels would be further dispersed and actual truck traffic generated by the BRT on roadways leading to the Sills Group facilities would be less than assumed for the noise analysis.

Table ES-1: Summary of Environmental Analysis Results

Impact Area	Result of Analysis	Type of Impact
	Rail Noise: The proposed project would generate, on average, one train per day. No significant noise impacts would occur from one additional train (the increase would be less than 3 dBA). Furthermore, based on existing noise levels of 63 dBA at the site entrance and 70 dBA along the site boundary with the LIRR, the screening distance within which noise impacts could occur are 70 feet and 81 feet, respectively. Since there are no noise sensitive receptors (residences, schools, hospitals, parks) within this screening distance from the proposed BRT, no significant noise impacts from rail operations would occur.	No significant negative impact
Cultural Resources	There are no historic structures or archaeological sites on the proposed project site.	No impacts
Hazardous Materials and Waste Sites	There are no hazardous materials or wastes on the proposed project site.	No impacts
Land Use	The proposed project site is zoned for industrial use and is surrounded by other industrial and infrastructure uses.	No impacts
Population Demographics	The proposed project would have no effect on population growth or trends.	No impacts
Economics and Employment	The proposed project site is designated as part of the Town of Brookhaven's Empire Zone, a program offering special incentives to attract new employers or expansion of existing business. The proposed project is expected to provide 60 temporary construction jobs and 25 full-time permanent jobs.	Positive impact
Recreation	There are no public parks or recreation areas within or adjacent to the proposed project site.	No impacts
Transportation	Highway Traffic: Truck traffic generated as a result of BRT operations would result in a less than 1% increase in average daily traffic over existing conditions.	No significant negative impact
	Highway Traffic: The shift of truck traffic from local, urban roads serving Port Washington and Port Jefferson to I-495 would reduce existing adverse impacts from truck traffic in these two coastal communities.	Positive benefit

Table ES-1: Summary of Environmental Analysis Results

Impact Area	Result of Analysis	Type of Impact
	Highway Safety: Removal of Sills Group-associated truck traffic from the Port Washington and Port Jefferson communities would reduce the potential for passenger vehicle-heavy truck crashes in these congested communities. The shift of truck traffic to better utilize I-495 and County roads is not anticipated to increase the potential for crashes, as these facilities have adequate capacity to accommodate the increased truck traffic without creating congested conditions.	Positive benefit to local roadways. No significant impacts to interstate and county roadways.
	Rail Traffic: The proposed project would add on average 6 trains per week to the current operations of the Long Island Rail Road (48 weekly trains) and the New York & Atlantic freight service (10 weekly trains). Adequate time slots are available based on current and project rail traffic to accommodate the proposed rail line operations.	No significant negative impact
	Rail Safety: Adequate schedule slots are available to NY&A to accommodate movement of BRT freight between scheduled LIRR passenger service. With the exception of switching, all BRT rail activities would occur outside of the LIRR right-of-way and would not pose a rail safety hazard.	No significant negative impact
Environmental Justice	No disproportionately high and adverse impacts to minority or low-income populations have been identified.	No impact
Cumulative Effects	The proposed project would insignificantly affect air quality, wildlife, wildlife habitat, and transportation.	No significant negative impact

SEA's Preliminary Recommended Mitigation Measures

This Draft EA sets forth the preliminary environmental mitigation measures SEA is recommending that the Board impose on U S Rail, if the Board should decide to approve U S Rail's proposal to construct and operate 18,000 feet (3.4 miles) of new rail line. SEA has developed some of these mitigation measures during the process of preparing this Draft EA. SEA has also relied on another document, the "Stipulation of Settlement"[16] that contains mitigation measures specific to U S Rail's proposal.

[16] See Appendix B, Exhibit 9.

The "Stipulation of Settlement" marked the conclusion of a lawsuit by the Town of Brookhaven against U S Rail, Sills Group, and another rail carrier, Suffolk & Southern Rail Road, seeking to halt construction activities allegedly occurring on the BRT site. In the "Stipulation of Settlement," U S Rail committed to several mitigation measures, including constructing a secondary egress in case of emergencies, dust control measures, height limits for buildings and aggregate piles, landscaping, noise reduction, "dark sky friendly" lighting, and water control measures to protect the Nassau-Suffolk Sole Source Aquifer. In addition to the mitigation recommended by SEA as a result of its own independent analysis, SEA is also recommending that the Board impose the mitigation measures that U S Rail has already committed to in the "Stipulation of Settlement."

SEA's recommends the following preliminary environmental mitigation:

1. U S Rail shall comply with the terms and obligations applicable to it that are set forth in the "Stipulation of Settlement" filed with the Surface Transportation Board on April 26, 2010.

2. U S Rail shall employ best management practices before and during construction to minimize soil erosion, sedimentation, and instability.

3. U S Rail shall develop and implement a spill prevention, control, and countermeasures plan (SPCC Plan) to ensure protection of the Nassau-Suffolk Sole Source Aquifer in the event of an accidental spill.

Public Participation

SEA invites comments on this Draft EA, including the scope and adequacy of the preliminary recommended mitigation measures. **Comments must be postmarked by Tuesday, August 10, 2010.** Here, SEA is seeking public review and comment during a 15-day comment period, which is shorter than the time SEA usually affords for review and comment of its Environmental Assessments. SEA has reduced the duration of the review and comment period because, in this case, (1) the Town of Brookhaven Department of Environmental Protection has already conducted an environmental review under SEQRA of the proposed site, (2) the area on which U S Rail proposes to built its new rail line and facilities is highly disturbed, and (3) the Town of Brookhaven has entered into a "Stipulation of Settlement" with U S Rail regarding this proposal. Once the comment period ends, SEA will consider and respond to comments timely received in response to the Draft EA. SEA's responses will be set forth in a Final EA. The Final

EA will also contain SEA's final recommendations to the Board. The Final EA will be available to the public by accessing the Board's Web site at www.stb.dot.gov and clicking "E-Library," then "Decisions and Notices," and then conducting a search under the docket number of FD 35141. The Board will consider the entire environmental record, including the Draft and Final EAs and the comments received, in making its final decision in this proceeding.

Please send comments on this Draft EA **postmarked no later than August 10, 2010** to:

Troy Brady
Surface Transportation Board
Suite 1100
395 E Street, SW
Washington, DC 20423-0001
Attn: Docket No. FD 35141

Comments may be filed electronically on the Board's website, www.stb.dot.gov by clicking on the "E-Filing" link. Please refer to Docket No. 35141 in correspondence, including e-filing, addressed to the Board. If you have questions regarding this Draft EA, please contact Troy Brady by phone at (202) 245-0301, by fax at (202) 245-0454, or by email at troy.brady@stb.dot.gov.

1.0 PURPOSE AND NEED

1.1 U S Rail's Proposal and Surface Transportation Board Justification

On August 7, 2008, U S Rail Corporation (U S Rail), an existing class III short line common carrier,[1] filed a petition[2] with the Surface Transportation Board (Board) under 49 United States Code (U.S.C.) § 10502 to construct and operate about 18,000 feet (approximately 3.4 miles) of rail line[3] and related rail facilities at a 28-acre site to be known as the Brookhaven Rail Terminal (BRT), in Brookhaven, Suffolk County, NY (Figure 1-1).

Under 49 U.S.C. § 10502, the Board must exempt the proposed construction of a rail line from the requirements of 49 U.S.C. 10901 if it finds that regulation of the project: (1) is not necessary to carry out the transportation policy of 49 U.S.C. § 10102; and (2) either: (a) the transaction or service is of limited scope, or (b) the application of a subdivision of subtitle IV of the ICC Termination Act of 1995 (Act) (Public Law 104-88) is not needed to protect shippers from the abuse of market power.

The Board's licensing role differs with regard to U S Rail's proposed new rail line and planned facilities. The Board, through the Interstate Commerce Act, must decide whether to license the new rail line. See 49 U.S.C. § 10901, 10502. The Board also has exclusive jurisdiction over rail facilities (under 49 U.S.C. § 10501(b)), but the construction and operation of rail facilities do not require prior approval from the Board under the Act. See 49 U.S.C. § 10906. In order to satisfy the Board's responsibilities under the National Environmental Policy Act (NEPA), this Draft Environmental Assessment (EA) examines the potential impacts of the proposed new rail line on wide variety of environmental resource areas including air, water, noise, biological and historic resources, and environmental justice communities. The Draft EA examines the potential environmental effects of U S Rail's proposed rail facilities as a

[1] A Class III railroad, as defined by the Board, is a railroad with annual operating revenue of less than $20 million, adjusted annually for inflation using the base year of 1991. Class III railroads are typically local short line railroads, serving a very small number of customers or industries over a limited distance.

[2] See Appendix B, Exhibit 1.

[3] In a filing dated May 25, 2010, U S Rail supplemented its original petition filed on August 7, 2008. This supplement incorporates revisions to the site plan and proposes an additional 7,000 feet of track totaling approximately 19,000 feet from the original approximately 11,000 feet. This increased trackage is entirely located within the original site footprint and also incorporates a screen wall, additional landscaping, and emergency access to the I-495 service road, and eliminated a previously proposed grade separated site entrance.

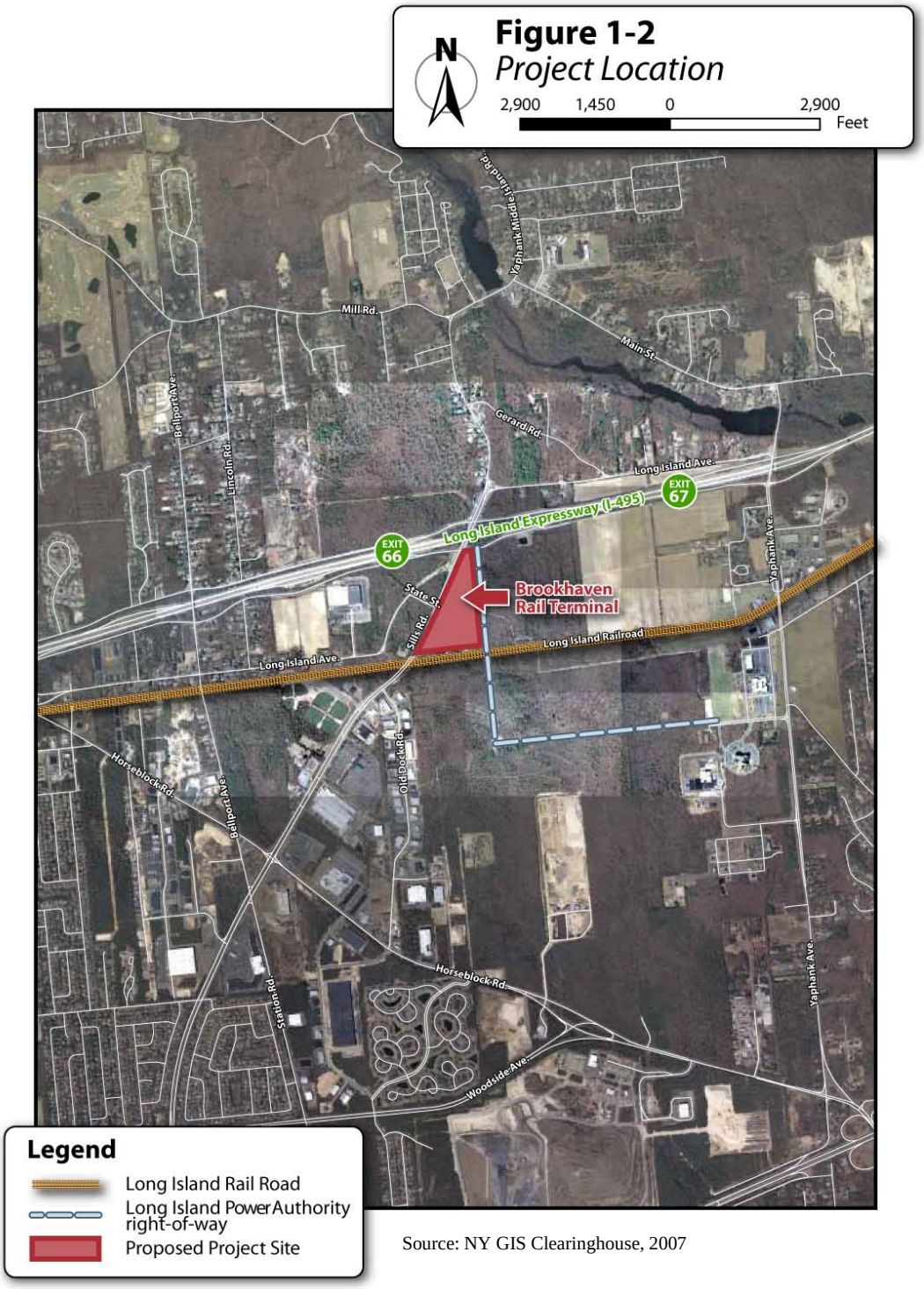
cumulative effect, as discussed in more detail below, even though the Board has no licensing role over the facilities proposed by U S Rail here.

1.2 Description

U S Rail proposes to construct and operate the BRT on an undeveloped, 28-acre parcel located immediately southeast of Exit 66 on Interstate 495 (I-495). The proposed site is bounded by I-495 to the north, County Road (CR) 101 (Sills Road) to the west, the Long Island Rail Road (LIRR) to the south, and a utility easement and a vacant parcel to the east (Figure 1-2). The BRT would consist of approximately 18,000 feet (approximately 3.4 miles) of rail line, in addition to other related rail components. These other components are: a rail switch, the proposed location of which would allow the new rail line to connect with the existing LIRR mainline; approximately 134 feet of track within the turnout;[4] an additional 200 feet of lead track[5] on LIRR property; another 100 feet of lead track on BRT property; and aggregate handling and storage facilities consisting of an aggregate storage area, an freight storage area, and a transload area with truck scales (Figure 1-3 – see Appendix A for a detailed site plan).

[4] A turnout is the track within the no-clearance zone emanating from the switch.

[5] A lead track is the primary rail line connecting a freight yard to the main line. Other track within the yard branch off from the lead track.



Source: NY GIS Clearinghouse, 2007

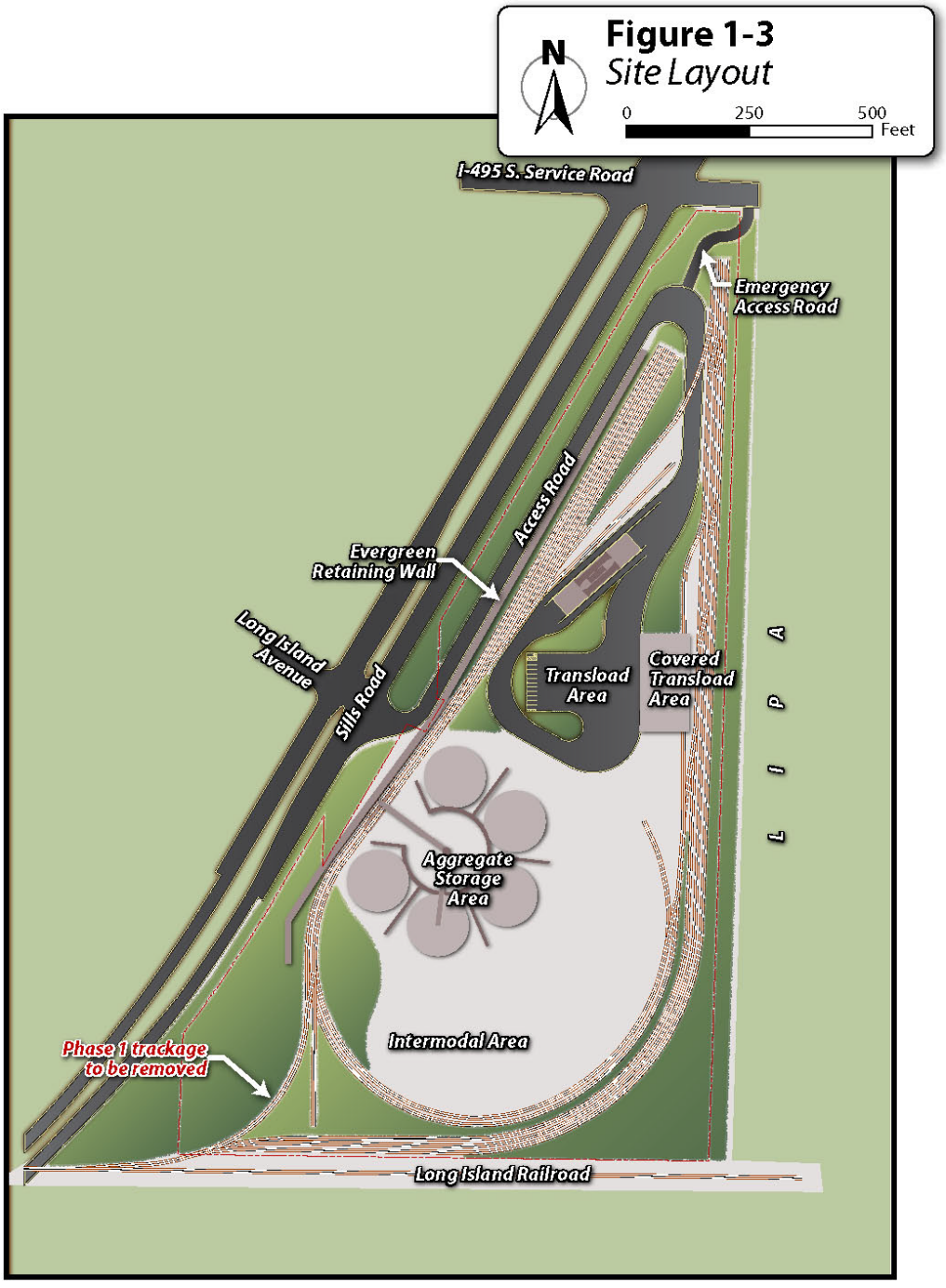


Figure 1-3
Site Layout
N
0
250
500
Feet
I-495 S. Service Road
Emergency Access Road
Access Road
Evergreen Retaining Wall
Long Island Avenue
Sills Road
Transload Area
Covered Transload Area
Aggregate Storage Area
Intermodal Area
Phase 1 trackage to be removed
Long Island Railroad
LIPA

The proposed BRT facility would connect with an existing passenger rail line, the LIRR. Freight service over the LIRR would continue to be provided by the New York & Atlantic Railway (NY&A).

The proposed rail line and related rail facilities are initially expected to handle between 5,000 and 6,000 inbound aggregate[6] railcars annually. U S Rail proposes to move an average of six trains per week: three inbound trains, each consisting of approximately 40 to 50 railcars of aggregate delivered to the BRT, and three outbound trains per week consisting of 40 to 50 empty railcars. NY&A would deliver the aggregate to the proposed BRT over the LIRR at which time the rail cars would be handed off to U S Rail for on-site rail movements.

The facility is initially proposed to handle aggregate, and the facility could, in the future, be used to handle other commodities including raw materials and intermodal freight. U S Rail expects this future use would increase the effectiveness of the facility by expanding the capacity of rail freight service on Long Island.

1.3 Purpose and Need for the Proposed Action

The purpose of the proposed project is to provide an efficient means for delivering commodities via rail to the Long Island market, including aggregate from sources in upper New York State (NYS), thereby reducing truck transport through the New York City area. U S Rail anticipates that the proposed project could redirect heavy freight commercial truck traffic to rail, reduce heavy truck traffic through the towns of Port Jefferson and Port Washington, and better address the projected freight demands of the Long Island community. Improved rail freight handling capacity and the reduction of truck traffic on local roads could also provide benefits related to regional air quality, shipping costs, and economic development.

The need for the proposed facility is based upon goods movement trends and the increasing congestion of traffic regionally and on the roadways serving Long Island.

According to U S Rail, the proposed construction and operation of the BRT would allow it to provide an efficient means for delivering aggregate via rail from sources in upper NYS to its primary customer, the Sills Group (which owns the underlying 28 acre parcel on which the

[6] Aggregates are construction materials of crushed stone, sand and gravel. The single largest market for aggregates is road and street construction, including base and asphalt paving for highways, parking lots and other pavements. Other typical uses for aggregate material are concrete for homes and office buildings, and stone and gravel for soil erosion control projects.

proposed BRT is to be constructed), located on Long Island, NY. If approved, the project would reduce the Sills Group's reliance on a complex transportation delivery system that currently relies on a combination of rail, truck, and barge transportation through the NYC metropolitan region, including the towns of Port Jefferson and Port Washington on Long Island.

Specifically, Sills Group proposes to deliver up to 500,000 tons of aggregate annually to the BRT for use in road and building construction on Long Island. The Sills Group expects to deliver 250,000 tons of the aggregate to asphalt manufacturing facilities on Long Island (the Scatt Materials plant and the Empire Asphalt plant) and would make the remaining 250,000 tons of aggregate available to currently unidentified, third party customers. Sills Group and U S Rail also intend to market the BRT to their customers as a facility for the rail transport of other commodities.

1.4 Future Growth and Demand

The 10-county New York City (NYC) metropolitan region is projected to experience substantial growth in population and employment over the next 20 years. This growth will likely increase the need for goods which must be accommodated by the regional transportation system.

The NYC metropolitan region currently experiences the highest volume of freight movement of any metropolitan area in the nation. Regional commodity flows are expected to grow from 333 million annual tons in 1998 to 490.5 million annual tons by 2025, an increase of 47 percent. Moreover, regional growth in the demand for clay, concrete, glass, and stone products is projected to increase from approximately 70 million tons in 1998 to 90 million tons by 2025, the second largest commodity group by volume moving through the region. Most of the products moving through the region are carried via truck, approximately 81 percent of the total volume, with rail moving less than 1 percent by volume (New York Metropolitan Transportation Council 2004). In contrast, from a national perspective, the rail sector moves approximately 16 percent of the total volume of freight in the U.S.

Total vehicular traffic in the region is forecast to increase 17 percent by 2020; however, truck traffic is projected to increase by 21 percent for trucks (all types) and by 51 percent for freight trucks (i.e., heavy trucks). The major travel corridor serving Long Island is I-495. Currently, traffic volumes on I-495 range from approximately 210,000 vehicles per day near the western border of Nassau County to approximately 78,000 vehicles per day near the project area in central Suffolk County. Approximately 35 million tons of freight per year is carried via I-495,

and it is the only major freight facility serving Long Island (New York Metropolitan Transportation Council 2004).

Traffic congestion is particularly critical given the area's substantial reliance on trucking, which further exacerbates regional roadway congestion making freight movements susceptible to the severe congestion experienced by all highway vehicles. Vehicles miles traveled (VMT)[7] provides a measure of the total travel demand placed on the roadway infrastructure during peak travel times. On Long Island, overall VMT is projected to increase 11.5 percent by 2030 (New York Metropolitan Transportation Council 2005). Travel demand, as compared with roadway capacity, is projected to be nearing or at capacity during morning and evening peak travel periods along several I-495 roadway segments and interchanges in Nassau and Suffolk Counties by 2035 (New York Metropolitan Transportation Council 2010).

Although some sections of I-495 are expected to be at or near travel capacity by 2035, sufficient capacity exists now and in the future on the portion of I-495 (between Exits 52 and 66) that would experience an increase in traffic should the Board approve U S Rail's proposal. Moreover, the number of additional trucks that would use I-495 (projected to be 122 heavy trucks per day) should the proposal be approved would constitute a less than 1 percent increase in overall average annual daily traffic (AADT) volumes.

1.5 NEPA Compliance for the Proposed Action

The Board's Section of Environmental Analysis (SEA) is responsible for ensuring the Board's compliance with the National Environmental Policy Act (NEPA) (42 U.S.C. § 4321 et. seq.), the implementing regulations of the Council on Environmental Quality (CEQ), and other related environmental laws and their implementing regulations. Under NEPA, the Board must take into account in its decision-making the environmental impacts of its actions, including direct, indirect and cumulative impacts. The Board must consider these impacts before making its final decision in a case. SEA has prepared this Draft EA in accordance with the Board's environmental regulations, which implement NEPA (49 C.F.R. § 1105).

While Section 10501(b) of the Act vests the Board with the exclusive jurisdiction over rail construction and facilities (49 U.S.C. § 10501(b)), the construction and operation of an intermodal facility is not a matter subject to the Board's regulatory control under the Act. In

[7] Vehicle miles traveled (VMT) is a measure that is commonly used to describe automobile use on a daily or annual basis. It incorporates both the number of vehicle trips and the length of those trips.

other words, the Board does not exercise separate approval or exemption authority with respect to the development or operation of intermodal facilities. Nonetheless, U S Rail's planned BRT, and truck traffic that it is expected to generate, are addressed in this Draft EA as a cumulative impact. Under NEPA and the CEQ guidelines, matters that fall outside the Board's regulatory control must be considered to the extent that they are a direct consequence of actions, such as the construction and operation of a rail line, that are within the Board's regulatory control.[8]

This Draft EA considers the potential environmental impacts of U S Rail's proposed actions resulting from the construction and operation of the rail line, truck traffic and other impacts resulting from the operation of the planned BRT facilities. At the same time, however, there are limits to the Board's authority to impose mitigation. The Board cannot impose mitigation with respect to matters that are outside its regulatory control, such as the specific routes that trucks may use to access U S Rail's planned BRT site.

1.6 Draft Environmental Assessment Process

On February 20, 2009, U S Rail submitted a written request to SEA for a waiver of the preparation of an Environmental Impact Statement (EIS)[9] which is normally required by the Board's regulations for rail line construction proposals. Information considered by SEA in making its decision included:

- On October 14, 2008, SEA distributed consultation letters to 25 key Federal, state, and local agencies providing information about the proposed action, and requested information on the possible environmental effects of the proposed action. In response to these consultation letters, SEA received 11 responses from Federal, state, and local agencies.[10] The comments received identified several areas of interest, including, but not limited to: 1) federally listed and endangered species, 2) impacts to the long Island Pine Barren Wildlife Habitat, 3) water use requirements, 4) impacts to a U.S. Environmental Protection Agency (EPA) designated Sole Source Aquifer, 5) impacts to commuter and

[8] The courts defer to agency determinations on what the appropriate scope of the environmental review should be in particular cases. See Sylvester v. U.S. Army Corps of Engineers, 884 F.2d 394, 399 (9th Cir. 1989). The Board's environmental regulations do not set forth a specific test for determining whether and how to consider particular related actions in the environmental review process. SEA has addressed this issue in past proceedings primarily by employing a "but for" test. See Riverview Trenton Railroad Company – Petition for an Exemption from 49 U.S.C. §10901 to Acquire and Operate a Rail Line in Wayne County, Michigan, STB Finance Docket No. 34040 (Environmental Assessment (EA), served October 15, 2001).

[9] See Appendix B, Exhibit 2.

[10] See Appendix C.

freight rail operations, 6) impacts to adjacent and regional roadways, 7) consistency with local land use plans, 8) noise impacts, 9) economic impact, 10) and cumulative effects. The commenters identified no potentially significant environmental impacts that would occur if this transaction were approved.

- On January 12, 2009, SEA conducted a site visit of the project area. As a result of the site visit and consultations with Federal, state, and local agencies, SEA determined the following:

    - The proposed rail construction project is consistent with local land use plans and would be located in an area zoned for industrial and commercial purposes.

    - The proposed site is bounded by I-495 to the north, commercial/industrial businesses to the west, and a power generation facility to the south.

    - There are no known historical or archaeological sites.

    - The proposed site is located one-quarter of a mile from the nearest noise-sensitive receptors (residences and schools, etc).

    - The site does not contain any wetlands or surface waters.

    - There are no wildlife sanctuaries, refuges or National or state parks or forests located near the proposed site.

    - There are no hazardous materials, sites, or spills associated with the proposed site.

    - The proposed site is located in an area with several existing noise sources, including vehicular and rail traffic, industrial activities, and high voltage power transmission lines.

Based on these findings, SEA granted a waiver in writing from the requirement to prepare an EIS on March 31, 2009[11] but noted that, should circumstances change or additional information come to light indicating that the potential environmental effects from the BRT could

[11] See Appendix B, Exhibit 3.

be significant, SEA reserved the right to prepare a full EIS. In its waiver letter, SEA also indicated that preparation of an EA to comply with NEPA was appropriate based on the information available to date.

Gannett Fleming, Inc., was retained to act as an independent third party consultant to assist SEA in the preparation of this Draft EA. The use of third party consultants is addressed at 49 C.F.R. § 1105.4(j).[12] Under the direction, supervision, and approval of SEA, the third party consultant is generally responsible for gathering technical data required to complete the environmental review of the proposed action. U S Rail's request for the use of Gannett Fleming Inc. as a third party consultant was approved by SEA on June 4, 2008.[13]

1.7 Board's Environmental Review Process

The purpose of this Draft EA is to provide the Board, U S Rail, other Federal and state agencies, and the public with a full disclosure of the anticipated environmental impacts of the proposal before the Board and the reasonable and feasible alternatives to that proposal. Full disclosure, with opportunity for public review and comment, will enable the Board to take the requisite "hard look" at the potential environmental consequences of its decision before arriving at a final decision.

This Draft EA assesses the environmental effects of the proposed action and the no-action alternative within the following framework:

- Chapter 1 introduces the proposed action and describes its purpose and need.
- Chapter 2 describes the proposed action and alternatives.
- Chapter 3 describes the affected environment in the project area.
- Chapter 4 identifies the potential environmental impacts of the proposed action.
- Chapter 5 sets forth SEA's preliminary recommended mitigation and provides the SEA's preliminary conclusion and request for comments.
- Chapter 6 identifies the supporting reference material and information used in preparation of the EA.

[12] See the Board's website at http://www.stb.dot.gov/stb/environment/contracting to review its Policy Statement for the use of third party contractors in the preparation of environmental documents.

[13] See Appendix B, Exhibit 6 and 7.

2.0 PROPOSED ACTION AND ALTERNATIVES

2.1 Preliminary Sites Considered by U S Rail

U S Rail initially considered four preliminary sites (Figure 2-1) during the conceptual development of its proposed rail line and planned facilities. In evaluating these four sites, U S Rail considered five key criteria: proximity of the site to the regional highway network and the Long Island Rail Road (LIRR); a preferred site size of 20 or more acres; distance of the site from residential and other sensitive land uses; lack of rail operational barriers (e.g., height restrictions and at-grade crossings); and environmental impacts. Based on U S Rail's assessment of the five key criteria, it concluded that the proposed project site (the Sills Road site) was preferable to the other three sites assessed. The discussion that follows provides more detail on each of the sites and U S Rail's decision to select the Sills Road site for its proposed rail line and planned facilities.

2.1.1 Sills Road Site

The Sills Road site is a 28-acre site bounded by Interstate 495 (I-495) to the north, County Road (CR) 101 (Sills Road) to the west, the LIRR to the south, and a Long Island Power Authority (LIPA) utility easement and a vacant parcel to the east (Table 2.1). The site is located in the Town of Brookhaven's North Bellport Empire Zone and is adjacent to other industrial enterprises to the south and west. Residential land uses are located to the south and north (north of I-495) and are a minimum of 0.25 mile from the site.

2.1.2 Bellport Road Site

The Bellport Road site is a 22-acre site bounded by the LIRR to the north, CR 101 (Sills Road) to the southeast, CR 16 (Horseblock Road) to the southwest, and Bellport Road to the west. The site has 1,280 feet of frontage on the LIRR main line with an at-grade crossing at Bellport Road, a local two-lane road, adjacent to the west end of the site. Access to the site would be constructed from Bellport Road. Residential land uses are located adjacent to the west and north of the site. The site is located approximately 0.3 mile south of access to I-495 via local service roads.

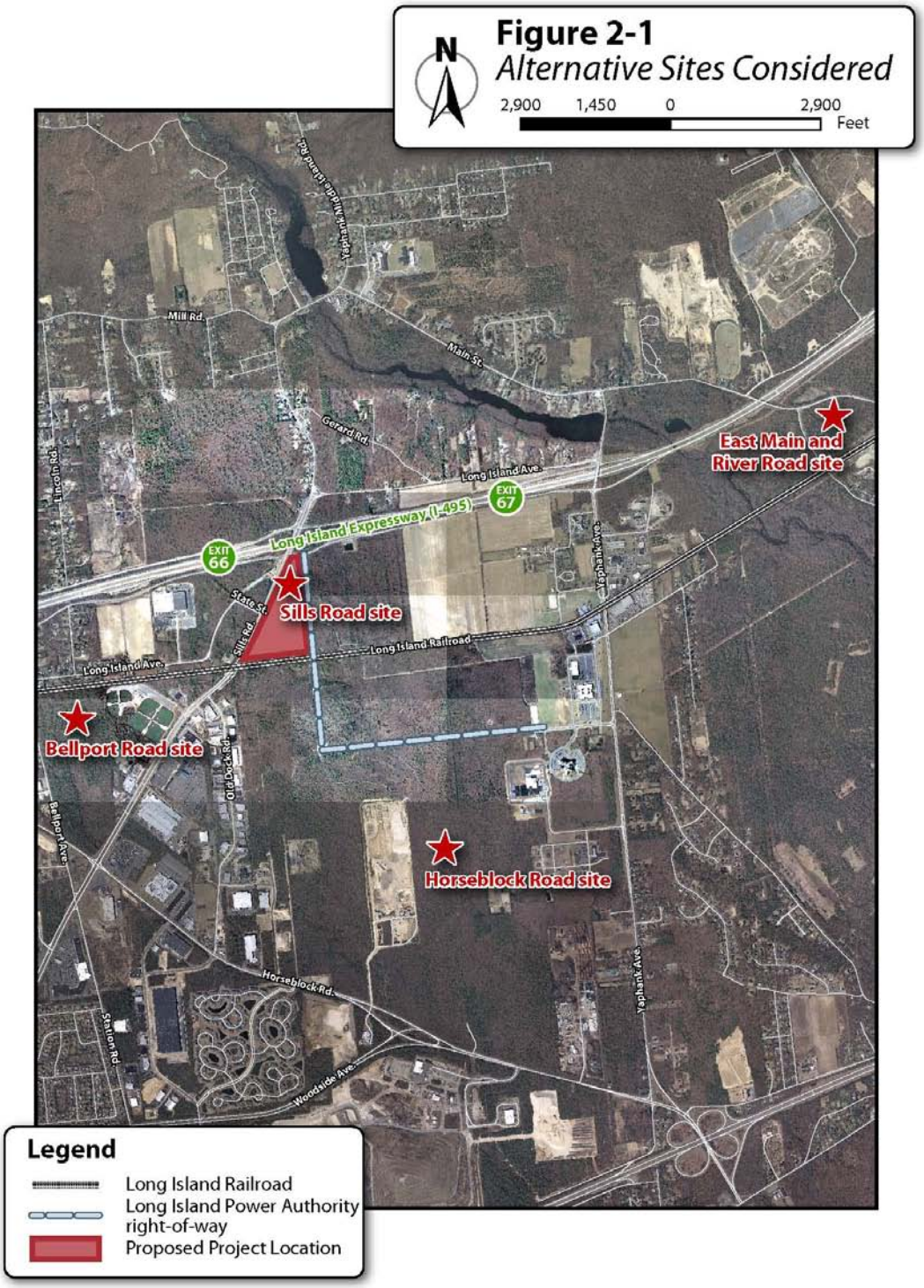


Figure 2-1
Alternative Sites Considered
N
2,900 1,450 0 2,900
Feet
East Main and River Road site
Sills Road site
Bellport Road site
Horseblock Road site
Long Island Expressway (I-495)
EXIT 66
EXIT 67
Long Island Ave.
Long Island Railroad
Mill Rd.
Main St.
Gerard Rd.
Lincoln Rd.
Yaphank Ave.
State St.
Sills Rd.
Old Dock Rd.
Bellport Ave.
Horseblock Rd.
Station Rd.
Woodside Ave.
Legend
Long Island Railroad
Long Island Power Authority right-of-way
Proposed Project Location

Table 2.1: Summary of sites considered by U S Rail for the planned BRT

Site Factors	Preliminary Sites			
	Sills Road	**Bellport Road**	**East Main & River Road**	**Horseblock Road**
Size (acres)	28	22	33	18
Located in an Empire Zone designation	Yes	Yes	No	No
Potential for expansion on adjacent parcels	Yes	No	No	No
Frontage on LIRR main line (feet)	1,000	1,280	1,730	0 - (4,000 foot connecting track required)
Grade crossings	No	Adjacent to west end	No	No
Equipment height constraints to access site	No	No	Yes (crossing at Yaphank Avenue)	No
Frontage road	County road	Local road	Local road	County road
Pre-existing access point, traffic control and turn lanes	Yes	No	No	No
Access to Interstate 495	Adjacent	1/3 of a mile	1/5 of a mile	2.5 miles
Distance from residential areas	1/4 mile, north side of I-495	Adjacent to the west and north boundaries of the site	350 feet south of site	3/5 of a mile

2.1.3 The East Main and River Road Site

The East Main and River Road site is a 38-acre site bordered by East Main Street to the north and east, River Road to the west, and the LIRR to the south. The site has 1,730 feet of frontage on the LIRR mainline. There is an equipment height constraint west of the site at the CR 21 (Yaphank Avenue) crossing of the LIRR. Access to the site could be provided from either River Road or East Main Street, both local two-lane roads. Residential areas are located 350 feet to the south of the site. The site is 0.2 mile from the I-495 service road (east bound only) and one mile to CR 46 (William Floyd Parkway).

2.1.4 Horseblock Road Site

The Horseblock Road site is an 18-acre site surrounded by forested land owned by Suffolk County to the north, Yaphank Avenue to the east, and CR 16 (Horseblock Road) to the south. The Caithness Power Plant, a 350 megawatt natural gas-fired electric generation plant, is located to the immediate west of the site. Roadway access to the site would be provided via CR 16 (Horseblock Road). There is no frontage on the LIRR main line; therefore a 4,000-foot connecting track crossing County property would be required. There are no adjoining residential areas; the closest residence is 0.6 mile south of the site. The Horseblock Road Site is 2.5 miles from access to I-495.

2.2 Selection of the Sills Road site by U S Rail

The proposed site is a flat parcel of undeveloped land in the unincorporated Village of Yaphank in the Town of Brookhaven. The site is currently zoned for industrial and commercial uses and is located within the Town of Brookhaven's North Bellport Empire Zone, which provides incentives for new economic development. The proposed site is bounded by a variety of commercial industries that can be classified as light manufacturing, commercial wholesale, and retail business. The proposed site is bordered on the north by I-495, a regional six-lane limited access highway extending the length of Long Island, on the east by a LIPA transmission line corridor, on the south by the LIRR, and on the west by CR 101 (Sills Road), a two-lane divided county roadway. The proposed site has approximately 2,000 feet of frontage on CR 101 (Sills Road), and a pre-existing curb cut, traffic light, and turn lanes providing access to the site. Additionally, the Sills Road site is industrialized and highly disturbed, thus avoiding or minimizing potential impacts to the environment.

U S Rail did not select the Bellport Road, East Main and River Road, and Horseblock Road sites because these sites did not offer the advantages of the Sills Road site or fully meet the key site criteria. The Bellport Road and East Main and River Road sites provided adequate acreage, but had operational barriers, neighboring residential parcels, and would have required truck access onto a local road rather than a higher capacity County road. The Horseblock Road site, while providing adequate distance from residential areas, adequate road access, and lack of operational barriers, was not preferred due to its small site size and the cost and environmental impacts associated with the required 4,000-foot connecting track to access the LIRR.

2.3 Alternatives Analyzed by SEA in this Draft EA

In this Draft EA, SEA has examined two alternatives: the proposed action and the no-action alternative. The proposed action would consist of the construction and operation of approximately 18,000 feet (3.4 miles) of new rail line at a 28-acre site located in the Town of Brookhaven, Suffolk County, NY. According to U S Rail, the new rail line would connect with an existing passenger rail line of the LIRR, over which freight is carried by the New York and Atlantic Railway (NY&A). Under the no-action alternative, environmental impacts associated with the construction and operation of the proposed rail line and planned BRT would not occur. In this scenario, Sills Group would continue to receive aggregate via truck from the towns of Port Jefferson and Port Washington. SEA also used the no-action alternative as a baseline to allow it to compare existing conditions against the proposed action to assess the potential environmental benefits and impacts from construction and operation of the proposed action. No other alternatives were considered because the proposed rail line and planned BRT facilities would use essentially the entire 28-acre site, and there is no evidence that there would be a more appropriate location of the proposed rail line. SEA discusses the proposed action and the no-action alternatives in more detail below.

2.3.1 Proposed Action

As stated above, the proposed action would consist of the construction and operation of approximately 18,000 feet (3.4 miles) of new rail line at the 28-acre BRT site. In addition to the construction and operation of the proposed rail line, U S Rail also plans to construct certain facilities. These facilities consist of a rail switch (which would allow the new rail line to connect with the existing LIRR mainline), approximately 134 feet of track within the turnout, an additional 200 feet of lead track on LIRR property, another 100 feet of lead track on BRT property, and crushed stone aggregate (aggregate) handling and storage facilities consisting of an aggregate storage area, a freight storage area, and a transload area with truck scales. As shown in Figure 2-2, the proposed 3.4 miles of rail line would loop around the facilities proposed by U S Rail, then would connect with LIRR.

The mainline of the LIRR borders the proposed site to the south for approximately 1,000 feet. The proposed connection to the LIRR mainline would be located approximately 58 miles east of Penn Station in Manhattan and approximately 34 miles west of the mainline terminus at Greenport at the eastern end Suffolk County. The LIRR commuter train service consists of 4 daily westbound trains into New York City (NYC) and 4 daily eastbound trains from NYC. Currently, NY&A freight movements along the LIRR mainline consist of

approximately 10 total freight movements (five in each direction) per week or, on average, two freight movements per day. If approved, the proposed BRT freight movements would operate outside of the LIRR rush hour schedule, therefore avoiding adverse impacts on the operation of the LIRR passenger rail service and NY&A freight service.[1]

2.3 No-Action Alternative

Under the no-action alternative, U S Rail would not construct the proposed rail line and the planned BRT facilities to accommodate the needs of Sills Group or other potential freight customers. Any environmental benefits and impacts resulting from the proposed construction and operation of the rail line and BRT facilities would not occur. The proposed site would remain vacant and available for other development.

Under the no-action alternative, Sills Group would continue to rely on the increased use of trucks to meet local and regional goods movement demands. Increased truck traffic resulting from the no-action alternative would result in negative environmental impacts to the area through increased traffic congestion, reduced air quality, and increased noise emissions.

[1] The LIRR mainline has only limited passenger services east of Ronkonkoma, NY, approximately ten miles west of the proposed BRT site.

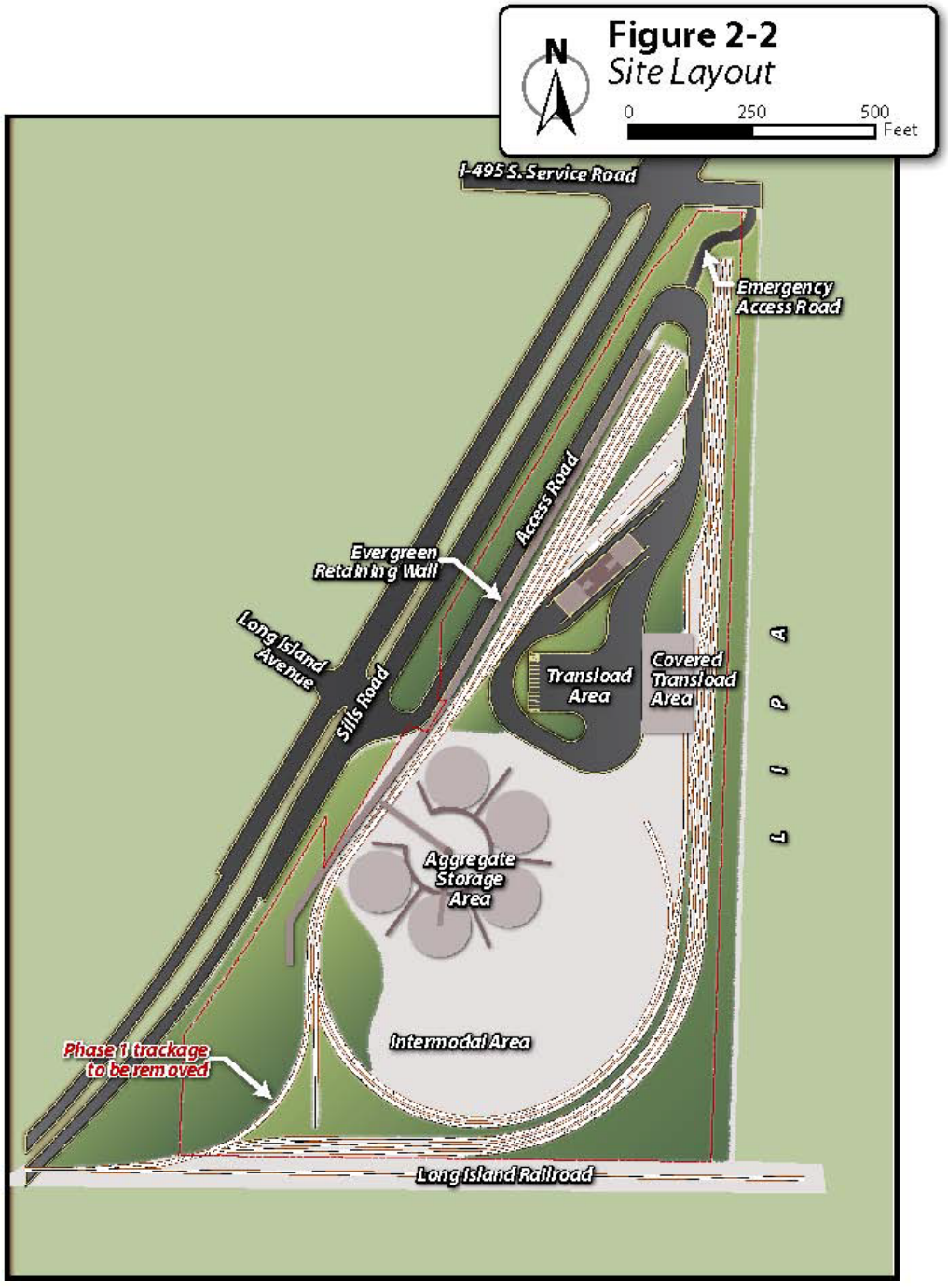


Figure 2-2
Site Layout
N
0
250
500
Feet
I-495 S. Service Road
Emergency Access Road
Access Road
Evergreen Retaining Wall
Long Island Avenue
Sills Road
Transload Area
Covered Transload Area
LIPA
Aggregate Storage Area
Intermodal Area
Phase 1 trackage to be removed
Long Island Railroad

3.0 AFFECTED ENVIRONMENT

This chapter provides an overview of the environment that may be affected by the construction and operation of U S Rail's proposed rail line and of its planned facilities at the BRT site. The affected environment examined in this chapter encompasses in part the project area, comprising the 28-acre site over which U S Rail proposes to build its new rail line and the facilities associated with the planned BRT facilities. SEA examined the entire 28-acre site to determine the presence of physical and cultural resources and hazardous waste sites. The rest of the affected environment includes an area extending out one-mile from the project site. SEA broadened its review and looked at this additional area to determine the ambient noise levels, the types of land use, recreation, and transportation, and whether environmental justice communities are present in the area.

SEA examined the project area, which as described in more detail below, consists of a highly disturbed, industrial site and determined that the following environmental resources are not present in the project area: coastal zone, wild and scenic rivers, floodplains, wildlife sanctuaries or refuges, and National or State parks or forests. As a result, SEA did not evaluate these resources as part of the affected environment.

3.1 Background

3.11 Project Area Description

The proposed project is located in the Town of Brookhaven, Suffolk County, NY and involves a 28-acre parcel located immediately southeast of Exit 66 off Interstate 495 (I-495). The proposed site is bounded by I-495 to the north, County Road (CR) 101 (Sills Road) to the west, the Long Island Rail Road (LIRR) to the south, and a Long Island Power Authority (LIPA) utility easement and vacant parcel to the east.

Land use surrounding the proposed project site consists primarily of local roads, highways, rail line and industrial uses. The proposed site is also located within the Town of Brookhaven's Empire Zone, which provides financial incentives to attract new and expanded employment opportunities. Future land use plans call for additional industrial uses surrounding the project site.

3.1.2 Site Visit

On January 12, 2009, SEA conducted a site visit to the Town of Brookhaven and to the Sills Road site. Based on observations during the site visit and following consultation with appropriate agencies, SEA made the following conclusions regarding the affected environment at the Sills Road site:

- U S Rail's proposed rail line and planned facilities are consistent with local land use plans and would be located in an area that is zoned for industrial and commercial purposes.

- The proposed site is bounded by I-495 to the north, commercial/industrial businesses to the west, and a power generation facility to the south.

- There are no known historical or archaeological sites.

- The proposed site is located one-quarter of a mile from the nearest noise-sensitive receptors (residences and schools, etc).

- The site does not contain any wetlands or surface waters.

- There are no wildlife sanctuaries, refuges or National or state parks or forests located near the proposed site.

- There are no hazardous materials, sites, or spills associated with the proposed site.

- The proposed site is located in an area with the following existing noise sources: vehicular and rail traffic, industrial activities, and high voltage power transmission lines.

The narrative below is arranged in sections that discuss the affected environment for each environmental resource area.

3.2 Physical Resources

3.2.1 Geology, Soils, and Climate

The U.S. Geological Survey (USGS) classifies the United States into various physiographic provinces, in order to describe uniform areas of topography, relief, geology, altitude and landform patterns. The project area is classified as part of the Atlantic Coastal Plain Physiographic province. The Atlantic Coastal Plain Province stretches along the east coast of the United States from Cape Cod, Massachusetts southward into Mexico. The soil layers underneath the top soil are made up of Quaternary till (i.e., unsorted glacial sediment from the last 2-3 million years), gravel, sand, and mud. The area is part of a glacial outwash plain, which is composed of sand and gravel deposited by melt-water streams in front of a glacial terminal moraine located north of the project area. The terminal moraine is a ridge-like accumulation of till, and unstratified mix of clay, silt, sand, gravel, and boulders that mark a standstill of the retreating glacial ice sheet. The local and regional glacial deposits sit upon much older coastal plain sediments dating back approximately 100 million years. The depth to bedrock is approximately 1,500 below the ground surface (U.S. Geological Survey 1995).

The project site is nearly level, with predominant slopes between zero and three percent. Slopes in the 15 – 35 percent range occur only at the northern portion of the project site (U.S. Department of Agriculture, Natural Resources Conservation Service 2009). Elevations above mean sea level (msl) range from approximately 98 feet in the northeast corner of the site adjacent to the I-495 access road, to approximately 120 feet along CR 101 (Sills Road) in the southwestern portion of the site.

The Natural Resources Conservation Service (NRCS) surveys and classifies soil types in each county across the United States. According to the NRCS Soil Survey of Suffolk County, NY, soils in the project area are in the Riverhead-Plymouth-Carver soil association. This means that the soil is characterized by deep, nearly level to gentle sloping, well drained and excessively drained soils which are moderately to coarsely textured, and are located on the southern outwash plain (U.S. Department of Agriculture, Natural Resources Conservation Service 2009). This soil association is mainly in woods or within areas of urban expansion. The project site contains Carver and Plymouth sands, Haven loam soils, Plymouth loamy sand soils, and Riverhead sandy loam soils (Table 3-1).

Table 3-1: Project area soils[1]

Soil Name	Approximate acreage	Approximate percentage of site
Carver and Plymouth sands, 15 to 35 percent slopes	0.6	2.2%
Haven loam, 0 to 2 percent slopes	12.6	45.0%
Plymouth loamy sand, 0 to 3 percent slopes	0.9	3.2%
Riverhead sandy loam, 0 to 3 percent slopes	7.1	25.3%
Riverhead sandy loam, 3 to 8 percent slopes	6.8	24.3%
TOTAL	28.0	100%

The Carver soil series consists of deep, excessively drained coarse-textured soils located on moraines (i.e., accumulated earth and stones deposited by a glacier) or a few steep areas on side slopes of some of the more deeply cut drainage channels on outwash plains. The Haven soil series consists of deep, well-drained, medium textured soils that formed in a loamy or silty mantle over stratified coarse sand and gravel. The Plymouth soil series consists of deep, excessively drained, coarse-textured soils that formed in a mantle of loamy sand or sand over thick layers of stratified coarse sand and gravel. Riverhead soils are typically very deep, well-drained soils formed in glacial outwash derived primarily from granitic materials (U.S. Department of Agriculture, Natural Resources Conservation Service 2009).

The climate of Suffolk County consists of winters that are modified by the Atlantic Ocean (the ocean raises the average winter temperature and decreases the average day-to-night range). Suffolk County summers are characterized by warm afternoons and cool evenings. Average annual precipitation is roughly 49 inches, and is distributed fairly evenly throughout the year. The average annual temperature is approximately 55 degrees Fahrenheit (F). The annual average temperature is approximately 35 degrees F in winter and 71 degrees F in summer. Total

[1] USDA, NRCS Web Soil Survey for Suffolk County (http://websoilsurvey.nrcs.usda.gov).

average annual snowfall is approximately 31 inches (Suffolk County Department of Economic Development and Workforce Housing 2009).

3.2.2 Surface and Ground Water

There are no surface waters within the project area. The nearest surface water, including intermittent streams, is the Carmans River, located approximately one mile northeast of the project area. In addition, the project area is not located within the 100-year or 500-year floodplain of the Carmans River (Federal Emergency Management Agency 1998).

The project area is on the southeast side of a groundwater mound. Therefore, groundwater flow is generally toward the southeast. Water that enters the system is either withdrawn for human use or discharged into rivers and streams south of the project area and/or the shore waters of Bellport Bay, a portion of the Great South Bay.

An aquifer is an underground permeable layer made of rock, gravel, sand, silt, or clay that yields groundwater. The project area is located over a portion of the Upper Glacial aquifer, which underlies all of Nassau and Suffolk Counties. The Upper Glacial aquifer consists of fine to coarse brown sand, gravel and stones and has a probable maximum thickness of about 700 feet below ground surface.

Data from the U.S. Geological Survey (USGS) indicate that the elevation of groundwater in the Upper Glacial Aquifer beneath the project area is approximately 37.5 feet above mean sea level. However, the water table at the project area is subject to seasonal and/or year-to-year fluctuations ranging from four to six feet. Based on surface elevations, depth to groundwater is estimated to be 70.5 feet on average, with a water table minimum depth at 67.5 feet and maximum at 73.5 feet (Smolensky et.al. 1989).

The state and federal maximum contaminant level for nitrogen/nitrate in drinking water is 10 milligrams per liter (mg\L). According to the New York State Department of Environmental Conservation (NYSDEC), the Upper Glacial aquifer has nitrogen/nitrate levels below the state and federal contamination limit.

Volatile organic compounds are organic compounds that can affect the environment and human health. They can be composed of a variety of biologic and manmade substances (e.g., paint, paint strippers, pesticides, glues, fuels). The volatile organic compound levels at zero to

100 feet below the water table throughout the aquifer generally meet drinking water standards (New York State Department of Environmental Conservation 2007a).

The project area is within the U.S. Environmental Protection Agency (EPA) designated Nassau-Suffolk Sole Source Aquifer. A sole source aquifer is a sole or principal drinking water source whose contamination would pose a hazard to public health (EPA 2009a). This designation protects an area's groundwater resource by requiring the EPA to review proposed projects within the designated area that would receive federal financial assistance. The EPA review is designed to ensure that potential projects do not endanger the groundwater source.

The federal Safe Drinking Water Act (42 U.S.C. § 330f-300j) establishes “wellhead protection areas,” or surface and subsurface land areas regulated to prevent contamination of a well or well-field supplying a public water system. For the Nassau-Suffolk Sole Source Aquifer, wellhead protection areas have not been delineated because the entire island has water bearing capacity and protective regulations are applied regionally.

New York State (NYS) has enacted methods to protect groundwater supplies on Long Island. The Long Island Comprehensive Water Treatment Management Plan of 1978 identified areas within Long Island where precipitation is able to recharge deep aquifers. The project area is located within Zone III (Town of Brookhaven 2008), which is designated to protect groundwater supplies from on-site wastewater discharge that may pose a threat to the quality of groundwater supplies.

3.2.3 Air Quality

The Clean Air Act (CAA) and amendments of 1990 define a "nonattainment area" as a locality where air pollution levels persistently exceed National Ambient Air Quality Standards (NAAQS) or that contribute to ambient air quality in a nearby area that fails to meet standards. The EPA designations of nonattainment areas are based on violations of NAAQS for carbon monoxide (CO), nitrogen dioxide (NO_2), ozone (O_3), particulate matter (PM_{10} and $PM_{2.5}$), sulfur dioxide (SO_2), and lead (Pb). The CAA established two types of national air quality standards: 1) primary standards set limits to protect public health, including the health of "sensitive" populations such as asthmatics, children, and the elderly and 2) secondary standards that set limits to protect public welfare, including protection against decreased visibility, damage to animals, crops, vegetation, and buildings.

The project area is located in the NY-New Jersey (NJ)-Long Island Air Quality Control Region. This region is designated as either attainment or unclassified for SO_2, PM_{10}, NO_2, CO, and Pb. The region is currently designated as a moderate nonattainment area for ozone and non-attainment for $PM_{2.5}$ (EPA 2009b).

In March 2008, the EPA lowered the NAAQS for eight-hour ozone concentrations from 0.08 parts per million (ppm) (effectively 0.084 ppm) to a concentration of 0.075 ppm. An area will meet the revised standards if the three-year average of the annual fourth-highest daily maximum eight-hour average at every ozone monitor is less than or equal to the level of the standard (i.e., 0.075 ppm) (EPA 2008). Based on this revised standard, the NYSDEC recommended to the EPA on March 12, 2009 that the New York Metropolitan Area Combined Statistical Area (CSA) – an area including all of Long Island – be designated as a non-attainment area for ozone. Monitoring data for the NY portion of the area indicates that seven monitors exceed the 0.075 ppm NAAQS, with the highest average measured concentrations occurring in Riverhead, Suffolk County (approximately 20 miles northeast of the project area). Based on a design year average (the three-year average of the fourth-highest daily maximum eight-hour ozone concentrations), ozone levels at the Riverhead monitoring station have a value of 0.089 ppm over the 2006-2008 period (NYSDEC 2009a).

The 24-hour NAAQS for $PM_{2.5}$ is 35 micrograms per cubic meter and the annual average NAAQS for $PM_{2.5}$ is 15 micrograms per cubic meter. The NY-Northern NJ-Long Island, NY-NJ-Connecticut (CT) area (with the exception of NYC) is designated as in attainment with the annual average NAAQS for $PM_{2.5}$, but the entire region is designated as non-attainment for the 24-hour NAAQS for $PM_{2.5}$. Areas are considered in attainment with the 24-hour standard if the 98th percentile of the measured 24-hour $PM_{2.5}$ concentrations in a year, averaged over three years, are less than or equal to 35 micrograms per cubic meter. Based on available data for the years 2004-2006, the NYSDEC recommended to the EPA that 10 counties in NY (Bronx, Kings, NY, Orange, Queens, Richmond, Rockland, Nassau, Suffolk and Westchester Counties) be considered part of the non-attainment area (NYSDEC 2009a). The 98^{th} percentile 24-hour concentrations, averaged over the three year period, ranged from a high of 41 micrograms per cubic meter in Manhattan to a low of 28 micrograms per cubic meter in Orange County. The three-year 24-hour $PM_{2.5}$ concentration in Suffolk County was 32 micrograms per cubic meter as measured at Babylon, NY (approximately 25 miles west of the project area).

3.3 Biological Resources

3.3.1 Vegetation and Wetlands

The project area is a relatively flat, undeveloped parcel that was formerly comprised of oak and pine trees and brush. The dominant trees were pitch pine, mixed with scarlet oak, white oak, red oak, and black oak. A review of historical aerial photography indicates the site has been undeveloped forest land since at least 1957. The predominant vegetation surrounding the project area is a terrestrial upland forest categorized as pitch pine-oak forest. Pitch pine-oak forest habitat and similar pine barren habitats occur in dry areas where a high degree of disturbance and nutrient poor soils exist. The surrounding forest land is comprised of similar pitch pine-oak forest vegetation, with trees generally about 30 feet in height and two to five-inches in diameter (Brookhaven Energy Limited Partnership (BELP) 2001).[2]

Prime agricultural land is land best suited for producing food, feed, forage, fiber and oilseed crops, and also available for these uses. In other words, the land could be crop, pasture, range, forest or other land, but not built-up land or water. Prime agricultural land has the soil quality, growing season and moisture supply needed to produce sustained yields of crops economically if treated and managed according to modern farming methods (USDA NRCS 2009). The project area contains no prime agricultural land.

The National Oceanic and Atmospheric Administration (NOAA) administers the National Coastal Zone Management Program (CZMP). The program was established by the Coastal Zone Management Act of 1972 to protect, and where possible, restore and enhance coastal areas. The program designates coastal zones in each state. Projects located within these zones must be consistent with state's coastal zone management program. The project area is not located within a designated coastal zone.

The project area is located outside the state-designated Central Pine Barrens Region (Central Pine Barrens Joint Planning and Policy Commission 2009) special protection area.

Based on the U.S. Fish and Wildlife's (FWS) National Wetland Inventory (NWI), the NYSDEC Freshwater Wetlands Mapping, and field reviews of the site, there are no federal or state jurisdictionally regulated wetlands in the project area (U.S. Fish and Wildlife Service 2009;

[2] Brookhaven Energy Limited Partnership (BELP) formerly proposed construction of a 580 megawatt natural gas combined cycle electric generating facility on the same 28-acre parcel as the proposed BRT. The electric generating facility was approved and permitted by the New York State Department of Environmental Conservation in 2002, but was never constructed.

NYS Department of Environmental Conservation 2009b). A jurisdictionally regulated wetland is a wetland protected under Section 404 of the Clean Water Act. Wetlands are designated for Clean Water Act protection by the U.S. Army Corps of Engineers (USACE) in cooperation with NYSDEC. The nearest jurisdictionally regulated wetlands are located along the Carmans River approximately 3,500 feet east of the project area.

3.3.2 Wildlife

The habitats on and near the project area are capable of supporting a number of mammal species. Wildlife species likely to be present within the project area would be common suburban, forest, and edge species, with little potential for forest interior and/or "sensitive" species, as the site is bordered by active business/industrial development, transportation facilities and a utility corridor.

Small rodents and insectivores such as mice, shrews, and moles are expected to be the most abundant mammals, but the surrounding area may support larger mammals as well. Some mammal species likely to occur on or near the project area are the short-tailed shrew (*Blarina breuicauda*), eastern mole (*Scalopus aquaticus*), woodchuck (*Marmota monax*), white-tailed deer (*Odocoileus virginianus*), raccoon (*Procyon lotor*), and eastern gray squirrel (*Sciurus carolinensis*) (BELP 2001).

Because there are no wetlands and other aquatic habitats in the project area, aquatic reptiles and amphibians (except for occasional transient species) would not be found either on the site or adjacent parcels.

Based on the vegetative habitat and observations by SEA, the site may accommodate common bird species adapted to urban/suburban environments and typically found throughout Suffolk County. Species likely to use the surrounding area could include Gray catbird (*Dumetella carolinensis*), Black-capped chickadee (*Parus atricapillus*), Northern cardinal (*Cardinalis cardinalis*), American crow (*Corvus brachyrhynchos*), Mourning dove (*Zenaida macroura*), Northern flicker (*Colaptus auratus*), Common grackle (*Quiscalus quiscula*), Blue jay (*Cyanocitta cristata*), Northern mockingbird (*Mimus polyglottos*) and European starling (*Sturnus vulgaris*) (BELP 2001).

3.3.3 Endangered, Threatened and Rare Species

SEA contacted the FWS and the New York Natural Heritage Program (NYNHP) to learn more about whether threatened and endangered species could be present in the project area. This is what SEA learned from these two agencies.

According to the FWS[3] there are eleven Federally-listed endangered or threatened species in Suffolk County, which could potentially occur in the project area (Table 3-2). Endangered species are in danger of extinction throughout all or a significant portion of its range. A threatened species is likely to become endangered within the foreseeable future throughout all or a significant portion of its range.

Table 3-2: Federal threatened and endangered species potentially occurring in Suffolk County, NY[4]

Common name	Scientific name	Federal Status
Kemp's (Atlantic) Ridley turtle	*Lepidochelys kempi*	Endangered
Green turtle	*Chelonia mydas*	Threatened
Hawksbill turtle	*Eretmochelys imbricate*	Endangered
Leatherback turtle	*Dermochelys coriacea*	Endangered
Loggerhead turtle	*Caretta caretta*	Threatened
Piping plover	*Charadrius melodus*	Threatened
Roseate tern	*Sterna dougallii dougallii*	Endangered
Sandplain gerardia	*Agalinis acuta*	Endangered
Seabeach amaranth	*Amaranthus pumilus*	Threatened
Shortnose sturgeon	*Acipenser brevirostrum*	Endangered
Small-whorled pogonia (*Historic*)	*Isotria medeoloides*	Threatened

According to the NYNHP[5] there are three State-listed endangered or threatened species in Suffolk County and one unlisted species of concern which may occur on or near the project area (Table 3-3). A state endangered species is a native species in imminent danger of extirpation or extinction in NYS. A state threatened species is a native species likely to become

[3] See Appendix C, Exhibit 11.
[4] FWS 2008.
[5] See Appendix C, Exhibit 5.

an endangered species within the foreseeable future in NYS. An additional species was noted as unlisted, but is included on the NYS list of Species of Greatest Conservation Need.

Table 3-3: New York State threatened and endangered species potentially occurring in Suffolk County, NY[6]

Common Name	Scientific Name	State Status
Dwarf Hawthorn	*Crataegus uniflora*	Endangered
Slender Pinweed	*Lechea tenuifolia*	Threatened
Persius Duskywing	*Erynnis persius persius*	Endangered
Comet Darner	*Anax longpipes*	Unlisted: included on state Species of Greatest Conservation Need (SGCN) list

3.4 Noise

Primary, permanent sources of noise affecting the project area are rail traffic and train locomotive horn noise along the existing LIRR, vehicle traffic along I-495 and CR 101 (Sills Road), activities from nearby industrial uses, and high voltage power lines.

LIRR commuter train service passing the project area consists of four daily weekday westbound trains (into NYC) and four daily eastbound trains (out from NYC). NY&A also provides on-demand rail freight service along the LIRR averaging ten trips per week (five inbound and five outbound), adding an additional intermittent noise source to the area.

Average annual daily traffic (AADT) volumes for CR 101 (Sills Road) average 14,800 vehicles per day between CR 16 (Horseblock Road) and I-495 (SCDPW 2009), while AADT volumes on I-495 average 78,331 vehicles per day between Interchange 65 (Horseblock Road) and Interchange 66 (Sills Road) and 65,130 vehicles per day between Interchange 66 and Interchange 67 (Yaphank Avenue) (NYSDOT 2008). Activities in the Sills Industrial Park and other industrial activities in the area also contribute to the noise environment.

Previous noise investigations within the project area estimated the daytime ambient noise level to be 63 A-weighted decibels (dBA) (BELP 2001). SEA undertook its own twenty-four hour noise level measurements at the planned BRT site in March 2010. SEA measured existing noise levels at the proposed BRT site ranged from 63 dBA along the southern boundary of the

[6] NYSDEC 2008.

site adjacent to the LIRR to 70 dBA at the proposed access to the site from CR 101 (Sills Road). Noise levels of 60-70 dBA are considered moderate and can be compared to the sound of an automobile at 100 feet, a clothes washer, or normal conversation.

3.5 Cultural Resources

3.5.1 Legislative Requirements

Cultural resources refer to archaeological, traditional, and other resources, including buildings, structures, objects, districts, and sites that are considered historically significant. Section 106 of the National Historic Preservation Act (NHPA) of 1966, as amended, requires that federal agencies consider the impact of their actions on significant historic resources. A significant resource is one that is either listed or determined to be eligible for listing on the National Register of Historic Places (NRHP). The New York Office of Parks, Recreation, and Historic Preservation (OPRHP) is designated as the State Historic Preservation Office (SHPO) responsible for implementing the Section 106 review process.

3.5.2 Context and Known Historic Resources

In addition to contacting OPRHP,[7] SEA reviewed the online NY Geographic Information System (GIS) NRHP and archaeological sensitivity database (OPRHP 2009) to determine the presence of eligible or potentially eligible sites for listing on the NRHP. The project area and proximity does not contain any known historic resources listed in the NRHP, archeological sensitive areas, or resources identified as a state important resource. Additionally, the project area contains no structures potentially eligible for listing in the NRHP.

3.6 Hazardous Material/Waste Sites

According to the EPA, there are no regulated facilities (e.g., Superfund sites, water discharge permits, permitted toxic and air releases, hazardous waste generators, or water discharge permits) within or adjacent to the project area (EPA 2009c). The closest regulated facility is the Suffolk County Farm, located approximately 0.75 mile east of the project area. The Suffolk County Farm is classified as a conditionally exempt small quantity generator of hazardous wastes (EPA 2009c). Other facilities located in the Sills Industrial Park, approximately 1.0 mile south of the project area, are also regulated by EPA as hazardous waste handlers. These facilities are automotive repair, printing, and manufacturing enterprises.

[7] See Appendix C, Exhibit 7.

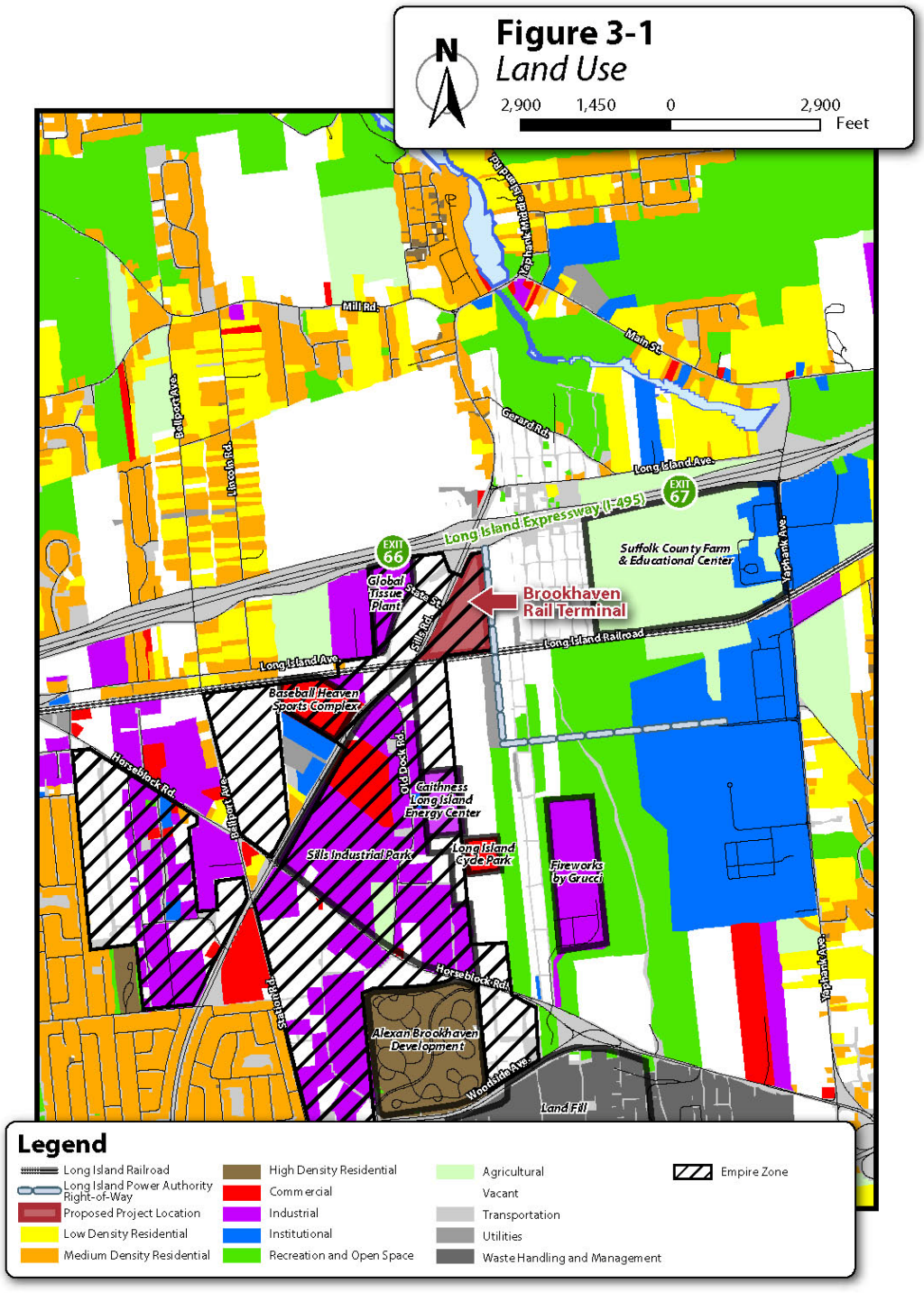
The Inactive Hazardous Waste Disposal Site (IHWDS) Program is the NYS program responsible for identifying, investigating and cleaning up sites where consequential amounts of hazardous waste may exist. According to the IHWDS, the project site and adjacent area do not contain known chemical and petroleum spill incidents that have been remediated or are being managed under one of NYSDEC's remedial programs. No bulk storage sites are located near the project area (NYSDEC 2009c).

3.7 Land Use

The land uses bordering the project area are mostly undeveloped parcels (land not under active use) with the exception of infrastructure uses: I-495, CR 101 (Sills Road), the LIRR, and the LIPA right-of-way (Figure 3-1).

The Sills Industrial Park and other industrial lots are located south of the site. The industrial park is home to a variety of businesses: a petroleum distributor, a greeting card company, an auto auction center, and other businesses such as offices and warehouses. In addition to the Sills Industrial Park, there are industrial and office properties along CR 16 (Horseblock Road), Old Dock Road, and CR 101 (Sills Road). The Caithness Power Plant, a 350-megawatt combined-cycle natural gas fired electric generation plant, is located approximately one mile south of the site. Land to the east of the industrial park and directly southeast of the site is unoccupied forested land owned by Suffolk County.

I-495 is north of the site, and Long Island Avenue is north of 1-495. Long Island Avenue serves as a local road with existing residences, forested land, and agricultural land. Several residences are located along Gerard Road north of I-495. Land uses east of the project area are undeveloped forested parcels east of the LIPA right-of-way and the Suffolk County Farm and Educational Center. The Global Tissue plant and undeveloped land along Long Island Avenue are west of the project area (Suffolk County Planning Department 2006; Town of Brookhaven 2008).



Source: Town of Brookhaven DPELM, 2008

3.8 Socioeconomic Setting

3.8.1 Population Demographics

The Town of Brookhaven (Town) encompasses approximately 530 square miles in central Suffolk County, accounting for almost a quarter of the County's land area and more than a third of its population. From 1990 to 2007, the population of the Town, Suffolk County, and NYS all increased; however, the Town experienced the greatest population growth in comparison with Suffolk County and the NYS (Table 3-4). The Town also had the greatest percent increase in the number of households in comparison to Suffolk County and NYS.

Table 3-4: Population and housing characteristics[8]

Geography	1990	2000	2007	Annual Growth		% Increase
				1990-2000	2000-2007	1990-2007
Town of Brookhaven						
Population	407,832	448,248	476,433	0.9%	0.9%	17%
Households	129,109	146,904	157,886	1.3%	1.0%	22%
Suffolk County						
Population	1,321,330	1,419,369	1,483,438	0.7%	0.6%	12%
Households	424,561	469,299	496,218	1.0%	0.8%	17%
New York State						
Population	17,990,455	18,976,457	19,581,872	0.5%	0.4%	9%
Households	6,639,322	7,056,860	7,279,758	0.6%	0.4%	10%

Long-term projections indicate that the population of the Town could increase by more than 100,000 people between 2000 and 2030 (Table 3-5). The Town is expected to experience a greater population increase, by percentage, than either Suffolk County or NYS between the years 2010 and 2030 (Town of Brookhaven 2008; NYS Department of Labor 2009).

[8] 1990 and 2000 population and housing counts: 2000 U.S. Census.
2007 population and housing estimates: Town of Brookhaven 2030: Existing Conditions and Trends Report, 2008.

Table 3-5: Projected population growth[9]

Geography	2000	2010	2020	2030	% change 2010 - 2030
Town of Brookhaven	448,248	506,966	554,447	586,461	16%
Suffolk County	1,419,369	1,546,088	1,655,083	1,730,306	12%
New York State	18,976,457	19,617,941	20,112,402	20,415,446	4%

3.8.2 Economics and Employment

The Town has a median household income of approximately $75,600, slightly less than the median household income of $77,000 in Suffolk County, but higher than the household income of $56,000 in NYS (Town of Brookhaven 2008). Unemployment rates experienced in the Town and Suffolk County are generally lower than the unemployment rates for NYS (Table 3-6).

Table 3-6: Percentage of unemployed labor force[10]

Geography	2005	2006	2007	2008	2009
Town of Brookhaven	4.2%	4.0%	3.9%	4.9%	7.2%
Suffolk County	4.2%	4.0%	3.9%	5.0%	7.3%
New York State	5.0%	4.6%	4.5%	5.4%	8.4%

Employment sector trends (i.e., the types of jobs held by residents) are similar within the Town, Suffolk County and NYS. The largest employment sector in the Town, Suffolk County and NYS is educational, health and social services, followed by retail trade and professional, scientific, management, administrative, and waste management services (Table 3-7).

[9] 2000 U.S. Census; Town of Brookhaven 2030: Existing Conditions and Trends Report 2008; NYSDOL, 2009.
[10] NYS Department of Labor, Local Area Unemployment Statistics (http://www.labor.state.ny.us/stats/lspubs.shtm).

Table 3-7: Employment by industry sector[11]

Industry Sector	Brookhaven		Suffolk County		New York State	
	Number	Percent	Number	Percent	Number	Percent
Agriculture, forestry, fishing and hunting, and mining	620	0.3%	2,369	0.3%	54,372	0.6%
Construction	17,277	7.9%	51,079	7.5%	433,787	5.2%
Manufacturing	19,219	8.8%	65,316	9.6%	839,425	10.0%
Wholesale trade	9,144	4.2%	29,859	4.4%	283,375	3.4%
Retail trade	28,489	13.0%	82,376	12.1%	877,430	10.5%
Transportation and warehousing, and utilities	12,919	5.9%	40,393	5.9%	460,485	5.5%
Information	8,781	4.0%	27,290	4.0%	340,713	4.1%
Finance, insurance, real estate, and rental and leasing	14,233	6.5%	53,510	7.8%	736,687	8.8%
Professional, scientific, management, administrative, and waste management services	20,417	9.3%	70,611	10.3%	849,124	10.1%
Educational, health and social services	52,762	24.1%	154,495	22.6%	2,039,182	24.3%
Arts, entertainment, recreation, accommodation and food services	12,121	5.5%	38,438	5.6%	611,280	7.3%
Other services (except public administration)	9,139	4.2%	29,202	4.3%	423,756	5.1%
Public administration	13,883	6.3%	38,124	5.6%	433,372	5.2%
TOTAL	219,004	100%	683,062	100%	8,382,988	100%

3.8.3 Empire Zone

NYS's Empire Zone program was created to stimulate economic growth through a variety of State tax incentives designed to attract new businesses and to enable existing businesses to expand and create more jobs. Companies that become Empire Zone certified qualify for the following benefits: wage tax credits, investment tax credit for equipment,

[11] 2000 U.S. Census.

employment incentive credit for additional job creation, and zone capital credits on personal or corporate income, and a NYS sales tax refund on building materials.

The Town's North Bellport Empire Zone was created in 1994 with the purpose of offering special state tax incentives to businesses to relocate or expand their operations (Town of Brookhaven 2009). Through the special state tax incentives, businesses are encouraged to hire workers who reside within the Town (especially those who come from economically depressed areas) and expand the variety of employment opportunities. The Town's Empire Zone encompasses 1,280 acres with over 500 acres of prime industrial sites for development.

3.9 Recreation

There are no public recreational facilities within or adjacent to the project area. The Suffolk County Farm and Education Center is located about one mile east of the project area. It is an active, working farm supplying crops, dairy, and meat products to County facilities. The farm is operated by the Cornell University Cooperative Extension. The Suffolk County Farm and Education Center's education programs attract over 150,000 visitors annually (Cornell Cooperative Extension 2009).

3.10 Transportation

3.10.1 Site Access

The proposed BRT site has approximately 2,000 feet of frontage along CR 101 (Sills Road), a four lane undivided roadway. An existing curb cut, traffic light, and turn lanes to enter the site are present at the intersection of CR 101 (Sills Road) and Long Island Avenue.

3.10.2 Existing Rail Traffic

LIRR commuter train service passing the proposed project area consists of four daily westbound trains (into NYC) and four daily eastbound trains (out from NYC). Weekend daily service consists of two westbound and two eastbound trains (MTA 2009). NY&A operates local freight service along the LIRR mainline, which provides approximately ten freight movements per week (five in each direction). Freight service to the proposed BRT would add an additional six freight movements per week (three in each direction) to the existing freight service.

3.10.3 Existing Vehicular Traffic

I-495 is a six-lane divided, controlled-access expressway approximately 70 miles in length from NYC to its eastern terminus in Riverhead, Suffolk County. Existing AADT volumes on I-495 average 78,331 vehicles per day between Interchange 65 (Horseblock Road) and Interchange 66 (Sills Road) and 65,130 vehicles per day between Interchange 66 and Interchange 67 (Yaphank Avenue) (NYSDOT 2008). The posted speed limit on I-495 is 55 miles per hour (mph). The I-495 service roads adjacent to the project site are owned and operated by the Suffolk County Department of Public Works (SCDPW) (SCDPW 2009).

CR 101 (Sills Road) is a two-lane, divided highway running northeast to southwest of the project site under the jurisdiction of the SCDPW. The posted speed limit is 55 mph. According to SCDPW, the AADT volumes for Sills Road are 14,800 vehicles per day between CR 16 (Horseblock Road) and I-495 (Suffolk County Department of Public Works 2009).

3.11 Environmental Justice

In accordance with Executive Order (EO) 12898, "Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations" and subsequent procedures developed by the U.S. Department of Transportation, activities that have the potential to generate a disproportionately high and adverse effect on human health or the environment shall include explicit consideration of their effects on minority and low-income populations. In assessing whether environmental justice has been served, information regarding race, color, or national origin and income level should be obtained where relevant, appropriate, and practical. Specific consideration should be given to those populations that are most directly served or affected by the proposed project.

3.11.1 Minority Populations

Approximately 11.6 percent of the Town's population is of a minority race, less than the percentage of minority residents for Suffolk County as a whole (Table 3-8). Black or African American residents comprise the largest segment of the minority population in both the Town and the County, followed by those of Asian ethnicity. No concentrated populations of racial minorities are known to reside in or near the project area.

Table 3-8: Minority population[12]

Race	Town of Brookhaven		Suffolk County	
	Residents	Approximate percentage of total population	Residents	Approximate percentage of total population
White	396,381	88.4%	1,200,755	84.6%
Black or African American	19,411	4.3%	98,553	7.0%
American Indian and Alaska Native	1,036	0.2%	3,807	0.3%
Asian	13,019	2.9%	34,711	2.4%
Native Hawaiian and Other Pacific Islander	113	0.03%	484	0.03%
Some other race alone	9,902	2.2%	51,875	3.7%
Two or more races	8,386	1.9%	29,184	2.0%

3.11.2 Low Income Populations

The U.S. Census Bureau uses a set of money income thresholds that vary by family size and composition to detect who is poor. If the total income for a family or unrelated individual falls below the relevant poverty threshold, then the family or unrelated individual is classified as being "below the poverty level." The percentage of the Town's residents estimated to be living below the poverty level (6.3 percent or 29,588 persons) over the three-year period from 2005-2007 is lower than in NYS (14 percent or 2,699,305 persons), yet slightly higher than Suffolk County (5.6 percent or 81,598 persons) (U.S. Census Bureau 2008).

[12] 2000 US Census.

4.0 ENVIRONMENTAL CONSEQUENCES

This chapter discusses the potential environmental impacts associated with the two alternatives discussed earlier in this Draft EA: (1) U S Rail's proposal to construct and operate approximately 18,000 feet[1] (3.4 miles) of new rail line at the planned 28-acre Brookhaven Rail Terminal (BRT) site located in the Town of Brookhaven, Suffolk County, NY; and (2) the no-action alternative, in which Sills Group (U S Rail's primary shipper) would continue to receive aggregate via truck from the towns of Port Jefferson and Port Washington.

SEA did not consider other alternatives because (1) there is no evidence that there would be a more appropriate location for the proposed rail line and (2) the planned BRT facilities would use essentially the entire 28-acre site BRT site.

As also discussed earlier in this Draft EA, U S Rail is planning to construct and operate rail facilities at the BRT site. The facilities would consist of a rail switch (which would allow the proposed new rail line to connect with the existing LIRR mainline), approximately 134 feet of track within the turnout,[2] an additional 200 feet of lead track[3] on property owned by the Long Island Railroad (LIRR), another 100 feet of lead track on BRT property and crushed stone aggregate (aggregate) handling and storage facilities consisting of an aggregate storage area, a freight storage area, and a transload[4] area with truck scales.

The Board's licensing role differs with regard to the proposed new rail line and the planned BRT facilities discussed above. The Board, through the Interstate Commerce Act, must decide whether to license the new rail line. See 49 U.S.C. § 10901, 10502. The Board also has exclusive jurisdiction over rail facilities (under 49 U.S.C. § 10501(b)), but the construction and operation of rail facilities do not require prior approval from the Board under the Act. See 49 U.S.C. § 10906. In order to satisfy the Board's responsibilities under the National

[1] In a filing dated May 25, 2010, U S Rail supplemented its original petition, filed on August 7, 2008, to include various revisions requested by the Town of Brookhaven and the Long Island Power Authority. The revisions included adding 7,000 feet of new track to U S Rail's original proposal of 11,000 feet of new rail line, bringing the total of proposed new rail to 18,000 feet, roughly 3.4 miles, which would be located entirely within the original site footprint. Other revisions included a screen wall, additional landscaping, an emergency access to the I-495 service road, and elimination of a previously proposed grade separated site entrance.

[2] A turnout is the track within the no-clearance zone emanating from the switch.

[3] A lead track is the primary rail line connecting a freight yard to a main line. Other track within the yard branch off from the lead track.

[4] Transloading is moving or shifting a commodity between two modes of transportation (generally rail and truck).

Environmental Policy Act (NEPA), this Draft EA examines the potential impacts of the proposed new rail line on a wide variety of environmental resource areas including air, water, noise, biological and historic resources, and environmental justice communities. The Draft EA examines the potential environmental effects of U S Rail's planned BRT facilities as a cumulative effect,[5] as discussed in more detail below, even though the Board has no licensing role over the improvements proposed by U S Rail here.

4.1 Physical Resources

4.1.1 Geology and Soils

As discussed in Chapter 3, the Affected Environment, no unique or unusual geological resources exist along the proposed rail line or on the planned BRT site. Also, no prime agricultural soils, soils of statewide importance, or hydric soils occur on or near the proposed rail line or the planned BRT site (U.S. Department of Agriculture, National Resources Conservation Service 2009).

Construction and operation of the proposed rail line — including cutting, grading, and filling activities to create the necessary elevation and grade to operate trains — would result in changes to the existing topography and soils. U S Rail would need to excavate a maximum of 23.5 feet of soil to maintain the grade needed to operate trains. The average depth of excavation would be approximately 12 feet. Construction of the proposed rail line would not affect the underlying geology because the cuts required would be relatively shallow and occur in the top sand layer of the site.

Construction and operation of the planned BRT facilities would require less extensive cutting and filling than the construction and operation of the proposed rail line. And again, because no special geologic features or soils are present on the BRT site, any cumulative effect from construction and operation of the planned facilities would be insignificant.

[5] The CEQ regulations implementing NEPA define "cumulative effect" as: the impact on the environment which results from the incremental impact of the action when added to other past, present, and reasonably foreseeable future actions regardless of what agency (Federal or non-Federal) or person undertakes such other actions. Cumulative impacts can result from individually minor but collectively significant actions taking place over a period of time. 40 C.F.R. § 1508.7. Here, the planned BRT site is analyzed as a cumulative effect of the proposed rail line construction and operation, except for specific environmental impact areas where it is not feasible to separate the analysis (i.e., air quality analysis).

Geology and Soils Conclusion: The no-action alternative would result in no changes to geology and soils, and therefore would result in no environmental impact to these resource areas. The proposed rail line would not result in significant adverse impacts to geologic resources, prime agricultural soils, soils of statewide importance, or hydric soils (U.S. Department of Agriculture, National Resources Conservation Service 2009). The planned BRT facilities would not result in significant cumulative effects to soils and geology.

U S Rail has committed to mitigation measures in its "Stipulation of Settlement"[6] that would limit soil erosion at the BRT site. SEA is recommending that the Board impose those measures if it should decide to approve U S Rail's proposal. SEA is also recommending in this Draft EA that the Board require U S Rail to use best management practices during construction of the proposed rail line and planned BRT facilities to further minimize soil erosion and contamination of ground water.

4.1.2 Surface and Ground Water

No surface waters are located on the proposed project site; therefore no impacts to waters of the U.S. or Federal Emergency Management Agency (FEMA)-designated floodplains would occur from either the construction or operation of the proposed rail line or the no-action alternative. And for the same reason — the absence of surface waters at the BRT site — no cumulative effects to surface waters would occur from construction and operation of the planned BRT facilities.

There would be no adverse impacts to groundwater under the no-action alternative, as no impervious surface would be present on the site to limit infiltration and precipitation would naturally flow into the groundwater aquifer. Impacts to ground water could occur as a result of the construction and operation of the proposed rail line. Cumulative effects to ground water could occur from the construction and operation of the planned BRT facilities. These impacts would result from uncontrolled off-site runoff of stormwater and would adversely affect the underlying Nassau-Suffolk Sole Source Aquifer. However, these environmental impacts could be reduced through mitigation measures that U S Rail has committed to in its "Stipulation of Settlement" with the Town of Brookhaven.

Under that settlement agreement, U S Rail would develop a stormwater management plan for the proposed project area that would provide for the retention of a five-inch rainfall, which

[6] See Appendix B, Exhibit 9.

would limit the potential for off-site runoff and provide an opportunity for stormwater to slowly drain into the soil and ultimately recharge the ground water aquifer. U S Rail would also implement erosion control practices during construction in accordance with local construction standards. Following construction, the 28-acre site would have approximately 8.4 acres of landscaped buffer area (approximately 30% of the site) comprised of a mix of existing and newly planted vegetated areas which would assist in the reduction of soil erosion.

SEA is recommending two mitigation measures to minimize potential impacts to ground water. One mitigation measure would require U S Rail to use best management practices during construction of the proposed rail line to minimize soil erosion and contamination of ground waters. The other mitigation measure would require U S Rail to develop and implement a spill prevention, control and countermeasures (SPCC) plan to protect the Nassau-Suffolk Sole Source Aquifer in the event of an accidental spill. The plan would focus on minimizing the potential for an accidental spill as well as ensuring that site personnel are adequately prepared to respond quickly and efficiently in the event of a spill.

Surface and Groundwater Conclusion: The no-action alternative would have no impact on surface or groundwater resources. Construction and operation of the proposed rail line would not impact surface waters or floodplain areas. Construction and operation of the planned BRT facilities would have no cumulative effect on surface waters or floodplain areas.

To protect the groundwater resources of the Nassau-Suffolk Sole Source aquifer from direct and cumulative impacts associated with the proposed rail line and the planned BRT facilities, U S Rail has committed to the following mitigation measures in the "Stipulation of Settlement." U S Rail would develop a stormwater management plan, incorporating construction of the proposed rail line and the planned BRT facilities that would provide for the retention of a five-inch rainfall that would limit the potential for off-site runoff and provide an opportunity for stormwater to slowly drain into the soil and ultimately recharge the ground water aquifer. U S Rail would also implement erosion control practices during construction of the proposed rail line and the planned BRT facilities in accordance with local construction standards. Following construction, the 28-acre BRT site would have approximately 8.4 acres of landscaped buffer area (approximately 30% of the site) comprised of a mix of existing and newly planted vegetated areas which would assist in the reduction of soil erosion.

Furthermore, SEA is recommending two additional mitigation measures to minimize potential impacts to ground water. One mitigation measure would require U S Rail to use best

management practices during construction of the proposed rail line and planned BRT facilities to minimize soil erosion and contamination of ground waters. The other mitigation measure would require U S Rail to develop and implement a spill prevention, control and countermeasures (SPCC) plan for the planned BRT facilities to protect the Nassau-Suffolk Sole Source Aquifer in the event of an accidental spill. The plan would focus on minimizing the potential for an accidental spill as well as ensuring that site personnel are adequately prepared to respond quickly and efficiently in the event of a spill. The SPCC should be developed in accordance with Article 12 of the Suffolk County Sanitary Code and U.S. Environmental Protection Agency (EPA) regulations at 40 C.F.R. § 112.7.

4.1.3 Air Quality

As noted in Chapter 3, the Affected Environment, the proposed rail line and the planned BRT site are located in the EPA-designated New York-New Jersey-Long Island Air Quality Control Region. This region is designated as either attainment or unclassified for SO_2 (sulfur dioxide), PM_{10} (particulate matter equal to or less than 10 microns), NO_2 (nitrogen dioxide), CO (carbon monoxide), and Pb (lead). The region is currently designated as a moderate nonattainment area for ozone and non-attainment for $PM_{2.5}$ (particulate matter equal to or less than 2.5 microns) (EPA 2009b). Therefore, in response to scoping consultation EPA requested SEA to consider the effects of the proposed project on particulate matter, mobile source air toxics (MSAT) and greenhouse gas emissions.[7]

Air Quality Impacts of the Proposed Rail Line Operation: SEA first examined the operation of U S Rail's proposed rail line to determine what potential environmental affects could result to air quality. Under the Board's environmental rules at 49 C.F.R. § 1105.7(e) (5), if a proposed action would result in an increase of at least eight trains per day in an area classified as an "attainment area" by EPA or an increase of at least three trains per day in an area classified as a "nonattainment area," SEA must quantify the anticipated effect on air emissions. Here, U S Rail is proposing to operate six trains per week, well below the Board's thresholds for additional analysis. Therefore, SEA has concluded that the very low level of additional train traffic that U S Rail's proposed rail line operation would not adversely affect air quality.

Air Quality Impacts From Construction of the Proposed Rail Line and Planned BRT Facilities: SEA then turned its attention to construction of U S Rail's proposed rail line and planned facilities. As explained earlier in both the Executive Summary and Purpose and Need

[7] See Appendix C, Exhibit 10.

chapters, the focus of this Draft EA is the potential environmental impacts of the construction and operation of U S Rail's proposed rail line. Because the Board has no licensing role over the planned BRT facilities, SEA is assessing the construction and operation of U S Rail's planned facilities to the extent that they would result in a cumulative effect. In examining the potential impact to air quality, however, it makes more sense to evaluate the construction of both U S Rail's proposed rail line and planned facilities at the BRT site together. The size of the site, the proximity of the features proposed for construction, and the nature of air emissions all dictate this result. Therefore, the discussion that follows examines the potential environmental impact to air quality that could result from the construction of both the proposed rail line and the planned facilities, focusing on particulate matter emissions.

Construction-Generated Particulate Matter: Air emissions generated during the construction phase of the project would likely be minimal. Construction would consist of activities such as: grading the site area (28 acres), paving of haul road and parking areas, extension of railroad tracks to the site from LIRR, addition of onsite rail tracks and interchanges, retaining wall construction, plantings and landscaping (30% of site), construction of on-site stormwater retention drywells and pond development, lighting installation and sanitary sewer installation

SEA calculated construction PM emissions using general EPA emission factors for heavy construction operations (EPA 1995).[8] The applicable EPA general emission factor for total suspended particulates (TSP) is 1.2 tons per acre per month for a wide variety of construction activities, not all of which would occur at the BRT. This emission factor also assumes construction occurring 30 days per month, which results in conservatively high projected emissions. Applying this emission factor to the 28-acre site on which the proposed rail line and planned BRT facilities would be constructed results in a conservative TSP emission estimate of approximately 34 tons per month.

Using EPA guidance on particulate size distribution,[9] 51 percent of the TSP would be classified as PM_{10} and 15 percent would be classified as $PM_{2.5}$ (EPA 1995). Thus, relying on EPA's guidance, SEA estimates that the PM_{10} and $PM_{2.5}$ emissions from the construction of the

[8] AP-42, *Compilation of Air Pollutant Emission Factors*, Fifth Edition, Chapter 13, Heavy Construction Operations (EPA 1995).

[9] EPA AP-42, *Compilation of Air Pollutant Emission Factors*, Fifth Edition Appendix B.2 (B.2.2 Category 3, Aggregate) (EPA 1995).

proposed rail line and the planned BRT facilities would be 17 tons per month and 5 tons per month, respectively.

Emissions of TSP would be temporary and would be greatly reduced through the use of erosion and sedimentation control measures, which include dust control. U S Rail has committed to mitigation measures that would minimize erosion at the BRT in its Stipulation of Settlement. Moreover, SEA is recommending a mitigation measure in this Draft EA that would require U S Rail to employ best management practices before and during construction to minimize soil erosion and sedimentation.

Emissions of other criteria pollutants during construction, such as volatile organic compounds (VOCs) and nitrous oxides (NO_x) would occur from the combustion of fuel from construction equipment. However, given the small area and short time of construction, SEA believes that the emissions that would be generated from the construction of both the proposed rail line and the planned BRT facilities would be insignificant on both a local and a regional basis.

Operation-Generated Particulate Matter (PM_{10}): Next, SEA assessed the potential air quality impacts from the operation of U S Rail's proposed rail line and planned BRT facilities, focusing on the generation of fugitive PM_{10} from standard operations (Table 4-1). These operations would involve emissions from two sources: (1) ***loading equipment*** (equipment and vehicles used to move and unload rail cars and sort aggregate material on unpaved areas), and (2) ***material transport*** (the loading and movement of trucks on paved areas).

Loading Equipment PM_{10} Emissions. The quantity of particulate matter generated by loading equipment on unpaved areas depends on a several factors: the quantity of material handled, wind speed, and moisture content.[10] The operations at the planned BRT facilities would consist of a number of steps. First, aggregate would be dumped from a rail car (1st movement) and then moved by loader to the sorted, aggregate storage area (2nd movement). For loading of trucks, aggregate would be picked-up and moved by loader from the storage area to the transload area (3rd movement) and then onto truck for delivery off-site (4th movement). To calculate the total amount of PM_{10} generated by the equipment and vehicles used to move and unload rail cars and sort aggregate material on unpaved areas at the BRT site, SEA took the annual amount of aggregate that U S Rail proposes to handle—500,000 tons—and then multiplied that yearly total by four.

[10] AP-42, *Compilation of Air Pollutant Emission Factors*, Fifth Edition, Chapter 13.2.4, Equation 1 (EPA 1995).

Table 4-1: Total operation emissions of PM_{10} by source from BRT site

Source	Emissions basis	Units	Description	PM_{10} Emission Factor	Units	PM_{10} Emissions	Units
Transfer Operations	2,000,000	tons per yr	material handled	0.012	Lb/ton	12.0	tons per yr
Paved Roads	22,529	VMT	vehicle mi. traveled/yr	0.78	lb/VMT	8.8	tons per yr
TOTAL						**20.8**	**tons per yr**

Material Transport PM Emissions: SEA used EPA emission factors to calculate the emissions associated with truck operations on paved areas of the planned BRT site. SEA took into account a number of factors in the calculation: silt loading, vehicle weight, and vehicle miles traveled,[11] including an adjustment for precipitation.[12] SEA determined the average truck weight using U.S. Department of Transportation (US DOT) data.[13] SEA estimated vehicle miles traveled by calculating the truck trips required per year to transport 500,000 tons of aggregate (the yearly amount proposed to be moved by U S Rail) and the round-trip length of the access road.

Operation-Generated PM Conclusion: SEA found that the total PM_{10} emissions from operation of the planned BRT (including both the proposed rail line and the planned BRT facilities) would be more than 15 tons annually. Using this information, SEA then evaluated the potential $PM_{2.5}$ contribution of the project.

Operation-Generated Particulate Matter ($PM_{2.5}$): In response to EPA's request[14] and because the project area is in a designated non-attainment area for $PM_{2.5}$, SEA used the predicted project PM_{10} emissions and the results of an air quality analysis for a similar rail facility to generally consider project $PM_{2.5}$ emissions. Completion of a detailed $PM_{2.5}$ analysis for the proposed BRT project would not be prudent, based on the limited size of the proposed facilities and given that many of the details concerning operations of the private facilities have not yet

[11] Vehicle miles traveled (VMT) is a measure that is commonly used to describe automobile use on a daily or annual basis. It incorporates both the number of vehicle trips and the length of those trips.

[12] AP-42, *Compilation of Air Pollutant Emission Factors*, Fifth Edition, Chapter 13.2.1 Equation 1 (EPA 1995).

[13] US DOT Comprehensive Truck Size & Weight Study, Chapter 3 (US DOT 2000).

[14] See Appendix C, Exhibit 10.

been determined. The development of the predicted PM_{10} emissions of the project and the availability of a comparable proposed rail facility — the New York State Department of Transportation (NYSDOT) Long Island Truck-Rail Intermodal Facility (LITRIM) — against which to compare the proposed BRT provides adequate information for a general $PM_{2.5}$ analysis.

To determine if the planned BRT operation would involve a significant $PM_{2.5}$ air quality impact,[15] SEA compared the planned BRT project to the proposed LITRIM project. The LITRIM project would involve a rail freight terminal on a 105-acre site near Brentwood, NY, approximately 20 miles west of the proposed BRT site south of Exit 53 on I-495. This proposed rail facility is projected to handle approximately 1.5 million tons of freight annually by 2030, resulting in approximately 600 truck trips (300 inbound and 300 outbound) per day. By comparison, the proposed BRT facility would handle approximately 500,000 tons and generate approximately 122 truck trips (61 inbound and 61 outbound) per day.

Based on NYSDEC policy concerning $PM_{2.5}$ emissions, the LITRIM project was found to not have an adverse impact on particulate matter concentrations[16] as $PM_{2.5}$ emissions would be less than two percent (2%) of the annual NAAQS standard of 15 micrograms per cubic meter, or 0.3 micrograms per cubic meter, and equal to or less than 5 micrograms per cubic meter on a 24-hour basis.

Since the planned BRT consists of approximately one-third the tonnage and one-fifth the number of truck trips that are projected to be generated by the LITRIM, it is expected that the planned BRT facilities would generate considerably less $PM_{2.5}$ emissions. Therefore, SEA concludes that the planned BRT facilities would have an insignificant cumulative impact associated with fine particulate matter emissions under NYSDEC policy (NYSDEC 2003).

Operation-Generated Mobile Source Air Toxics Emissions: Based on project scoping consultation, EPA asked SEA to consider mobile source air toxics (MSATs) generated by the

[15] Under NYSDEC policy, if a project is shown to have maximum $PM_{2.5}$ air quality impacts equal to or less than two percent (2%) of the annual NAAQS standard of 15 micrograms per cubic meter, or 0.3 micrograms per cubic meter, and equal to or less than 5 micrograms per cubic meter on a 24-hour basis, it would be considered to have insignificant impacts (NYSDEC 2003).

[16] LITRIM-generated projected increases in $PM_{2.5}$ concentrations, above a no-action scenario, from roadway vehicular traffic for the year 2030 were 0.02 micrograms per cubic meter for the 24-hour average and 0.01 micrograms per cubic meter for the annual average. Increases in $PM_{2.5}$ concentration from LITRIM yard operations over a no-action alternative were projected to be 0.11 micrograms per cubic meter for the 24-hour standard and 0.02 micrograms per cubic meter for the annual average standard (FHWA and NYSDOT 2007).

planned BRT facilities.[17] SEA again used a comparison with the proposed LITRIM project to estimate potential MSAT emissions of the BRT facilities. Based on that comparison, it is expected that the planned BRT facilities would have a low potential for adverse MSAT effects (FHWA-NYSDOT 2007). Implementation of the LITRIM, resulting in reduced truck VMT and increased diesel locomotive VMT, was found to substantially reduce MSAT emissions, with individual pollutant emission reductions ranging from 11 percent to 35 percent. Because the planned BRT facilities would provide similar changes (potential reduction in regional truck VMT with small increase in regional diesel locomotive VMT), SEA concludes that the proposed rail line and the planned BRT operations would also contribute to a reduction in regional MSAT concentrations (although less reduction in comparison with the LITRIM).

Greenhouse Gas Emissions: In response to EPA's scoping request,[18] SEA considered the potential greenhouse gas emissions of the project, especially related to the shift in truck and rail transport modes. Greenhouse gases are defined as those gases in the atmosphere that absorb and emit radiation. The main greenhouse gases in the Earth's atmosphere are carbon dioxide, methane, nitrous oxide, and ozone. U S Rail's proposed rail line and planned BRT facilities would shift some freight movements from truck to rail. Such a shift would generally reduce emissions of greenhouse gases, as rail transport is more efficient than truck transport in terms of air emissions.

The New York Metropolitan Transportation Council (NYMTC) Freight Plan notes that the efficiency of rail freight movement is approximately 455 ton-miles per gallon of fuel, compared to an efficiency of 105 ton-miles per gallon for diesel trucks (NYMTC 2004). Accordingly, moving freight by rail instead of truck reduces greenhouse gas emissions by two-thirds or more (Transportation Research Board 2010). Initially, the Sills Group would be the primary customer of U S Rail, using approximately one-half (250,000 tons) of the total annual tonnage of aggregate projected to be handled through the BRT. As Sills Group currently receives aggregate via barge and local truck (see Section 4.9 Transportation), the relative change in truck traffic that would result if the proposed rail line were available would likely have a negligible effect on regional greenhouse gas emissions from their activities alone. However, if potential future customers ultimately take delivery of the residual 250,000 tons of aggregate a potential for further reduction in greenhouse gas emissions could be realized. Assuming that potential future customers currently use diesel trucks exclusively to transport aggregate from the New York City (NYC) area to a location near the planned BRT, a shift to rail freight could

[17] See Appendix C, Exhibit 10.

[18] See Appendix C, Exhibit 10.

reduce greenhouse gas emissions by 65 percent (Table 4-2). Therefore, SEA concludes that the no-action alternative would have a greater adverse impact on greenhouse gas emissions than the proposed action.

Table 4-2: Estimated potential annual greenhouse gas reductions from proposed BRT from shift in freight movement from truck to rail[19]

Input assumptions:	
One-way mileage using I-495 from NYC to BRT	58 miles
Total weight	250,000 tons
Typical truck capacity	18 tons
Typical rail car capacity	90 tons
Output assumptions	
Number of trucks needed	13,889
Number of rail cars needed	2,778
Estimated CO_2 emissions truck (tons)	1,288
Estimated CO_2 emissions rail (tons)	448
Estimated CO_2 reduction (tons)	**840**

Air Quality Conclusion: Construction and operation of the proposed rail line would not result in significant effects to local and regional air quality, and the construction and operation of the planned BRT facilities would not produce adverse cumulative effects to local or regional air quality. Emissions of particulate matter and mobile source air toxics from construction and operation activities for the proposed rail line and planned BRT facilities would be within acceptable limits as established by NYSDEC policy. The shift from truck to rail has the potential to reduce greenhouse gas emissions on a local and regional level. Under the no-action alternative, no impacts to local and regional air quality would occur; however potential greenhouse gas emission reductions from regional shifts in freight movement from truck to rail would not be experienced.

[19] CSX carbon calculator: http://www.csx.com/?fuseaction=customers.emissions_carboncalculator.

4.2 Biological Resources

4.2.1 Vegetation and Wetlands

Construction of the proposed rail line and the planned BRT facilities would require the conversion of most of the 28-acre parcel to industrial use. While no wetlands exist and much of the BRT site has been cleared, U S Rail, in its "Stipulation of Settlement" entered into with the Town of Brookhaven,[20] has committed to mitigation that would require U S Rail to install 8.4 acres of landscaped area using existing and native species. SEA is recommending in this Draft EA that the Board impose a requirement that U S Rail comply with all of the mitigation in the "Stipulation of Settlement."

Vegetation and Wetlands Conclusion: As there are no regulated federal or state wetlands and minimal vegetation on or adjacent to the proposed project area, SEA concludes that there would be no adverse impacts to vegetation or wetlands under either the no-action alternative or construction and operation of the proposed rail line. Furthermore, the planned BRT facilities would result in no cumulative affects to vegetation as minimal vegetation is currently found on the planned site and U S Rail has committed to mitigation in its "Stipulation of Settlement" that would require the installation of 8.4 acres (30 percent) of landscaped area with existing and native plant species. SEA is recommending that the Board impose compliance with the condition of the "Stipulation of Settlement" if it should decide to approve U S Rail's proposal.

4.2.2 Wildlife

The planned BRT site provides only marginal habitat for wildlife due to its urbanized, industrial location. Species most likely to be found in and around the project area are common wildlife species that can adapt to urbanized environments. Due to the absence of wetland areas on and adjacent to the planned site, aquatic reptiles and amphibians are not expected to be found and no adverse impacts are anticipated either from construction and operation of the proposed rail line or cumulative effects from the planned BRT facilities.

During construction and operation of the proposed rail line and planned BRT facilities, some species, especially larger mammals, may be displaced due to increased noise and human activity. However, sufficient suitable habitat exists on nearby undeveloped parcels for those

[20] See Appendix B, Exhibit 9.

wildlife species that choose to remain within the vicinity of the proposed rail line and planned BRT facilities.

There are no wildlife sanctuaries or refuges, national or state parks or forests that would be affected by the proposed rail construction and operation or the planned BRT facilities.

Wildlife Conclusion: Construction and operation of the proposed rail line would not adversely impact wildlife. While the impact to wildlife may be greater than that of the no-action alternative, the area is industrial in nature, providing only marginal habitat and adjacent undeveloped parcels exist for wildlife that remain. The BRT facilities are not expected to result in any cumulative effects to wildlife. As noted above, U S Rail has committed to mitigation in its "Stipulation of Settlement" to install 8.4 acres (30 percent) of landscaped area with existing and native plant species. These landscaped areas would provide some habitat for common wildlife species.

4.2.3 Endangered, Threatened, and Rare Species

Of the eleven Federally-listed endangered or threatened species that potentially existent in Suffolk County, 10 of the species (five sea turtle species, two coastal birds, two coastal plants, one anadromous fish species) are typically found in coastal or neritic (near shore) habitats. Based on the lack of surface waters and suitable aquatic habitats, these species are not found within or surrounding the proposed rail line or the planned BRT facilities.

The Federally-listed species (small whorled pogonia), by definition, has no existing sites of occurrence in New York State (NYS) and, furthermore, has not been identified within NYS in the last 20 to 30 years (New York Natural Heritage Program 2009a). Because 1) the project site has limited forest habitat and contains no surface water features and 2) the species has not been sighted in NYS in more than 20 years, it is unlikely that this species would be located on or near the site where the proposed rail line would be constructed or the area of the planned BRT.

There are three State-listed endangered and threatened species and unlisted species identified by the New York Natural Heritage Program (NYNHP) that have been historically documented in the vicinity of the planned BRT. However, none have been documented in the vicinity since 1979. The species identified by the NYNHP are discussed below:

The persius duskywing (*Erynnis persius persius*) prefers open areas including mountain grasslands, marshes, sand plains, seeps, streamsides and is thought to be extirpated or possibly

extirpated from NYS (NatureServe 2009a). As no such habitat exists within the site of the proposed rail line or surrounding area, it is unlikely that this species would exist and therefore be impacted by the construction and operation of the proposed rail line. In addition, construction and operation of the planned BRT facilities is unlikely to result in any cumulative effect on the persius duskywing.

The slender pinweed (*Lechea tenuifolia*) prefers dry, often grassy, natural or artificial open habitats. These habitats consist of pine or oak barrens with disturbances such as roads, firebreaks, all-terrain vehicle trails, or runways, as well as rocky slopes and summits on limestone (NYNHP 2009b). The last documented occurrence of this species in the proposed project area was in 1912, although existing populations occur in other areas on eastern Long Island. Additionally, the slender pinweed was not observed during previous investigations on the planned BRT site (Brookhaven Energy Limited Partnership 2001). Due to the absence of preferred habitat and the lack of documented existence within the area of the proposed rail line, it is unlikely that this species would exist and therefore be impacted by the construction and operation of the rail line. In addition, construction and operation of the planned BRT facilities is likewise unlikely to result in any cumulative effect on the slender pinweed.

The dwarf hawthorn (*Crataegus uniflora*) is a low spreading shrub that prefers dry woodlands, rocky uplands and open field habitats with partial to full sun exposure and is thought to be extinct in Suffolk County (NatureServe 2009b). It was last documented in the region in 1907. Due to the lack of suitable habitat within the area of the proposed rail line, it is unlikely that this species would be impacted by the proposed construction and operation of the rail line. It is also unlikely that construction and operation of the planned BRT facilities would result in any cumulative effect on the dwarf hawthorn.

The comet darner (*Anax longpipes*), a dragon fly, is listed as a species needing conservation that was last documented in Suffolk County in 1908. These dragonflies are typically found near ponds containing floating and emergent vegetation, including coastal plain ponds (Massachusetts Division of Fisheries and Wildlife 2008). Due to the lack of proximate water features, it is unlikely that this species inhabits the area and would therefore not be impacted by the construction and operation of the rail line. This lack of habitat and documentation also make it unlikely that the planned BRT facilities would result in any cumulative effect on the comet darner.

Endangered, Threatened and Rare Species Conclusion: Because of the lack of specific habitat conditions associated with potential endangered, threatened and rare species and the industrial nature of the area, SEA has determined that no adverse impacts to these species would occur from either the construction and operation of the proposed rail line or the no-action alternative. Furthermore, SEA also believes that no cumulative effects would result to these species from the construction and operation of the planned BRT facilities.

4.3 Noise

4.3.1 Rail Noise Associated with the Proposed Rail Line

SEA first examined the construction and operation of U S Rail's proposed new rail line to determine what potential noise impacts could result. Under the Board's environmental rules at 49 C.F.R. § 1105.7(e) (5), SEA must quantify the anticipated noise impacts if a proposed action would result in an increase of at least eight trains per day. Here, U S Rail is proposing to operate six trains per week, well below the Board's thresholds for additional analysis. Therefore, SEA has concluded that the very low level of additional train traffic that U S Rail's proposed rail line would accommodate would not result in an adverse noise impact.

Noise generated by the construction of the proposed rail line would be temporary and be limited to daytime periods. Additionally, SEA has noted that the project is located within an industrial area adjacent to a major highway and that there are no noise-sensitive receptors within 0.25 mile of the BRT site.

Rail Noise Conclusion: Because U S Rail is proposing to operate only 1 train during daytime hours, operation of the proposed rail line would not meet or exceed any of the thresholds set forth in the Board's environmental rules. Consequently, SEA has concluded that the operation of U S Rail's proposed rail line would not likely result in any adverse noise impacts. Moreover, SEA has determined that any noise impact from rail construction activities would be temporary and not significant because no sensitive noise receptors are located in this industrial area.

4.3.2 Truck-Generated Noise Associated with the Planned BRT Facilities

SEA also considered noise generated by the planned BRT facilities. While SEA is generally examining the planned BRT facilities for potential cumulative effects, in examining the potential noise impacts it is appropriate to evaluate the construction and operation of U S Rail's proposed rail line and planned facilities at the BRT site. This is because of the relatively small

size of the site, the proximity of the rail line and the planned facilities, and the nature of noise generation. Therefore, the discussion that follows examines the potential for adverse noise impacts that could result from the construction and operation of both the proposed rail line and the planned facilities.

Applicability: The Board's environmental rules at 49 C.F.R. § 1105.7(e) (6) state that a proposed action that would result, among other thresholds, in an increase in truck traffic of more than 10 percent of the average daily traffic or 50 vehicles per day on any affected road segment, requires SEA to perform additional analysis. Truck traffic generated from the planned BRT operations is expected to average approximately 14 trucks per hour (122 trucks per day). Therefore, the planned BRT operations exceed the threshold and require SEA to perform a detailed noise analysis.

Impact Thresholds: The Board's noise regulations at 49 C.F.R. § 1105.7e (6) set forth the following criteria: an increase in noise exposure as measured by a day-night average noise level (Ldn) of 3 dBA or more and an increase to a noise level of 65 dBA Ldn or greater.

Methodology: The following steps outline the analysis approach for the assessment of potential noise impacts used in this case:

1. SEA compiled and reviewed available information to identify potential noise impacts of the construction and operation of the proposed rail line and highway effects related to operations of the planned BRT. Digital aerial photographs were used for the initial identification of noise-sensitive receptors and land use was verified with site visits.

2. Existing noise levels were measured on the proposed site and along portions of the planned truck routes (including I-495, NY State Route 112, and Commack Avenue) to determine background noise levels.

3. SEA identified models for estimating noise for each of the following potentially significant noise sources: 1) the proposed rail line, 2) Interstate 495 and Commack Avenue between the proposed BRT and Scatt Materials, and 3) I-495 and SR 112 between the proposed BRT and Empire Asphalt. SEA used the Federal Railroad Administration/Federal Transit Administration (FRA/FTA)

noise spreadsheet model and the Federal Highway Administration's (FHWA) Traffic Noise Model (TNM), version 2.5 to evaluate noise effects.

4. SEA used the following information to estimate the existing and future noise exposure in terms of Ldn: 1) the locations of noise sources, 2) distances and propagation paths to noise-sensitive receptors, and 3) future operations, including the proposed 6 trains per week and an additional 122 trucks per day on existing roadways. Because noise from the planned BRT activities may cause localized impacts, SEA considered the following factors in conducting a detailed assessment of noise impacts: 1) the location of the noise sources in relation to receptors for both rail and highway modes, 2) the highway traffic consist including auto, medium trucks and heavy trucks, 3) the traffic volume during peak hour at posted speed limit, 4) any acoustical shielding between receptors and noise sources, and 5) the existing levels of background noise.

SEA assessed noise that would result from trucks for two purposes. First, to evaluate the noise that would be generated by the 122 additional trucks that would result if the project were implemented. Second, to evaluate the no-action alternative, which if approved by the Board, would result in trucks continuing to move aggregate from areas north of Long Island to the existing Sills Group facilities at Scatt Materials and Empire Asphalt. Before discussing SEA's analysis of noise impacts, however, we must assess the ambient or background noise levels at the site of the planned BRT site.

SEA conducted ambient noise measurements along the truck routes associated with the operations of the planned BRT facilities. For each truck route between the planned BRT and the truck's ultimate destination, either Scatt Materials or Empire Asphalt, SEA took short-term (typically 20 minute in length) noise readings along with traffic counts at several locations.[21] The results of these readings are set forth in Table 4-3. Using this data and that available from the NYSDOT, existing and future traffic volume assumptions were developed reflecting the increased truck traffic that would be generated by the planned BRT facilities (Table 4-4).

[21] SEA used American National Standards Institute (ANSI) Type I noise meters to measure ambient noise levels. Type 1 meters are typically used to obtain precise measurements in the field and generally have an accuracy tolerance of ± 1dBA.

Table 4-3: Noise readings and traffic volume, speed and traffic composition data collected at several locations along truck routes associated with planned BRT operations

Date	Start Time	Roadway	Est. Speed (mph)	Hourly Traffic from Concurrent Traffic Counts					Modeled Leq (dBA)	Measured Leq (dBA)	Difference (dBA)
				Auto	Med. Trks	Heavy Trks	Buses	Motor cycle			
3/10/10	7:00 AM	Comsewogue	35	51	15	6	0	0	61.8	61.9	-0.1
		Hulse	35	147	18	0	0	0			
3/10/10	7:54AM	Sheep Pasture NB	45	147	3	15	3	0	66.2	68.6	-2.4
		Sheep Pasture SB	45	321	12	6	6	0			
		Lynx Lane	25	57	3	0	6	0			
3/10/10	8:30AM	Sheep Pasture NB	45	669	9	3	24	0	63.7	66.3	-2.6
		Sheep Pasture SB	45	462	12	12	24	3			
3/10/10	9:03AM	Old Town Rd NB	45	492	27	24	33	3	70.0	70.3	-0.3
		Old Town Rd SB	45	693	15	3	78	0			
3/10/10	10:43AM	Commack SB	45	636	42	39	0	0	67.9	68.4	-0.5
		Commack NB	45	549	42	36	0	0			
3/10/10	12:07PM	495 EB	55	4656	180	228	24	18	58.5	58.9	-0.4
		495 WB	55	4866	186	180	21	0			
3/10/10	2:00PM	495 EB	55	4572	222	276	54	0	71.9	70.4	1.5
		495 WB	55	5034	96	132	6	18			
		WB Service Rd	45	132	30	6	3	0			
3/11/10	12:21PM	101 SB	45	381	12	12	0	0	65.9	65.3	0.6
		101 NB	45	375	6	21	6	0			
		Island Ave	25	36	3	0	0	0			
3/11/10	1:20PM	495 EB	55	2868	42	126	6	0	62.6	63.7	-1.1
		495 WB	55	3150	150	174	36	6			
		WB Service Rd	45	192	12	3	0	0			
		Woodycrest Rd.	25	15	0	0	0	0			
3/11/10	3:00 PM	Rte 112 NB	45	834	9	6	6	3	67.3	68.5	-1.2
		Rte 112 SB	45	639	12	31	6	0			

Table 4-4: Traffic data used for prediction of existing noise level conditions and future noise levels with the planned BRT[22]

Truck Route: Planned BRT to Empire Asphalt Plant (Traffic Volumes without BRT)

Road	AADT	Peak Hour	Distribution	Auto	Heavy Truck
CR 101 (Sills Rd)	15,060	1,506	753	702	51
I-495 North Service Rd	5,124	512	256	236	20
I-495 between Exit 64 and 66	86,780	8,678	4,339	3,975	364
SR 112 North	25,600	2,560	1,280	1,194	86
Old Town Road	16,070	1,607	804	749	55

Truck Route: Planned BRT to Empire Asphalt Plant (Traffic Volumes with BRT)

Road	AADT	Peak Hour	Distribution	Auto	Heavy Truck
CR 101 (Sills Rd)	15,121	1,512	756	702	54
I-495 Service Rd	5,185	519	259	236	23
I-495 between Exit 64 and 66	86,841	8,684	4,342	3,977	365
SR 112 North	25,661	2,566	1,283	1,195	89
Old Town Road	16,131	1,613	807	748	58

Truck Route: Planned BRT to Scatt Materials Plant (Traffic Volumes without BRT)

Road	AADT	Peak Hour	Distribution	Auto	Heavy Truck
CR 101 (Sills Road)	15,060	1,506	753	702	51
I-495 Service Rd	5,124	512	256	236	20
I-495 between Exit 52 and 66	177,300	17,730	8,865	8,120	745
Commack Road	24,240	2,424	1,212	1,130	82

Truck Route: Planned BRT to Scatt Materials Plant (Traffic Volumes with BRT)

Road	AADT	Peak Hour	Distribution	Auto	Heavy Truck
CR 101 (Sills Road)	15,121	1,512	756	702	54
I-495 Service Rd	5,185	519	259	236	23
I-495 between Exit 52 and 66	177,360	17,736	8,868	8,123	745
Commack Road	24,301	2,430	1,215	1,130	85

[22] Traffic volume assumptions for noise analysis along segments of I-495 used the highest volume, or worst case condition, rather than a segment average.

It should be noted that noise measurements were taken at various times of the day and did not necessarily represent the noisiest condition at the measurement site. In addition, measurement sites were positioned in order to enable validation of the noise prediction model. Measurements were used strictly for the purposes of noise model calibration, with existing peak hour traffic volumes used in the prediction of worst-case existing noise levels.

The noise measurement data was used as the basis for validation of the highway noise prediction model at sites throughout the truck travel corridors. Actual measured noise levels at the measurement sites ranged from 59 to 70 dBA. Using the concurrent traffic data, noise levels were modeled and compared to measured noise levels. Measured versus modeled noise levels were within an acceptable 3 dBA for all sites evaluated.

In order to predict the worst-case existing and future BRT facilities build year noise levels and to also evaluate noise abatement options, SEA used the FHWA's Traffic Noise Model (TNM). The FHWA TNM is used to predict noise levels at selected locations based on traffic data, roadway design, topographic features, and the relationship of analysis sites to the roadway.

The increases in highway noise associated with the project are predicted to increase noise levels in the range of 0.0 to 0.2 dBA for the worst-case noise conditions along the planned truck routes. Therefore, SEA believes that these changes reflect that the traffic growth associated with the additional new truck traffic (61 loaded trips per day or 122 round trips with empty back-haul per day) is minimal, within a less than 3 dBA increase (the adverse noise impact threshold) in noise levels, and therefore would not result in any significant cumulative noise impact.

Truck-Generated Noise Conclusion: The noise impacts associated with new truck traffic generated by the project would not create a significant increase in noise along the roadways used to deliver aggregate to the Scatt Materials and Empire Asphalt plants. The worst-case scenario analysis shows that noise increases from BRT-associated truck traffic would be in the range of 0.0-0.2 dBA, less than the 3 dBA increase needed to produce a significant impact.

4.4 Cultural Resources

According to the NY Office of Parks, Recreation and Historic Preservation, under the Section 106 regulations of the National Historic Preservation Act (NHPA) the construction of the

proposed rail line or planned BRT facilities would have no effect on cultural resources[23] in or eligible for inclusion on the National Register of Historic Places (NRHP).

Cultural Resources Conclusion: Based on coordination with the State Historic Preservation Office, there are no historic structures or archaeological sites of importance within or adjacent to the proposed rail line or the planned BRT facilities. Therefore, both the construction and operation of the rail line and the no-build alternative would not have a significant effect on cultural resources. That lack of any historic structures or archaeological sites also indicates that the planned BRT facilities would not result in any adverse cumulative effects.

4.5 Hazardous Material/Waste Sites

The proposed rail line and the no-action alternative would not impact sites containing uncontrolled petroleum and hazardous wastes, and there would be no significant cumulative effects from the planned BRT facilities (NYSDEC 2009c). Operation of the planned BRT envisions limited storage of fuels while refueling of equipment would be provided through the use of mobile refueling vehicles. Under terms of the "Stipulation of Settlement," U S Rail has agreed that no materials considered to be potentially hazardous are would be handled as part of the planned BRT operations.

Furthermore, SEA is recommending a mitigation measure to minimize impacts from potential fuel spills. The mitigation measure would require U S Rail to develop and implement a spill prevention, control and countermeasures (SPCC) plan. The SPCC plan would focus on minimizing the potential for an accidental spill as well as ensuring that site personnel are adequately prepared to respond quickly and efficiently in the event of a spill. The SPCC plane would be designed in accordance with Article 12 of the Suffolk County Sanitary Code and EPA regulations at 40 C.F.R. § 112.7.

Hazardous Material/Waste Sites Conclusion: The no-action alternative would not involve the use of or impact known hazardous materials or waste sites. The construction and operation of the proposed rail line would not be affected by hazardous materials or waste sites, as there are no hazardous materials or waste sites within or adjacent to the proposed site. Operation of the planned BRT facilities would not involve the transport of regulated hazardous materials to or from the project site and generate no adverse cumulative effects.

[23] See Appendix C, Exhibit 7.

SEA's recommended mitigation measure, development of a SPCC, would help to prevent, or in the case of an accidental spill, to ensure that appropriate spill prevention and control measures are implemented. Additionally, SEA is recommending that the Board impose a requirement the U S Rail comply with all of the terms and conditions included in their "Stipulation of Settlement" with the Town of Brookhaven.[24] Therefore, construction and operation of the planned BRT facilities would not result in any adverse cumulative effects.

4.6 Land Use

Both the construction and operation of the proposed rail line and the planned BRT are consistent with current zoning and future land use plans adopted by the Town of Brookhaven.[25] The site of the proposed rail line and the planned BRT is zoned for industrial and commercial purposes, and is within the Town's North Bellport Empire Zone, an area of approximately 1,200 acres dedicated to industrial and commercial development. Suffolk County has identified the Village of Yaphank as one of its five major growth and development areas within the region. Approximately 740 acres are planned for industrial-type development in the vicinity of the project area, adequate to accommodate 7,219,000 square feet of industrial uses (Suffolk County 2006).

Land Use Conclusion: Construction and operation of the proposed rail line would be consistent with existing land use plans and the economic development goals of the Town of Brookhaven. The proposed rail line could provide improved freight rail service to local enterprises, allowing for more cost efficient shipment of goods and materials which could also potentially attract new business to the area. The no-action alternative would not further the planned development and economic goals of the Town of Brookhaven or the objectives of the local Empire Zone program. The planned BRT facilities would not result in any adverse cumulative effect to land use, because the facilities and the associated activities to be conducted there also would be consistent with current zoning and local land use plans.

4.7 Socioeconomic Setting

4.7.1 Population Demographics

According to projections of the Town of Brookhaven and the NY Department of Labor, the Town of Brookhaven's population is projected to increase by 31 percent over the next two

[24] See Appendix B, Exhibit 9.

[25] See Appendix C, Exhibit 9.

decades. Neither the proposed construction and operation of the rail line nor the no-action alternative would have a discernable impact on population growth, nor there would be any cumulative effect from the planned BRT facilities.

Population Demographics Conclusion: Construction and operation of the proposed rail line would be consistent with the community planning goals of the Town of Brookhaven and would not directly affect local population trends. The result is the same for the planned BRT facilities and would result in no cumulative effects. The development of the planned BRT facilities could indirectly attract new business to the area, or influence the expansion of existing businesses, and potentially draw new residents to the Town of Brookhaven to fill additional employment opportunities. This result would be consistent with the Town of Brookhaven's goals and that of the Empire Zone program. The no-action alternative would have no direct or indirect impact on population demographics of Brookhaven.

4.7.2 Economic Impacts

Positive economic impacts are anticipated in connection with the construction and operation of the proposed rail line and planned BRT facilities as compared with the no-action alternative. Construction of the project is expected to provide 60 temporary construction jobs. The operation of the proposed rail line and planned BRT facilities is expected to provide permanent employment opportunities for 25 employees (a mix of full- and part-time positions). The availability of the proposed rail line and planned BRT facilities would also provide opportunities for other businesses to utilize the rail services for the transport of raw materials, finished goods and/or other products. This freight rail service would provide competitive advantages for further economic development and opportunities for additional employment and business activity, meeting the goals of the Empire Zone's designation. During construction of the proposed rail line and planned BRT facilities, temporary employment opportunities and potential increases in sales to local merchants based on the purchasing activities of construction personnel could be realized.

Economic Impact Conclusion: The construction and operation of the proposed rail line and planned BRT facilities would provide both temporary and permanent job opportunities for local residents and provide a new and potentially less costly transport option for other local businesses. The location and development of the proposed rail line and planned BRT facilities would be consistent with the intent of the Town of Brookhaven's Empire Zone program which seeks to attract new business to the community. Cumulatively, the proposed rail line and the

planned BRT facilities would provide an economic benefit to the community. Under the no-action alternative, none of the potential economic benefits would occur.

4.8 Recreation

No public recreation facilities or services are located within 1 mile of the proposed rail line or the planned BRT facilities. Future land use plans for the project area seek to expand economic development through expanded industrial and other employment opportunities and do not envision public recreation facilities.

Recreation Conclusion: Neither the proposed rail line construction nor the no-action alternative would impact any existing or planned parks or recreation facilities. The planned BRT facilities would not result in any cumulative effects to existing or planned parks or recreation areas.

4.9 Transportation

4.9.1 Impacts to Rail Transportation

If the proposed rail line is approved and built, six weekly train movements (three inbound and three outbound trains) would use the existing LIRR mainline and switch to the proposed rail line for access to the planned BRT facilities. These BRT-associated freight rail movements would occur along the LIRR mainline in addition to the LIRR's existing eight daily (Monday through Friday) and four weekend (4 each Saturday and Sunday) passenger trains, as well as NY&A's existing ten weekly freight service trains. If the proposed construction of the rail line is approved, freight trains that would move over the LIRR and be handed off to U S Rail would operate outside normal LIRR passenger rail service. Given the low number of passenger trains that run along the LIRR in this area, SEA believes that adequate time slots are available for the additional rail service that would result from this project without adversely affecting LIRR operations.

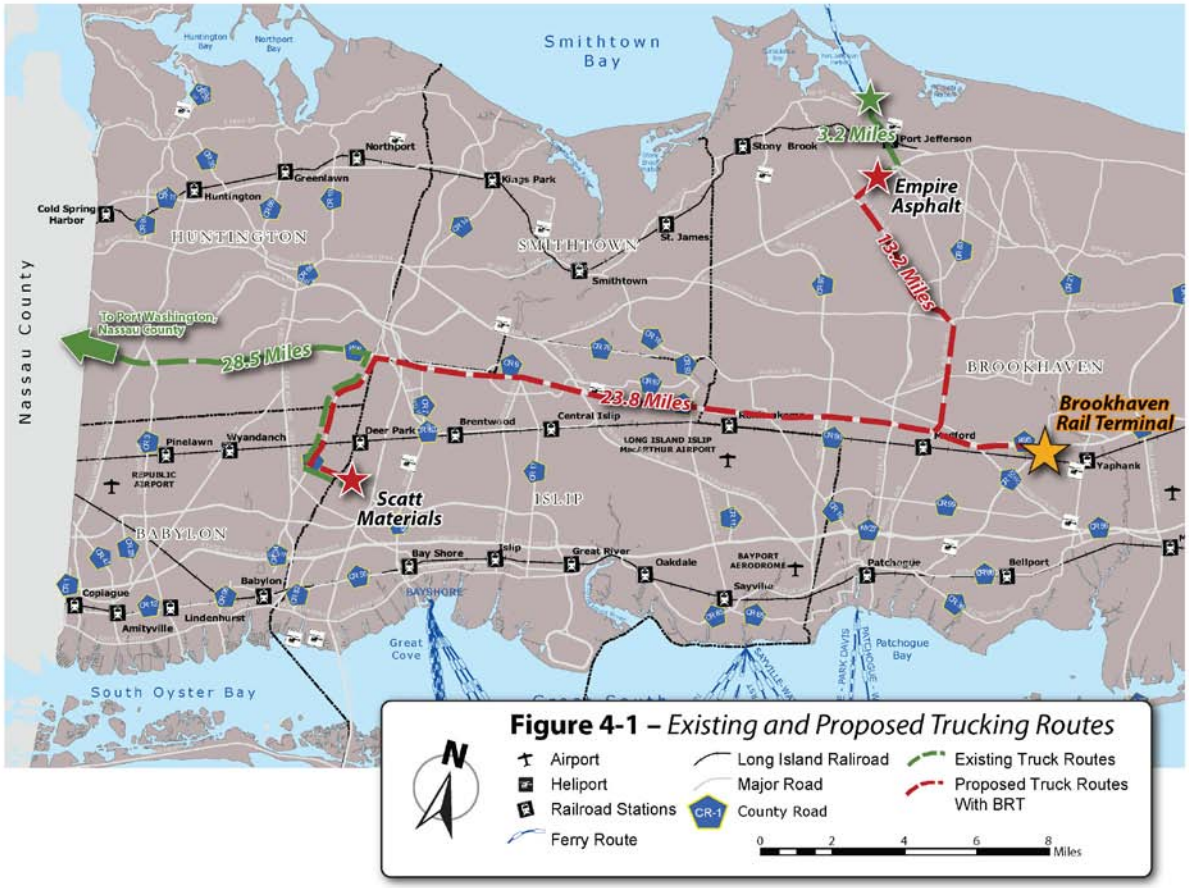
Rail Transportation Conclusion: Delivery of aggregate to the planned BRT facilities via U S Rail would occur separate from LIRR's passenger rail operations as part of the normal NY&A freight activities. LIRR passenger rail operations are limited to eight daily (Monday through Friday) and four daily weekend trains, providing a substantial schedule window for the safe movement of freight related to this project. The no-action alternative would have no impact on rail operations.

4.9.1 Impacts on Vehicular Traffic from the Planned BRT Facilities

As explained previously in this Draft EA, the focus of this Draft EA is the potential environmental impacts of the construction and operation of U S Rail's proposed rail line. Since the Board has no licensing role over the BRT facilities, SEA has (when possible, as it is in this section) separated out the potential effects of the rail construction from the planned facilities and has assessed the construction and operation of U S Rail's planned facilities on the BRT site to the extent that they would result in cumulative effects.

Currently, truck deliveries of aggregate to the Empire Asphalt and Scatt Materials facilities follow routes from the docks at Port Jefferson, NY and Port Washington, NY, respectively (Figure 4-1). Each plant takes delivery of between 15-18 truckloads of aggregate per day, resulting in 30 to 36 truck trips per day per plant to each of the two plants. This results in a combined 60 – 72 total truck trips per day.

Existing transport conditions have resulted in impacts to the residential areas in Port Jefferson and Port Washington, coastal towns with narrow streets and setbacks that experience congested travel conditions from both local and tourism demand. This project, if implemented, would help reduce the adverse effects of truck traffic on these residential communities. Those effects, however, would continue under the no-action alternative.



Before examining the potential impacts on vehicular traffic that would occur from the planned BRT facilities, SEA first considered the current conditions — AADT, speed limits, and roadway capacity — on the roads that would potentially be affected by U S Rail's planned facilities.

I-495 is a six-lane divided, controlled-access expressway approximately 70 miles in length from NYC to its eastern terminus in Riverhead, Suffolk County. Existing AADT volumes on I-495 average 78,331 vehicles per day between Interchange 65 (Horseblock Road) and Interchange 66 (Sills Road) and 65,130 vehicles per day between Interchange 66 and Interchange 67 (Yaphank Avenue) (NYSDOT 2008). The posted speed limit on I-495 is 55 miles per hour (mph). The I-495 service roads adjacent to the project site are owned and operated by the Suffolk County Department of Public Works (SCDPW) (SCDPW 2009).

CR 101 (Sills Road) is a two-lane, divided highway running northeast to southwest of the project site under the jurisdiction of the SCDPW. The posted speed limit is 55 mph. According

to SCDPW, the AADT volumes for Sills Road are 14,800 vehicles per day between CR 16 (Horseblock Road) and I-495 (Suffolk County Department of Public Works 2009).

The proposed new truck routes for the delivery of aggregate (Tables 4-5 and 4-6) to both Empire Asphalt and Scatt Materials would maximize the use of Interstate and arterial roadways thereby reducing impacts to residential areas. SEA estimates that if the full complement of 500,000 tons of aggregate is delivered annually to the planned BRT facilities that it would generate approximately 14,800 loaded outbound truck trips per year: approximately 10,250 trips in trailers with a legal load limit of 39-tons and 4,550 truck trips with legal load limit of 22-tons.[26] Based on the projected new truck traffic and an estimated 240 operating days per year, there would be approximately 61 total loaded truck trips per day – an average of less than seven loaded truck trips per hour per day over a 10-hour operating period from the plant. When including empty truck trips returning to the planned BRT facilities, total truck trips associated with the proposed action at full capacity would average 122 per day or 14 per operating hour (7 inbound and 7 outbound).

Currently, the truck transport of aggregate to Scatt Materials (Table 4-5) starts at the Port Washington dock and travels south along state roads for approximately 4 miles before accessing I-495 at Exit 37. On I-495, trucks bound for Scatt Materials travel east to Exit 52, a distance of approximately 19 miles, where they travel county and local roads for an additional 5 miles before accessing the plant. If this project is implemented, the new truck traffic would leave the planned BRT, entering I-495 at Exit 66, and travel west to Exit 52, a distance of approximately 17 miles. From there, trucks would follow the same route as currently traveled, using county and local roads for 5 miles to reach the Scatt Materials plant.

[26] 500,000 annual tons = 399,900 tons (derived as 10,250 trips using 39-ton truck) + 100,100 tons (derived as 4,550 trips using 22-ton truck). Total loaded trips equals 10,250 + 4,550 = 14,800 trips per year. Total loaded trips of 14,800 / 240 operating days per year = 61 loaded truck trips per day. Accounting for empty load trucks entering site and loaded truck leaving site, the total average truck generation associated with the BRT was estimated at 122 trucks per day.

Table 4-5: Scatt Materials plant: existing and proposed truck travel routes[27]

Existing Condition: Port Washington to Scatt Materials plant			
Roads	**Road Class**	**Current AADT**	**Estimated Heavy Vehicles #, (% of AADT)**
West Shore Road	Minor Arterial	14,380	980 (6.8%)
Northern Boulevard	Principal Arterial	37,416	2,500 (6.7%)
Willis Avenue	Minor Arterial	29,758	1,964 (6.6%)
I-495 East Exit 37 to Exit 52	Interstate	179,162 (segment average)	15,050 (8.4%) (segment average)
Commack Road	Minor Arterial	24,240	1,650 (6.8%)
Grand Boulevard	Minor Arterial	10,000	660 (6.6%)
Corbin Avenue	Collector	8,000	530 (6.6%)
South 4th Street	Local	<5,000	385 (7.7%)

Proposed Condition: Planned BRT to Scatt Materials plant				
Roads	**Road Class**	**Current AADT**	**Estimated Heavy Vehicles w/o BRT[28] #, (% of AADT)**	**Estimated Heavy Vehicles w/BRT #, (% of AADT)**
CR 101 (Sills Road)	Minor Arterial	15,060	1,020 (6.8%)	1,081 (7.1%)
I-495 N. Service Road	Local	5,124	400 (7.7%)	461 (8.9%)
I-495 West Exit 66 to Exit 52	Interstate	140,975 (segment average)	11,840 (8.4%) (segment average)	11,901 (8.4%) (segment average)
Commack Road	Minor Arterial	24,240	1,650 (6.8%)	1,650 (6.8%)
Grand Boulevard	Minor Arterial	10,000	660 (6.6%)	660 (6.6%)
Corbin Avenue	Collector	8,000	530 (6.6%)	530 (6.6%)
South 4th Street	Local	<5,000	385 (7.7%)	385 (7.7%)

[27] Volumes for interstate and arterial roads from NYSDOT County Highway Traffic Volume Report, Suffolk and Nassau County and volumes for other roads derived from Nassau County Traffic Flow Volume Maps.

[28] w/o BRT is the condition without construction and operation of the BRT facility, i.e. the No-Action Alternative.

As for transport of aggregate to Empire Asphalt (Table 4-6), trucks currently pick up aggregate at the Port Jefferson dock and then travel south along state and local roads for approximately 2 miles to Sheep Pasture Road, and then continue another 1 mile using local roads before reaching the plant. If the project is implemented, the new truck traffic would leave the planned BRT site, accessing I-495 at Exit 66, and travel west to Exit 64, a distance of approximately 3 miles. From there, the new truck traffic would follow state and county roads north for approximately 9 miles before reaching Sheep Pasture Road, where the trucks would follow the same route as under the no-action alternative, traveling 1 mile on local roads to reach the Empire Asphalt plant.

Table 4-6: Empire Asphalt plant: existing and proposed truck travel routes[29]

Existing Condition: Port Jefferson to Empire Asphalt plant			
Roads	**Road Class**	**Current AADT**	**Estimated Heavy Vehicles #, (% of AADT)**
Beach Street	Local	< 5,000	< 385 (7.7%)
Northern Boulevard	Minor Arterial	18,950	1,280 (6.8%)
Route 112 South	Principal Arterial (other street)	29,070	1,950 (6.7%)
Route 347 West	Principal Arterial (expressway)	51,560	2,730 (5.3%)
Old Town Road (north of SR 347)	Minor Arterial	16,070	1,090 (6.8%)
Sheep Pasture Road	Collector	12,310	812 (6.6%)
Hulse Road	Local	7,920	610 (7.7%)
Comsewogue Road	Local	1,730	144 (8.3%)

[29] Volumes for interstate and arterial roads from NYSDOT County Highway Traffic Volume Report, Suffolk County and volumes for other roads derived from March 2010 observed hourly traffic counts.

Proposed Condition: Planned BRT to Empire Asphalt plant				
Roads	**Road Class**	**Current AADT**	**Estimated Heavy Vehicles w/o BRT #, (% of AADT)**	**Estimated Heavy Vehicles w/BRT #, (% of AADT)**
CR 101 (Sills Road)	Minor Arterial	15,060	1,020 (6.8%)	1,081 (7.1%)
I-495 N. Service Road	Local	5,124	400 (7.7%)	461 (8.9%)
I-495 West Exit 66 to Exit 64	Interstate	79,466 (segment average)	6,675 (8.4%) (segment average)	6,736 (8.5%) (segment average)
CR 112 North (I-495 to Granny Road)	Principal Arterial (other street)	23,460 (segment average)	1,571 (6.7%) (segment average)	1,632 (6.9%) (segment average)
Old Town Road	Minor Arterial	14,990 (segment average)	1,020 (6.8%) (segment average)	1,081 (7.2%) (segment average)
Sheep Pasture Road	Collector	12,310	812 (6.6%)	812 (6.6%)
Hulse Road	Local	7,920	610 (7.7%)	610 (7.7%)
Comsewogue Road	Local	1,730	144 (8.3%)	144 (8.3%)

Proposed new truck routes on roads adjacent to each plant would be the same under both the no-action alternative and the proposed project. The major increases in truck traffic over existing conditions would occur on CR 101 (Sills Road), I-495 North Service Road at Exit 66, and I-495 between Exits 64 and 66. As shown in Table 4-7, all 122 trucks would use these roadways for travel to either Scatt Materials or Empire Asphalt and would therefore experience the majority of roadway impacts.

Table 4-7: Proposed Condition: Heavy truck AADT impacts for shared roadway segments[30]

Roads	Road Class	Estimated Heavy Vehicle w/o BRT #, (% of AADT)	Estimated Heavy Vehicle w/BRT #, (% of AADT)
CR 101 (Sills Road)	Minor Arterial	1,020 (6.8%)	1,142 (7.6%)
I-495 North Service Road	Local	400 (7.7%)	522 (10%)
I-495 West Exit 66 to Exit 64	Interstate	6,675 (8.4%)	6,797 (8.5%)

[30] These roadway segments would need to accommodate all 122 daily truck trips regardless of destination under the proposed condition, assuming all 500,000 tons of aggregate is delivered to Scatt Materials and Empire Asphalt.

New truck traffic entering and leaving the planned BRT site would use CR 101 (Sills Road) to access I-495. Currently, CR 101 (Sills Road) has an AADT volume of 15,060 vehicles per day (NYSDOT 2009), with a 54 percent to 46 percent directional split between northbound and southbound traffic, respectively. The planned BRT operations would generate a total of fourteen truck trips per hour. The average peak hourly traffic volume along (CR 101) Sills Road is 788 vehicles southbound and 1,019 vehicles northbound. Assuming that fourteen truck trips associated with the planned BRT are generated per hour, the maximum increase in travel demand during the peak travel hour would be 1.7 percent for southbound traffic and 1.4 percent for northbound traffic. From a daily perspective, truck traffic associated with the planned BRT would result in a 12 percent increase in the heavy vehicle component of the overall AADT volume along Sills Road. Overall, the resultant impact activities that would take place at the planned BRT site on CR 101 (Sills Road) would be a 0.8 percent increase in peak travel demand and the overall AADT volume. If U S Rail's project were to be implemented, Sills Group's additional new truck traffic would travel on CR 101 (Sills Road) for a distance of less than one-half of a mile and result in less than a 1 percent increase in the overall AADT volume. For these reasons, SEA believes that sufficient roadway capacity exists to accommodate the proposed new truck traffic.

Traffic volumes on the I-495 North Service Road would experience the greatest change in traffic composition due to the generally low existing traffic volumes. Overall the AADT volume would increase approximately 2.4 percent (from 5,124 vehicles per day to 5,246 vehicles per day), with an increase in the heavy truck traffic component of the AADT volume from 7.7 percent to 10.0 percent. However, SEA believes that adequate capacity exists to accommodate this increase in new truck traffic, as this roadway is a short, one-way travel access ramp onto I-495.

Increases in the AADT volume on I-495 would occur if the project is implemented. As noted in Table 4-7, all new truck traffic arriving or departing the planned BRT site would use the segment of I-495 between Exits 66 and 64 to access both Scatt Materials and Empire Asphalt. Therefore, this segment of roadway would need to accommodate all projected 122 truck trips per day. Currently, the average AADT volume along this roadway segment is 79,460 vehicles per day, including approximately 6,675 heavy trucks per day. Assuming all 122 new truck trips would use this segment of I-495, the increase in overall AADT volume would be approximately 0.2 percent and the change in overall heavy truck AADT volume would be approximately 1.7 percent.

The additional new truck traffic generated by Sills Group to Scatt Materials on I-495, between Exits 64 and 52, would increase the overall AADT volume approximately 0.04 percent along this segment (from 151,000 vehicles per day to 151.061 vehicles per day) with a corresponding increase in the heavy truck AADT volume of 0.5 percent (from 12,684 trucks per day to 12,745 trucks per day).

In short, the overall change in the AADT volume along each involved segment of I-495 would experience a less than 1 percent increase if the project is implemented. Similarly, the change in the heavy truck AADT volume would be less than 1 percent, except for the segment between Exits 66 and 64 which would, under the assumed condition, accommodate all 122 daily trips and experience a 1.7 percent increase in heavy trucks trips compared to existing conditions.

Because there would be a less than 1 percent increase in the total AADT volume, impacts of the project would not be significant. Sufficient roadway capacity exists to easily accommodate the proposed increase in truck traffic between Exits 66 and 64. Moreover, implementation of the planned activities would eliminate Sills Road-related trucks from the towns of Port Jefferson and Port Washington.

SEA notes that the analysis above assumes a worst-case scenario in that it assumes that all of the future truck trips are destined for either the Empire Asphalt and/or the Scatt Materials plants. However, Sills Group is proposing to use only 250,000 tons of the aggregate for its own purposes and to sell the remaining 250,000 tons of aggregate to yet unknown customers. If this plan comes to fruition, only 50 percent of the aggregate and therefore only 50 percent of the number of trucks would serve the Empire Asphalt and Scatt Materials plants. Under this assumption, only 61 total trips per day would travel to the Empire Asphalt and Scatt Materials plants combined in comparison with (1) existing conditions which average 60 to 72 trips to the plants combined and (2) the worst case scenario which would result in an average of 122 truck trips per day to plants combined.

Vehicular Traffic Conclusion: In general, the additional 122 new truck trips per day traveling to and from the planned BRT would increase the overall AADT volumes on major roadways by less than 1 percent. Roadways which would handle the majority of the new truck traffic (I-495, the I-495 service roads at Exit 66 and CR 101 (Sills Road)) have adequate capacity to safely accommodate the increased volume from the planned BRT and would not result in any adverse cumulative effects to the mobility of the area.

SEA believes that the change in travel patterns would benefit the region by eliminating Sills Group's reliance on heavy truck traffic in the port towns of Port Jefferson and Port Washington. Under the no-action alternative, heavy truck traffic would continue to adversely impact congestion and safety in Port Jefferson and Port Washington and would not provide the opportunity for regional shifts in freight movement from truck to rail which could help reduce transportation network congestion on Long Island.

4.9.3 Rail Safety Impacts

If the proposed rail line is approved and built, six weekly train movements (three inbound and three outbound trains) would use the existing LIRR mainline and switch to the proposed rail line for access to the planned BRT facilities. These BRT-associated freight rail movements would occur along the LIRR mainline in addition to the LIRR's existing eight daily (Monday through Friday) and four weekend (4 each Saturday and Sunday) passenger trains, as well as NY&A's existing ten weekly freight service trains.

Rail Safety Conclusion: The construction and operation of the proposed new rail line would not generate sufficient rail traffic to result in an adverse impact to existing freight and passenger rail operations. The 6 weekly trains projected to use the proposed rail line would not negatively impact existing or future LIRR or NY&A operations. All U S Rail and planned BRT-related activities, with the exception of the actual switching of trains from the LIRR to U S Rail, would occur along the proposed rail line and within the planned BRT site. Therefore, the increased rail activity would not pose a safety hazard for other LIRR rail activities. Neither the planned BRT facilities nor the no-action alternative would result in any adverse cumulative effect on rail safety operation.

4.9.4 Roadway Safety Impacts

As noted above, the planned routes that would be used by the additional truck traffic generated by the project would use the same roads adjacent to Scatt Materials and Empire Asphalt facilities under both the no-action alternative and the proposed action. The major increases in truck traffic over existing conditions would occur on CR 101 (Sills Road), I-495 service roads and I-495 between Exits 66 and 64.

Because the contribution of the additional new truck traffic relative to total AADT would be 1 percent or less on I-495, this would not result in any adverse impacts to traffic safety. Moreover, SEA also believes that because the additional new truck traffic on CR 101 (Sills

Road) and the I-495 North Service Road would only travel on both roads for a distance of less than one-half of a mile prior to entering/exiting I-495 and because the increase in total AADT would be less than 1 percent on CR 101 (Sills Road) and less than 3 percent on the I-495 service road, that there would be no adverse impact to traffic safety their either.

Roadway Safety Conclusion: If the project is implemented, new truck traffic would be removed from Port Jefferson and Port Washington, thereby reducing congestion and safety concerns in those communities. The increases in overall traffic experienced on I-495, the I-495 service roads and CR 101 (Sills Road) would not be significant and the planned activities at the rail facilities on the BRT site would not result in any cumulative impacts to traffic safety. Under the no-action alternative, safety improvements from reduced truck traffic in Port Jefferson and Port Washington would not be realized, and safety concerns would likely increase over time with increasing truck traffic volumes and demand for goods and services in the region.

4.10 Environmental Justice

There are no residential areas in proximity to the proposed rail line or planned BRT facilities and no displacements of residential or commercial buildings are proposed. The proposed action thus would not result in discriminatory or disproportionate impacts to minority or low-income populations, and the planned BRT facilities would not have any cumulative environmental justice effects.

Environmental Justice Conclusion: Construction and operation of the proposed rail line would not impact minority or low-income populations afforded protection under Executive Order 12898 on Environmental Justice, nor would the planned BRT facilities have any cumulative effect on environmental justice populations.

4.11 Regional Cumulative Effects

4.11.1 Methodology

The consideration of cumulative effects consists of an assessment of the total effect on a resource, ecosystem or community from past, present and future actions which have altered the quantity, quality or context of those resources within a broad geographic scope. As previously noted, under the CEQ regulations, cumulative effects are defined as *"…the impact on the environment which results from the incremental impact of the actions regardless of what agency (federal or non-federal) or person undertakes such other actions. Cumulative effects can result*

from individually minor but collectively significant actions taking place over a period of time" (40 C.F.R § 1508.7).

The intent of the cumulative effects analysis is to determine the magnitude and significance of cumulative effects, both beneficial and adverse, and to determine the contribution of the proposed action to those aggregate effects.

As discussed above, SEA considered the potential cumulative effects of the planned BRT facilities in preparing this Draft EA. In this section, SEA describes its analysis of broader, regional cumulative effects. SEA considered cumulative effects on the Village of Yaphank, an area of approximately 14 square miles generally surrounding the BRT site. Reasonably foreseeable future actions were limited to those for which a plan or study has been completed or funding has been committed, and anticipated environmental effects can be at least qualitatively characterized. Any attempt to assess unforeseeable residential, commercial and industrial development in the area in this document would be speculative.

4.11.2 Past Context

SEA chose to use the year 1994 as the historical baseline for this regional cumulative impact analysis, as this was the year in which the Empire Zone designation was completed in an attempt to attract more development to the area. Between 1998 and 2004, the overall number of private business establishments in Yaphank increased from 121 to 148, with an accompanying increase in employment from 2,103 to 2,745. By 2004, the area contained over 1.5 million square feet of building space devoted to industrial activities. In addition to these private establishments, Suffolk County government has numerous facilities in the area, including the Suffolk County Farm, a skilled nursing facility, county police headquarters, county prison, fire training facilities, and various county office facilities. In total, Suffolk County buildings in the analysis area contain more than 800,000 square feet of space. The Village of Yaphank has one major commercial retail center with six stores and approximately 10,000 square feet of commercial space.

4.11.3 Present Context

In addition to the planned BRT facilities, there are other residential, commercial and industrial developments that have been constructed since 2004, or are in the process of being constructed, located within the area of analysis (Table 4-7).

Table 4-7: Present actions (2004-2010) within the cumulative effects analysis area[31]

Action	Location	Air Quality	Transportation	Forest and wildlife habitat
Chelmsford Weald - 36 unit condominium complex completed in 2006	3.5 miles north of BRT	Contribution to greenhouse gas emissions	Increase in local traffic on Mill Road (north of I-495)	Conversion of approximately 2.75 acres of forest land
Caithness Power Plant -350 mw generation plant completed in 2009	1 mile south of BRT	Emissions would not result in NAAQS violations, contribution of 0.35 million metric tons of carbon equivalent	No discernable traffic effects	Conversion of approximately15 acres of forest land
Global Tissue – 175,000 sq ft manufacturing facility completed in 2006	0.5 mile west of BRT	Emissions would not result in NAAQS violations, moderate contribution to greenhouse gas emissions	Increase in traffic volumes on Sills Road and Horseblock Road	Conversion of approximately 23 acres of forest land

4.11.4 Future Context

As a proposed growth district, numerous major development proposals have been presented in the area surrounding the Village of Yaphank (Table 4-8).

[31] Suffolk County Planning Department, 2006. A Review of Selected Growth and Development Areas – Yaphank.

Table 4-8: Reasonably foreseeable future actions beyond 2010 within the cumulative effects analysis area[32]

Action	Location	Air Quality	Transportation	Forest and wildlife habitat
Avalon Bay Apartments – 450-unit housing complex	1.5 miles north of BRT	Contribution to greenhouse gas emissions	Traffic increase on Mill Road (north of I-495)	Conversion of approximately 163 acres of grassland and forest land
Country Pointe Senior Gardens – 190 unit condominium complex	1.5 miles southeast of BRT	Contribution to greenhouse gas emissions	Traffic increase on Yaphank Avenue (south of I-495)	Conversion of approximately 8.5 acres of forest land
Silver Glen - 500 unit housing complex,120 unit assisted living facility and 22,000 sq feet of office space	0.5 mile north of BRT	Contribution to greenhouse gas emissions	Traffic increase along Sills Road (north of I-495)	Conversion of approximately 150 acres of forest land
495 Station Plaza - 800,000 square feet of commercial retail	3.5 miles east of BRT	Substantial contribution to greenhouse gas emissions	Major traffic increase along William Floyd Parkway, Main Street/Moriches Middle Island Road and I-495	Conversion of approximately 120 acres of forest land
Brookhaven Walk - 850,000 square feet of commercial retail	3.5 miles east of BRT	Substantial contribution to greenhouse gas emissions	Major traffic increase along William Floyd Parkway and I-495	Conversion of approximately 100 acres of forest land
Suffolk County Land – 250 acres of proposed development, including residential, commercial, and office development and public institutional facilities including recreation and sports amenities	0.5 mile east of BRT	Substantial contribution to greenhouse gas emissions, Potential transit connection could provide some mitigation.	Major traffic increase on Yaphank Road and I-495. Potential new transit station on LIRR.	Conversion of approximately 250 acres of forest land

[32] Suffolk County Planning Department, 2006. A Review of Selected Growth and Development Areas – Yaphank.

SEA believes that the potential cumulative effects of the actions to the environmental resources analyzed in this Draft EA, with and without the proposed rail line and the planned BRT facilities, would generally follow existing patterns and trends of development. Residential, commercial, and industrial development would continue to occur within the region at the same rate, and with the same characteristics, under either the no-action alternative or the proposed action, and none of the projected actions would change SEA's conclusion that the action before the Board would have only minimal, non-significant environmental impacts.

4.11.5 Air quality cumulative effects

Based on the present and reasonably foreseeable future actions, greenhouse gas emissions in the area of analysis could increase somewhat. The no-action alternative would provide no potential benefits to cumulative air quality in the region. The proposed rail line and the planned BRT facilities, by leading to a reduction in regional truck VMT and related-emissions, would potentially provide a minor improvement to regional air quality by reducing regional truck traffic demand. As noted in Section 4.1.3 of this Draft EA, the project has the potential to reduce regional CO emissions by as much as 840 tons per year, based on the potential emission reductions associated with a shift in long-haul freight movements in the NYC metropolitan area from truck to rail.

However, much of that improvement may be tempered through additional residential and commercial activities and the continued operation of the Caithness Power Plant. Other improvements, such as improved vehicle efficiency, are likely to occur and provide additional benefits for regional air quality, but are not expected to mitigate a significant portion of area greenhouse gas emissions. Future actions, if constructed and operated, would reduce vegetation available to help sequester greenhouse gases and further limit the effectiveness of greenhouse gas reduction strategies for the analysis area.

4.11.6 Forest and wildlife habitat cumulative effects

Forest and wildlife habitat would continue to decrease and habitat would become more fragmented as more lands are converted from forest and grasslands to residential and commercial uses. Development is being promoted in the area near the Village of Yaphank rather than in other regional areas containing more sensitive or ecologically important habitats. While the proposed action would contribute to the loss of forest and marginal wildlife habitat, the contribution would be minor in comparison with the no-action alternative and with more significant conversions associated with major development proposals.

4.11.7 Transportation cumulative effects

Cumulative effects on transportation show the potential for a substantial increase in local and regional travel demand as future residential and commercial development occurs in the area. As discussed above, the planned BRT facilities would provide an opportunity to reduce a portion of future travel demand by reducing regional truck traffic, in contrast to the no-action alternative which could serve to create further adverse transportation effects. However, other measures in addition to the proposed action, such as potential increases in transit use and expansion of roadways, would be necessary to fully accommodate future transportation demand in the area.

Regional Cumulative Effects Conclusion: Overall, SEA concludes that construction and operation of the proposed rail line and the planned BRT facilities would provide a benefit to air quality and transportation. By reducing regional truck traffic, the project could reduce or delay the need for major roadway improvements as well as reduce the emissions and generation of greenhouse gases in the area. The proposed rail line and planned BRT facilities would result in a minor adverse effect to forest and wildlife habitat within the area of analysis. However, SEA believes that it is likely that if not used for the proposed action the project area could be used for another development purpose in the foreseeable future and would therefore generate a similar contribution.

5.0 SECTION OF ENVIRONMENTAL ANALYSIS RECOMMENDATIONS FOR MITIGATION & REQUEST FOR COMMENTS

Based on independent analysis of the proposed action and comments received prior to and during the preparation of this Draft EA, SEA recommends that, if the Board should approve U S Rail's proposal to construct and operate the 3.4-mile rail line located on the planned BRT site, that such approval be subject to the mitigation measures identified below.

5.1 SEA's Preliminary Recommended Mitigation

This Draft EA sets forth the preliminary environmental mitigation measures SEA is recommending that the Board impose on U S Rail, if the Board should decide to approve U S Rail's proposal to construct and operate 18,000 feet (3.4 miles) of new rail line.

One of the recommended mitigation measures would require U S Rail to comply with the terms of the "Stipulation of Settlement" U S Rail entered into with the Town of Brookhaven, Sills Group, and another rail carrier, Suffolk & Southern Rail Road, following litigation regarding construction activities allegedly occurring on the BRT site. In the "Stipulation of Settlement," filed with the Board on April 26, 2010, U S Rail committed to several mitigation measures, including constructing a secondary egress in case of emergencies, dust control measures, height limits for buildings and aggregate piles, landscaping, noise reduction, "dark sky friendly" lighting, and water control measures to protect the Nassau-Suffolk Sole Source Aquifer. Other mitigation recommended results from SEA's own independent environmental analysis.

SEA's preliminary environmental mitigation recommendations are as follows:

1. U S Rail shall comply with the terms and obligations applicable to it that are set forth in the "Stipulation of Settlement" filed with the Surface Transportation Board on April 26, 2010.

2. U S Rail shall employ best management practices before and during construction to minimize erosion, sedimentation, and instability of soils.

3. U S Rail shall develop and implement a spill prevention, control, and countermeasures plan (SPCC Plan) to ensure protection of the Nassau-Suffolk Sole Source Aquifer in the event of an accidental spill. The SPCC shall be developed in accordance with Article 12 of the Suffolk County Sanitary Code and EPA regulations at 40 C.F.R. § 112.7.

5.2 Conclusion

Based on available information provided from all sources to date, SEA preliminarily concludes that, as currently proposed, construction and operation of U S Rail's proposed line would not significantly affect the quality of the natural or human environment provided that the recommended mitigation measures set forth in this Draft EA are imposed and implemented. Therefore, preparation of an EIS is unnecessary in this proceeding.

5.3 Request for Comments

SEA invites comments on this Draft EA, including the scope and adequacy of the preliminary recommended mitigation measures. **Comments must be postmarked by August 10, 2010.** Here, SEA is seeking public review and comment during a 15-day comment period, which is shorter than the time SEA usually affords for review and comment of its Environmental Assessments. SEA believes that 15-days for review and comment is appropriate because in this case, (1) the Town of Brookhaven's Division of Environmental Protection has already conducted an environmental review of the BRT site under New York State's Environmental Quality Act (SEQRA), which resulted in a Negative Declaration finding indicating that under SEQRA the proposed project would not have a significant impact on the environment, (2) the site is in an industrial area and is already highly disturbed, and (3) the Town of Brookhaven has entered into a "Stipulation of Settlement" with U S Rail regarding this proposal. Once the comment period ends, SEA will consider and respond to comments timely received in response to the Draft EA. SEA's responses will be set forth in a Final EA. The Final EA will also contain SEA's final recommendations to the Board. The Final EA will be available to the public by accessing the Board's Web site at www.stb.dot.gov and clicking "E-Library," then "Decisions and Notices," and then conducting a search under the docket number of FD 35141. The Board will consider the entire environmental record, including the Draft and Final EAs and the comments received, in making its final decision in this proceeding.

Please send comments on this Draft EA **postmarked no later than August 10, 2010** to:

Troy Brady
Surface Transportation Board
Suite 1100
395 E Street, S.W.
Washington, DC 20423-0001
Attn: Docket No. FD 35141

Comments may be filed electronically on the Board's website, www.stb.dot.gov by clicking on the "E-Filing" link. Please refer to Docket No. 35141 in correspondence, including e-filing, addressed to the Board. If you have questions regarding this Draft EA, please contact Troy Brady by phone at (202) 245-0301, by fax at (202) 245-0454, or by email at troy.brady@stb.dot.gov.

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