



Consolidated Edison Company of New York, Inc.

Site Characterization Report

Former Unionport Works Site (Site No. V00553) 1066 Zerega Avenue Bronx, New York

March 2010

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Site Characterization Report

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Our Ref.:

B0043015.0005 #10

Date: March 2010

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1. Introduction

This Site Characterization Report (SC Report) summarizes work performed and results obtained for the SC field activities at the former Consolidated Edison Company of New York, Inc. (Con Edison) Unionport Works site (site) located at 1066 Zerega Avenue in the Unionport section of Bronx, New York. The site location is shown on Figure 1. The SC field activities were completed by ARCADIS of New York, Inc. (ARCADIS), pursuant to the requirements of an existing Voluntary Cleanup Agreement (VCA) between Con Edison and the New York State Department of Environmental Conservation (NYSDEC) (Site # V00553).

Historical manufactured gas plant (MGP) operations were conducted at the former Unionport Works site and the Zerega Avenue former gas holder site (located immediately across Zerega Avenue, west of the site) in the early 1900s by Con Edison and/or predecessor companies of Con Edison. The site was utilized as a bulk petroleum storage and distribution facility from approximately 1950 until 2007, and numerous historical petroleum releases at the site have been documented. The site was purchased in 2007 by a private owner and the future use of the property has not been determined. This SC Report focuses on the Unionport Works site and does not present information associated with the Zerega Avenue former gas holder site (with the exception of upgradient wells located along the west side of Zerega Avenue across from the site). The Zerega Avenue former gas holder site will be evaluated under a separate NYSDEC-approved SC Work Plan (ARCADIS, April 2007).

The SC Investigation activities were implemented in accordance with the following NYSDEC-approved work plans:

- Site Characterization Work Plan (ARCADIS, 2007)
- Field Sampling Plan (ARCADIS, 2007)
- Quality Assurance Project Plan (ARCADIS, 2007)
- Community Air Monitoring Plan (ARCADIS, 2007)
- Health and Safety Plan (ARCADIS, 2007)

Work activities performed as part of the SC Investigation consisted of the following:

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- Implementing soil investigation activities to characterize subsurface stratigraphy and evaluate the presence and extent of residual MGP- and non-MGP-related materials and constituents of concern in soil.
- Implementing groundwater investigation activities to characterize groundwater flow conditions in the vicinity of the site and evaluate the extent of potential MGP- and non-MGP-related groundwater impacts.

1.1 Purpose and Report Organization

The SC Report has been organized into the following sections:

	Section	Purpose
Section 1 –	Introduction	Provides background information relevant to the development of the SC Report and objectives of the SC Investigation.
Section 2 –	Summary of Previous Investigations	Identifies and summarizes the previous investigations performed at the site.
Section 3 –	Site Characterization Activities	Describes the field activities related to investigation of soil and groundwater.
Section 4 –	Site Characterization Findings	Describes the field observations and laboratory results of the SC Investigation.
Section 5 –	Conclusions and Recommendations	Presents the conclusions based on the SC Investigation results and recommendations for further investigation.
Section 6 –	References	Presents a list of the references cited in the FS Report.

1.2 Site Background

This section presents relevant background information related to the SC Investigation. The location and physical setting of the site is described below, followed by a summary of relevant historical information, surface topography and drainage, and geologic/hydrogeologic conditions in the vicinity of the site.

1.2.1 Location and Physical Setting

The Unionport Works site is located at 1066 Zerega Avenue in the Unionport section of Bronx, New York. The site is located on an approximately 1.8 acre lot that is bordered



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by Watson Avenue to the north, Zerega Avenue to the west, Blackrock Avenue to the south, and Westchester Creek to the East. Adjacent properties to the site are primarily utilized for industrial or commercial purposes. Properties to the north, across Watson Avenue, include commercial businesses, industrial businesses, and parking lots. Properties to the south and southwest, across Blackrock Avenue, include commercial and industrial businesses. The property to the east, across Westchester Creek, is a movie theater. The adjacent property to the west, across Zerega Avenue, is the Zerega Avenue former gas holder site. The southeast portion of the Zerega Avenue former gas holder site is currently occupied by a Con Edison electrical substation and the remainder of the site is occupied by a school bus parking/maintenance facility. The existing layout of the site with soil boring, test pit, and monitoring well locations is shown on Figure 2. Historical MGP structures and sampling locations are presented on Figure 3.

The site (Block 3837, Lot 1) is currently occupied by an inactive bulk petroleum storage terminal. Above-grade structures at the site include a large service garage and office building, three small buildings (office, boiler house, and control room), and fuel loading racks. A total of 11 underground fuel oil storage tanks with a combined storage capacity of approximately 2,200,000 gallons are located within a bermed area situated in the southern half of the property (shown on Figure 2). The walls of the bermed area extend approximately 10 feet above the grade of the surrounding property (so that the top of the buried tanks are above the grade of the surrounding area). With the exception of the areas occupied by the tank berm and structures, the majority of property is covered with asphalt pavement and/or concrete. A chain link fence currently surrounds the western portion of the site.

As shown on Figures 1 and 2, the site is located adjacent to the west bank of Westchester Creek, which flows south toward the East River. A concrete and wood bulkhead extends along the bank of Westchester Creek. The eastern-most area of the site (along Westchester Creek) is separated from the remaining portion of the site by an approximately 8-foot high retaining wall. The portion of the site west of the retaining wall is generally flat with an elevation of approximately 20 feet above mean sea level (AMSL) at the western property boundary. The area east of the retaining wall slopes toward Westchester Creek, with the lowest elevation of approximately 10 feet AMSL. Surface drainage flows east/southeast toward Westchester Creek. The majority of the site is paved and has been graded to slope toward storm sewer catch basins.



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1.2.2 Historic Site Operations

Information on historical MGP operations at the site was obtained from the document entitled Manufactured Gas Plant History: Unionport Works and Zerega Avenue Station prepared by GEI Consultants, Inc. (GEI, 2002). Information presented in the GEI document includes a review of available Sanborn Fire Insurance Maps, current and historical use of the site and adjacent properties, and potential environmental issues associated with these current and historical activities. Information on petroleum releases and previous investigation activities at the site was developed from a review of NYSDEC files obtained through a Freedom of Information Law (FOIL) request. This information was used to develop the approach for the investigation activities described in Section 3.

Historical MGP operations were conducted at the site between 1905 and 1927 and primarily included the production of manufactured gas using the Lowe carbureted water gas process. Fuel oil used to support the manufacture of gas at the site was stored in aboveground storage tanks located at the Zerega Avenue gas holder site.

Manufactured gas produced at the site was stored in aboveground gas holders located at the former gas holder site. In addition to the manufactured gas plant, operations at the site also included an electric generating plant and coal unloading/storage facility. Con Edison owned and operated the site between 1927 and 1945, but the site use during this period is unknown. Various petroleum companies owned and operated the site between 1945 and 2007, except for the years 1947 through 1950. The property was recently purchased by a private owner. The future use of the property has not been determined, however, the new owner has indicated that the buried fuel oil storage tanks will remain at the site for the foreseeable future. Therefore, no investigation of the bermed storage tank area was performed during the SC Investigation.

Annual reports submitted to the Public Service Commission (PSC) indicate that the Bronx Gas and Electric Company (BG&E) (a Con Edison predecessor company) began generating electricity at the site in 1893. The 1898 Sanborn map identifies BG&E as the site occupant, where it operated a small electric generating plant. Coal was shipped to the plant by water and transferred from a small wharf on Westchester Creek.

Prior to 1904, BG&E owned and operated a small MGP on Purdy Street located approximately 12 blocks north of the site (with an average production rate of approximately 96,000 cubic feet [cf] per day). Due to increased demand for gas service, BG&E constructed the MGP at the former Unionport Works site in 1904 (with an average production rate of approximately 750,000 cf per day).



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Based on a 1908 Sanborn fire insurance map, the MGP consisted of a generator house, engine room, purifiers, and a meter room. The electric plant was also located onsite. The historical MGP structures at the site are shown on Figure 3. A 1919 and 1908 Sanborn fire insurance map identified approximately the same structures, which indicates that the MGP remained largely unchanged between 1908 and 1919. BG&E's 1922 annual report to the PSC indicates the MGP had two water-gas sets. In addition, the MGP had the following auxiliary structures:

- 3 exhausters
- 1 tar extractor
- 3 purifiers
- 3 governors
- 1 oil heater
- 2 tar pumps
- 2 tar tanks (one having a capacity of 5,000 gallons)
- 1 coal elevator
- 1 tar separator

The 1922 report also indicated that both the MGP and electric plant used tar as a boiler fuel.

Fuel oil was stored in two 80,000-gallon aboveground storage tanks located at the Zerega Avenue former gas holder site to support the manufacture of gas onsite. Manufactured gas produced at the Unionport former MGP site was stored in aboveground gas holders located at the Zerega Avenue former holder site.

The 1927 annual report to the PSC indicates that the electric generating plant at the site was removed from service and the building and boiler plant for the generation facility was transferred to the gas department. The annual report to the Public Service Commission (PSC) in 1928 indicated that the gas works installed/constructed purifiers, a shaving scrubber, and an exhauster. In 1928, the MGP was connected to gas mains owned by Consolidated Gas Company (a Con Edison predecessor company) and, on March 1, 1928, the MGP was shutdown and placed on stand-by status. Portions of the MGP were removed in 1929, including:

- 2 water gas sets
- 150,000-gallon tank
- 2,600-gallon tank
- 4 B&W boilers
- 2 NY Safety steam engines
- 2 Troy Engine Company steam engines



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Two small holders (with capacities of 75,000 and 500,000 cubic feet) at the adjacent Zerega Avenue former gas holder site were also removed in 1929 when the MGP at the Unionport Gas Work site was dismantled. The 5,000,000-cubic foot holder remained in use at the Zerega Ave site until approximately 1966, when it was demolished along with a pumping station, governor house, and storehouse building.

As indicated above, Con Edison (or predecessor companies) owned the site between 1929 and 1945. In 1945, Con Edison sold the site. Various petroleum companies owned the site from 1945 through 2007, except for the years 1947 through 1950, when Forsee Realty Corporation owned/operated the site. The 1950 Sanborn map indicates the presence of two small buildings (constructed in 1950), loading racks, and "fuel oil tanks buried in ground" with a total capacity of approximately 2,200,000 gallons. Environmental records indicate that the bulk fuel oil tanks were installed at the site in 1950. A garage/office building was constructed on the north-central portion of the site in 1962.

Petroleum companies that owned and operated the site between 1945 and 2007 include Combined Petroleum Transfer Corporation; Cirillo Brothers Petroleum Company; Cibro Terminal, Inc.; Morningside Fuel Corporation; and Twin Pines Fuels Corporation. Based on records obtained through the NYSDEC FOIL request, multiple documented petroleum releases occurred at the site between 1975 and 2000, including:

- A 20,000-gallon release of No. 6 fuel oil occurred at the western end of the storage tank area in 1975. An estimated 13,000 gallons were recovered through emergency response activities.
- November 18, 1987 1,000 gallons of No. 2 fuel oil caused by tank failure.
- June 7, 1988 100 gallons of unknown petroleum.
- October 21, 1991 one pound of unknown petroleum.
- July 23, 1992 one pound of gasoline caused by tank test failure.
- August 10, 1992 one pound of No. 6 fuel oil caused by tank test failure.
- December 16, 1992 one liter of No. 6 fuel oil caused by tank failure.
- February 23, 1995 one gallon of gasoline due to possible tank failure.



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- March 21, 1995 one gallon of unknown petroleum.
- October 31, 1996 10 gallons of No. 2 fuel oil caused by tank test failure.
- January 2, 1998 15 gallons of No. 2 fuel oil caused by equipment failure, and all 15 gallons were recovered.
- June 7, 1999 2,100 gallons of No. 6 fuel oil caused by equipment failure.

1.2.3 Geologic and Hydrogeologic Setting

Bedrock was encountered during the SC Investigation at depths ranging from 25 to 48 feet below ground surface (bgs). Based on information presented in the Manufactured Gas Plant History: Unionport Works and Zerega Avenue Station (GEI, 2002), the bedrock is the Pelham Bay Member of the Hartland Formation. The Hartland Formation bedrock varies from Middle Ordovician to Middle Cambrian in age. The Pelham Bay Member generally consists of sillimanite-grade gneiss. The bedrock surface descends sharply toward the east under the Cross Bronx Expressway, located approximately 150 feet to the south of the site. The axis of a northeast-trending synform (the trough of an upward facing bedrock fold) is mapped in this area, extending through the easternmost portion of the site.

Glacial till comprises the lowermost overburden deposit in the Bronx. The till is derived from the glacial erosion of underlying metamorphic bedrock. The till tends to be sandy in areas and relatively thin; only incompletely blanketing the bedrock (USGS 1992; Caldwell 1989; USGS 1953). The overburden materials at the site are likely the result of a tidal marsh and stream that once existed at the site (USGS, 1992; Topographic Bureau, Bronx, 1905). The edge of the marsh historically ran along the east side of Zerega Avenue (US Coast & Geodectic Survey, 1845; Beers 1868; USGS 1992). .The former stream and marsh deposited fine-grained alluvium over glacial till. Fill, consisting of anthropogenic materials in a matrix of sand and gravel overlies the native deposits.

Groundwater beneath the site has been encountered at depths ranging from approximately 8 to 17 feet bgs. Shallow groundwater flow in the vicinity of the site is generally east/southeast toward Westchester Creek. Groundwater levels measured on site are higher than the level of Westchester Creek, indicating that groundwater discharges to the creek. Water levels in Westchester Creek are subject to tidal fluctuation. According to National Oceanic and Atmospheric Administration (NOAA), the mean range of tide at King Point, Queens (NOAA Station 8516945), located



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approximately 4.5 miles southwest of the site, is 7.1 feet. The magnitude of the tidal influence on groundwater levels at the site has not been evaluated.

1.3 Site Characterization Objectives

The overall objective of the SC Investigation was to assess the nature and extent of the site-related environmental impacts. The data provided in this report addresses the following objectives:

- Determine if MGP- and/or non-MGP-related compounds are present in soil and/or groundwater at the site.
- Identify the potential presence of MGP- and/or non-MGP-related by-product residuals (such as coal tar, non-aqueous phase liquid [NAPL], purifier wastes, petroleum, solvents, etc.) in soil and/or groundwater at the site.
- Evaluate, to the extent practicable, whether groundwater flow may be a pathway for offsite migration of identified chemical constituents (if present).
- Determine compliance with applicable NYSDEC standards, criteria, and guidance values (SCGs).
- Provide sufficient data to evaluate the necessity for further investigation and/or remedial action.

Although the SC Investigation was primarily conducted to characterize the presence and extent of MGP-related constituents and residual materials in environmental media, the SC sampling approach also provided data to characterize co-mingled petroleum-related compounds and differentiate between MGP- and petroleum-related issues. SC field activities that were implemented to achieve the above objectives are detailed in Section 3.



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2. Summary of Previous Investigations

2.1 Previous Investigations

In 1991, Cibro Terminals, Inc. (Cibro) entered into a consent agreement with the NYSDEC (Order on Consent No. D2-1234-91-3). Subsequently, Oil Masters, LLC acquired the facility from Cibro in 1996 and a new consent order for the site (Order on Consent No. D2-0001-96-12) was issued by the NYSDEC. Based on information obtained through the NYSDEC FOIL request, eight separate phases of investigation activities were performed between 1992 and 2001 to characterize soil and groundwater conditions at the site. Sampling locations for the previous investigation activities at the site are shown on Figure 3. The investigations included:

- Groundwater Remedial Investigation conducted by Groundwater Technology, Inc. (GTI) between the May 1992 (approval of the work plan by the NYSDEC) and April 23, 1993 (the issuance of the summary report).
- Remedial Investigation (RI) conducted by GTI in 1993.
- Phase I and Limited Phase II Assessments conducted by CA Rich Consultants, Inc. in 1995.
- Annual Groundwater Monitoring conducted by Atlantic Petroleum Services, Inc. (APSI) in 1997.
- GeoProbe Soil Sampling Results conducted by Science Applications International Corporation 1997.
- Well Redevelopment & Tidal Study conducted by P.W. Grosser in 1998 and 1999.
- Subsurface Investigation conducted by P.W. Grosser in 1999.
- Groundwater Monitoring and Product Removal Investigation conducted by P.W. Grosser in 2001.

A brief description of the field work performed and the results obtained for the previous investigations are presented below.



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2.2 Groundwater Remedial Investigation

A Groundwater Remedial Investigation was conducted by GTI in 1995. The investigation was performed to evaluate groundwater conditions at the site and included:

- Installing five monitoring wells (GT-4 through GT-8, which have subsequently been renamed MW-4 through MW-8).
- Performing fluid level gauging of the new and existing wells.
- Collecting a sample of NAPL from MW-4 for source characterization.

The fluid level gauging results indicated a tidal influence of up to 4 feet onsite and the periodic presence of NAPL in each well, except MW-6. The analytical result indicated the NAPL composition to be a mixture of degraded diesel fuel and lubricating oil.

2.3 Remedial Investigation

A Remedial Investigation was conducted by GTI in 1993. The RI was performed to evaluate groundwater and NAPL conditions at the site and included:

- Performing fluid level gauging between September and November 1993.
- Performing NAPL removal activities between September and November 1993.
- Performing reconnaissance of the site, specifically Westchester Creek which borders the eastern border of the site.

Fluid level gauging activities periodically identified NAPL in monitoring wells MW-4, MW-7, and MW-8. The report indicated that the nearest potential receptor is Westchester Creek, which is a tidally influenced salt water body that is not used as a source of potable water. Fluid levels indicated that onsite groundwater flows toward the creek, except during high tide when a component of groundwater flows toward the west from the creek.

2.4 Phase I and Limited Phase II Assessment

Phase I and Limited Phase II Assessments were conducted for Cibro by CA Rich Consultants, Inc. (CA Rich) in 1995. The Phase I Assessment was performed to identify features and environmental conditions at the site. The limited Phase II



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Assessment was implemented to evaluate potential conditions identified at the site and included:

- Completing 11 soil borings and analysis of six samples for the presence of volatile organic compounds (VOCs), lead and methyl tertiary-butyl ether (MTBE). Three soil borings were finished as monitoring wells.
- Completing six soil borings and submitting four samples for analysis of VOCs, lead and MTBE. Two samples (one groundwater and one soil) were submitted for analysis of total petroleum hydrocarbon diesel range organics (TPH-DRO) and gasoline range organics (TPH-GRO).

The soil sample results indicated the presence of gasoline-related, and to a lesser extent, fuel-oil related organic compounds. Several of the reported results exceeded NYSDEC-recommended soil cleanup objectives.

In general, soils collected from directly adjacent to and downgradient of the buried tanks exhibited higher levels of impacts than the samples collected from borings on the north and south property boundaries. The detected gasoline-related compounds (mainly the presence of lead and absence of MTBE) indicates an older (i.e., prior to 1980) source of gasoline contamination.

2.5 Annual Groundwater Monitoring

Annual groundwater monitoring activities were conducted by APSI in 1997. The monitoring activities were performed to evaluate groundwater conditions at the site and included:

- Performing fluid level gauging at monitoring wells MW-1, MW-2, MW-3, MW-6, and MW-8.
- Collecting groundwater samples from monitoring wells MW-1, MW-2, MW-3, MW-6, and MW-8 and submitting them for laboratory analysis.

Gauging/sampling activities at MW-4 were not performed due to the presence of a passive oil mop NAPL recovery system. NAPL was not identified in any wells during the monitoring activities. Results of the analytical sampling indicated detections of SVOCs in MW-3 (diethylphthalate [13.5 ppb]) and MW-8 (naphthalene [197.4 ppb], 2-methylnaphthalene [155.9 ppb], acenaphthylene [71.3 ppb], and phenanthrene [93.8 ppb]).



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2.6 GeoProbe Soil Sampling Investigation

GeoProbe soil sampling was conducted by Science Applications International Corporation (SAIC) in accordance with a NYSDEC Order on Consent (No. D2-0001-96-12), and included the completion of eight soil borings and analysis of three samples for the presence of TPH-DRO and a qualitative gas chromatograph (GC) fingerprint analysis using USEPA Method 8015M.

Hydrocarbon impacts were present in each of the borings. NAPL (referred to as product or free phase) was observed at or below the water table, except at one location where NAPL was observed throughout the soil column. The NAPL was black in color, relatively viscous, and had odors resembling fuel oil. Screening of the soils was performed using a photoionization detector (PID) to identify the potential presence of VOCs. PID screening results ranged from 25.7 to 375 ppm.

The soil samples indicated concentrations of TPH-DRO in each of the 10 samples submitted for laboratory analysis. TPH-DRO concentrations in soil samples ranged from 64 to 78,000 ppm, with the most elevated concentrations of TPH-DRO corresponding to NAPL-saturated soil samples collected at the soil/groundwater interface.

A qualitative determination of the type of hydrocarbon present was performed using the GC fingerprints of the samples. The results of this analysis indicated that the impacts closely resemble lubricating oil, diesel fuel, or a mixture of the two products. The exact source of the hydrocarbons detected in the samples was not determined.

2.7 Well Redevelopment & Tidal Study

The Well Redevelopment & Tidal Study was performed by P.W. Grosser Consulting (PW Grosser). Field activities were implemented on December 21, 1998 and February 21, 1999, and an additional site visit was performed to collect additional depth to water and depth to product measurements. The study consisted of the following:

- Redeveloping five existing monitoring wells.
- Performing a tidal study.
- Measuring depth to water, depth to product, and depth to bottom measurements.

The study also identified NAPL at the bottom of three of the five monitoring wells. The tidal study indicated that a tidal influence occurs throughout most of the site, with a net groundwater flow to the east towards Westchester Creek.



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2.8 Subsurface Investigation

The Subsurface Investigation was performed by PW Grosser. The investigation was performed to estimate the volume of NAPL in soil and groundwater beneath the site and to determine soil characteristics. Field activities were implemented on November 12 and 13, 1999, and included the following:

- Completing 15 soil borings and collecting and submitting five soil samples for petroleum fingerprint analysis with product matching.
- Measuring depth to water and NAPL at five existing monitoring wells.

NAPL and/or staining were observed at 11 of the 15 soil borings, and NAPL stained soils were observed at the water table. The investigation indicated that NAPL remains within the site boundaries and is primarily concentrated on the west side of the tank area, where releases occurred. The volume of NAPL is estimated between 9,150 and 13,400 gallons. Three of the five soil samples submitted for fingerprint analysis identified signatures consistent with weathered fuel oil. Evaluation of two samples (from one location) identified signatures consistent with weathered coal tar, which was attributed to the fill deposits underlying the site.

2.9 Groundwater Monitoring and Product Removal Investigation

The Groundwater Monitoring and Product Removal Investigation were conducted by PW Grosser. Field activities were implemented on May 8, 2001 and September 13, 2001, and included the following:

- Abandoning and replacing two damaged monitoring wells.
- Replacing oil recovery equipment.
- Recovering NAPL from monitoring wells, to the extent possible.

On four separate occasions, PW Grosser pumped water and NAPL from the monitoring wells. The thickness of NAPL decreased after each event, and combined with the replacement of oil recovery equipment, indicated that the product removal activities were effective in reducing the overall thickness of accumulated NAPL in monitoring wells.



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3. Site Characterization Field Activities

This section summarizes SC field activities that were implemented by ARCADIS between January 2008 and April 2009. The SC field activities consisted of the following:

- Mobilizing to the site and conducing utility mark-out efforts to verify existing conditions and identify proposed sample locations.
- Implementing soil investigation activities which consisted of completing soil borings and test pits to characterize subsurface conditions and facilitate the collection of subsurface soil samples for laboratory analysis.
- Implementing groundwater investigation activities which included installing
 groundwater monitoring wells, collecting groundwater samples for laboratory
 analysis, and completing fluid level monitoring to characterize groundwater flow
 conditions and evaluate the presence and characteristics of NAPL.
- Completing a site survey to document the property boundaries and locate soil borings, test pits, and groundwater monitoring wells associated with the SC activities.

An analytical sample summary, which identifies soil and groundwater samples collected as part of the SC Investigation activities, is included as Table 1. A summary of field observations at SC sampling locations is included as Table 2. A summary of construction details for groundwater monitoring wells installed as part of the SC is included in Table 3. Fluid level measurements for Water and NAPL at groundwater monitoring well locations are presented in Table 4. Comprehensive soil and groundwater analytical results for samples collected as part of the SC field activities are presented in Tables 5 through 10.

Several subcontractors provided various services during implementation of the SC field activities, as presented in the following table:

Subcontractor	Office Location	Services Provided
Aquifer Drilling and Testing	New Hyde Park, NY	Utility clearance/HSA drilling
Naeva Geophysics	Congers, NY	Utility clearance
Boart Longyear Corp.	North Reading, MA	Rotosonic drilling
TestAmerica Laboratories	Shelton, CT	Analytical services

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Subcontractor	Office Location	Services Provided
Alpha Analytical – Woods Hole	Mansfield, MA	Analytical services
Munoz Engineering, P.C.	New York, NY	Surveying
Clean Earth of New Jersey	South Kearny, NJ	Waste transport and disposal

A detailed description of the above-listed SC field activities is presented below.

3.1 Mobilization and Utility Mark-out

Utilities were cleared according to the Con Edison Utility Clearance Process for Intrusive Activities (Revision 1, dated October 8, 2003). Prior to mobilization, hard copies of available utility plates, drawings, and maps were reviewed to determine the approximate size and location of aboveground and underground utilities in the vicinity of the site. Field personnel verified existing site conditions and marked/identified the proposed sampling locations. A New York City Rules and Regulations (NYCRR) Code 753 utility mark-out was completed to identify underground utilities in areas where ground-intrusive activities were scheduled to take place. Following the completion of the utility mark-out, a magnetic scope (M-scope) survey was completed by a private utility locating contractor who marked the location of underground utilities in areas of the site where ground intrusive activities were scheduled to occur (including storm sewer lines, water lines, gas lines, oil lines, electric lines, communication lines, subterranean tunnels, etc.). Following utility location markout, equipment and field personnel necessary to implement the remaining SC field investigation activities were mobilized to the site.

3.2 Soil Investigation

The SC soil investigation was implemented to determine the presence and extent of MGP- and petroleum-related impacts in vadoze zone and saturated soil at the site. The SC soil investigation consisted of the following:

- Completing 32 soil borings to further characterize subsurface conditions and facilitate collection of subsurface soil samples for laboratory analysis.
- Excavating 15 test pits to investigate former gas holders and other historical MGPrelated structures.



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 Collecting and submitting 130 soil samples for laboratory analysis to further characterize the site conditions.

The SC soil investigation activities are described below.

3.2.1 Soil Borings

Soil borings were completed to characterize subsurface conditions at the site and, in some cases, facilitate groundwater monitoring well installation. Soil boring locations were selected to focus on the areas near former subsurface structures and to obtain a site-wide characterization of subsurface geology. A total of 32 soil/monitoring well borings, including two monitoring well borings located upgradient of the site (on the west side of Zerega Avenue), were completed at the locations shown on Figure 3 using a combination of hollow-stem auger (HSA) and/or rotosonic drilling techniques, as follows:

- 10 borings were completed using HSA drilling methods.
- 19 borings were completed using rotosonic methods.
- 3 borings were completed using a combination of HSA and rotosonic methods.

The borings ranged in depth from 12 to 50 feet bgs. The location of each boring is shown on Figure 3. Each soil boring was first cleared via non-mechanical means (i.e., hand auger, post-hole digger, and/or vacuum truck) to a depth of 5 feet bgs. Subsequently, the soil borings were completed via HSA and/or rotosonic methods. Soil borings were initially completed using HSA drilling methods. Based on subsurface conditions encountered at the site (subsurface debris and obstructions which slowed the progress of field efforts), HSA drilling was replaced with rotosonic drilling methods approximately midway through the SC field activities.

Borings completed using HSA drilling methods were advanced using a hollow-stem auger drill rig with 4.25-inch inside diameter augers. Soil samples were recovered continuously by advancing a 2-foot long by 2-inch outer diameter split barrel sampler ahead of the augers.

In comparison to HSA drilling, the rotosonic method uses vibration/resonance to drive the drill tooling into the subsurface. Rotosonic drilling uses two drive motors inside the drill head that rotate weighted cams at high speeds which create a vibration that is translated along the drill string to a diamond- or carbide steel-tipped cutting bit. The speed at which the motors turn can be adjusted which results in a change in the resonance. Along with varying the frequency of the vibration the drill tooling can be



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rotated to enhance the cutting action of the drill bit. This usually results in fast and efficient borehole completion. During drilling, a core barrel is advanced to obtain a soil sample. An outer casing is then advanced over the core barrel to stabilize the boring. The core barrel is extracted from the ground and the sample is extruded from the core barrel into a plastic sleeve for visual characterization and logging. Core barrel lengths can vary from 5 to 20 feet in length and usually correspond to the size of the rig used and the desired total depth of the borehole.

At each boring location (regardless of the drilling method used to complete the boring), soil samples were recovered continuously from grade to the total depth of boring completion. Recovered soil samples were visually characterized and logged by an onsite geologist. Soil samples from each 2-foot depth interval were screened for VOCs using a PID and selected samples were submitted for laboratory analyses, as described below in Section 3.2.3. Following completion, borings were tremie-grouted to grade (except for borings completed to facilitate monitoring well installation). Soil borings that were completed in a paved area were repaired with an asphalt patch or non-shrink grout, as appropriate.

Soil boring logs which document subsurface conditions encountered at each boring location are provided in Appendix A. Table 2 summarizes PID screening results and intervals where staining, sheens, and/or odors were encountered for soil samples recovered from the borings.

3.2.2 Test Pits

A total of 12 test pits (TP-102 through TP-108 and TP-110 through TP-114) were excavated at the locations shown on Figure 3 to confirm the location of former MGP structures, characterize the nature of materials contained within and near the structures, and document subsurface conditions. Test pits were not excavated at TP-101, TP-109 or TP-115 included in the SC Work Plan (ARCADIS, April 2007) due to the presence of utilities or access limitations. The test pits were excavated using a backhoe to depths ranging from 2 feet 3 inches to 13 feet 6 inches bgs. Following completion of each test pit excavation, the test pit was backfilled using the stockpiled soil in the reverse order that the test pit was excavated (i.e., deepest soil was replaced in the bottom of the excavation). An ARCADIS geologist observed the excavations and prepared test pit logs summarizing the pit dimensions and materials encountered. Test pit logs which summarize the subsurface conditions encountered at each test pit location are included in Appendix B and photo documentation is included in Appendix C.



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3.2.3 Laboratory Analysis of Soil Samples

A total of 130 soil samples (including 8 field duplicates) were collected from 26 soil/monitoring well borings and 1 test pit completed as part of the SC Investigation. Soil samples were not collected from three shallow monitoring well borings (MW-102B, MW-111B, and MW-113B) completed at monitoring well cluster locations (soil samples were only collected for analysis from the boring for the deep monitoring well at each well cluster pair). In addition, soil samples were not collected for analysis from soil boring SB-122 where auger refusal was encountered at approximately 13.5 feet bgs. SB-122 was assumed to be impacted due to observed NAPL impacts from 7 feet bgs to the depth of refusal. Analytical results for soil samples collected at the upgradient monitoring wells are not included in this report (these results will be included in the SC Report for the Zerega Avenue former gas holder site). Soil samples were submitted to TestAmerica Laboratories, Inc. of Shelton, Connecticut (TestAmerica) for laboratory analysis for Target Compound List (TCL) VOCs, TCL semi-volatile organic compounds (SVOCs), and Target Analyte List (TAL) inorganics (including total cyanide) using the analytical methods specified in the project-specific QAPP.

Up to seven soil samples were selected for laboratory analysis from each soil/monitoring well boring using the following criteria:

- The sampling interval within the vadose zone where the strongest evidence of suspected impacts was identified based on PID readings, visual observation and/or odors.
- At the soil/groundwater table interface.
- The sampling interval within the saturated zone where the strongest evidence of suspected impacts was identified based on PID readings, visual observation and/or odors.
- The sampling interval above the top of the first low permeability unit encountered (if any) in the soil boring.
- Sampling intervals where changes in subsurface stratigraphy or differences in visible MGP- or non-MGP-related residual materials were noted.



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 At boring locations where suspected impacts were identified, from a sampling interval of apparently clean material below impacted soil (to provide data for vertical delineation).

If no suspected impacts were identified at a boring location based on PID readings, visual observation, and/or odors, then a minimum of two soil samples were selected for laboratory analysis, with the exception of one location (SB-108), from the following intervals: (1) the soil/groundwater table interface; and (2) the uppermost low permeability unit encountered at the boring. Specific soil sampling methods are described in the FSP (Appendix A of the SC Work Plan).

A total of 34 soil samples were also submitted to Alpha Analytical, Inc. (Alpha) of Mansfield, Massachusetts for forensic volatile hydrocarbon analysis of paraffin, isoparaffin, aromatic, naphthene, or olefin (PIANO) constituents and total petroleum hydrocarbon (TPH) diesel range organic (DRO) analysis. In addition, 17 soil samples were also submitted to Alpha for laboratory analysis for forensic polynuclear aromatic hydrocarbon (PAH) analysis (an extended list of PAHs including parent and alkyl polycyclic aromatic compounds) using a modification to USEPA SW-846 Method 8270C. Soil samples for forensic analysis were selected based visual observations during the SC field activities to provide information to differentiate the types and sources of hydrocarbons present in site soils (i.e., petroleum or coal tar).

3.3 Groundwater Investigation

The groundwater investigation was implemented to evaluate hydraulic properties of the overburden, groundwater flow direction and gradient, the potential presence of NAPL, and the potential presence and concentration of MGP- and non-MGP-related constituents in groundwater. The SC groundwater investigation consisted of the following:

- Installing 15 groundwater monitoring wells.
- Gauging groundwater monitoring well fluid levels (i.e., water and NAPL [if any]).
- Conducting specific capacity tests.
- Sampling groundwater.

Descriptions of the SC groundwater investigation activities are presented below.



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3.3.1 Groundwater Monitoring Well Installation

A total of 15 groundwater monitoring wells were installed during the SC investigation at the locations identified below and on Figure 3.

- 9 monitoring wells were completed onsite between January and February 2008.
- 3 monitoring wells were completed north of the site in Watson Avenue between February and March 2008.
- 1 monitoring well was completed south of the site in Blackrock Avenue in January 2008.
- 2 upgradient monitoring wells were completed along the west side of Zerega Avenue in April 2009.

Monitoring well completion logs are included as Appendix D, and construction details are summarized in Table 3. The groundwater monitoring wells installed during the SC Investigation was constructed as described below:

- At each monitoring well location, a soil boring was completed using HSA or rotosonic drill drilling methods.
- Monitoring wells were constructed using 2-inch diameter Schedule 40 polyvinyl chloride (PVC) casing with 20-slot (0.020-inch slot size) PVC well screens.
- A total of 13 shallow monitoring wells (identified with a "B" or no designation) were installed in fill to a depth of approximately 5 feet below the groundwater table. The shallow monitoring wells were screened over 10-foot intervals, from approximately 5 feet above the water table to the depth of completion.
- Three deep monitoring wells (identified with an "A") were installed in glacial till to a
 depth of between 37 and 40 feet bgs. One deep monitoring well was screened
 over a 10-foot interval (MW-101A) and remaining two deep monitoring wells (MW110A and MW-113A) were screened over 5-foot intervals of the glacial till unit.
- Appropriately sized silica sand packs (between 8- and 14-feet) were installed in the annular space around the screened interval and generally extended to 2 feet above the screen top.



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- The well annulus was filled with 1 to 3 feet of bentonite chips to provide a seal above the sand pack. The bentonite chips were hydrated, and cement/bentonite grout was placed on top of the seal, using a tremie pipe, to a depth of approximately 1 to 2 feet bgs.
- Each well was protected at the surface with an 8-inch flush-mount curb box. A
 measuring point was marked on top of the PVC riser and fitted with a 2-inch
 locking J-plug cap.

Following installation, each new monitoring well was evaluated for the presence of NAPL and the well was developed using the procedures outlined in the FSP.

3.3.2 Hydraulic Conductivity Testing

Specific capacity tests were performed for six monitoring wells (MW-101A, MW-110A, MW-110B, MW-111, MW-113A, and MW-113B) in March 2008 and the two upgradient monitoring wells (MW-4 and MW-5) in April 2009 following groundwater sampling. The testing was performed to determine the hydraulic conductivity of the formation surrounding the screened interval at each monitoring well. The specific capacity tests were conducted using the procedures identified in the FSP. Monitoring well locations where NAPL was identified were not tested for specific capacity.

3.3.3 Groundwater Flow Characterization

ARCADIS completed site-wide fluid level gauging events on March 7, 2008 and April 27, 2009 to evaluate groundwater levels and the presence of NAPL at each well location. The upgradient wells west of Zerega Avenue (MW-4 and MW-5) were not included in the March 2008 gauging event (these wells were not installed until 2009). During each monitoring event, groundwater and NAPL levels were measured at each new and existing well to the nearest one-hundredth of a foot from a surveyed reference point at the top of the inner casing using procedures presented in the FSP. Fluid-level measurements obtained at each monitoring well are summarized in Table 4. The measurements were converted to elevations above mean sea level (AMSL). NAPL was identified at 9 wells during the 2008 gauging event. NAPL was identified at seven wells during the 2009 gauging event.



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3.3.4 Groundwater Quality Characterization

ARCADIS collected groundwater samples from 10 monitoring wells (including 1 existing and 9 new wells) during March 2008 and April 2009. Each groundwater sample was submitted to TestAmerica for laboratory analysis for TCL VOCs, TCL SVOCs, TAL inorganics, and cyanide. Groundwater samples collected from the two upgradient wells were also submitted for analysis of polychlorinated biphenyls (PCBs) due to the presence of the Con Edison electrical substation that occupies the southeast portion of the Zerega Avenue former gas holder site. PCB analytical results for these wells are not included in the SC Report for the former Unionport Works site (these results will be included in the SC Report for the former Zerega Avenue former gas holder site). Sample analyses were performed in accordance with USEPA SW-846 Methods, as referenced in the NYSDEC 2005 analytical services protocol (ASP). Quality assurance/quality control (QA/QC) samples were collected as required by the site-specific Quality Assurance Project Plan (QAPP) (ARCADIS, 2007).

ARCADIS used a peristaltic pump and dedicated disposable tubing (i.e., low-flow techniques) to purge monitoring wells prior to sampling. Field parameters, including pH, oxidation/reduction potential, turbidity, temperature, conductivity, and dissolved oxygen, were measured approximately every five minutes during purging. The results of the field parameter measurements collected prior to sampling are presented on the groundwater sampling logs included in Appendix E.

Groundwater samples were collected from the wells after field parameters stabilized via peristaltic pumping, with the exception of VOCs. Samples submitted for laboratory analysis for VOCs were obtained by collecting water in the dedicated polyethylene tubing prior to entering the pump.

3.4 Site Survey

Following the completion of the soil and groundwater investigations, Munoz Engineering, P.C. (Munoz) surveyed the property limits (including the limits of the Block 3837, Lot 1 parcel) and the location of major buildings/structures at the site. In addition, Munoz completed a topographic survey and surveyed the location of soil borings, test pits, groundwater monitoring wells, and subsurface structures encountered during the SC Investigation activities. The groundwater monitoring well survey included the location, ground-surface elevation, and measuring-point elevation (defined as the top of the inner casing). The survey is tied to the New York State Plane Coordinate System and the North America Vertical Datum of 1988.



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3.5 Equipment Decontamination

Equipment was decontaminated in accordance with the procedures presented in the FSP. In general, non-disposable equipment, including drilling tools and equipment were decontaminated prior to first use onsite, between each investigation point, and prior to mobilization. A total of six equipment rinse blanks were submitted for analysis of TCL VOCs, TCL SVOCs, and TAL inorganics to evaluate the integrity of the decontamination procedures, as required in the QAPP.

3.6 Management of IDW

Investigation-derived waste (IDW) generated during the SCI included:

- Soil cuttings from subsurface drilling
- · Development, decontamination, drilling and purge water
- Personal protective equipment
- Spent disposable sampling equipment

IDW generated during the SC Investigation activities was containerized in new DOT-approved steel 55-gallon closed-top drums and staged in an onsite area prior to offsite disposal. Each drum was secured and labeled with the date, contents, contact information, and other relevant information. Five liquid waste characterization samples (Liquid Waste 01 through Liquid Waste 02 and Waste 03 through Waste 05) and three solid waste characterization samples (Solid Waste 01, Solid Waste 02, and Waste 06) were collected and submitted for laboratory analysis for Toxicity Characteristic Leaching Procedure (TCLP) VOCs, TCLP SVOCs, TCLP metals (including cyanide), ignitability, combustibility, and reactivity (I/C/R), with the exception of Waste 03 and Waste 04, which were only analyzed for I/C/R. Based on the results obtained for the analysis of the waste characterization samples, both solid and liquid IDW materials were transported by a Con Edison approved waste hauler to Clean Earth in South Kearney, New Jersey for offsite disposal as non-hazardous waste.



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4. Site Characterization Investigation Findings

This section presents the findings of the SC field investigation activities described in Section 3. A discussion of regional geologic conditions in the vicinity of the site is presented below, followed by a discussion of the site geology, groundwater flow and hydrogeology, NAPL distribution, and soil/groundwater sampling results.

4.1 Site Geology

The SC Investigation identified four principal stratigraphic units beneath the site. These units, listed below, show a sequence of events, from the land surface down (youngest to oldest) specific to the site's geologic and industrial history:

Stratigraphic Unit	Thickness Range (feet)
Fill	10 – 12
Clay	11 - 25.5
Glacial Till (Sand and Silt)	4 – 18
Bedrock (Gneiss of Heartland Formation)	> 8.5

The cross sections on Figures 5 through 10 show the vertical distribution of these units in the site area. The inferred shallow water table surface, location of former MGP structures, and visual observations of impacts are also depicted in each of the cross-sections. Cross-section locations are shown on Figure 4.

A description of each stratigraphic unit is provided below

4.1.1 Fill Unit

The ground surface (top of the fill unit) generally descends from west to east towards the Westchester Creek (Figure 2). The top of the fill unit consists of construction debris (brick, cinders, ash, coal, wood and glass) intermingled with poorly sorted brown to black sand and gravel. As indicated on the cross-sections (Figures 5 through 10), the thickness of the fill unit varies from approximately 16 to 20 feet in the western portion of the site, increases to approximately 25 feet near the buried petroleum storage tank berm (SB-108), and decreases to approximately 11 feet along the Westchester Creek bulkhead (SB-115).



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4.1.2 Clay Unit

The clay unit consists of post-glacial sediments formed in marshlands that historically extended along the Westchester Creek (as discussed in Section 1.2.3). The clay unit consists of grey, medium stiff clay with trace amounts of sand and silt. Peat, roots, and shell fragments were frequently observed in collected samples. The top of clay surface descends from west to east across the site (Figure 11), and the unit ranges from approximately 10 to 20 feet thick (Figure 12). Thicker areas of clay were observed in the northeast portion of the site, while the clay unit was thinner along Watson, Blackrock, and Zerega Avenues.

The clay unit appears to be continuous onsite, as depicted in the cross-sections (Figures 5 through 10). The clay unit was not encountered at the upgradient monitoring well locations (MW-4 and MW-5). Silt deposits (consisting of marshland sediments) were identified at the upgradient monitoring well borings. The grain size increase from clay to silt at the upgradient well locations reflects a change in the depositional environment.

4.1.3 Glacial Till (Sand and Silt)

Glacial till was encountered in each of the SC soil borings with the exception of SB-115 and SB-116 (located along the Westchester Creek bulkhead), where the clay unit extends to bedrock, as show on Figures 6 and 7. This unit consists of variably colored poorly sorted sand with silt and clay lenses. The abundance of mica grains indicates that these sediments were formed, at least partially, by the erosion of underlying gneiss bedrock.

The average thickness (where encountered) of this unit is approximately 11 feet, with a maximum thickness of approximately 18 feet at SB-102A and minimum thickness of approximately 4 feet at SB-125.

4.1.4 Bedrock

A total of 16 SC soil borings encountered the top of bedrock at and near the site. Depth to bedrock at these borings ranged from approximately 40 to 50 feet bgs (at soil boring SB-105 and SB-112, respectively). As shown on Figure 13, the top of bedrock generally descends from south to north, with the higher elevations (approximately 24 feet bgs) along Blackrock Avenue, and the lower elevations along Watson Avenue



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(approximately 32 feet bgs). Bedrock surface mounding near SB-115 causes of the glacial till unit to pinch out along the eastern edge of the site (at SB-115 and SB-116).

4.2 Groundwater Flow and Hydrogeologic Characterization

The hydrogeology at the site has been characterized based on information obtained from 15 monitoring wells installed as part of the SC Investigation and 7 monitoring wells installed during previous site investigations. A total of 18 monitoring wells are screened straddling the water table and 4 monitoring wells are screened within the deeper glacial till unit. Well construction details are summarized in Table 3.

The hydrostratigraphy beneath the site consists of two relatively permeable units (the fill and glacial till units) separated by the low permeability clay confining unit. The saturated portion of the fill unit represents the water table aquifer (uppermost unconfined aquifer). The average saturated thickness of this hydrostratigraphic unit is approximately 5 feet. Hydraulic conductivity (K) values for the fill range between 11.59 (MW-113B) and 192 ft/day (MW-111).

Monitoring wells were not screened in the clay unit, but hydraulic conductivity values for clays are generally between 10⁻⁹- and 10⁻⁶-ft/day (C.W. Fetter, 1994). Secondary porosity features (i.e., roots, shells, and wood pieces) were identified within the upper 3- to 4-feet of the clay unit.

The glacial till unit is fully saturated. Hydraulic conductivity values for this unit range between 1.17 (MW-101A) and 11.7 ft/day (MW-113A). This unit extends to bedrock and pinches out towards Westchester Creek (at SB-115 and SB-116).

4.2.1 Groundwater Flow

Water level and NAPL measurements were collected at the site on March 7, 2008 and April 27, 2009. Groundwater elevation data for the March 7, 2008 shallow and deep wells are summarized in Table 4 and shown on Figures 14 and 15, respectively.

Groundwater in the fill generally flows toward the northeast near Zerega Avenue but turns to the east as it moves closer to Westchester Creek (Figure 14). Horizontal hydraulic gradients in the fill are fairly constant throughout the site, with values between 0.004 and 0.009 feet/feet.



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Groundwater flow in the glacial till is also to the east (Figure 15). Horizontal hydraulic gradients in this unit are of similar magnitude to those observed in shallow groundwater (0.002 feet/feet between MW-101A and MW-113A); however, a steeper horizontal hydraulic gradient exists in the northern portion of the site (0.018 between MW-113A and MW-110A).

Three well clusters (i.e., one well screened in the fill and one well screened in the glacial till) were installed at the site: MW-101A/B, MW-110A/B and MW-113A/B. Vertical gradients observed these well clusters locations are summarized below.

Monitoring Well Cluster	Gradient March 7, 2008 (feet/feet)	Gradient April 27, 2009 (feet/feet)	Direction of Vertical Gradient
MW-101	-0.0004	-0.0016	Upward
MW-110	0.11	0.18	Downward
MW-113	-0.01	-0.0038	Upward

Further evaluation is needed to determine if the observed vertical gradients may be caused by tidal influences. According to NOAA, the mean range of tide at Kings Point, Queens (NOAA Station 8516945), which is located approximately 4.5 miles to the southeast of the site, is 7.1 feet. Fluctuations of this magnitude, however, would not be expected to propagate far from the creek. The water table elevation in MW-110B (near Westchester Creek) is at least 8 feet above the creek, indicating that the onsite groundwater discharges to the creek.

4.3 Extent of Visual Impacts and NAPL Characterization

MGP- and non-MGP related visual impacts were encountered in soil/monitoring well borings completed across the site and at test pits that were excavated to evaluate former MGP structures. LNAPL and DNAPL was observed in monitoring wells during the fluid level gauging events completed as part of the SC Investigation. A discussion of visual MGP and non-MGP related impacts observed at sampling locations and the extent of NAPL identified by fluid level monitoring is presented below.



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4.3.1 Field Observations of Impacts

MGP- and non-MGP-related impacts noted during the SC field activities included odors, visible staining, sheens, and NAPL. Field observations are summarized in Table 3 and shown on the geologic cross sections presented as Figures 5 through 10. Figure 16 shows all locations where NAPL was encountered in subsurface soil sampling locations. Figure 17 shows locations where NAPL was identified in vadoze zone soil. Figure 18 shows locations where NAPL was identified at the water table. Locations where NAPL was observed along the top of the clay unit and below the clay unit are shown on Figures 19 and 20, respectively.

Four locations had NAPL in the unsaturated zone (SB-103, SB-104/MW-109, SB-106/MW-102, and SB-119/MW-107). In these borings, NAPL was observed at least two feet above the saturated zone. NAPL was identified at the water table at the majority of the soil borings completed in the central and western portion of the site. NAPL was not observed at the water table along the Westchester Creek bulkhead or along Watson Avenue, with the exception of SB-128. NAPL typically extended uninterrupted from the water table to the clay unit, as shown on the geologic cross sections (Figures 5 through 10). Masonry obstructions were encountered at SB-122 at approximately 13 feet bgs, and heavy NAPL impacts were observed from 7 to 13 feet bgs, where the boring was terminated. The buried masonry structure is potentially associated with the former tar separator. The most widespread observations of NAPL were noted along the top of the clay unit. NAPL impacts were observed at each SC Investigation soil boring immediately above the clay unit with the exception of SB-118.

NAPL impacts in the glacial till (below the clay unit) were observed at 6 of 15 SC Investigation borings. These NAPL impacts were generally located along the northern and eastern site boundaries. Although NAPL impacts below the clay unit were not observed in the soil borings located closest to Westchester Creek. NAPL was identified several feet above the top of bedrock on a lens of brown-green silt, at depths ranging between 30 and 41 feet bgs (Figures 8 and 10). This lens is laterally discontinuous as it was not observed in the western or southeastern (SB-128) portion of the site. NAPL was not observed below the clay unit at SB-102A and SB-105, which were the westernmost borings that extended into the glacial till unit.

NAPL impacts were not observed at MW-5 (upgradient location west of west of Zerega Avenue). However, petroleum-like odors and a visible sheen were noted at MW-5. NAPL blebs were observed at MW-4 in the core barrel bit at a depth of 10 and 15 feet



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bgs, but NAPL was not observed in the soil sample recovered from that interval. Sheens and strong MGP-like odors were also present in the silt layer in MW-4.

4.3.2 NAPL Gauging

NAPL gauging was performed concurrently with the collection of water level measurements on March 7, 2008 and April 27, 2009. The NAPL gauging results are summarized in Table 4.

Light, non-aqueous phase liquid (LNAPL) was identified at the groundwater table at three monitoring well locations (MW-101B, MW-102, and MW-107). One additional location (MW-109) also contained LNAPL during the 2009 gauging event. Only trace quantities of LNAPL were identified during the 2009 gauging event, with the exception of MW-101B and MW-102, which contained approximately 3- and 2.6-inches, respectively.

Dense, non-aqueous phase liquid (DNAPL) was encountered below the water table at six wells in 2008 (MW-103, MW-108, MW-109, MW-110B, MW-111, and MW-113B). DNAPL thickness ranged from trace to 3.1 feet. Four of the monitoring well locations that contained DNAPL in 2008 had no detectable DNAPL in April 2009 (MW-108, MW-110B, MW-111, and MW-113B).

DNAPL was also identified in monitoring wells MW-07-OLD and MW-08-OLD during the 2009 gauging event. A trace amount of DNAPL was identified at MW-08-OLD and approximately 4 inches were measured at MW-07-OLD.

4.4 Soil Sample Results

A total of 130 subsurface soil samples (including 8 field duplicates) were collected during the SC Investigation activities. Up to seven soil samples from each soil boring were submitted for laboratory analysis. Soil samples collected as part of the investigation were analyzed for VOCs, SVOCs, metals, total cyanide, percent solids, and moisture. Subsurface soil samples were collected throughout accessible areas of the site and from three locations immediately north and south of the site boundary, but primarily focused on areas where former MGP-related structures were located (i.e., the western portion of the site). Analytical results for the laboratory analysis of the SC Investigation soil samples were reported using NYSDEC ASP Category B data deliverable packages. Each data package was reviewed by ARCADIS' data validation



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staff. Data Usability Summary Reports (DUSRs) which present the data validation review for each sample delivery group are presented in Appendix F.

Benzene, toluene, ethylbenzene, and xylenes (BTEX compounds), polycyclic aromatic hydrocarbons (PAHs), and cyanide were detected in several of the soil samples collected as part of the investigation. For purposes of evaluating the soil analytical results, the results have been compared (in Tables 5, 6, and 7) to the restricted commercial- and industrial-use SCOs and SCOs for protection of groundwater presented in 6 NYCRR Part 375-6.8(a) and (b). The commercial- and industrial-use SCOs are applicable to the site given that the current and future site use is anticipated to be either commercial or industrial. The SCOs for the protection of groundwater are also potentially applicable to the site given the proximity of the site to Westchester Creek. Detected total BTEX concentrations in soil are shown on Figure 21 and detected total PAH concentrations in soil are shown on Figure 22.

The subsurface soil analytical results in comparison to the SCOs are summarized below.

- BTEX compounds were detected at concentrations exceeding the SCOs for the protection of groundwater in 42 subsurface soil samples. Ethylbenzene was the only compound detected at a concentration exceeding the commercial use SCOs in one sample (SB-125 [17-18]). No samples exceeded industrial-use SCOs. Sampling locations where total BTEX was identified in one or more intervals at concentrations greater than 10 ppm are shown on Figure 21. The 10 ppm total BTEX value are consistent with the VOC "cap" value presented in the NYSDEC Technical and Administrative Guidance Memorandum titled "Determination of Soil Cleanup Objectives and Cleanup Levels," HWR-94-4046, dated January 24, 1994 (TAGM 4046). A total of 29 samples from 19 locations exceeded the 10 ppm total BTEX cap value, and 18 of the samples were collected from the interval immediately above the clay confining unit. An additional five of the exceedances were identified in the silt/clay unit identified below the clay confining unit.
- PAHs were detected at concentrations exceeding SCOs for the protection of groundwater in 69 of 122 subsurface soil samples. A total of 64 samples exceeded commercial use SCOs and 63 samples exceeded industrial use SCOs. Sampling locations where total PAHs greater than 500 ppm are shown on Figure 22. The 500 ppm total PAH value is consistent with the SVOC "cap" value presented in TAGM 4046. The 500 ppm total PAH value is consistent with the SVOC "cap" value presented in TAGM 4046. A total of 31samples from 21 locations exceeded the 500 ppm total PAH value, and 22 of the samples were collected from the interval immediately above the clay

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confining unit. An additional five of the exceedances were identified in the silt/clay unit identified below the clay confining unit.

- Elevated concentrations of BTEX and PAHs were generally co-located with a total of 22 subsurface soil samples with concentrations of total BTEX greater than 10 ppm and total PAHs greater than 500 ppm. Soils at the site that exhibit concentrations exceeding the 10 ppm total BTEX and 500 ppm total PAH cap values are generally uniformly distributed over the site. The exceedances were identified in samples between 5 and 41 feet bgs, but generally corresponded to sample intervals immediately above the clay unit and the glacial till below the clay unit.
- Cyanide was identified at concentrations exceeding the SCOs for the protection of
 groundwater and commercial use SCO in a sample collected from the 5 to 6 foot depth
 interval at boring SB-103. Cyanide did not exceed the industrial use SCO in any
 samples collected during the SC Investigation. Purifier waste (which is frequently
 associated with cyanide impacted material) was not identified at the site.

4.5 Groundwater Sampling Results

Groundwater samples were collected from 10 monitoring wells, 9 of which were installed during the SC Investigation. A total of 6 samples were collected from shallow monitoring wells (MW-06-OLD, MW-4, MW-5, MW-110B, MW-111, and MW-113B) and the remaining 4 samples were collected from deep monitoring wells (MW-101A, MW-110A, MW-112, MW-113A. Groundwater sampling for the wells located east on Zerega Avenue (including onsite wells and wells north of the site along Watson Avenue) was performed during March 2008. The upgradient wells west of Zerega Avenue were sampling in April 2009. Groundwater samples were submitted for laboratory analysis of VOCs, SVOCs, metals, and cyanide to assess the nature and extent of MGP- and non-MGP-related groundwater quality impacts. Analytical results for the laboratory analysis of the SC Investigation groundwater samples were reported using NYSDEC ASP Category B data deliverable packages. Each data package was reviewed by ARCADIS' data validation staff. Data Usability Summary Reports (DUSRs) which present the data validation review for each sample delivery group are presented in Appendix F.

Laboratory analytical results for the groundwater samples, including comparisons to the groundwater quality standards/guidance values presented in TOGS 1.1.1, are presented in Table 8, 9, and 10. Detected total BTEX and total PAHs concentrations in groundwater are presented on Figure 23.



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The groundwater analytical results are summarized below.

- BTEX compounds were not detected at upgradient monitoring wells MW-5. Slight
 exceedances of benzene and xylenes were identified at upgradient well MW-6, and
 ethylbenzene exceeded the standard at an elevated concentration.
- BTEX compounds were detected at concentrations exceeding the groundwater quality standards or guidance values at each of the wells located on site and immediately north of the site along Watson Avenue. BTEX exceedances for these areas are summarized below.
 - Benzene exceeded the standards/guidance values in onsite shallow monitoring
 wells at relatively low concentrations. The shallow monitoring well MW-113B, which
 was located immediately north of the site also contained slight exceedances of
 benzene, ethylbenzene, and xylenes.
 - Deep monitoring well MW-101A contained a slight exceedance of the benzene standard.
 - Remaining deep monitoring wells, both onsite and immediately north of the site, contained exceedances of BTEX compounds, except for toluene at MW-113A.
 Concentrations of these compounds along the northern border of the site and in the northeast portion of the site were generally greater than shallow wells.
- PAHs were not identified at concentrations exceeding standards/guidance values in the upgradient and onsite monitoring wells, with the exception of the MW-4 and MW-110A.
- PAHs were detected at concentrations exceeding the groundwater quality standards or guidance values at the monitoring wells located immediately north of the site.
- Total cyanide was not detected at any of the monitoring well locations at concentrations exceeded the 200 ppb standard.

The groundwater sampling results indicated that groundwater that exhibits BTEX and PAHs at concentrations exceeding the standards/guidance values are generally located in northeast portion of the site and immediately north of the site.

Concentrations of BTEX and PAHs identified at these locations were also generally higher at deep monitoring wells than shallow monitoring wells.



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4.6 Forensic Results

Forensic analyses for PIANO constituents and TPH DRO was conducted for 34 soil samples. AN additional 17 soil samples were analyzed for extended-list PAHs (parent and alkyl polycyclic aromatic compounds). Each of these analyses provided information on the type of hydrocarbons (e.g., petroleum, coal tar) present in the Site soils. From these analyses, PIANO compositional histograms, PAH compositional distributions and TPH GC fingerprints were generated to show compositional differences and similarities among samples. In addition diagnostic ratios of selected PIANO and PAH analytes were calculated to help in differentiating types of hydrocarbons in the samples. Results of the interpretation of PIANO, PAH, and TPH data are summarized in Table 11. The forensic evaluation, including PIANO histograms, PAH distributions, PIANO and PAH diagnostic ratio plots, and TPH fingerprints for soil samples, is presented in Appendix G.

The PIANO analysis identified 9 samples with petroleum compositions, 18 samples with coal tar compositions, 5 samples with a mixture of petroleum and coal tar compositions, and 2 samples with neither petroleum nor coal tar compositions (due to low concentrations). Petroleum and coal tar compositional characteristics are quite contrasting. Coal tar contains almost exclusively aromatic compounds with relatively trace amounts of the thiophenes and high-molecular-weight *n*-alkanes, whereas petroleum products are generally represented by each of the PIANO groups.

The PIANO analysis indicates that petroleum was identified throughout the site, but was more frequently identified in the western portion of the site. Petroleum was predominately identified at depths between 7 and 20 feet bgs, generally above the water table. Some samples contained commingled petroleum and coal tar at the deeper intervals. Coal tar was also identified throughout the site, but was more frequently identified in the western portion of the site, and both within and immediately north of the site border along Watson Avenue. The coal tar samples were identified at depths between 10 and 41 feet bgs, generally below the water table.

PAH analysis of 16 soil samples, which were usually collected at corresponding locations and depths of samples analyzed for PIANO compounds, identified 8 samples with petroleum compositions, 6 samples with coal tar compositions, and 2 samples with a mixture of petroleum and coal tar materials. The PAH results were consistent with PIANO results, identifying petroleum, coal tar, or a mixture of the two for each sample collected at the same location and depth.



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Gas Chromatography (GC) fingerprints for TPH DRO samples, which were collected at the same locations and depths as the PIANO samples, indicate that petroleum, coal tar, or petroleum/coal tar mixtures were generally identified at the same locations as those identified by the PIANO and PAH analyses. In addition, two types of petroleum, diesel and mid-heavy oils, were differentiated in the samples using the GC fingerprints.

The vertical distribution of petroleum and coal tar products at the Site are summarized below:

Vadose Zone/Water Table

- Eight of 12 samples analyzed for PIANO compounds showed predominately petroleum product compositional signatures. The remaining four samples from the vadose zone (SB-102A, SB-103, SB-128, and TP-105) had a mixture of petroleum and coal tar signatures.
- Seven of 11 samples analyzed for PAH compounds had predominately petroleum compositional signatures whereas two samples (SB-104 and SB-126) had a coal tar signature and the remaining two samples (SB-102, TP-105).showed a mixture of petroleum and coal tar signatures.
- Petroleum, coal tar, and petroleum/coal tar mixtures identified TPH GC fingerprints
 corresponding to the same samples as those identified by the PIANO analysis.
 Although most of the samples contained a mid-heavy oil, diesel was the
 predominant type oil in three samples (SB-110, SB-119, and SB-127), located in
 the eastern and southern area of the Site.

Top of Clay Unit

- Twelve of 16 samples analyzed for PIANO compounds and TPH along the top of
 the clay unit contained chemical compositional signatures that resembled coal tar.
 Chemical signatures resembling a mixture of petroleum and coal tar were identified
 in three samples (SB-101, SB-104, and SB-115). PIANO concentrations of one
 sample (SB-118) were too low to conclude identification of any type of
 hydrocarbon material.
- Each of the five samples analyzed for PAHs along the top of the clay unit, or collected within the clay unit, contained PAH signatures that resembled coal tar.



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Below Clay Unit

- Each of the five samples analyzed for PIANO compounds and TPH from below the clay unit contained chemical compositional signatures that resembled coal tar.
- No samples were analyzed for PAH fingerprints below the clay unit.

The forensic results indicate a spatial stratification of hydrocarbon material types in soils at the Site with petroleum impacts predominately at the top of the water table and the groundwater smear zone, and MGP—related (coal tar) impacts predominately on top of the clay unit and in the glacial till unit.



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5. Conclusions and Recommendations

This section presents conclusions which are supported by the SC investigation results discussed in Section 4 and also discusses remaining datagaps and recommendations for future activities. As summarized in Section 1.3, the objectives of the SC Investigation include:

- Determine if MGP- and/or non-MGP-related compounds are present in soil and/or groundwater at the site.
- Identify the potential presence of MGP- and/or non-MGP-related by-product residuals (such as coal tar, non-aqueous phase liquid [NAPL], purifier wastes, petroleum, solvents, etc.) in soil and/or groundwater at the site.
- Evaluate, to the extent practicable, whether groundwater flow may be a pathway for offsite migration of identified chemical constituents (if present).
- Determine compliance with applicable NYSDEC standards, criteria, and guidance values (SCGs).
- Provide sufficient data to evaluate the necessity for further investigation and/or remedial action.

The results of the SC Investigation activities described in this report satisfy the objectives for accessible onsite areas.

5.1 Summary of Findings

The relevant findings of the SC Investigation are summarized below, including historical site use, geologic and hydrogeologic conditions, distribution of visible MGP-and non-MGP-related impacts, soil sampling results, groundwater sampling results, and forensic sampling results.

5.1.1 Historical Site Use

Historical MGP operations were conducted at the site between 1905 and 1927 and primarily included the production of manufactured gas using the Lowe carbureted water gas process. Manufactured gas produced at the site was stored in aboveground gas holders located at the Zerega Avenue former gas holder site. In addition to the



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manufactured gas plant, operations at the site also included an electric generating plant and coal unloading/storage facility. Con Edison owned and operated the site between 1927 and 1945, but the site use during this period is unknown. Various petroleum companies owned and operated the site between 1945 and 2007, except for the years 1947 through 1950. The property was recently purchased by a private owner. The future use of the property has not been determined, however, the new owner has indicated that the buried fuel oil storage tanks will remain at the site for the foreseeable future.

Petroleum companies that owned and operated the site between 1945 and 2007 include Combined Petroleum Transfer Corporation; Cirillo Brothers Petroleum Company; Cibro Terminal, Inc.; Morningside Fuel Corporation; and Twin Pines Fuels Corporation. Multiple documented petroleum releases occurred at the site between 1975 and 2000. Several different phases of investigation activities were implemented to evaluate potential environmental concerns associated with petroleum releases at the site.

5.1.2 Geologic and Hydrogeologic Conditions

Surficial deposits in the Bronx consist of till derived from the glacial erosion of underlying metamorphic rocks. Bedrock beneath the site is sillimanite-grade gneiss of the Pelham Bay Member (Hartland Formation, Middle Ordovician to Lower Cambrian age). Depth to bedrock is 40 feet bgs or more. The bedrock surface reportedly descends sharply toward the east under the Cross Bronx Expressway.

Site stratigraphy can be divided into four units. In order of increasing depth, these units are presented in the table below.

Stratigraphic Unit	Thickness Range (feet)
Fill	10 – 12
Clay	11 - 25.5
Glacial Till (Sand and Silt)	4 – 18
Bedrock (Gneiss of Heartland Formation)	> 8.5



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Groundwater Flow

Shallow groundwater generally flows toward the northeast near Zerega Avenue and predominantly east closer to Westchester Creek. Deep groundwater flow in the glacial till unit is generally east as shown on Figure 15.

Three sets of well clusters were installed at the site. Slightly upward vertical gradients were observed at MW-101 and MW-113 and a downward vertical gradient was observed at MW-110.

5.1.3 Distribution of Visual Impacts and NAPL

Only two locations had visible NAPL in the unsaturated zone (SB-103 and SB-106/MW-102). In these borings, NAPL was observed at least two feet above the saturated zone. NAPL was identified at the water table at the majority of the soil borings completed in the central and western portion of the site. NAPL was not observed at the water table along the Westchester Creek bulkhead or along Watson Avenue, with the exception of SB-128. NAPL typically extended uninterrupted from the water table to the clay unit. A masonry obstruction (potential former tar separator) was were encountered at SB-122 at approximately 13 feet bgs, and heavy NAPL impacts were observed from 7 to 13 feet bgs. The most widespread observations of NAPL were noted along the top of the clay unit. NAPL impacts were observed at each SC Investigation soil boring immediately above the clay unit with the exception of SB-118.

Visible NAPL impacts in the glacial till (below the clay unit) were observed at 6 of 15 SC Investigation borings. These NAPL impacts were generally located along the northern and eastern site boundaries. Although the clay unit extended to bedrock in the soil borings located closest to Westchester Creek. NAPL was identified several feet above the top of bedrock on a lens of brown-green silt, at depths ranging between 30 and 41 feet bgs. This lens is laterally discontinuous as it was not observed in the western or southeastern portion of the site. NAPL was not observed below the clay unit at SB-102A and SB-105, which were the westernmost borings that extended into the glacial till unit.

Visible NAPL impacts were not observed at MW-5 (upgradient location west of west of Zerega Avenue). However, petroleum-like odors and a visible sheen were noted at MW-5. NAPL blebs were observed at MW-4 in the core barrel bit at a depth of 10 and 15 feet bgs, but NAPL was not observed in the soil sample recovered from that



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interval. Sheens and strong MGP-like odors were also present in the silt layer in MW-4.

NAPL gauging was performed concurrently with the collection of water level measurements on March 7, 2008 and April 27, 2009. LNAPL was identified at the groundwater table at three monitoring well locations (MW-101B, MW-102, and MW-107) during the 2008 monitoring event. One additional location (MW-109) also contained LNAPL during the 2009 gauging event. Only trace quantities of LNAPL were identified during the 2009 gauging event, with the exception of MW-101B and MW-102, which contained approximately 3- and 2.6-inches, respectively.

DNAPL was encountered below the water table at six wells in 2008 (MW-103, MW-108, MW-109, MW-110B, MW-111, and MW-113B). DNAPL thickness ranged from trace to 3.1 feet. Four of the monitoring well locations that contained DNAPL in 2008 had no detectable DNAPL in April 2009 (MW-108, MW-110B, MW-111, and MW-113B). DNAPL was also identified in monitoring wells MW-07-OLD and MW-08-OLD during the 2009 gauging event.

5.1.4 Soil Sampling Results

The subsurface soil analytical results are summarized below.

- BTEX compounds were detected at concentrations exceeding the SCOs for the
 protection of groundwater in 42 subsurface soil samples. A total of 29 samples from 19
 locations exceeded the 10 ppm total BTEX cap value, and 18 of the samples were
 collected from the interval immediately above the clay confining unit. An additional five
 of the exceedances were identified in the glacial till unit identified below the clay unit.
- PAHs were detected at concentrations exceeding SCOs for the protection of groundwater in 69 of 122 subsurface soil samples. A total of 64 samples exceeded commercial use SCOs and 63 samples exceeded industrial use SCOs. A total of 31samples from 21 locations exceeded the 500 ppm total PAH value, and 22 of the samples were collected from the interval immediately above the clay confining unit. An additional five of the exceedances were identified in the glacial till below the clay unit.
- Elevated concentrations of BTEX and PAHs were generally co-located with a total of 22 subsurface soil samples with concentrations of total BTEX greater than 10 ppm and total PAHs greater than 500 ppm. Soils at the site that exhibit concentrations exceeding the 10 ppm total BTEX and 500 ppm total PAH cap values are generally uniformly

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distributed over the site. The exceedances were identified in samples between 5 and 41 feet bgs, but generally corresponded to sample intervals immediately above the clay confining unit and the glacial till below the clay unit.

 Cyanide was identified at concentrations exceeding the SCOs for the protection of groundwater and commercial use SCO in a sample collected from the 5 to 6 foot depth interval at boring SB-103. Cyanide did not exceed the industrial use SCO in any samples collected during the SC Investigation.

5.1.5 Groundwater Sampling Results

The groundwater analytical results are summarized below.

- The groundwater sampling results indicated that groundwater that exhibits BTEX and PAHs at concentrations exceeding the standards/guidance values are generally located in northeast portion of the site and immediately north of the site. Concentrations of BTEX and PAHs identified at these locations were also generally higher at deep monitoring wells than shallow monitoring wells.
- Total cyanide was not detected at any of the monitoring well locations at concentrations exceeded the groundwater quality standard.

5.1.6 Forensic Sampling Results

The distribution of petroleum and coal tar products at the site as identified by the SC investigation forensic analysis effort is summarized below:

Vadose Zone/Water Table

- Eight of 12 samples analyzed for PIANO compounds showed predominately petroleum product compositional signatures. The remaining four samples had a mixture of petroleum and coal tar signatures.
- Seven of 11 samples analyzed for PAH compounds had predominately petroleum compositional signatures whereas two samples had a coal tar signature and the remaining two samples showed a mixture of petroleum and coal tar signatures.
- Petroleum, coal tar, and petroleum/coal tar mixtures identified TPH GC fingerprints corresponding to the same samples as those identified by the PIANO analysis.
 Although most of the samples contained a mid-heavy oil, diesel was the



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predominant type oil in three samples (SB-110, SB-119, and SB-127), located in the eastern and southern area of the Site.

Top of Clay Unit

- Twelve of 16 samples analyzed for PIANO compounds and TPH contained chemical compositional signatures that resembled coal tar. Chemical signatures resembling a mixture of petroleum and coal tar were identified in three samples and PIANO concentrations for one sample were too low to identify the type of hydrocarbon material.
- Each of the five samples analyzed for PAHs along the top of the clay unit, or collected within the clay unit, contained PAH signatures that resembled coal tar.

Below Clay Unit

- Each of the five samples analyzed for PIANO compounds and TPH from below the clay unit contained chemical compositional signatures that resembled coal tar.
- No samples were analyzed for PAH fingerprints below the clay unit.

The forensic results indicate a spatial stratification of hydrocarbon material types in soils at the Site with petroleum impacts predominately at the top of the water table and the groundwater smear zone, and MGP—related (coal tar) impacts predominately on top of the clay unit and in the glacial till unit.

5.2 Data Gaps and Recommendations

Based on the results of the SC Investigation activities, the nature and extent of MGPand non-MGP-related impacts in accessible onsite areas is generally understood. With the exception of the minor datagaps discussed below, the SC Investigation results provide a sufficient basis for the evaluation of potential remedial alternatives for accessible onsite areas.

Potential datagaps identified by the SC investigation results include:

 The extent of the tidal influences on groundwater flow and NAPL distribution at the site has not been fully characterized.



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- Further characterization of the physical properties of DNAPL (including density, viscosity, and interfacial tension) is appropriate to evaluate NAPL mobility and remedial options for NAPL recovery.
- Potential migration of MGP- and non-MGP-related constituents in soil vapor to occupied structures at the site was not evaluated as part of the SC investigation.
- The buried petroleum storage tank berm area was not characterized for the SC Investigation and the current owner does not plan to remove the buried tanks (which is a pre-requisite to conducting investigation activities in this area). Based on the age of the storage tanks and the history of past petroleum spills, the lack of characterization information for the tank berm area is a significant data gap.
- Offsite soil, groundwater, and NAPL impacts to the north of the site along Watson Avenue have not been fully delineated and additional investigation is required.
- Soil, groundwater, and NAPL impacts were identified along the eastern site boundary with Westchester Creek. Characterization of sediment and underlying soil within the portion of Westchester Creek adjacent to the site is required to evaluate potential offsite migration of MGP- and non-MGP-related impacts.
- Upgradient impacts to the Zerega Avenue site will be further evaluated in a separate investigation.
- The extent of NAPL (identified as a mixture of petroleum and coal tar) identified at the water table and minor NAPL blebs (identified as coal tar) identified at the top of clay at SB-119/MW-107 (located along Blackrock Avenue south of the site) has not been delineated. Groundwater samples were not collected from MW-107 due to the presence of NAPL..

Based on the findings of the SC Investigation, future activities in connection with the former Unionport Gas Works site will include:

 Con Edison will develop a Remedial Investigation Work Plan to delineate and characterize offsite MGP- and non-MGP-related soil and groundwater impacts to the north of the site along Watson Avenue. The Remedial Investigation Work Plan for upland areas north of the site will be submitted to the NYSDEC for review and approval.



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- Con Edison will develop a Remedial Investigation Work Plan to delineate and characterize potential MGP- and non-MGP-related impacts in sediment and underlying soil within Westchester Creek adjacent to the site. The Remedial Investigation Work Plan for sediment and underlying soil within Westchester Creek will be submitted to the NYSDEC for review and approval.
- Further work in connection with the buried petroleum storage tank area is not feasible until the petroleum storage tanks are removed by the current property owner. Following removal of the petroleum storage tanks, Con Edison (in conjunction with the current property owner) will submit a Remedial Investigation Work Plan to delineate and characterize potential MGP- and non-MGP-related impacts in the buried petroleum storage tank berm area and in the area along Blackrock Avenue to the south of the site. The Remedial Investigation Work Plan for the former buried petroleum storage tank berm area and the area along Blackrock Avenue south of the site will be submitted to the NYSDEC for review and approval.
- Limited additional onsite investigation activities will be conducted in conjunction
 with the offsite characterization efforts, including hydrologic monitoring to evaluate
 tidal influence on groundwater and collection of DNAPL samples for analysis of
 physical characterization parameters. If further onsite characterization of the clay
 unit is useful (based on further review of the onsite and offsite characterization
 results), Con Edison may propose to conduct additional mapping of the clay using
 non-intrusive methods.
- In conjunction with the future investigation activities for the buried petroleum storage tank berm area (to be implemented following removal of the petroleum storage tanks), Con Edison will implement a Vapor Intrusion Investigation to evaluate potential migration of MGP- and non-MGP-related constituents in soil vapor to occupied structures at the site. Con Edison will submit a Vapor Intrusion Investigation Work Plan to the NYSDEC for review and approval.



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Tables

								1	ΓCLI	P	Forens Analys		stics
Sample ID	Depth	Sample Matrix	Sample Type	Date Collected	VOCs	SVOCs	Inorganics	vocs	SVOCs	Metals	VOCs (PIANO)	PAHs	RCRA Characteristics
Waste Characterizat			. , p =	CCCC.CC.					10,				
Liquid Waste 01		Water	Waste	1/25/2008				√	√	√			√
Liquid Waste 02		Water	Waste	3/3/2008				√	1	✓			√
Liquid Waste 03		Water	Waste	3/21/2008									√
Liquid Waste 04		Water	Waste	3/21/2008									√
Liquid Waste 05		Water	Waste	3/21/2008				✓	1	√			√
Solid Waste 01		Soil	Waste	1/25/2008				√	1	✓			√
Solid Waste 02		Soil	Waste	3/3/2008				√	1	✓		М	√
Solid Waste 06		Soil	Waste	3/24/2008				√	1	✓			√
Duplicate Samples				5.2 1/2000									
DUP-01T		Soil	QA/QC-Duplicate	1/23/2008	✓	√	√						
DUP-02T		Soil	QA/QC-Duplicate	1/30/2008		✓	1						
DUP-03T		Soil	QA/QC-Duplicate	2/8/2008		✓	1						
DUP-04T		Soil	QA/QC-Duplicate	2/3/2000	✓	✓	1						
DUP-05T		Soil	QA/QC-Duplicate	2/21/2008	✓	✓	1					Н	
DUP-06T		Soil	QA/QC-Duplicate	2/2 1/2000	·	·	· ✓						
DUP-02A		Soil	QA/QC-Duplicate	2/8/2008	Ť	_	<u> </u>						
DUP-03A		Soil	QA/QC-Duplicate	2/20/2008					\vdash			\vdash	
DUP-04A		Soil	QA/QC-Duplicate	2/21/2008								Н	
DUP-05A		Soil	QA/QC-Duplicate	3/3/2008					\vdash			\vdash	
DUP-06A		Soil	QA/QC-Duplicate	3/5/2008								Н	
Matrix Spike/Matrix	Snika Duni			3/3/2008									
MS/MSD #1	Spike Dupi	Soil	QA/QC-MS/MSD	1/29/2008	√	✓	√						
MS/MSD #2		Soil	QA/QC-MS/MSD	2/5/2008		→	√						
MS/MSD #3		Soil	QA/QC-MS/MSD	2/18/2008		<u> </u>	✓					\vdash	
MS/MSD #4		Soil	QA/QC-MS/MSD	2/20/2008		<u> </u>	✓					\vdash	
MS/MSD #5		Soil	QA/QC-MS/MSD	2/28/2008		▼	√		\vdash			Н	
MS/MSD #6		Soil	QA/QC-MS/MSD	3/5/2008		<u> </u>	✓		\vdash			Н	
Soil Samples		3011	QA/QC-IVI3/IVI3D	3/3/2008	_	Ľ							
John Jampies			Augers/Restricted										
	(6-7)	Soil	Access	2/4/2008	✓	✓	 ✓						
00.404	(0.)		Augers/Restricted										
SB-101	(11-13)	Soil	Access	2/4/2008	✓	✓	✓				✓	 	
			Augers/Restricted										
	(17-19)	Soil	Access	2/4/2008	✓	✓	✓				✓	✓	
	(3-5)	Soil	Sonic	2/12/2008	✓	✓	✓						
	(11-12)	Soil	Sonic	2/12/2008	✓	✓	✓				✓	✓	
SB-102	(15-16)	Soil	Sonic	2/12/2008	✓	✓	✓				✓		
00-102	(28-29)	Soil	Sonic	2/12/2008	✓	✓	✓						
	(34-35)	Soil	Sonic	2/12/2008	✓	✓	✓						
	(45-46)	Soil	Sonic	2/12/2008	✓	✓	✓						
	(5-6)	Soil	Sonic	2/8/2008	✓	✓	✓						
SB-103	(10-13)	Soil	Sonic	2/8/2008	✓	✓	✓				✓	✓	
	(14-16)	Soil	Sonic	2/8/2008	✓	✓	✓				✓		

								1	ΓCLI	P	Forens Analys		stics
Sample ID	Depth	Sample Matrix	Sample Type	Date Collected	VOCs	SVOCs	Inorganics	VOCs	SVOCs	Metals	VOCs (PIANO)	PAHs	RCRA Characteristics
	(2.2)		Augers/Restricted	2/2/222			,						
	(8-9)	Soil	Access	2/6/2008	✓	✓	✓					√	
	(11-13)	Soil	Augers/Restricted Access	2/6/2008	✓	\	\ \				 		
SB-104	(11-13)	Juli	Augers/Restricted	2/0/2008	_	ا	'		\vdash		•		
	(17-19)	Soil	Access	2/6/2008									
	(** **)		Augers/Restricted										
	(19-20)	Soil	Access	2/6/2008	✓	✓	✓				✓		
DUP-2 [SB-104]			Augers/Restricted										
DOF-2 [SB-104]	(19-20)	Soil	Access	2/6/2008							✓		
	(5-6)	Soil	Sonic	2/7/2008	✓	✓	✓						
	(10-12)	Soil	Sonic	2/7/2008	✓	✓	✓				✓		
SB-105	(14-15)	Soil	Sonic	2/7/2008	✓	✓	✓						
	(26-27)	Soil	Sonic	2/7/2008	✓	✓	✓						
	(29-30)	Soil	Sonic	2/7/2008	✓	✓	✓						
	(38-40)	Soil	Sonic	2/7/2008	✓	✓	✓		_				
	(2-4)	Soil	Sonic	2/8/2008	✓	✓	✓		_				
SB-106	(7-8)	Soil	Sonic	2/8/2008		√	√		_	_		✓	
	(12-13)	Soil	Sonic	2/8/2008		√	√	_	<u> </u>				
	(15-16)	Soil	Sonic	2/8/2008	✓	✓	✓	_	<u> </u>		✓		
	(5-7)	Soil	Augers/Restricted Access	2/5/2008	✓	✓	✓						
SB-107	(11-13)	Soil	Augers/Restricted Access	2/5/2008	√	✓	✓				✓		
	(15-17)	Soil	Augers/Restricted Access	2/5/2008	√	✓	✓				√		
OD 400	(26)	Soil	Augers/Restricted Access	1/22/2008	√	1	✓						
SB-108	25 - 27	Soil	Augers/Restricted Access	1/22/2008							√	✓	
	(5)	Soil	Vactron	1/11/2008	√	✓	1						
	(11-13)	Soil	Augers/Restricted Access	1/17/2008		✓	✓						
SB-109	(15-17)	Soil	Augers/Restricted Access	1/17/2008		· ✓	· ✓						
	(19)	Soil	Augers/Restricted Access	1/17/2008		✓	✓						
	(32-33)	Soil	Sonic	3/3/2008		✓	✓						
	(35-36)	Soil	Sonic	3/3/2008		✓	✓						
	(48-49)	Soil	Sonic	3/3/2008	✓	✓	✓						

								7	[CLI	P	Forens Analys		stics
Sample ID	Depth	Sample Matrix	Sample Type	Date Collected	vocs	SVOCs	Inorganics	VOCs	SVOCs	Metals	VOCs (PIANO)	PAHs	RCRA Characteristics
SB-110			Augers/Restricted			П							
	(9)	Soil	Access	1/23/2008	✓	✓	✓				✓	✓	
			Augers/Restricted										
	(17)	Soil	Access	1/23/2008	✓	✓	✓						
			Augers/Restricted										
	(20)	Soil	Access	1/23/2008	✓	✓	✓					Ш	
			Augers/Restricted			١.	١.						
	(22)	Soil	Access	1/23/2008	✓	✓	✓					Ш	
	(40)		Augers/Restricted										
	(13)	Soil	Access	1/18/2008	✓	✓	✓		_	Ш		\vdash	
	(0.4)	0.11	Augers/Restricted Access	4/40/0000			\ _{\ \}						
	(21)	Soil		1/18/2008	✓	√	·		<u> </u>	\vdash		\vdash	
SB-111	(23)	Soil	Augers/Restricted Access	1/18/2008	✓	\ _{\ \}	\ _\						
			Sonic		∨	V V	∨	_	\vdash			Н	
	(27-28)	Soil	Sonic	3/3/2008	_	∨	∨					\vdash	
	(33-34)	Soil	Sonic	3/3/2008	√	∨	∨					\vdash	
	(39-40)	Soil	Sonic	3/3/2008	∨	V V	∨		<u> </u>	\vdash		\vdash	
	(49-50)	Soil		3/3/2008		-	-		<u> </u>	\vdash		\vdash	
	(3)	Soil	Vactron	1/14/2008	✓	✓	✓					\vdash	
	(44.40)	Cail	Augers/Restricted	4/46/2000	✓	\ _{\(\}	\ _{\ \}						
	(11-13)	Soil	Access Augers/Restricted	1/16/2008		\ <u>'</u>	\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	_		\vdash		\vdash	
	(21)	Soil	Access	1/16/2008	✓	\ _\	\ _{\ \}				 		
SB-112	(21)	Suil	Access Augers/Restricted	1/10/2006	_	<u> </u>	-		\vdash	\vdash	•	\vdash	
	(22-23)	Soil	Access	1/16/2008	✓	\ \	 _/						
	(31-32)	Soil	Sonic	3/5/2008	· ✓	· /	1			Н		Н	
	(40-41)	Soil	Sonic	3/5/2008		· ·	· /				√		
	(48-49)	Soil	Sonic	3/5/2008	▼	\ \ \ \	▼			\vdash	•	\vdash	
	(40-49)	Suil	Augers/Restricted	3/3/2006	_	<u> </u>	-			\vdash		\vdash	
	(11)	Soil	Access	1/18/2008	√	\ \	 _/						
	(11)	COII	Augers/Restricted	17 10/2000	ŕ	Ė	Ė			$\vdash \vdash$		\vdash	
	(13)	Soil	Access	1/18/2008	✓	\	<u>/</u>						
SB-113	(.0)	2011	Augers/Restricted	., .5,2556		Ė				\vdash		Н	
	(19)	Soil	Access	1/18/2008	✓	 ✓	 ✓						
	(:•)		Augers/Restricted							М		Н	
	(23)	Soil	Access	1/18/2008	✓	✓	✓						

Sample ID Depth Matrix Type Collected Coll									1	[CLI	P	Forens Analys		stics
SB-114	Sample ID	Depth	_	Type		VOCs	SVOCs	Inorganics	VOCs	SVOCs	Metals	VOCs (PIANO)	PAHs	RCRA Characteri
SB-114		(0)	Coil		1/24/2009	./								
SB-114		(9)	3011		1/24/2006	_	\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	V						
SB-114		(13)	Soil	_	1/24/2008	✓	 _/	 				✓		
SB-114		(.0)												
Canal Cap	CD 114	(21)	Soil	_	1/24/2008	✓	✓	 ✓						
Augers/Restricted Access 1/29/2008 V V V V V V V V V	SB-114			Augers/Restricted										
(40-41) Soil Access 1/29/2008 V V V V V V V V V		(29-31)	Soil		1/28/2008	✓	✓	✓						
Augers/Restricted Access 1/29/2008 V V V V V V V V V														
Company		(40-41)	Soil		1/29/2008	✓	✓	√		_				
SB-115		(44.45)	0.11	•	4/00/0000		_							
SB-115										-	<u> </u>			
(24-25) Soil Sonic 2/15/2008	OD 445									-	<u> </u>	~		
(5.5) Soil Sonic 2/18/2008 V V V V V V V V V	SB-115						_			-	<u> </u>			
SB-116 (12-13) Soil Sonic 2/18/2008 V V V V V V V V V							_	-		-	<u> </u>			
SB-116 (19-20) Soil Sonic 2/18/2008								-		-	<u> </u>			
C29-30	OD 446						_	-		-	<u> </u>	~		
(31-32) Soil Sonic 2/18/2008 V V V V V V V V V	SB-110						_			-	<u> </u>			
SB-118 (4-5) Soil Sonic 37/2008 V V V V V V V V V							_	-		-	<u> </u>			
Color							_			-	<u> </u>			
SB-118							_			-	<u> </u>			
(22-23) Soil Sonic 3/7/2008	CD 110						_							
Soil Sonic 3/7/2008	SB-110						_					V		
(5) Soil Vactron 1/21/2008 V V V V V V V V V							_	-		\vdash				
Column		· · ·					_	-		\vdash	\vdash			
Column		(3)	3011		1/2 1/2006	_	-	-						
SB-119 (9-10) Soil Access 1/31/2008 ✓ ✓ ✓ (11-12) Soil Access 1/31/2008 ✓ ✓ ✓ Augers/Restricted Access 1/31/2008 ✓ ✓ ✓ Augers/Restricted Access 1/25/2008 ✓ ✓ ✓ (6) Soil Access 1/25/2008 ✓ ✓ ✓ Augers/Restricted Access 1/25/2008 ✓ ✓ ✓		(7-8)	Soil	_	1/31/2008	✓	 _/	🗸				 	 	
(9-10) Soil Access 1/31/2008	SB-119	(, 0)			170172000									
Comparison of the comparison		(9-10)	Soil	-	1/31/2008	✓	/	 ✓						
(6) Soil Augers/Restricted Augers/Restricted Augers/Restricted Augers/Restricted Augers/Restricted Augers/Restricted Augers/Restricted Augers/Restricted				Augers/Restricted										
(6) Soil Access 1/25/2008 \(\ \		(11-12)	Soil	Access	1/31/2008	✓	✓	✓						
SB-120 Augers/Restricted Augers/Restricted														
SB-120 (13) Soil Access 1/25/2008 ✓ ✓ ✓		(6)	Soil		1/25/2008	✓	✓	✓						
SB-120 Augers/Restricted														
Augers/Restricted	SB-120	(13)	Soil		1/25/2008	✓	✓	✓		<u> </u>				
ן דס-דס Soil Access 1/25/2008		15.40	0-:1		4/05/0000									
		15-16	5011		1/25/2008		<u> </u>			<u> </u>	<u> </u>		~	
Augers/Restricted		(17)	Soil		1/25/2002	/	/							

							"	7	CLI	Р	Foren: Analys		istics
Sample ID	Depth	Sample Matrix	Sample Type	Date Collected	VOCs	SVOCs	Inorganics	VOCs	SVOCs	Metals	VOCs (PIANO)	PAHs	RCRA Characteristics
	(6.7)	Soil	Augers/Restricted Access	1/30/2008	✓	\ _\	\ _						
	(6-7)	3011	Augers/Restricted	1/30/2006	_	<u> </u>	Ľ		\vdash	\vdash			
	(10-11)	Soil	Access	1/30/2008	✓	 _/	✓						
SB-121	(10 11)	COII	Augers/Restricted	170072000	Ť	ļ.							
	(13-14)	Soil	Access	1/30/2008	✓	 ✓	✓						
	,		Augers/Restricted										
	(17)	Soil	Access	1/30/2008	✓	✓	✓						
	(4-5)	Soil	Sonic	2/28/2008	✓	✓	✓						
	(19-20)	Soil	Sonic	2/28/2008	✓	✓	✓				✓	✓	
SB-123	(23-24)	Soil	Sonic	2/28/2008	✓	✓	✓						
	(34-35)	Soil	Sonic	2/28/2008	✓	✓	✓				✓		
	(44-45)	Soil	Sonic	2/28/2008	✓	✓	✓						
	(9-10)	Soil	Sonic	3/5/2008	✓	✓	✓						
	(15-16)	Soil	Sonic	3/5/2008	✓	✓	✓				✓		
OD 404	(20-21)	Soil	Sonic	3/5/2008	✓	✓	✓						
SB-124	(22-23)	Soil	Sonic	3/5/2008	✓	✓	✓						
	(36-36.5)	Soil	Sonic	3/5/2008	√	✓	✓				✓		
	(47-48)	Soil	Sonic	3/5/2008	✓	✓	√						
DUP-06 [SB-124]	(15-16)	Soil	Sonic	3/5/2008							✓		
	(5-6)	Soil	Sonic	2/19/2008	✓	✓	✓					✓	
	(11-13)	Soil	Sonic	2/19/2008	✓	✓	✓						
SB-125	(17-18)	Soil	Sonic	2/19/2008	✓	✓	✓				✓		
SB-120	(23-25)	Soil	Sonic	2/19/2008	✓	✓	✓						
	(37-38)	Soil	Sonic	2/19/2008	✓	✓	✓				✓		
	(39-40)	Soil	Sonic	2/19/2008	✓	✓	✓						
	(3-5)	Soil	Sonic	2/20/2008	✓	✓	✓						
	6	Soil	Sonic	2/20/2008								✓	
	(15-16)	Soil	Sonic	2/20/2008	✓	✓	✓						
SB-126	(25-26)	Soil	Sonic	2/20/2008	✓	✓	✓						
	(34-35)	Soil	Sonic	2/20/2008	✓	✓	✓						
	(37-38)	Soil	Sonic	2/20/2008	✓	✓	✓						
	(46-47)	Soil	Sonic	2/20/2008	✓	✓	✓						
	(14-15)	Soil	Sonic	2/21/2008	✓	✓	✓				✓	✓	
	(18-18.5)	Soil	Sonic	2/21/2008	✓	✓	✓						
SB-127	(25-26)	Soil	Sonic	2/21/2008	✓	✓	✓						
	(39.5)	Soil	Sonic	2/21/2008	✓	✓	✓				✓		
	(41-42)	Soil	Sonic	2/21/2008	✓	✓	✓						
	(3-4)	Soil	Sonic	2/27/2008	✓	✓	✓						
	(10-11)	Soil	Sonic	2/27/2008	✓	✓	✓				✓		
SB-128	(19-20)	Soil	Sonic	2/27/2008	✓	✓	✓				✓	✓	
JD-120	(25-26)	Soil	Sonic	2/27/2008	✓	✓	✓						
	(30.5-31)	Soil	Sonic	2/27/2008	✓	✓	✓						
	(44-45)	Soil	Sonic	2/27/2008	✓	✓	✓						
TP-102 9/30/2009		Soil	Excavator										

FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY SAMPLE SUMMARY TABLE

								7	CLI	5	Forens Analys		stics
Sample ID	Depth	Sample Matrix	Sample Type	Date Collected	VOCs	SVOCs	Inorganics	VOCs	SVOCs	Metals	VOCs (PIANO)	PAHs	RCRA Characteristics
TP-103		Soil	Excavator										
TP-104		Soil	Excavator										
TP-105		Soil	Excavator								✓	✓	
TP-106		Soil	Excavator										
TP-107		Soil	Excavator										
TP-108		Soil	Excavator										
TP-110		Soil	Excavator										
TP-111		Soil	Excavator										
TP-112		Soil	Excavator										
TP-113		Soil	Excavator										
TP-114		Soil	Excavator										
Groundwater Sampl	es												
MW-4		Water	Sonic	4/27/2009	✓	✓	✓						
MW-5		Water	Sonic	4/27/2009	✓	✓	✓						
MW-6S [MW-4]		Water	Sonic	4/27/2009	✓	✓	✓						
MW-06-OLD		Water	Unknown	3/18/2008	✓	✓	✓						
MW-101A		Water	Sonic	3/20/2008	✓	✓	✓						
MW-110A		Water	Sonic	3/17/2008	✓	✓	✓						
MW-110B		Water	Sonic	3/17/2008	✓	✓	✓						
MW-111		Water	Sonic	3/18/2008	✓	✓	✓						
MW-112A		Water	Sonic	3/18/2008	✓	✓	✓						
MW-113A		Water	Sonic	3/18/2008	✓	✓	✓						
MW-113B		Water	Sonic	3/18/2008	✓	✓	✓						
DUP-01 [MW-113B]		Water	QA/QC-Duplicate	3/18/2008	✓	✓	✓						

Notes:

- 1. NA = not applicable.
- 2. VOCs = volatile organic compounds.
- 3. SVOCs = semi-volatile organic compounds.
- 4. PIANO = paraffin, isoparafin, aromatic, napthene, or olefin.
- 5. Waste characterization samples analyzed for Toxicity Leachate Characteristic Procedure (TCLP) VOCs, TCLP SVOCs, TCLP metals, and RCRA characteristics.
- 6. Samples liquid waste 03 and liquid waste 04 were only analyzed for RCRA characteristics.

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY

SUMMARY OF FIELD OBSERVATIONS

Boring ID	Drilling Method	Depth Range (feet bgs)	Depth to Groundwater	Depth to Clay	Unit Containing NAPL	PID Reading	Observation
SB-101	HSA	9.83-19	NA	18.83	F	26,35,66,47,81	OLM is is viscous and sticky from just above water table down to clay unit.
	Sonic	10-11	11.2112.14	16	F	28	OLM blebs found, heavy sheen
SB-102 / MW-101A	Sonic	11-14	11.2112.14	16	F	46,8	Black, OLM saturated
05 1027	Sonic	14-16	11.2112.14	16	F	21,44	Trace OLM blebs found concentrated around ~16'bgs sitting on Clay below
	Sonic	10-11	11.37	16	F	NA	OLM blebs found, heavy sheen
SB-102 / MW-101B	Sonic	11-14	11.37	16	F	NA	Black, OLM saturated
	Sonic	14-16	11.37	16	F	NA	Trace OLM blebs found concentrated around ~16'bgs sitting on Clav below
	Sonic	5-6	NA	16	F	21,60	Some stringy-very sticky OLM in pore spaces
SB-103	Sonic	10-13	NA	16	F	47,51	Saturated with black OLM
	Sonic	15-19	NA	16	F	23,5.5	Black OLM
SB-104 / MW-109	HSA	9-13	11.2	20	F	12,57,49,61,77	Some OLM blebs coating bricks and Gravel
3B-104 / IVIVV-109	HSA	14.5-20	11.2	20	F	134,108,116,123	OLM found throughout
	HSA	10-12	NA	17	F	28	OLM saturated
SB-105	HSA	12.5-15	NA	17	F	606	Residual OLM throughout
	HSA	15-17	NA	17	F	38	OLM blebs found on Brick
	Sonic	2-7	NA	20	F	5	Brick layer with timber
	Sonic	7-8	NA	20	F	188	Brick, black crushed cinders, slag and OLM in last 6"
SB-106 / MW-102	Sonic	10-11.5	NA	20	F	134	OLM
	Sonic	11.5-12	NA	20	F	NA	OLM blebs
	Sonic	13-16	NA	20	F	7	Sheen on water, trace blebs
SB-107	HSA	11-13	NA	17.7	F	61	Black OLM coating/saturating all grains
2B-107	HSA	14.8-17.7	NA	17.7	F	71,129,84	Brown - yellow OLM throughout
SB-108	HSA	23-25	NA	25.5	F	18	Piece of plastic found in cutting shoe that is coated in OLM
	HSA	25-25.5	NA	25.5	F	36	Black OLM saturated
SB-109	HSA	13-17.5	NA	17.5	F	30.2,18	Black OLM coating grains
00.440.4884.400	HSA	17-18	16.97	22	F	238,80	Fractured brick pieces and wood timber with some OLM coating
SB-110 / MW-103	HSA	19-21	16.97	22	F	110,118,104	Some OLM coating grains throughout
	HSA	21-22	16.97	22	F	68	OLM blebs coating grains towards bottom sitting on Clay
	HSA	11.5-15	NA	20	F	105,115,203	OLM coated
SB-111	HSA	15-17	NA	20	F	166,82	OLM blebs throughout
	HSA	19-20.16	NA	20	F	218,150	OLM
	HSA	7.75-9	NA	22	F	10.5	Pulverized BRICK and ROCK fragments
	HSA	17-22	NA	22	F	57,22	Shoe and soils OLM coated
SB-112	Sonic	37-40	NA	22	GT	15.5	Trace blebs
	Sonic	40-41	NA	22	GT	117	OLM saturated
SB-113	HSA	18.83-19	NA NA	20.5	F	91	OLM observed in pore spaces
SB-114	HSA	21-22	NA NA	22	F	125	OLM pools in pore spaces, heavy sheen
SB-115	Sonic	10-11	NA NA	11	F	16	Wood treated with creosote
	Sonic	6-12	NA NA	12	F	27	Sheen on water
SB-116	Sonic	12-13	NA NA	12	F	43	OLM coating
SB-118	Sonic	10-11.5	NA NA	15	F	0	Spotty sheen on water
OD-110	HSA	6.83-9.83	8.44	11.75	F	591,391,123	OLM throughout
SB-119 / MW-107	HSA	9.83-10.67	8.44	11.75	F	18	Slight sheen on water, bottom 2" is timber pieces
		0.00-10.07	U. 111	11.75	_ F	10	TORIGIN SINCELLOIT WATER, DOLLOITI Z. 15 IIIIDEI DIECES

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY

SUMMARY OF FIELD OBSERVATIONS

Boring ID	Drilling Method	Depth Range (feet bgs)	Depth to Groundwater	Depth to Clay	Unit Containing NAPL	PID Reading	Observation
CD 400	HSA	12-13	NA	17.5	F	NA	Sticky black OLM coating grains throughout, timber pieces top 8"-10"
SB-120	HSA	13-15	NA	17.5	F	NA	OLM blebs coating grains
	HSA	15-17.5	NA	17.5	F	NA	Black viscous OLM
	HSA	5-7	10.53-13	17.75	F	0	Metal and brick throughout
	HSA	7-10	10.53-13	17.75	F	0,0.3, 0.2,0.4	Pulverized brick and concrete pieces
	HSA	10-11	10.53-13	17.75	F	0.7	black OLM throughout
SB-121 / MW-108	HSA	11-11.75	10.53-13	17.75	F	149	Sluff (brick and concrete)
3B-121 / WWV-100	HSA	11.75-12.58	10.53-13	17.75	F	186	Black OLM coated slag
	HSA	13-14	10.53-13	17.75	F	85,77	Brick, glass and coal fragments, OLM saturated
	HSA	15-15.75	10.53-13	17.75	F	43	Sheen and trace OLM blebs
	HSA	15.75-17.75	10.53-13	17.75	F	33,215,48	Some OLM coating grains
	HSA	7-11	NA	NA	F	251,137	Red brick, OLM blebs throughout and sheen
SB-122	HSA	13-13.5	NA	NA	F	NA	Black OLM blebs throughout
	Sonic	19.86-20.5	NA	20	F	122,125	OLM
SB-123	Sonic	30-35	NA	20	GT	4,30	Brown OLM found throughout in pore spaces
	Sonic	10-16.5	9.55-10.35	21	F	8,27,175	OLM blebs, Black OLM saturated
SB-124 / MW-113A	Sonic	20-21.5	9.55-10.35	21	F	20.5	OLM blebs
	Sonic	16.5-18.5	NA	18.5	F	248	OLM present throughout
SB-125	Sonic	37-38	NA	18.5	GT	25,17	OLM present on coarse Gravel and in pore spaces between sands
	Sonic	10-12	12.37-14.85	12	F	10	OLM Blebs
SB-126 / MW-110A	Sonic	32-35	12.37-14.85	12	GT	161	TLM in pore spaces
	Sonic	37-38	12.37-14.85	12	GT	171	TLM in pore spaces
SB-126-MW-110B	Sonic	10-12	10.53-10.79	12	F	NA	OLM Blebs
	Sonic	11.5-12	11.53-11.67	18.5	F	4	Brick layer
05 405 1844 444	Sonic	13-18.5	11.53-11.67	18.5	F	1.5,132,38	OLM present throughout
SB-127-MW-111	Sonic	32-35	11.53-11.67	18.5	GT	2	TLM in pore spaces
	Sonic	37-38	11.53-11.67	18.5	GT	18	TLM in pore spaces
SB-128-MW-112A	Sonic	10-11	7.7-8.93	11	F	10	Sheen and some brown OLM blebs and stringers found throughout
	Sonic	9-10	8.52	NA	S	4.9	Stained, sheen and odors, NAPL blebs.
	Sonic	10-12	8.52	NA	S	65	Odors and sheen.
MW-4	Sonic	12-15	8.52	NA	GT	152	Petroleum-like sheen.
	Sonic	15-17.5	8.52	NA	GT	48	Sheen and odors.
	Sonic	20-20.7	8.52	NA	GT	54	Sheen and odors.
MW-5	Sonic	5-6.8	7.88	NA	F	4.2	Petroleum-like odor and staining.
G-AAIAI	Sonic	10-12	7.88	NA	S	4.3	Petroleum-like odor and slight sheen.

Notes:

- 1. Samples were collected by ARCADIS.
- 2. Sampling descriptions are from the field sampling team at the time of sample collection.
- 3. HSA = Hollow stem auger.
- 4. bgs = Below ground surface.
- 5. NA = Not applicable.
- 6. OLM = Oil-like material.
- 7. TLM = Tar-like material.
- 8. NAPL = Non-aqueous phase liquid.
- 9. PID = Photo ionization detector.
- 10. F = Fill.
- 11. S = Silt.
- 12. GT = Glacial till.

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY

WELL CONSTRUCTION SUMMARY

Location ID	Unit Screened	Total Well Depth	Dept Screened (ft. b	l Interval	Borehole Depth	Screen Slot Size	Screen Length	Sump Length	Depth to Water*	Installed by
		feet bgs	Тор	Bottom	feet bgs		feet	feet	feet bgs	
SB-102/MW-101A	Glacial Till	42	30	40	50	20	10	2	11.98*	Sonic
SB-102/MW-101B	Fill	18	6	16	18	20	10	2	12.05	Sonic
SB-106/MW-102	Fill	18	6	16	20	20	10	2	8.99	Sonic
SB-110/MW-103	Fill	23	12	22	23	20	10	1	16.9	HSA
SB-119/MW-107	Fill	14	3	13	13	20	10	1	8.4	HSA
SB-121-MW-108	Fill	19	8	18	19	20	10	1	10.43	HSA
SB-104/MW-109	Fill	21	9	19	21	20	10	2	11.05	HSA
SB-126/MW-110A	Glacial Till	40	33	38	47	20	5	2	13.06	Sonic
SB-126/MW-110B	Fill	18	6	16	18	20	10	2	10.71	Sonic
SB-127/MW-111	Fill	20	8	18	42	20	10	2	11.6	Sonic
SB-128/MW-112	Glacial Till	37	30	35	45	20	5	2	8.87	Sonic
SB-124/MW-113A	Glacial Till	39	32	37	50	20	5	2	10.06	Sonic
SB-124/MW-113B	Fill	18	6	16	18	20	10	2	10.4	Sonic
MW-4	Fill/Glacial Till	22	5	20	25	20	15	2		Sonic
MW-5	Fill/Glacial Till	19	7	17	20	20	10	2		Sonic
MW-01 OLD	NA	NA	NA	NA	NA	NA	NA	NA	12.93	OLD
MW-02 OLD	NA	NA	NA	NA	NA	NA	NA	NA	11.79	OLD
MW-03 OLD	NA	NA	NA	NA	NA	NA	NA	NA	7.94	OLD
MW-05 OLD	NA	14	4	14	15	10	10	N/A	6	HSA
MW-06 OLD	NA	15	5	15	16	10	10	N/A	7.63	Drive Casing
MW-07 OLD	NA	NA	NA	NA	NA	NA	NA	NA	17.9	OLD
MW-08 OLD	NA	NA	NA	NA	NA	NA	NA	NA	16.1	OLD

Notes:

PVC = polyvinyl chloride

NA = not available; well likely installed prior to SC

in. = inches

bgs = below ground surface

All elevations shown are Above Mean Sea Level (AMSL)

Northing and easting coordinates on New York State Plane grid

* Water level measurements listed here for MW-101 through MW113B were taken on 03/07/08 by Preston Berry and Craig Massaro. Water level measurements for MW-01 through MW-08 were collected on 3/17/08 by PB and CM

HSA = Hollow stem auger.

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY

WATER/NAPL LEVEL DATA

	Dept		•	o Product	•	o Bottom	
	Ground			bgs)		bgs)	
Location		4/27/2009	3/7/2008	4/27/2009	3/7/2008	4/27/2009	Remarks
MW-101A	11.98	12.1	ND	ND	41.4	41.5	Bailed out water out of the manhole. Faint MGP odors.
MW-101B	12.05	12.2	11.98	11.85	17.85	17.79	(3/7/08) Trace black oil on tape and probe tip. (4/27/09) Black OLM coating probe - OLM at water table.
MW-102	8.99	9.3	15.21	9.1	17.4	17.3	NAPL on probe.
MW-103	16.9	21.21	NA	See remarks	22.65	22.62	(3/7/08) Petroleum odor. Residual product on probe. (4/27/09) Trace OLM blebs on probe at the bottom of the well.
MW-107	8.4	8.69	8.35	See remarks	16.35	16.35	(3/7/08) Oil-coated probe. (4/27/09) OLM found sporadically on IP probe/tape. Some observed on nut/string. IP registered no tone when lowered to the bottom of the well.
MW-108	10.43	16.02	16.61	ND	18.8	18.75	Black NAPL on probe and tape.
MW-109	11.05	11.19	17.27	See remarks	20.4	20.3	(3/7/08) NAPL on probe and tape. (4/27/09) Trace OLM on IP probe and tape when retrieved from well. Trace OLM blebs on nut and string. Lots of sediment on bottom.
MW-110A	13.06	14.51	ND	ND	39.8	38.5	MGP odors and sediment on probe.
MW-110B	10.71	14.44	16.94	ND	17.9	17.9	(3/7/08) No NAPL on probe. (4/27/09) Moderate odor.
MW-111	11.6	15.34	17.83	ND	20.6	21	(3/7/08) Sediment on probe, no visual impacts. (4/27/09) Sediments on probe.
MW-112	8.87	11.21	ND	ND	37.4	37.28	MGP odors .
MW-113A	10.06	14.45	17	ND	39.5	39.11	NVI on probe.
MW-113B	10.4	14.34	16.62	ND	18	17.95	Product on tape. Heavy impacts.
MW-4		8.52		ND			
MW-5		7.88		ND			
MW-03-OLD		9.1		ND		20.23	
MW-06-OLD		7.56		ND		17.44	Roots and organic matter covering probe.
MW-07-OLD		18.1		See remarks		28.33	Black OLM covering bottom 4" of the probe in the bottom of the well. Thickness of DNAPL confirmed manually (nut and string).
MW-08-OLD		15.2		Trace NAPL at the bottom of		22.61	Some OLM on probe of IP, but no tone obtained.

Notes:

- 1. IP = Interphase probe.
- 2. NAPL = Non-aqueous phase liquid.
- 3. DNAPL = Dense non-aqueous phase liquid.
- 4. OLM = Oil-like material.
- 5. MGP = Manufactured gas plant.
- 6. ND = Not detected.
- 7. NVI = No visible impacts
- 8. MW = Monitoring well.
- 9. -- = Data is not available.
- 10. Groundwater elevations are presented in feet above mean sea level (AMSL).
- 11. ft bgs = Feet below ground surface.

TABLE 5

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC.

FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED VOCS

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-101	SB-101	SB-101	SB-102	SB-102	SB-102	SB-102
Sample Depth(Feet):	Commercial	Industrial	for Protection of		6 - 7	11 - 13	17 - 19	3 - 5	11 - 12	15 - 16	28 - 29
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	02/04/08	02/04/08	02/04/08	02/12/08	02/12/08	02/12/08	02/12/08
BTEX											
Benzene	44	89	0.06	mg/kg	0.0061 UJ	2.1 J	16	0.00093 J	2.7 J	26	0.0061 U
Ethylbenzene	390	780	1	mg/kg	0.0061 UJ	1.2 J	12	0.0062 U	1.7 J	180	0.0061 U
Toluene	500	1,000	0.7	mg/kg	0.0061 UJ	2.7	3.1	0.0062 U	1.4 J	9.7 U	0.0061 U
Xylenes (total)	500	1,000	1.6	mg/kg	0.0061 UJ	3.4	4.1	0.0062 U	3.2 J	26	0.0061 U
Total BTEX				mg/kg	ND	9.4 J	35.2	0.00093 J	9 J	232	ND
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	0.0061 UJ	2.5 U	2.7 U	0.0062 U	6.5 U	9.7 U	0.0061 U
1,1,2-Trichloroethane				mg/kg	0.0061 UJ	2.5 U	2.7 U	0.0062 U	6.5 U	9.7 U	0.0061 U
2-Butanone	500	1,000	0.12	mg/kg	0.012 UJ	2.5 UJ	2.7 UJ	0.012 U	6.5 UJ	9.7 UJ	0.012 U
2-Hexanone				mg/kg	0.012 UJ	2.5 U	2.7 U	0.012 U	6.5 U	9.7 U	0.012 U
Acetone	500	1,000	0.05	mg/kg	0.025 UJ	0.82 J	0.92 J	0.025 U	R	R	0.024 U
Carbon Disulfide				mg/kg	0.0061 UJ	2.5 U	2.7 U	0.0062 U	6.5 U	9.7 U	0.0025 J
Chlorobenzene	500	1,000	1.1	mg/kg	0.0061 UJ	2.5 U	2.7 U	0.0062 U	6.5 U	9.7 U	0.0061 U
Chloroform	350	700	0.37	mg/kg	0.0061 UJ	2.5 U	2.7 U	0.0062 U	6.5 U	9.7 U	0.0061 U
Chloromethane				mg/kg	0.0061 UJ	2.5 UJ	2.7 UJ	0.0062 U	6.5 UJ	9.7 UJ	0.0061 U
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.0061 UJ	2.5 U	2.7 U	0.0062 U	6.5 U	9.7 U	0.0061 U
Methylene Chloride	500	1,000	0.05	mg/kg	0.0018 J	2.5 U	0.24 J	0.025 U	6.5 U	9.7 U	0.024 U
Styrene				mg/kg	0.0061 UJ	2.5 U	2.7 U	0.0062 U	6.5 U	9.7 U	0.0061 U
Tetrachloroethene	150	300	1.3	mg/kg	0.0037 J	2.5 U	2.7 U	0.0062 U	6.5 U	9.7 U	0.0011 J
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.0061 UJ	2.5 U	2.7 U	0.0062 U	6.5 U	9.7 U	0.0061 U
Trichloroethene	200	400	0.47	mg/kg	0.0061 UJ	2.5 U	2.7 U	0.0062 U	6.5 U	9.7 U	0.0061 U
Total Other VOCs				mg/kg	0.0055 J	0.82 J	1.2 J	ND	ND	ND	0.0036 J

TABLE 5

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC.

FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-102	SB-102	SB-103	SB-103	SB-103	SB-104	SB-104
Sample Depth(Feet):	Commercial	Industrial	for Protection of		34 - 35	45 - 46	5 - 6	10 - 13	14 - 16	8 - 9	11 - 13
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	02/12/08	02/12/08	02/08/08	02/08/08	02/08/08	02/06/08	02/06/08
ВТЕХ											
Benzene	44	89	0.06	mg/kg	0.0056 U	0.0057 U	0.13	2.4 [2.2 J]	0.55 J	0.028 J	2.8
Ethylbenzene	390	780	1	mg/kg	0.0056 U	0.0057 U	0.65 D	3.3 [1.9 J]	12	4.6 D	1.7
Toluene	500	1,000	0.7	mg/kg	0.0056 U	0.0057 U	1.2 D	1.1 J [0.83 J]	0.28 J	0.036 U	2.4
Xylenes (total)	500	1,000	1.6	mg/kg	0.0056 U	0.0057 U	0.95	3.1 [2.3 J]	1.1 J	0.43	3.5
Total BTEX				mg/kg	ND	ND	2.93	9.9 J [7.23 J]	13.9 J	5.06 J	10.4
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	0.0056 U	0.0057 U	0.0065 U	1.2 U [2.4 U]	3.2 U	0.034 U	1.3 U
1,1,2-Trichloroethane				mg/kg	0.0056 U	0.0057 U	0.012	1.2 U [2.4 U]	3.2 U	0.034 U	1.3 U
2-Butanone	500	1,000	0.12	mg/kg	0.011 U	0.011 U	0.054	0.96 J [2.4 UJ]	3.2 U	0.067 U	1.3 UJ
2-Hexanone				mg/kg	0.011 U	0.011 U	0.013 U	1.2 U [2.4 U]	3.2 U	0.067 U	1.3 U
Acetone	500	1,000	0.05	mg/kg	0.022 U	0.023 U	0.19	0.40 J [R]	R	0.13 UJ	0.41 J
Carbon Disulfide				mg/kg	0.0056 U	0.0057 U	0.16	1.2 U [2.4 U]	3.2 U	0.0047 J	1.3 U
Chlorobenzene	500	1,000	1.1	mg/kg	0.0056 U	0.0057 U	0.0065 U	1.2 U [2.4 U]	3.2 U	0.034 U	1.3 U
Chloroform	350	700	0.37	mg/kg	0.0056 U	0.0057 U	0.0065 U	1.2 U [2.4 U]	3.2 U	0.034 U	1.3 U
Chloromethane				mg/kg	0.0056 U	0.0057 U	0.0065 U	1.2 UJ [2.4 UJ]	3.2 UJ	0.034 U	1.3 UJ
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.0056 U	0.0057 U	0.0065 U	1.2 U [2.4 U]	3.2 U	0.034 U	1.3 U
Methylene Chloride	500	1,000	0.05	mg/kg	0.022 U	0.023 U	0.026 U	1.2 U [2.4 U]	3.2 U	0.012 J	0.10 J
Styrene				mg/kg	0.0056 U	0.0057 U	0.20	1.2 U [2.4 U]	3.2 U	0.034 U	1.3 U
Tetrachloroethene	150	300	1.3	mg/kg	0.0056 U	0.0057 U	0.028	1.2 U [2.4 U]	3.2 U	0.034 U	0.17 J
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.0056 U	0.0057 U	0.0065 U	1.2 U [2.4 U]	3.2 U	0.034 U	1.3 U
Trichloroethene	200	400	0.47	mg/kg	0.0056 U	0.0057 U	0.0026 J	1.2 U [2.4 U]	3.2 U	0.034 U	1.3 U
Total Other VOCs				mg/kg	ND	ND	0.65 J	1.4 J [ND]	ND	0.017 J	0.68 J

TABLE 5

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC.

FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED VOCS

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-104	SB-105	SB-105	SB-105	SB-105	SB-105	SB-105
Sample Depth(Feet):	Commercial	Industrial	for Protection of		19 - 20	5 - 6	10 - 12	14 - 15	26 - 27	29 - 30	38 - 40
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	02/06/08	02/07/08	02/07/08	02/07/08	02/07/08	02/07/08	02/07/08
BTEX											
Benzene	44	89	0.06	mg/kg	5.6 J	0.0057 U	1.2	0.2 J	0.0061 U	0.0056 U	0.0057 U
Ethylbenzene	390	780	1	mg/kg	30	0.0014 J	1.9	280 D	0.013	0.0014 J	0.0057 U
Toluene	500	1,000	0.7	mg/kg	0.7 J	0.0057 U	4.6	0.17 J	0.0061 U	0.0056 U	0.0057 U
Xylenes (total)	500	1,000	1.6	mg/kg	3.8 J	0.0057 U	5.8	0.58 J	0.0061 U	0.0056 U	0.0057 U
Total BTEX				mg/kg	40.1 J	0.0014 J	13.5	281 J	0.013	0.0014 J	ND
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	7.6 U	0.0057 U	0.62 U	0.058 U	0.0061 U	0.0056 U	0.0057 U
1,1,2-Trichloroethane				mg/kg	7.6 U	0.0057 U	0.62 U	0.058 U	0.0061 U	0.0056 U	0.0057 U
2-Butanone	500	1,000	0.12	mg/kg	2.1 J	0.011 U	0.62 UJ	1.1 J	0.012 U	0.011 U	0.011 U
2-Hexanone				mg/kg	7.6 U	0.011 U	0.62 U	0.12 U	0.012 U	0.011 U	0.011 U
Acetone	500	1,000	0.05	mg/kg	2.2 J	0.023 UJ	0.26 J	9.2 DJ	0.025 UJ	0.023 UJ	0.023 UJ
Carbon Disulfide				mg/kg	7.6 U	0.0057 U	0.62 U	0.049 J	0.0061 U	0.0056 U	0.0057 U
Chlorobenzene	500	1,000	1.1	mg/kg	7.6 U	0.0057 U	0.62 U	0.058 U	0.0061 U	0.0056 U	0.0057 U
Chloroform	350	700	0.37	mg/kg	7.6 U	0.0057 U	0.62 U	0.058 U	0.0061 U	0.0056 U	0.0057 U
Chloromethane				mg/kg	7.6 UJ	0.0057 U	0.62 UJ	0.058 U	0.0061 U	0.0056 U	0.0057 U
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	7.6 U	0.0057 U	0.62 U	0.058 U	0.0061 U	0.0056 U	0.0057 U
Methylene Chloride	500	1,000	0.05	mg/kg	0.80 J	0.0023 J	0.085 J	0.034 J	0.0032 J	0.0020 J	0.0025 J
Styrene				mg/kg	7.6 U	0.0057 U	0.62 U	0.058 U	0.0061 U	0.0056 U	0.0057 U
Tetrachloroethene	150	300	1.3	mg/kg	7.6 U	0.0012 J	0.25 J	0.19 J	0.0043 J	0.0056 U	0.0057 U
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	7.6 U	0.0057 U	0.62 U	0.058 U	0.0061 U	0.0056 U	0.0057 U
Trichloroethene	200	400	0.47	mg/kg	7.6 U	0.0057 U	0.62 U	0.058 U	0.0061 U	0.0056 U	0.0057 U
Total Other VOCs				mg/kg	5.1 J	0.0035 J	0.60 J	11 J	0.0075 J	0.0020 J	0.0025 J

TABLE 5

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC.

FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-106	SB-106	SB-106	SB-106	SB-107	SB-107	SB-107
Sample Depth(Feet):	Commercial	Industrial	for Protection of		2 - 4	7 - 8	12 - 13	15 - 16	5 - 7	11 - 13	15 - 17
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	02/08/08	02/08/08	02/08/08	02/08/08	02/05/08	02/05/08	02/05/08
BTEX											
Benzene	44	89	0.06	mg/kg	0.0056 U	0.55 U	0.0067 U	0.0084 U	0.0057 U	3.8	3.7 J
Ethylbenzene	390	780	1	mg/kg	0.0011 J	0.55 U	0.0067 U	0.0014 J	0.0057 U	0.91 J	39
Toluene	500	1,000	0.7	mg/kg	0.0063	0.55 U	0.013	0.0078 J	0.0057 U	3.8	1.1 J
Xylenes (total)	500	1,000	1.6	mg/kg	0.0056 U	0.33 J	0.0067 U	0.0084 U	0.0057 U	3.2	2.2 J
Total BTEX				mg/kg	0.0074 J	0.33 J	0.013	0.0092 J	ND	11.7 J	46 J
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	0.0056 U	0.55 U	0.0067 U	0.0084 U	R	1.2 U	7.7 U
1,1,2-Trichloroethane				mg/kg	0.0056 U	0.55 U	0.0067 U	0.0084 U	0.0057 U	1.2 U	7.7 U
2-Butanone	500	1,000	0.12	mg/kg	0.011 U	5.4 J	0.13	0.023	0.011 U	1.2 UJ	7.7 UJ
2-Hexanone				mg/kg	0.011 U	0.55 U	0.013 U	0.017 U	0.011 U	1.2 U	7.7 U
Acetone	500	1,000	0.05	mg/kg	0.043 U	R	0.50 D	0.097	0.023 UJ	0.40 J	R
Carbon Disulfide				mg/kg	0.0056 U	0.55 U	0.0014 J	0.0088	0.00072 J	1.2 U	7.7 U
Chlorobenzene	500	1,000	1.1	mg/kg	0.0056 U	0.55 U	0.0067 U	0.0084 U	0.0057 U	1.2 U	7.7 U
Chloroform	350	700	0.37	mg/kg	0.0056 U	0.55 U	0.0067 U	0.0084 U	0.0057 U	1.2 U	7.7 U
Chloromethane				mg/kg	0.0056 U	0.55 UJ	0.0067 U	0.0084 U	0.0057 U	1.2 UJ	7.7 UJ
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.0056 U	0.55 U	0.0067 U	0.0084 U	0.0057 U	1.2 U	7.7 U
Methylene Chloride	500	1,000	0.05	mg/kg	0.022 U	0.55 U	0.027 U	0.033 U	0.0023 J	1.2 U	7.7 U
Styrene				mg/kg	0.0056 U	0.55 U	0.0067 U	0.0084 U	0.0057 U	1.2 U	7.7 U
Tetrachloroethene	150	300	1.3	mg/kg	0.0042 J	0.55 U	0.0055 J	0.0045 J	0.0028 J	1.2 U	7.7 U
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.0056 U	0.55 U	0.0067 U	0.0084 U	0.0057 U	1.2 U	7.7 U
Trichloroethene	200	400	0.47	mg/kg	0.0056 U	0.55 U	0.0067 U	0.0084 U	0.0057 U	1.2 U	7.7 U
Total Other VOCs				mg/kg	0.0042 J	5.4 J	0.64 J	0.13 J	0.0058 J	0.40 J	ND

TABLE 5

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC.

FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED VOCS

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-108	SB-109	SB-109	SB-109	SB-109	SB-109	SB-109
Sample Depth(Feet):	Commercial	Industrial	for Protection of		26	5	11 - 13	15 - 17	19	32 - 33	35 - 36
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	01/22/08	01/11/08	01/17/08	01/17/08	01/17/08	03/03/08	03/03/08
BTEX											
Benzene	44	89	0.06	mg/kg	13 J	0.0056 U	0.0063 U	0.28 J	0.57 J	0.0086 U	0.0059 U
Ethylbenzene	390	780	1	mg/kg	200	0.014	0.0063 U	1.4 U	4.8	0.0086 U	0.0059 U
Toluene	500	1,000	0.7	mg/kg	1.3 J	0.0056 U	0.0063 U	1.4 U	0.91 U	0.0038 J	0.00094 J
Xylenes (total)	500	1,000	1.6	mg/kg	36	0.019	0.0063 U	1.4 U	1.2	0.0086 U	0.0059 U
Total BTEX				mg/kg	250 J	0.033	ND	0.28 J	6.57 J	0.0038 J	0.00094 J
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	13 U	0.0056 U	0.0063 UJ	1.4 U	0.91 U	0.0086 U	0.0059 U
1,1,2-Trichloroethane				mg/kg	13 U	0.0056 U	0.0063 U	1.4 U	0.91 U	0.0086 U	0.0059 U
2-Butanone	500	1,000	0.12	mg/kg	13 UJ	0.011 U	0.013 U	2.8 J	0.91 UJ	0.017 UJ	0.012 UJ
2-Hexanone				mg/kg	13 U	0.011 U	0.013 U	1.4 U	0.91 U	0.017 U	0.012 U
Acetone	500	1,000	0.05	mg/kg	41 U	0.075	0.025 UJ	29	8.4	0.041 UJ	0.024 UJ
Carbon Disulfide				mg/kg	13 U	0.0056 U	0.0063 U	1.4 U	0.91 U	0.031 J	0.0038 J
Chlorobenzene	500	1,000	1.1	mg/kg	13 U	0.0056 U	0.0063 U	1.4 U	0.91 U	0.0086 U	0.0059 U
Chloroform	350	700	0.37	mg/kg	13 U	0.0056 U	0.0063 U	1.4 U	0.91 U	0.0086 U	0.0059 U
Chloromethane				mg/kg	13 U	0.0056 UJ	0.0063 U	1.4 U	0.91 U	0.0086 U	0.0059 U
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	13 U	0.0056 U	0.0063 U	1.4 U	0.91 U	0.0086 U	0.0059 U
Methylene Chloride	500	1,000	0.05	mg/kg	13 U	0.0020 J	0.0020 J	1.4 U	0.91 U	0.035 U	0.024 U
Styrene				mg/kg	13 U	0.0056 U	0.0063 U	1.4 U	0.91 U	0.0086 U	0.0059 U
Tetrachloroethene	150	300	1.3	mg/kg	13 U	0.010	0.0015 J	1.4 U	0.91 U	0.0086 U	0.0059 U
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	13 U	0.0056 U	0.0063 U	1.4 U	0.91 U	0.0086 U	0.0059 U
Trichloroethene	200	400	0.47	mg/kg	13 U	0.0056 U	0.0063 U	1.4 U	0.91 U	0.0086 U	0.0059 U
Total Other VOCs				mg/kg	ND	0.087 J	0.0035 J	32 J	8.4	0.031 J	0.0038 J

TABLE 5

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC.

FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-109	SB-110	SB-110	SB-110	SB-110	SB-111
Sample Depth(Feet):	Commercial	Industrial	for Protection of		48 - 49	9	17	20	22	13
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	03/03/08	01/23/08	01/23/08	01/23/08	01/23/08	01/18/08
ВТЕХ										
Benzene	44	89	0.06	mg/kg	0.0057 U	0.0031 J [0.03 UJ]	0.0062	17	8.4	1.3
Ethylbenzene	390	780	1	mg/kg	0.0057 U	0.029 J [0.076 J]	0.0076	59	43	0.41 J
Toluene	500	1,000	0.7	mg/kg	0.0057 U	0.0032 J [0.005 J]	0.0025 J	12	16	0.85
Xylenes (total)	500	1,000	1.6	mg/kg	0.0057 U	0.0079 J [0.021 J]	0.015	81	69	3.8
Total BTEX				mg/kg	ND	0.0432 J [0.102 J]	0.0313 J	169	136	6.36 J
Other Volatile Organics										
1,1,2,2-Tetrachloroethane				mg/kg	0.0057 U	0.0062 UJ [0.030 UJ]	0.0059 UJ	6.9 U	6.5 U	0.62 U
1,1,2-Trichloroethane				mg/kg	0.0057 U	0.0062 U [0.030 U]	0.0059 U	6.9 U	6.5 U	0.62 U
2-Butanone	500	1,000	0.12	mg/kg	0.011 UJ	0.012 U [0.060 U]	0.012 U	6.9 UJ	6.5 UJ	0.62 UJ
2-Hexanone				mg/kg	0.011 U	0.012 U [0.060 U]	0.012 U	6.9 U	6.5 U	0.62 U
Acetone	500	1,000	0.05	mg/kg	0.023 UJ	0.025 UJ [0.12 UJ]	0.094 J	17 U	16 U	2.4 J
Carbon Disulfide				mg/kg	0.0057 UJ	0.0062 U [0.030 U]	0.0059 U	6.9 U	6.5 U	0.62 U
Chlorobenzene	500	1,000	1.1	mg/kg	0.0057 U	0.0062 U [0.030 U]	0.0059 U	6.9 U	6.5 U	0.62 U
Chloroform	350	700	0.37	mg/kg	0.0057 U	0.0062 U [0.030 U]	0.0059 U	6.9 U	6.5 U	0.62 U
Chloromethane				mg/kg	0.0057 U	0.0062 U [0.030 U]	0.0059 U	6.9 U	6.5 U	0.62 U
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.0057 U	0.0062 U [0.030 U]	0.0059 U	6.9 U	6.5 U	0.62 U
Methylene Chloride	500	1,000	0.05	mg/kg	0.023 U	0.025 U [0.0090 J]	0.0019 J	6.9 U	6.5 U	0.62 U
Styrene				mg/kg	0.0057 U	0.0062 U [0.030 U]	0.0059 U	1.8 J	3.5 J	0.62 U
Tetrachloroethene	150	300	1.3	mg/kg	0.0057 U	0.0023 J [0.0056 J]	0.0045 J	6.9 U	6.5 U	0.62 U
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.0057 U	0.0062 U [0.030 U]	0.0059 U	6.9 U	6.5 U	0.62 U
Trichloroethene	200	400	0.47	mg/kg	0.0057 U	0.0062 U [0.030 U]	0.0059 U	6.9 U	6.5 U	0.62 U
Total Other VOCs				mg/kg	ND	0.0023 J [0.015 J]	0.10 J	1.8 J	3.5 J	2.4 J

TABLE 5

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC.

FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-111	SB-111	SB-111	SB-111	SB-111	SB-111
Sample Depth(Feet):	Commercial	Industrial	for Protection of		21	23	27 - 28	33 - 34	39 - 40	49 - 50
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	01/18/08	01/18/08	03/03/08	03/03/08	03/03/08	03/03/08
BTEX										
Benzene	44	89	0.06	mg/kg	11	0.19 D	0.0083 U	0.014	0.0057 U [0.0033 J]	0.0054 U
Ethylbenzene	390	780	1	mg/kg	110	0.16	0.0083 U	0.0082 U	0.00096 J [0.02 J]	0.0054 U
Toluene	500	1,000	0.7	mg/kg	1.5 J	0.12	0.0043 J	0.0082 U	0.0014 J [0.00083 J]	0.0054 U
Xylenes (total)	500	1,000	1.6	mg/kg	150	0.2	0.0083 U	0.0082 U	0.0057 U [0.0073]	0.0054 U
Total BTEX				mg/kg	273 J	0.67	0.0043 J	0.014	0.00236 J [0.0314 J]	ND
Other Volatile Organics										
1,1,2,2-Tetrachloroethane				mg/kg	3.0 U	0.0085 UJ	0.0083 U	0.0082 U	0.0057 U [0.0058 U]	0.0054 U
1,1,2-Trichloroethane				mg/kg	3.0 U	0.0085 U	0.0083 U	0.0082 U	0.0057 U [0.0058 U]	0.0054 U
2-Butanone	500	1,000	0.12	mg/kg	3.0 UJ	0.017 J	0.017 U	0.021 J	0.011 UJ [0.012 UJ]	0.011 U
2-Hexanone				mg/kg	3.0 U	0.017 U	0.017 U	0.016 U	0.011 U [0.012 U]	0.011 U
Acetone	500	1,000	0.05	mg/kg	7.6 UJ	0.044 UJ	0.051 J	0.033 UJ	0.023 UJ [0.027 UJ]	0.022 UJ
Carbon Disulfide				mg/kg	0.83 J	0.025	0.029 J	0.023 J	0.0057 UJ [0.0020 J]	0.0054 UJ
Chlorobenzene	500	1,000	1.1	mg/kg	3.0 U	0.0085 U	0.0083 U	0.0082 U	0.0057 U [0.0058 U]	0.0054 U
Chloroform	350	700	0.37	mg/kg	3.0 U	0.0085 U	0.0083 U	0.0082 U	0.0057 U [0.0058 U]	0.0054 U
Chloromethane				mg/kg	3.0 U	0.0085 U	0.0083 U	0.0082 U	0.0057 U [0.0058 U]	0.0054 U
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	3.0 U	0.0085 U	0.0083 U	0.0082 U	0.0057 U [0.0058 U]	0.0054 U
Methylene Chloride	500	1,000	0.05	mg/kg	3.0 U	0.034 U	0.0077 J	0.033 U	0.023 U [0.023 U]	0.022 U
Styrene				mg/kg	3.0 U	0.0085 U	0.0083 U	0.0082 U	0.0057 U [0.0058 U]	0.0054 U
Tetrachloroethene	150	300	1.3	mg/kg	3.0 U	0.0019 J	0.0083 U	0.0082 U	0.0057 U [0.0058 U]	0.0054 U
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	3.0 U	0.0085 U	0.0083 U	0.0082 U	0.0057 U [0.0058 U]	0.0054 U
Trichloroethene	200	400	0.47	mg/kg	3.0 U	0.0085 U	0.0083 U	0.0082 U	0.0057 U [0.0058 U]	0.0054 U
Total Other VOCs				mg/kg	0.83 J	0.044 J	0.088 J	0.044 J	ND [0.0020 J]	ND

TABLE 5

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC.

FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY
SOIL SAMPLING RESULTS FOR DETECTED VOCS

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-112	SB-112	SB-112	SB-112	SB-112	SB-112	SB-112
Sample Depth(Feet):	Commercial	Industrial	for Protection of		3	11 - 13	21	22 - 23	31 - 32	40 - 41	48 - 49
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	01/14/08	01/16/08	01/16/08	01/16/08	03/05/08	03/05/08	03/05/08
BTEX											
Benzene	44	89	0.06	mg/kg	0.027 U	0.0059 U	0.21 J	0.39 DJ	0.0083 U	7.8	0.028
Ethylbenzene	390	780	1	mg/kg	0.027 U	0.0059 U	6.2	0.6 DJ	0.0083 U	240 D	0.16
Toluene	500	1,000	0.7	mg/kg	0.027 U	0.0059 U	1.6 U	0.022 J	0.0021 J	1.5 J	0.006 U
Xylenes (total)	500	1,000	1.6	mg/kg	0.19	0.0059 U	6.2	0.38	0.0083 U	370	0.21
Total BTEX				mg/kg	0.19	ND	12.6 J	1.39 J	0.0021 J	619 J	0.398
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	0.027 UJ	0.0059 UJ	1.6 U	0.0088 UJ	0.0083 U	5.5 U	0.0060 U
1,1,2-Trichloroethane				mg/kg	0.027 U	0.0059 U	1.6 U	0.0088 U	0.0083 U	5.5 U	0.0060 U
2-Butanone	500	1,000	0.12	mg/kg	0.055 U	0.012 U	3.2 J	0.012 J	0.017 U	5.5 U	0.010 J
2-Hexanone				mg/kg	0.055 U	0.012 U	1.6 U	0.018 U	0.017 U	5.5 U	0.012 U
Acetone	500	1,000	0.05	mg/kg	0.11 UJ	0.024 UJ	1.6 J	0.035 UJ	0.043 J	14 UJ	0.027 UJ
Carbon Disulfide				mg/kg	0.027 U	0.0059 U	1.6 U	0.0055 J	0.030 J	5.5 U	0.0060 UJ
Chlorobenzene	500	1,000	1.1	mg/kg	0.027 U	0.0059 U	1.6 U	0.0088 U	0.0083 U	5.5 U	0.0060 U
Chloroform	350	700	0.37	mg/kg	0.027 U	0.0059 U	1.6 U	0.0088 U	0.0083 U	5.5 U	0.00088 J
Chloromethane				mg/kg	0.027 U	0.0059 U	1.6 U	0.0088 UJ	0.0083 U	5.5 U	0.025
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.027 U	0.0059 U	1.6 U	0.0088 U	0.0083 U	5.5 U	0.0060 U
Methylene Chloride	500	1,000	0.05	mg/kg	0.017 J	0.024 U	1.6 U	0.035 U	0.0049 J	5.5 U	0.0025 J
Styrene				mg/kg	0.027 U	0.0059 U	1.6 U	0.0088 U	0.0083 U	5.5 U	0.0060 U
Tetrachloroethene	150	300	1.3	mg/kg	0.11	0.0059 U	1.6 U	0.0030 J	0.0083 U	5.5 U	0.0060 U
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.027 U	0.0059 U	1.6 U	0.0088 U	0.0083 U	5.5 U	0.0060 U
Trichloroethene	200	400	0.47	mg/kg	0.027 U	0.0059 U	1.6 U	0.0088 U	0.0083 U	5.5 U	0.0060 U
Total Other VOCs				mg/kg	0.13 J	ND	4.8 J	0.021 J	0.078 J	ND	0.038 J

TABLE 5

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC.

FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-113	SB-113	SB-113	SB-113	SB-114	SB-114	SB-114
Sample Depth(Feet):	Commercial	Industrial	for Protection of		11	13	19	23	9	13	21
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	01/18/08	01/18/08	01/18/08	01/18/08	01/24/08	01/24/08	01/24/08
BTEX											
Benzene	44	89	0.06	mg/kg	0.0062 U	0.12 J	2.5	0.0087	0.0055 U	0.006 U	15 J
Ethylbenzene	390	780	1	mg/kg	0.0062 U	0.15 J	40	0.031	0.0055 U	0.006 U	190 D
Toluene	500	1,000	0.7	mg/kg	0.0011 J	0.083 J	0.47 J	0.0083 U	0.0055 U	0.0022 J	0.37 J
Xylenes (total)	500	1,000	1.6	mg/kg	0.0062 U	0.38 J	22	0.02	0.0055 U	0.006 U	10 J
Total BTEX				mg/kg	0.0011 J	0.733 J	65 J	0.0597	ND	0.0022 J	215 J
Other Volatile Organics											'
1,1,2,2-Tetrachloroethane				mg/kg	0.0062 UJ	0.64 U	1.3 U	0.0083 UJ	0.0055 UJ	0.0060 UJ	1.4 UJ
1,1,2-Trichloroethane				mg/kg	0.0062 U	0.64 U	1.3 U	0.0083 U	0.0055 U	0.0060 U	1.4 UJ
2-Butanone	500	1,000	0.12	mg/kg	0.012 U	0.64 UJ	1.3 U	0.011 J	0.011 U	0.012	1.4 UJ
2-Hexanone				mg/kg	0.012 U	0.64 U	1.3 U	0.017 U	0.011 U	0.012 U	1.4 UJ
Acetone	500	1,000	0.05	mg/kg	0.025 UJ	2.2 UJ	0.90 J	0.033 UJ	0.022 UJ	0.036 J	3.5 UJ
Carbon Disulfide				mg/kg	0.0062 U	0.64 U	1.3 UJ	0.019	0.0055 U	0.0060 U	1.4 UJ
Chlorobenzene	500	1,000	1.1	mg/kg	0.0062 U	0.64 U	1.3 U	0.0083 U	0.0055 U	0.0060 U	1.4 UJ
Chloroform	350	700	0.37	mg/kg	0.0062 U	0.64 U	1.3 U	0.0083 U	0.0055 U	0.0060 U	1.4 UJ
Chloromethane				mg/kg	0.0062 U	0.64 U	1.3 U	0.0083 U	0.0055 U	0.0060 U	1.4 UJ
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.0062 U	0.64 U	1.3 U	0.0083 U	0.0055 U	0.0060 U	1.4 UJ
Methylene Chloride	500	1,000	0.05	mg/kg	0.0030 J	0.64 U	1.3 U	0.033 U	0.0032 J	0.0064 J	1.4 UJ
Styrene				mg/kg	0.0062 U	0.64 U	1.3 U	0.0083 U	0.0055 U	0.0060 U	1.4 UJ
Tetrachloroethene	150	300	1.3	mg/kg	0.0037 J	0.64 U	1.3 U	0.0017 J	0.0024 J	0.034	1.4 UJ
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.0062 U	0.64 U	1.3 U	0.0083 U	0.0055 U	0.0060 U	1.4 UJ
Trichloroethene	200	400	0.47	mg/kg	0.0062 U	0.64 U	1.3 U	0.0083 U	0.0055 U	0.0060 U	1.4 UJ
Total Other VOCs				mg/kg	0.0067 J	ND	0.90 J	0.032 J	0.0056 J	0.088 J	ND

TABLE 5 CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-114	SB-114	SB-114	SB-115	SB-115	SB-115	SB-116
Sample Depth(Feet):	Commercial	Industrial	for Protection of		29 - 31	40 - 41	44 - 45	10 - 11	16 - 17	24 - 25	5.5
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	01/28/08	01/29/08	01/29/08	02/14/08	02/14/08	02/14/08	02/18/08
BTEX											
Benzene	44	89	0.06	mg/kg	0.019	0.0057 U	0.0058 U	0.0082 U	0.0095 U	0.027	0.0057 U
Ethylbenzene	390	780	1	mg/kg	0.0036 J	0.0057 U	0.0058 U	0.0082 U	0.0095 U	0.0077 U	0.0057 U
Toluene	500	1,000	0.7	mg/kg	0.0045 J	0.0057 U	0.0058 U	0.0082 U	0.032	0.0077 U	0.0023 J
Xylenes (total)	500	1,000	1.6	mg/kg	0.0091 U	0.0057 U	0.0058 U	0.0082 U	0.0095 U	0.0077 U	0.0057 U
Total BTEX				mg/kg	0.0271 J	ND	ND	ND	0.032	0.027	0.0023 J
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	0.0091 U	0.0057 U	0.0058 U	0.0088	0.0095 U	0.0077 U	0.0057 U
1,1,2-Trichloroethane				mg/kg	0.0091 U	0.0057 U	0.0058 U	0.0082 U	0.0095 U	0.0077 U	0.0057 U
2-Butanone	500	1,000	0.12	mg/kg	0.0080 J	0.011 UJ	0.012 UJ	0.016 U	0.019 U	0.015 U	0.014 J
2-Hexanone				mg/kg	0.018 UJ	0.011 U	0.012 U	0.016 U	0.019 U	0.015 U	0.011 U
Acetone	500	1,000	0.05	mg/kg	0.036 UJ	0.023 UJ	0.023 UJ	0.033 U	0.038 U	0.031 U	0.047 J
Carbon Disulfide				mg/kg	0.034	0.0057 U	0.0058 U	0.0062 J	0.025	0.012	0.014
Chlorobenzene	500	1,000	1.1	mg/kg	0.0091 U	0.0057 U	0.0058 U	0.0082 U	0.0095 U	0.0077 U	0.0057 U
Chloroform	350	700	0.37	mg/kg	0.0091 U	0.0057 U	0.0058 U	0.0082 U	0.0095 U	0.0077 U	0.0057 U
Chloromethane				mg/kg	0.0091 U	0.0057 U	0.0058 U	0.0082 U	0.0095 U	0.0077 U	0.0057 U
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.0091 U	0.0057 U	0.0058 U	0.0082 U	0.0095 U	0.0077 U	0.0057 U
Methylene Chloride	500	1,000	0.05	mg/kg	0.0032 J	0.0027 J	0.0035 J	0.033 U	0.038 U	0.031 U	0.023 U
Styrene				mg/kg	0.0091 UJ	0.0057 U	0.0058 U	0.0082 U	0.0095 U	0.0077 U	0.0057 U
Tetrachloroethene	150	300	1.3	mg/kg	0.0034 J	0.00093 J	0.0039 J	0.0082 U	0.017	0.0077 U	0.0020 J
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.0091 U	0.0057 U	0.0058 U	0.0082 U	0.0095 U	0.0077 U	0.0057 U
Trichloroethene	200	400	0.47	mg/kg	0.0091 U	0.0057 U	0.0058 U	0.0082 U	0.0095 U	0.0077 U	0.0057 U
Total Other VOCs				mg/kg	0.049 J	0.0036 J	0.0074 J	0.015 J	0.042	0.012	0.077 J

TABLE 5 CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-116	SB-116	SB-116	SB-116	SB-118	SB-118	SB-118
Sample Depth(Feet):	Commercial	Industrial	for Protection of		12 - 13	19 - 20	29 - 30	31 - 32	4 - 5	10 - 11	14.5 - 15
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	02/18/08	02/18/08	02/18/08	02/18/08	03/07/08	03/07/08	03/07/08
BTEX											
Benzene	44	89	0.06	mg/kg	0.011 U	0.009 U	0.0064 U	0.0058 U	0.0067 U	0.0058 U	0.0056 U
Ethylbenzene	390	780	1	mg/kg	0.27	0.009 U	0.0026 J	0.0058 U	0.0067 U	0.0058 U	0.0056 U
Toluene	500	1,000	0.7	mg/kg	0.0015 J	0.0093	0.0019 J	0.0011 J	0.0067 U	0.0058 U	0.0056 U
Xylenes (total)	500	1,000	1.6	mg/kg	0.069	0.009 U	0.0064 U	0.0058 U	0.0067 U	0.0058 U	0.0056 U
Total BTEX				mg/kg	0.341 J	0.0093	0.0045 J	0.0011 J	ND	ND	ND
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	0.011 U	0.0090 U	0.0064 U	0.0058 U	0.0067 U	0.0058 U	0.0056 U
1,1,2-Trichloroethane				mg/kg	0.011 U	0.0090 U	0.0064 U	0.0058 U	0.0067 U	0.0058 U	0.0056 U
2-Butanone	500	1,000	0.12	mg/kg	0.022 UJ	0.018 UJ	0.013 UJ	0.012 UJ	0.013 U	0.012 U	0.011 U
2-Hexanone				mg/kg	0.022 U	0.018 U	0.013 U	0.012 U	0.013 U	0.012 U	0.011 U
Acetone	500	1,000	0.05	mg/kg	0.043 UJ	0.041 UJ	0.032 UJ	0.091 J	0.027 UJ	0.011 J	0.0085 J
Carbon Disulfide				mg/kg	0.0096 J	0.024	0.0016 J	0.0015 J	0.0067 U	0.0045 J	0.0012 J
Chlorobenzene	500	1,000	1.1	mg/kg	0.011 U	0.0090 U	0.0064 U	0.0058 U	0.0067 U	0.0058 U	0.0056 U
Chloroform	350	700	0.37	mg/kg	0.011 U	0.0090 U	0.0064 U	0.0058 U	0.0067 U	0.0058 U	0.0056 U
Chloromethane				mg/kg	0.011 U	0.0090 U	0.0064 U	0.0058 U	0.0067 U	0.0058 U	0.0056 U
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.011 U	0.0090 U	0.0064 U	0.0058 U	0.0067 U	0.0058 U	0.0056 U
Methylene Chloride	500	1,000	0.05	mg/kg	0.043 U	0.0053 J	0.0018 J	0.0022 J	0.0043 J	0.0025 J	0.0034 J
Styrene				mg/kg	0.011 U	0.0090 U	0.0064 U	0.0058 U	0.0067 U	0.0058 U	0.0056 U
Tetrachloroethene	150	300	1.3	mg/kg	0.011 U	0.0083 J	0.0012 J	0.0058 U	0.0067 U	0.0058 U	0.0056 U
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.011 U	0.0090 U	0.0064 U	0.0058 U	0.0067 U	0.0058 U	0.0056 U
Trichloroethene	200	400	0.47	mg/kg	0.011 U	0.0090 U	0.0064 U	0.0058 U	0.0067 U	0.0058 U	0.0056 U
Total Other VOCs				mg/kg	0.0096 J	0.038 J	0.0046 J	0.095 J	0.0043 J	0.018 J	0.013 J

TABLE 5 CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-118	SB-118	SB-119	SB-119	SB-119	SB-119	SB-120
Sample Depth(Feet):	Commercial	Industrial	for Protection of		22 - 23	32 - 33	5	7 - 8	9 - 10	11 - 12	6
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	03/07/08	03/07/08	01/21/08	01/31/08	01/31/08	01/31/08	01/25/08
BTEX											
Benzene	44	89	0.06	mg/kg	0.0085 U	0.006 U	0.005 J	1.2 U	0.006 U	0.0099 J	0.0025 J
Ethylbenzene	390	780	1	mg/kg	0.0085 U	0.006 U	0.029 U	1.2 U	0.006 U	0.18 J	0.0071 U
Toluene	500	1,000	0.7	mg/kg	0.0038 J	0.00072 J	0.0035 J	1.2 U	0.006 U	0.0063 U	0.0041 J
Xylenes (total)	500	1,000	1.6	mg/kg	0.0085 U	0.006 U	0.017 J	0.35 J	0.006 U	0.082 J	0.0071 U
Total BTEX				mg/kg	0.0038 J	0.00072 J	0.0255 J	0.35 J	ND	0.272 J	0.0066 J
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	0.0085 U	0.0060 U	0.029 UJ	2.2 J	0.0060 U	0.0063 U	0.0071 U
1,1,2-Trichloroethane				mg/kg	0.0085 U	0.0060 U	0.029 U	1.2 U	0.0060 U	0.0063 U	0.0071 U
2-Butanone	500	1,000	0.12	mg/kg	0.017 U	0.16	0.058 U	7.6 J	0.012 U	0.013 U	0.014 UJ
2-Hexanone				mg/kg	0.017 U	0.045	0.058 U	1.2 UJ	0.012 U	0.013 U	0.014 UJ
Acetone	500	1,000	0.05	mg/kg	0.031 J	0.16 DJ	0.12 UJ	R	0.024 UJ	0.038 UJ	0.028 UJ
Carbon Disulfide				mg/kg	0.012	0.0015 J	0.029 U	1.2 U	0.0060 U	0.0058 J	0.0071 U
Chlorobenzene	500	1,000	1.1	mg/kg	0.0085 U	0.0060 U	0.029 U	1.2 U	0.0060 U	0.0063 U	0.0071 U
Chloroform	350	700	0.37	mg/kg	0.0085 U	0.0060 U	0.029 U	1.2 U	0.0060 U	0.0063 U	0.0071 U
Chloromethane				mg/kg	0.0085 U	0.0060 U	0.029 U	1.2 U	0.0060 U	0.0063 U	0.0071 U
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.0085 U	0.0060 U	0.029 U	1.2 U	0.0060 U	0.0063 U	0.024
Methylene Chloride	500	1,000	0.05	mg/kg	0.0068 J	0.0032 J	0.12 U	1.2 U	0.0027 J	0.0027 J	0.0058 J
Styrene				mg/kg	0.0085 U	0.0060 U	0.029 U	1.2 U	0.0060 U	0.0063 U	0.0071 UJ
Tetrachloroethene	150	300	1.3	mg/kg	0.0085 U	0.0060 U	0.029 U	1.2 UJ	0.026 J	0.032 J	0.21
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.0085 U	0.0060 U	0.029 U	1.2 U	0.0060 U	0.0063 U	0.0035 J
Trichloroethene	200	400	0.47	mg/kg	0.0085 U	0.0060 U	0.029 U	1.2 UJ	0.0060 U	0.0063 U	0.0054 J
Total Other VOCs				mg/kg	0.050 J	0.37 J	ND	9.8 J	0.029 J	0.041 J	0.25 J

TABLE 5 CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-120	SB-120	SB-121	SB-121	SB-121	SB-121	SB-123
Sample Depth(Feet):	Commercial	Industrial	for Protection of		13	17	6 - 7	10 - 11	13 - 14	17	4 - 5
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	01/25/08	01/25/08	01/30/08	01/30/08	01/30/08	01/30/08	02/28/08
BTEX											
Benzene	44	89	0.06	mg/kg	1.1	0.27 J	0.0057 U	0.032 U	9.3 [8.4]	1 J	0.0054 U
Ethylbenzene	390	780	1	mg/kg	0.36 J	4.7	0.0057 U	0.032 U	11 [9.6]	25	0.0054 U
Toluene	500	1,000	0.7	mg/kg	1	2.8 U	0.0057 U	0.032 U	10 [9.9]	1.4 J	0.003 J
Xylenes (total)	500	1,000	1.6	mg/kg	1.9	0.58 J	0.0057 U	0.032 U	21 [20]	5.6	0.0054 U
Total BTEX				mg/kg	4.36 J	5.55 J	ND	ND	51.3 [47.9]	33 J	0.003 J
Other Volatile Organics											-
1,1,2,2-Tetrachloroethane				mg/kg	0.63 U	2.8 U	0.0057 U	0.032 U	2.4 U [2.3 U]	1.6 UJ	0.0054 U
1,1,2-Trichloroethane				mg/kg	0.63 U	2.8 U	0.0057 U	0.032 U	2.4 U [2.3 U]	1.6 U	0.0054 U
2-Butanone	500	1,000	0.12	mg/kg	0.63 UJ	2.8 UJ	0.011 U	0.064 UJ	3.2 UJ [2.6 UJ]	1.8 UJ	0.011 U
2-Hexanone				mg/kg	0.63 U	2.8 U	0.011 U	0.064 U	2.4 UJ [2.3 UJ]	1.6 UJ	0.011 U
Acetone	500	1,000	0.05	mg/kg	1.6 UJ	7.0 UJ	0.0046 J	0.13 UJ	R [R]	R	0.022 UJ
Carbon Disulfide				mg/kg	0.63 U	2.8 U	0.0057 U	0.032 U	2.4 U [2.3 U]	1.6 U	0.0054 UJ
Chlorobenzene	500	1,000	1.1	mg/kg	0.63 U	2.8 U	0.0057 U	0.032 U	2.4 U [2.3 U]	1.6 U	0.0054 U
Chloroform	350	700	0.37	mg/kg	0.63 U	2.8 U	0.0057 U	0.032 U	2.4 U [2.3 U]	1.6 U	0.0054 U
Chloromethane				mg/kg	0.63 U	2.8 U	0.0057 U	0.032 U	2.4 UJ [2.3 UJ]	1.6 UJ	0.0054 U
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.63 U	2.8 U	0.0057 U	0.032 U	2.4 U [2.3 U]	1.6 U	0.0054 U
Methylene Chloride	500	1,000	0.05	mg/kg	0.63 U	2.8 U	0.023 U	0.018 J	2.4 U [2.3 U]	1.6 U	0.0034 J
Styrene				mg/kg	0.63 U	2.8 U	0.0057 U	0.032 U	2.5 [2.5]	0.48 J	0.0054 U
Tetrachloroethene	150	300	1.3	mg/kg	0.63 U	2.8 U	0.0032 J	0.0086 J	2.4 UJ [2.3 UJ]	1.6 U	0.0054 U
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.63 U	2.8 U	0.0057 U	0.032 U	2.4 U [2.3 U]	1.6 U	0.0054 U
Trichloroethene	200	400	0.47	mg/kg	0.63 U	2.8 U	0.0057 U	0.032 U	2.4 UJ [2.3 UJ]	1.6 U	0.0054 U
Total Other VOCs				mg/kg	ND	ND	0.0078 J	0.027 J	2.5 [2.5]	0.48 J	0.0034 J

TABLE 5 CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-123	SB-123	SB-123	SB-123	SB-124	SB-124	SB-124
Sample Depth(Feet):	Commercial	Industrial	for Protection of		19 - 20	23 - 24	34 - 35	44 - 45	9 - 10	15 - 16	20 - 21
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	02/28/08	02/28/08	02/28/08	02/28/08	03/05/08	03/05/08	03/05/08
BTEX											
Benzene	44	89	0.06	mg/kg	1.7 J	0.0085 U	4.6 U	0.0056 U	0.0066 U	12	1.9 D
Ethylbenzene	390	780	1	mg/kg	43	0.0085 U	20	0.0056 U	0.0066 U	260	20 D
Toluene	500	1,000	0.7	mg/kg	0.85 J	0.0039 J	4.6 U	0.0056 U	0.0066 U	13	0.067 J
Xylenes (total)	500	1,000	1.6	mg/kg	35	0.0085 U	54	0.0056 U	0.0066 U	340	0.26 J
Total BTEX				mg/kg	80.6 J	0.0039 J	74	ND	ND	625	22.2 J
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	6.4 U	0.0085 U	4.6 U	0.0056 U	0.0066 U	2.7 U	0.0081 UJ
1,1,2-Trichloroethane				mg/kg	6.4 U	0.0085 U	4.6 U	0.0056 U	0.0066 U	2.7 U	0.0081 UJ
2-Butanone	500	1,000	0.12	mg/kg	6.4 U	0.017 U	4.6 U	0.011 U	0.013 U	2.7 U	0.016 UJ
2-Hexanone				mg/kg	6.4 U	0.017 U	4.6 U	0.011 U	0.013 U	2.7 U	0.016 UJ
Acetone	500	1,000	0.05	mg/kg	16 UJ	0.056 J	11 UJ	0.022 UJ	0.027 UJ	3.0 J	0.033 UJ
Carbon Disulfide				mg/kg	6.4 U	0.030 J	4.6 U	0.0056 UJ	0.0066 U	2.7 U	0.0020 J
Chlorobenzene	500	1,000	1.1	mg/kg	6.4 U	0.0085 U	4.6 U	0.0056 U	0.0066 U	2.7 U	0.0023 J
Chloroform	350	700	0.37	mg/kg	6.4 U	0.0085 U	4.6 U	0.0056 U	0.0066 U	2.7 U	0.0081 UJ
Chloromethane				mg/kg	6.4 UJ	0.0085 U	4.6 UJ	0.0056 U	0.0066 U	2.7 U	0.0081 UJ
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	6.4 U	0.0085 U	4.6 U	0.0056 U	0.0066 U	2.7 U	0.0081 UJ
Methylene Chloride	500	1,000	0.05	mg/kg	6.4 U	0.0067 J	4.6 U	0.0050 J	0.0020 J	2.7 U	0.0025 J
Styrene				mg/kg	6.4 U	0.0085 U	1.2 J	0.0056 U	0.0066 U	2.7 U	0.0081 UJ
Tetrachloroethene	150	300	1.3	mg/kg	6.4 U	0.0085 U	4.6 U	0.0056 U	0.0066 U	2.7 U	0.0081 UJ
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	6.4 U	0.0085 U	4.6 U	0.0056 U	0.0066 U	2.7 U	0.0081 UJ
Trichloroethene	200	400	0.47	mg/kg	6.4 U	0.0085 U	4.6 U	0.0056 U	0.0066 U	2.7 U	0.0081 UJ
Total Other VOCs				mg/kg	ND	0.093 J	1.2 J	0.0050 J	0.0020 J	3.0 J	0.0068 J

TABLE 5 CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-124	SB-124	SB-124	SB-125	SB-125	SB-125	SB-125
Sample Depth(Feet):	Commercial	Industrial	for Protection of		22 - 23	36 - 36.5	47 - 48	5 - 6	11 - 13	17 - 18	23 - 25
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	03/05/08	03/05/08	03/05/08	02/19/08	02/19/08	02/19/08	02/19/08
BTEX											
Benzene	44	89	0.06	mg/kg	0.029	0.028 U	0.0054 U	0.0056 U	0.0013 J	32	0.0083 UJ
Ethylbenzene	390	780	1	mg/kg	0.0048 J	0.3 J	0.0054 U	0.001 J	0.0019 J	550	0.0083 UJ
Toluene	500	1,000	0.7	mg/kg	0.025	0.0061 J	0.0054 U	0.0073 J	0.0021 J	6.7 J	0.004 J
Xylenes (total)	500	1,000	1.6	mg/kg	0.0066 J	0.33	0.0054 U	0.035 J	0.0068 U	420	0.0083 UJ
Total BTEX				mg/kg	0.0654 J	0.636 J	ND	0.0433 J	0.0053 J	1,010 J	0.004 J
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	0.0086 U	0.028 U	0.0054 U	R	0.0068 U	20 U	0.0083 UJ
1,1,2-Trichloroethane				mg/kg	0.0086 U	0.028 U	0.0054 U	0.0056 U	0.0068 U	20 U	0.0083 UJ
2-Butanone	500	1,000	0.12	mg/kg	0.017 U	0.056 U	0.011 U	0.021 UJ	0.044 J	20 U	0.017 UJ
2-Hexanone				mg/kg	0.017 U	0.056 U	0.011 U	0.011 UJ	0.014 U	20 U	0.017 UJ
Acetone	500	1,000	0.05	mg/kg	0.034 UJ	0.11 UJ	0.022 UJ	0.057 J	0.14 J	50 UJ	0.033 UJ
Carbon Disulfide				mg/kg	0.010	0.028 U	0.0054 U	0.0014 J	0.0043 J	20 U	0.024 J
Chlorobenzene	500	1,000	1.1	mg/kg	0.0086 U	0.028 U	0.0054 U	0.0056 UJ	0.0068 U	20 U	0.0083 UJ
Chloroform	350	700	0.37	mg/kg	0.0086 U	0.028 U	0.0054 U	0.0056 U	0.0068 U	20 U	0.0083 UJ
Chloromethane				mg/kg	0.0086 U	0.028 U	0.0054 U	0.0056 U	0.0068 U	20 U	0.0083 UJ
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.0086 U	0.028 U	0.0054 U	0.0056 U	0.0068 U	20 U	0.0083 UJ
Methylene Chloride	500	1,000	0.05	mg/kg	0.0044 J	0.013 J	0.0017 J	0.023 U	0.0022 J	20 U	0.0051 J
Styrene				mg/kg	0.0086 U	0.028 U	0.0054 U	0.0056 UJ	0.0068 U	20 U	0.0083 UJ
Tetrachloroethene	150	300	1.3	mg/kg	0.0086 U	0.028 U	0.0054 U	0.0044 J	0.0068 U	20 U	0.0015 J
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.0086 U	0.028 U	0.0054 U	0.0056 U	0.0068 U	20 U	0.0083 UJ
Trichloroethene	200	400	0.47	mg/kg	0.0086 U	0.028 U	0.0054 U	0.0056 U	0.0068 U	20 UJ	0.0083 UJ
Total Other VOCs				mg/kg	0.014 J	0.013 J	0.0017 J	0.063 J	0.19 J	ND	0.031 J

TABLE 5 CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-125	SB-125	SB-126	SB-126	SB-126	SB-126	SB-126
Sample Depth(Feet):	Commercial	Industrial	for Protection of		37 - 38	39 - 40	3 - 5	15 - 16	25 - 26	34 - 35	37 - 38
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	02/19/08	02/19/08	02/20/08	02/20/08	02/20/08	02/20/08	02/20/08
BTEX											
Benzene	44	89	0.06	mg/kg	2.4 U	0.0065 UJ	0.0055 U	0.0016 J	0.0031 J	0.38 J	1.4 U
Ethylbenzene	390	780	1	mg/kg	55	0.0065 UJ	0.0055 U	0.2	0.28	30	21
Toluene	500	1,000	0.7	mg/kg	0.35 J	0.0013 J	0.0014 J	0.0065	0.0095	1.8	0.62 J
Xylenes (total)	500	1,000	1.6	mg/kg	58	0.0065 UJ	0.0055 UJ	0.081	0.43	31	27
Total BTEX		-		mg/kg	113 J	0.0013 J	0.0014 J	0.289 J	0.723 J	63.2 J	48.6 J
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	2.4 U	0.0065 UJ	0.0055 U	0.0060 UJ	0.0085 UJ	1.2 U	1.4 U
1,1,2-Trichloroethane				mg/kg	2.4 U	0.0065 UJ	0.0055 U	0.0060 U	0.017 U	1.2 U	1.4 U
2-Butanone	500	1,000	0.12	mg/kg	2.4 U	0.013 UJ	0.011 UJ	0.018 UJ	0.034 UJ	1.2 UJ	1.4 UJ
2-Hexanone				mg/kg	2.4 U	0.013 UJ	0.011 U	0.012 U	0.017 U	1.2 U	1.4 U
Acetone	500	1,000	0.05	mg/kg	1.8 J	0.026 UJ	0.030 UJ	0.030 UJ	0.068 UJ	2.9 UJ	3.5 UJ
Carbon Disulfide				mg/kg	2.4 U	0.0065 UJ	0.0055 U	0.0053 J	0.022	1.2 U	1.4 U
Chlorobenzene	500	1,000	1.1	mg/kg	2.4 U	0.0065 UJ	0.0055 U	0.0060 U	0.0085 U	1.2 U	1.4 U
Chloroform	350	700	0.37	mg/kg	2.4 U	0.0065 UJ	0.0055 U	0.0060 U	0.017 U	1.2 U	1.4 U
Chloromethane				mg/kg	2.4 U	0.0065 UJ	0.0055 U	0.0060 U	0.017 U	1.2 U	1.4 U
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	2.4 U	0.0065 UJ	0.0055 U	0.0060 U	0.017 U	1.2 U	1.4 U
Methylene Chloride	500	1,000	0.05	mg/kg	2.4 U	0.0033 J	0.0017 J	0.0031 J	0.012 J	1.2 U	1.4 U
Styrene				mg/kg	2.4 U	0.0065 UJ	0.0055 U	0.0060 U	0.0085 U	1.2 U	0.40 J
Tetrachloroethene	150	300	1.3	mg/kg	2.4 U	0.0065 UJ	0.0047 J	0.010	0.0085 U	1.2 U	1.4 U
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	2.4 U	0.0065 UJ	0.0055 U	0.0060 U	0.017 U	1.2 UJ	1.4 U
Trichloroethene	200	400	0.47	mg/kg	2.4 UJ	0.0065 UJ	0.0055 U	0.0060 U	0.017 U	1.2 UJ	1.4 U
Total Other VOCs				mg/kg	1.8 J	0.0033 J	0.0064 J	0.018 J	0.034 J	ND	0.40 J

TABLE 5 CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-126	SB-127	SB-127	SB-127	SB-127
Sample Depth(Feet):	Commercial	Industrial	for Protection of		46 - 47	14 - 15	18 - 18.5	25 - 26	39.5
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	02/20/08	02/21/08	02/21/08	02/21/08	02/21/08
BTEX									
Benzene	44	89	0.06	mg/kg	0.0057 U [0.0057 U]	0.0086 J	3.4 U	0.0085 U [0.009 U]	0.0046 J
Ethylbenzene	390	780	1	mg/kg	0.0057 U [0.0057 U]	0.017 J	14	0.0085 U [0.009 U]	0.21
Toluene	500	1,000	0.7	mg/kg	0.0057 U [0.0057 U]	0.035 U	3.4 U	0.005 J [0.0017 J]	0.012
Xylenes (total)	500	1,000	1.6	mg/kg	0.0057 U [0.0057 U]	0.057 J	1.8 J	0.0085 U [0.009 U]	0.27
Total BTEX				mg/kg	ND [ND]	0.0826 J	15.8 J	0.005 J [0.0017 J]	0.497 J
Other Volatile Organics									
1,1,2,2-Tetrachloroethane				mg/kg	0.0057 U [0.0057 U]	0.035 U	3.4 U	0.0085 U [0.0090 U]	0.0062 U
1,1,2-Trichloroethane				mg/kg	0.0057 U [0.0057 U]	0.035 U	3.4 U	0.0085 U [0.0090 U]	0.0062 U
2-Butanone	500	1,000	0.12	mg/kg	0.011 UJ [0.011 UJ]	0.071 UJ	3.4 U	0.017 UJ [0.018 UJ]	0.012 UJ
2-Hexanone				mg/kg	0.011 U [0.011 U]	0.071 U	3.4 U	0.017 U [0.018 U]	0.012 U
Acetone	500	1,000	0.05	mg/kg	0.023 UJ [0.023 UJ]	0.14 UJ	8.6 UJ	0.037 UJ [0.047 UJ]	0.025 UJ
Carbon Disulfide				mg/kg	0.0057 U [0.0057 U]	0.016 J	3.4 U	0.051 [0.10]	0.014
Chlorobenzene	500	1,000	1.1	mg/kg	0.0057 U [0.0057 U]	0.035 U	3.4 U	0.0085 U [0.0090 U]	0.0062 U
Chloroform	350	700	0.37	mg/kg	0.0057 U [0.0057 U]	0.035 U	3.4 U	0.0085 U [0.0090 U]	0.0062 U
Chloromethane				mg/kg	0.0057 U [0.0057 U]	0.035 U	3.4 U	0.0085 U [0.0090 U]	0.0062 U
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.0057 U [0.0057 U]	0.035 U	3.4 U	0.0085 U [0.0090 U]	0.0062 U
Methylene Chloride	500	1,000	0.05	mg/kg	0.023 U [0.023 U]	0.14 U	3.4 U	0.0044 J [0.0031 J]	0.0039 J
Styrene				mg/kg	0.0057 U [0.0057 U]	0.035 U	3.4 U	0.0085 U [0.0090 U]	0.0062 U
Tetrachloroethene	150	300	1.3	mg/kg	0.0057 U [0.0057 U]	0.035 U	3.4 U	0.0015 J [0.0090 U]	0.0042 J
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.0057 U [0.0057 U]	0.035 U	3.4 UJ	0.0085 U [0.0090 U]	0.0062 U
Trichloroethene	200	400	0.47	mg/kg	0.0057 U [0.0057 U]	0.035 U	3.4 UJ	0.0085 U [0.0090 U]	0.0062 U
Total Other VOCs				mg/kg	ND [ND]	0.016 J	ND	0.057 J [0.10 J]	0.022 J

TABLE 5 CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY SOIL SAMPLING RESULTS FOR DETECTED VOCs

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-127	SB-128	SB-128	SB-128	SB-128	SB-128	SB-128
Sample Depth(Feet):	Commercial	Industrial	for Protection of		41 - 42	3 - 4	10 - 11	19 - 20	25 - 26	30.5 - 31	44 - 45
Date Collected:	Use SCOs	Use SCOs	Groundwater	Units	02/21/08	02/27/08	02/27/08	02/28/08	02/27/08	02/27/08	02/27/08
ВТЕХ											
Benzene	44	89	0.06	mg/kg	0.0055 U	0.0058 U	0.0012 J	1	0.0086 U	0.0058 U	0.0052 U
Ethylbenzene	390	780	1	mg/kg	0.0055 U	0.0058 U	0.0063 J	3.9 EJ	0.0086 U	0.0058 U	0.0052 U
Toluene	500	1,000	0.7	mg/kg	0.00099 J	0.0061	0.011	0.21	0.0036 J	0.0023 J	0.0052 U
Xylenes (total)	500	1,000	1.6	mg/kg	0.0055 U	0.0058 U	0.0049 J	9.5	0.0086 U	0.0058 U	0.0052 U
Total BTEX				mg/kg	0.00099 J	0.0061	0.0234 J	14.6 J	0.0036 J	0.0023 J	ND
Other Volatile Organics											
1,1,2,2-Tetrachloroethane				mg/kg	0.0055 U	0.0058 U	0.0066 U	0.051 U	0.0086 U	0.0058 U	0.0052 U
1,1,2-Trichloroethane				mg/kg	0.0055 U	0.0058 U	0.0066 U	0.051 U	0.0086 U	0.0058 U	0.0052 U
2-Butanone	500	1,000	0.12	mg/kg	0.011 UJ	0.012 U	0.013 U	0.10 U	0.017 U	0.012 U	0.010 U
2-Hexanone				mg/kg	0.011 U	0.012 U	0.013 U	0.10 U	0.017 U	0.012 U	0.010 U
Acetone	500	1,000	0.05	mg/kg	0.022 UJ	0.036 J	0.026 UJ	0.21 UJ	0.034 UJ	0.023 UJ	0.021 UJ
Carbon Disulfide				mg/kg	0.0055 U	0.0058 UJ	0.0069	0.16 J	0.012	0.0058 U	0.0052 U
Chlorobenzene	500	1,000	1.1	mg/kg	0.0055 U	0.0058 U	0.0066 U	0.051 U	0.0086 U	0.0058 U	0.0052 U
Chloroform	350	700	0.37	mg/kg	0.0055 U	0.0058 U	0.0066 U	0.051 U	0.0086 U	0.0058 U	0.0052 U
Chloromethane				mg/kg	0.0055 U	0.0058 U	0.0066 U	0.051 U	0.0086 U	0.0058 U	0.0052 U
cis-1,2-Dichloroethene	500	1,000	0.25	mg/kg	0.0055 U	0.0058 U	0.0066 U	0.051 U	0.0086 U	0.0058 U	0.0052 U
Methylene Chloride	500	1,000	0.05	mg/kg	0.022 U	0.0032 J	0.0048 J	0.021 J	0.0046 J	0.0039 J	0.0015 J
Styrene				mg/kg	0.0055 U	0.0058 U	0.0066 U	0.051 U	0.0086 U	0.0058 U	0.0052 U
Tetrachloroethene	150	300	1.3	mg/kg	0.0055 U	0.0038 J	0.0013 J	0.051 U	0.0086 U	0.0058 U	0.0052 U
trans-1,2-Dichloroethene	500	1,000	0.19	mg/kg	0.0055 U	0.0058 U	0.0066 U	0.051 U	0.0086 U	0.0058 U	0.0052 U
Trichloroethene	200	400	0.47	mg/kg	0.0055 U	0.0058 U	0.0066 U	0.051 U	0.0086 U	0.0058 U	0.0052 U
Total Other VOCs				mg/kg	ND	0.043 J	0.013 J	0.18 J	0.017 J	0.0039 J	0.0015 J

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY SOIL SAMPLING RESULTS FOR DETECTED VOCs

Notes:

- This table includes detected compounds only.
- 2. Bolded data indicates exceedances of Restricted Commercial Use criteria as per NYCRR Part 375, Table 375-6.8(b).
- 3. Shaded data indicates exceedances of Protection of Groundwater Use criteria as per NYCRR Part 375, Table 375-6.8(b).
- 4. Italicized data indicates exceedances of Industrial Use criteria as per NYCRR Part 375, Table 375-6.8(b).
- Samples were collected by ARCADIS.
- 6. Samples were analyzed by TestAmerica, Inc. of Shelton, Connecticut.
- 7. Data validated by ARCADIS.
- 8. Results reported are [] are for field duplicate sample collected at that location.
- 9. J = estimated value.
 - UJ = estimated detection limit.
 - U = compound not detected at indicated detection limit.
 - ND = none detected.
 - R = rejected.

TABLE 6

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-101	SB-101	SB-101	SB-102	SB-102	SB-102	SB-102	SB-102	SB-102
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		6 - 7	11 - 13	17 - 19	3 - 5	11 - 12	15 - 16	28 - 29	34 - 35	45 - 46
Date Collected:	SCOs	SCOs	of Groundwater	Units	02/04/08	02/04/08	02/04/08	02/12/08	02/12/08	02/12/08	02/12/08	02/12/08	02/12/08
SVOCs-PAHs													
Naphthalene	500	1,000	12	mg/kg	0.64	17 J	560 D	6 J	27 J	6,100 D	0.39 U	0.37 U	0.36 U
Acenaphthylene	500	1,000	107	mg/kg	2.6	17 J	21	33	140 J	330	0.39 U	0.37 U	0.36 U
Acenaphthene	500	1,000	98	mg/kg	0.11 J	13 J	90	6.4 U	280 J	760	0.39 U	0.37 U	0.36 U
Fluorene	500	1,000	386	mg/kg	0.48	15 J	61	2.6 J	240 J	670	0.39 U	0.37 U	0.36 U
Phenanthrene	500	1,000	1,000	mg/kg	1.6	34 J	180 D	13	600 J	1,900 D	0.39 U	0.37 U	0.36 U
Anthracene	500	1,000	1,000	mg/kg	1.9	13 J	47	16	200 J	490	0.39 U	0.37 U	0.36 U
Fluoranthene	500	1,000	1,000	mg/kg	3.3	11 J	39	20	190 J	470	0.39 U	0.37 U	0.36 U
Pyrene	500	1,000	1,000	mg/kg	4.4	18 J	49	33	270 J	700	0.39 U	0.37 U	0.36 U
Benzo(a)anthracene	5.6	11	1	mg/kg	3.2	7.3 J	23	28	100 J	300	0.39 U	0.37 U	0.36 U
Chrysene	56	110	1	mg/kg	3.8	10 J	23	34	110 J	280	0.39 U	0.37 U	0.36 U
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	4.5	4.8 J	10	34 J	56 J	130	0.39 U	0.37 U	0.36 U
Benzo(k)fluoranthene	56	110	1.7	mg/kg	1.4	1.6 J	3.8 J	10 J	20 J	57	0.39 U	0.37 U	0.36 U
Benzo(a)pyrene	1	1.1	22	mg/kg	3.6	4.5 J	13	9.9 J	60 J	190	0.39 U	0.37 U	0.36 U
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	5	3.2 J	4.6 J	23 J	25 J	73	0.39 U	0.37 U	0.36 U
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	1.1	8.4 UJ	1.4 J	6.5 J	84 UJ	24 J	0.39 U	0.37 U	0.36 U
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	5.6	3.4 J	4.3 J	22 J	22 J	70	0.39 U	0.37 U	0.36 U
Total PAHs				mg/kg	43.2 J	173 J	1,130 J	291 J	2,340 J	12,500 J	ND	ND	ND
Other Semivolatile Organics													
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	0.40 U	8.4 UJ	8.8 U	6.4 U	84 UJ	51 U	0.39 U	0.37 U	0.36 U
2-Methylnaphthalene				mg/kg	0.52	18 J	290 D	6.6	35 J	1,700 D	0.39 U	0.37 U	0.36 U
2-Methylphenol	500	1,000	0.33	mg/kg	0.40 U	8.4 UJ	8.8 U	6.4 U	84 UJ	51 U	0.39 U	0.37 U	0.36 U
3,3'-Dichlorobenzidine				mg/kg	0.80 U	17 UJ	18 U	13 U	170 UJ	100 U	0.79 U	0.73 U	0.73 U
4-Chloroaniline				mg/kg	0.40 U	8.4 UJ	8.8 U	6.4 U	84 UJ	51 U	0.39 U	0.37 U	0.36 U
4-Methylphenol	500	1,000	0.33	mg/kg	0.40 U	8.4 UJ	8.8 U	6.4 U	84 UJ	51 U	0.39 U	0.37 U	0.36 U
4-Nitrophenol				mg/kg	1.9 UJ	40 UJ	43 U	31 U	410 UJ	250 U	1.9 U	1.8 U	1.8 U
Benzyl Alcohol				mg/kg	0.40 U	8.4 UJ	8.8 U	6.4 U	84 UJ	51 U	0.39 U	0.37 U	0.36 U
bis(2-Ethylhexyl)phthalate				mg/kg	0.051 J	8.4 UJ	8.8 U	6.4 U	84 UJ	51 U	0.39 U	0.37 U	0.36 U
Butylbenzylphthalate				mg/kg	0.40 U	8.4 UJ	8.8 U	6.4 U	84 UJ	51 U	0.39 U	0.37 U	0.36 U
Carbazole	-			mg/kg	0.17 J	8.4 UJ	2.1 J	6.4 U	84 UJ	18 J	0.39 U	0.37 U	0.36 U
Dibenzofuran	350	1,000	210	mg/kg	0.16 J	2.7 J	7.7 J	6.4 U	25 J	63	0.39 U	0.37 U	0.36 U
Di-n-Butylphthalate	-		-	mg/kg	0.40 U	8.4 UJ	8.8 U	6.4 U	84 UJ	51 U	0.39 U	0.37 U	0.36 U
Di-n-Octylphthalate	-		-	mg/kg	0.40 U	8.4 UJ	8.8 U	6.4 U	84 UJ	51 U	0.39 U	0.37 U	0.36 U
Isophorone				mg/kg	0.40 U	8.4 UJ	8.8 U	6.4 U	84 UJ	51 U	0.39 U	0.37 U	0.36 U
N-Nitrosodiphenylamine	-		-	mg/kg	0.40 U	8.4 UJ	8.8 U	6.4 U	84 UJ	51 U	0.39 U	0.37 U	0.36 U
Phenol	500	1,000	0.33	mg/kg	0.40 U	8.4 UJ	8.8 U	6.4 U	84 UJ	51 U	0.39 U	0.37 U	0.36 U
Total Other SVOCs				mg/kg	44 J	190 J	1,400 J	300 J	2,400 J	14,000 J	ND	ND	ND

TABLE 6

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-103	SB-103	SB-103	SB-104	SB-104	SB-104	SB-105	SB-105
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		5 - 6	10 - 13	14 - 16	8 - 9	11 - 13	19 - 20	5 - 6	10 - 12
Date Collected:	SCOs	SCOs	of Groundwater	Units	02/08/08	02/08/08	02/08/08	02/06/08	02/06/08	02/06/08	02/07/08	02/07/08
SVOCs-PAHs												
Naphthalene	500	1,000	12	mg/kg	1,500 DJ	14 [9.5]	320 J	59 D	4.6	560 D	0.3 J	3 J
Acenaphthylene	500	1,000	107	mg/kg	190 J	6.1 U [7 J]	260 J	9.1	3.6 J	31	0.77	4.1 U
Acenaphthene	500	1,000	98	mg/kg	51 J	17 [13]	570 J	9	3.7 J	180 D	0.19 J	1.2 J
Fluorene	500	1,000	386	mg/kg	190 J	27 [20]	420 J	21	6.4	79	0.2 J	2.7 J
Phenanthrene	500	1,000	1,000	mg/kg	790 J	62 [48]	1,100 DJ	60 D	17	280 D	1.9	4.5
Anthracene	500	1,000	1,000	mg/kg	56 J	18 [13]	400 J	14	4.8	76	0.6	0.97 J
Fluoranthene	500	1,000	1,000	mg/kg	270 J	16 [12]	290 J	23	6.4	68	3.7	4.1 U
Pyrene	500	1,000	1,000	mg/kg	350 J	25 [17]	390 J	33	9.9	77	3.1	1.1 J
Benzo(a)anthracene	5.6	11	1	mg/kg	150 J	12 [8.4]	190 J	14	4.5	44	2	4.1 U
Chrysene	56	110	1	mg/kg	210 J	18 [12]	170 J	16	6.4	42	2.2	2.5 J
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	110 J	9.5 J [5.7 J]	82 J	8.5	3.1 J	21	2.2	4.1 U
Benzo(k)fluoranthene	56	110	1.7	mg/kg	46 J	3.1 J [2.3 J]	34 J	3.1	1 J	8.3	0.74	4.1 U
Benzo(a)pyrene	1	1.1	22	mg/kg	17 J	5.8 J [3.7 J]	110 J	5.4	1.9 J	28	1.6	4.1 U
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	44 J	3.4 J [2.3 J]	36 J	5.5	1.9 J	9	1.6	4.1 U
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	15 J	1.4 J [7.8 U]	13 J	1.8 J	4.1 U	2.9 J	0.39	4.1 U
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	34 J	3.3 J [2.3 J]	34 J	5.2	1.8 J	8.6	1.4	4.1 U
Total PAHs				mg/kg	4,020 J	236 J [176 J]	4,420 J	288 J	77 J	1,510 J	22.9 J	16 J
Other Semivolatile Organics												
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	83 UJ	6.1 U [7.8 U]	42 UJ	2.2 U	4.1 U	5.0 U	0.36 U	4.1 U
2-Methylnaphthalene				mg/kg	1,400 DJ	72 [54]	1,500 DJ	63 D	4.7	380 D	0.29 J	4.3
2-Methylphenol	500	1,000	0.33	mg/kg	83 UJ	6.1 U [7.8 U]	42 UJ	2.2 U	4.1 U	5.0 U	0.36 U	4.1 U
3,3'-Dichlorobenzidine				mg/kg	170 UJ	12 U [16 U]	83 UJ	4.4 U	8.2 U	10 U	0.73 U	8.2 U
4-Chloroaniline				mg/kg	83 UJ	2.0 J [7.8 U]	42 UJ	2.2 U	4.1 U	5.0 U	0.36 U	4.1 U
4-Methylphenol	500	1,000	0.33	mg/kg	83 UJ	6.1 U [7.8 U]	42 UJ	2.2 U	4.1 U	5.0 U	0.36 U	4.1 U
4-Nitrophenol				mg/kg	400 UJ	30 U [38 U]	200 UJ	11 U	20 UJ	24 U	1.8 U	20 UJ
Benzyl Alcohol				mg/kg	83 UJ	6.1 U [7.8 U]	42 UJ	2.2 U	4.1 U	5.0 U	0.36 U	4.1 U
bis(2-Ethylhexyl)phthalate				mg/kg	83 UJ	6.1 U [7.8 U]	42 UJ	0.40 J	4.1 U	5.0 U	0.19 J	4.1 U
Butylbenzylphthalate				mg/kg	83 UJ	6.1 U [7.8 U]	42 UJ	2.2 U	4.1 U	0.92 J	0.053 J	4.1 U
Carbazole				mg/kg	83 UJ	6.1 U [7.8 U]	42 UJ	0.55 J	4.1 U	2.1 J	0.098 J	4.1 U
Dibenzofuran	350	1,000	210	mg/kg	37 J	5.4 J [4.1 J]	42 J	3.1	1.4 J	8.9	0.36 U	0.89 J
Di-n-Butylphthalate				mg/kg	83 UJ	6.1 U [7.8 U]	6.8 J	2.2 U	4.1 U	5.0 U	0.36 U	4.1 U
Di-n-Octylphthalate				mg/kg	83 UJ	6.1 U [7.8 U]	42 UJ	2.2 U	4.1 U	5.0 U	0.36 U	4.1 U
Isophorone				mg/kg	83 UJ	6.1 U [7.8 U]	42 UJ	2.2 U	4.1 U	5.0 U	0.36 U	4.1 U
N-Nitrosodiphenylamine				mg/kg	83 UJ	6.1 U [7.8 U]	42 UJ	2.2 U	4.1 U	5.0 U	0.36 U	4.1 U
Phenol	500	1,000	0.33	mg/kg	83 UJ	6.1 U [7.8 U]	42 UJ	2.2 U	4.1 U	5.0 U	0.36 U	4.1 U
Total Other SVOCs				mg/kg	5,500 J	320 J [230 J]	6,000 J	360 J	83 J	1,900 J	24 J	21 J

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-105	SB-105	SB-105	SB-105	SB-106	SB-106	SB-106	SB-106	SB-107
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		14 - 15	26 - 27	29 - 30	38 - 40	2 - 4	7 - 8	12 - 13	15 - 16	5 - 7
Date Collected:	SCOs	SCOs	of Groundwater	Units	02/07/08	02/07/08	02/07/08	02/07/08	02/08/08	02/08/08	02/08/08	02/08/08	02/05/08
SVOCs-PAHs													
Naphthalene	500	1,000	12	mg/kg	2,400 DJ	0.57	0.37 U	0.38 U	0.37	3.9 J	4.5	4	0.68
Acenaphthylene	500	1,000	107	mg/kg	26 J	0.4 U	0.37 U	0.38 U	2	4.9 J	0.44 U	1.5	0.34 J
Acenaphthene	500	1,000	98	mg/kg	310 J	0.098 J	0.37 U	0.38 U	0.95	14	6.5	1.6	0.075 J
Fluorene	500	1,000	386	mg/kg	120 J	0.4 U	0.37 U	0.38 U	1.2	25	3.6	1.8	0.4
Phenanthrene	500	1,000	1,000	mg/kg	280 J	0.097 J	0.37 U	0.38 U	5.1	66	5.2	7.4	1
Anthracene	500	1,000	1,000	mg/kg	83 J	0.4 U	0.37 U	0.38 U	2.3	15	3.6	2.8	0.34 J
Fluoranthene	500	1,000	1,000	mg/kg	69 J	0.4 U	0.37 U	0.38 U	7.7 D	16	6.8	4.8	0.83
Pyrene	500	1,000	1,000	mg/kg	94 J	0.4 U	0.37 U	0.38 U	10 D	25	7.9 D	6.3	0.77
Benzo(a)anthracene	5.6	11	1	mg/kg	37 J	0.4 U	0.37 U	0.38 U	4.6	9.4	3.2	3.5	0.42
Chrysene	56	110	1	mg/kg	35 J	0.4 U	0.37 U	0.38 U	4.5	13	3.2	3.1	0.39
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	18 J	0.4 U	0.37 U	0.38 U	4.1 J	4.8 J	2.4	4.1	0.46
Benzo(k)fluoranthene	56	110	1.7	mg/kg	75 UJ	0.4 U	0.37 U	0.38 U	1.2 J	1.8 J	0.88	1.5	0.18 J
Benzo(a)pyrene	1	1.1	22	mg/kg	23 J	0.4 U	0.37 U	0.38 U	3.5 J	3.1 J	2.2	4.1	0.34 J
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	75 UJ	0.4 U	0.37 U	0.38 U	2.1 J	2.2 J	1.7	4.8	0.27 J
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	75 UJ	0.4 U	0.37 U	0.38 U	0.56 J	0.9 J	0.46	0.91	0.058 J
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	75 UJ	0.4 U	0.37 U	0.38 U	2.1 J	2.1 J	1.7	4.8	0.25 J
Total PAHs				mg/kg	3,500 J	0.765 J	ND	ND	52.3 J	207 J	53.8	57	6.8 J
Other Semivolatile Organics													
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.36 U	5.7 U	0.44 U	0.54 U	0.37 U
2-Methylnaphthalene	1		-	mg/kg	860 DJ	0.25 J	0.37 U	0.38 U	0.36	6.3	1.1	0.99	0.50
2-Methylphenol	500	1,000	0.33	mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.36 U	5.7 U	0.44 U	0.54 U	0.37 U
3,3'-Dichlorobenzidine	-		-	mg/kg	150 UJ	0.80 U	0.74 U	0.75 U	0.72 U	11 U	0.87 U	1.1 U	0.75 U
4-Chloroaniline				mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.36 U	5.7 U	0.44 U	0.54 U	0.37 U
4-Methylphenol	500	1,000	0.33	mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.36 U	5.7 U	0.65	0.54 U	0.37 U
4-Nitrophenol	-		-	mg/kg	370 UJ	1.9 U	1.8 U	1.8 U	1.8 U	27 U	2.1 U	2.6 U	1.8 UJ
Benzyl Alcohol				mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.36 U	5.7 U	0.44 U	0.54 U	0.37 U
bis(2-Ethylhexyl)phthalate	-			mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.36 U	2.2 J	0.44 U	0.54 U	0.93 J
Butylbenzylphthalate				mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.36 U	5.7 U	0.44 U	0.54 U	0.078 J
Carbazole				mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.20 J	5.7 U	0.37 J	0.25 J	0.14 J
Dibenzofuran	350	1,000	210	mg/kg	16 J	0.40 U	0.37 U	0.38 U	0.17 J	4.2 J	0.96	0.50 J	0.26 J
Di-n-Butylphthalate				mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.36 U	5.7 U	0.44 U	0.54 U	0.37 U
Di-n-Octylphthalate				mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.36 U	5.7 U	0.44 U	0.54 U	0.45 J
Isophorone				mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.36 U	5.7 U	0.44 U	0.54 U	0.37 U
N-Nitrosodiphenylamine				mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.36 U	5.7 U	0.44 U	0.54 U	0.37 U
Phenol	500	1,000	0.33	mg/kg	75 UJ	0.40 U	0.37 U	0.38 U	0.36 U	5.7 U	0.076 J	0.54 U	0.37 U
Total Other SVOCs				mg/kg	4,400 J	1.0 J	ND	ND	53 J	220 J	57 J	59 J	9.2 J

TABLE 6

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-107	SB-107	SB-108	SB-109	SB-109	SB-109	SB-109	SB-109	SB-109
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		11 - 13	15 - 17	26	5	11 - 13	15 - 17	19	32 - 33	35 - 36
Date Collected:	SCOs	SCOs	of Groundwater	Units	02/05/08	02/05/08	01/22/08	01/11/08	01/17/08	01/17/08	01/17/08	03/03/08	03/03/08
SVOCs-PAHs													
Naphthalene	500	1,000	12	mg/kg	3.4	830 DJ	2,700 D	1	3.1	4.4	68 D	0.55 U	0.37 U
Acenaphthylene	500	1,000	107	mg/kg	2	45 J	130	0.33 J	2.8	9.4	1.1	0.55 U	0.37 U
Acenaphthene	500	1,000	98	mg/kg	4.7	190 J	450 D	0.6	1.6	9.8	11 EJ	0.55 U	0.37 U
Fluorene	500	1,000	386	mg/kg	11 D	110 J	300 D	0.81	1.5	11	7	0.55 U	0.37 U
Phenanthrene	500	1,000	1,000	mg/kg	26 D	270 J	810 D	3.1	4	29 D	12 EJ	0.55 U	0.37 U
Anthracene	500	1,000	1,000	mg/kg	6.4	97 J	250 D	0.71	2.3	11	2.4	0.55 U	0.37 U
Fluoranthene	500	1,000	1,000	mg/kg	6.3	74 J	220 EJ	1.5	3.2	12	2.2	0.55 U	0.37 U
Pyrene	500	1,000	1,000	mg/kg	10 D	100 J	330 D	1.7	6.2	20 D	3.6	0.55 U	0.37 U
Benzo(a)anthracene	5.6	11	1	mg/kg	3.7	43 J	160 EJ	0.86	4.1	8.2	1.5	0.55 U	0.37 U
Chrysene	56	110	1	mg/kg	5	42 J	140 EJ	0.94	4.8	8.5	1.5	0.55 U	0.37 U
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	2.3	21 J	65	0.76	3.7	4.6	0.76	0.55 U	0.37 U
Benzo(k)fluoranthene	56	110	1.7	mg/kg	0.88	50 UJ	27	0.26 J	1.4	1.7 J	0.26 J	0.55 U	0.37 U
Benzo(a)pyrene	1	1.1	22	mg/kg	1.4	26 J	100	0.67	2.4	5.3 J	1	0.55 U	0.37 U
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	0.9	11 J	39	0.6	3.2	3 J	0.42 J	0.55 U	0.37 U
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	0.34 J	50 UJ	13	0.13 J	1.1	0.94	0.13 J	0.55 U	0.37 U
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	8.0	11 J	38	0.58	3.5	2.6 J	0.44 J	0.55 U	0.37 U
Total PAHs				mg/kg	85.1 J	1,870 J	5,770 J	14.6 J	48.9	141 J	113 J	ND	ND
Other Semivolatile Organics													
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	0.40 U	50 UJ	8.5 U	0.37 U	0.83 U	0.91 U	0.60 U	0.55 U	0.37 U
2-Methylnaphthalene				mg/kg	4.7	590 J	1,100 D	4.5	2.2	4.9	15 D	0.55 U	0.37 U
2-Methylphenol	500	1,000	0.33	mg/kg	0.11 J	50 UJ	8.5 U	0.37 U	0.83 U	0.91 U	0.60 U	0.55 U	0.37 U
3,3'-Dichlorobenzidine				mg/kg	0.81 U	100 UJ	17 U	0.74 U	1.7 U	1.8 U	1.2 U	1.1 U	0.75 U
4-Chloroaniline				mg/kg	0.40 U	50 UJ	8.5 U	0.37 U	0.83 U	0.91 U	0.60 U	0.55 U	0.37 U
4-Methylphenol	500	1,000	0.33	mg/kg	0.40 J	50 UJ	8.5 U	0.37 U	0.83 U	0.91 U	0.60 U	0.55 U	0.37 U
4-Nitrophenol				mg/kg	2.0 U	240 UJ	41 U	1.8 U	4.0 U	4.4 U	2.9 U	2.7 U	1.8 U
Benzyl Alcohol				mg/kg	0.40 U	50 UJ	8.5 U	0.37 U	0.83 U	0.91 U	0.60 U	0.55 U	0.37 U
bis(2-Ethylhexyl)phthalate				mg/kg	0.75	50 UJ	2.5 J	0.073 J	0.39 J	1.6	1.3	0.55 U	0.37 U
Butylbenzylphthalate				mg/kg	0.40 U	50 UJ	8.8	0.37 U	0.83 U	0.91 U	0.60 U	0.55 U	0.37 U
Carbazole				mg/kg	0.40 U	50 UJ	7.6 J	0.13 J	0.83 U	0.28 J	0.61	0.55 U	0.37 U
Dibenzofuran	350	1,000	210	mg/kg	2.1	14 J	34	0.56	0.33 J	1.7	0.81	0.55 U	0.37 U
Di-n-Butylphthalate				mg/kg	0.40 U	50 UJ	8.5 U	0.37 U	0.83 U	0.16 J	0.60 U	0.55 U	0.37 U
Di-n-Octylphthalate				mg/kg	0.40 U	50 UJ	8.5 U	0.37 U	0.83 U	0.91 U	0.60 U	0.55 U	0.37 U
Isophorone				mg/kg	0.40 U	50 UJ	8.5 U	0.37 U	0.83 U	0.91 U	0.60 U	0.55 U	0.37 U
N-Nitrosodiphenylamine				mg/kg	0.40 U	50 UJ	8.5 U	0.37 U	0.83 U	0.91 U	0.60 U	0.55 U	0.37 U
Phenol	500	1,000	0.33	mg/kg	0.40 U	50 UJ	8.5 U	0.37 U	0.83 U	0.91 U	0.60 U	0.55 U	0.37 U
Total Other SVOCs				mg/kg	93 J	2,500 J	6,900 J	20 J	52 J	150 J	130 J	ND	ND

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-109	SB-110	SB-110	SB-110	SB-110	SB-111	SB-111	SB-111
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		48 - 49	9	17	20	22	13	21	23
Date Collected:	SCOs	SCOs	of Groundwater	Units	03/03/08	01/23/08	01/23/08	01/23/08	01/23/08	01/18/08	01/18/08	01/18/08
SVOCs-PAHs												
Naphthalene	500	1,000	12	mg/kg	0.36 U	7.4 D [11 D]	11 D	590	560	5.8	1,100 D	34 D
Acenaphthylene	500	1,000	107	mg/kg	0.36 U	1.2 [0.96]	1.1	230	320	15	79 EJ	1.6
Acenaphthene	500	1,000	98	mg/kg	0.36 U	2 [2.5]	3.5	180	250	33	210 D	7.5
Fluorene	500	1,000	386	mg/kg	0.36 U	2.6 [3.2]	2.4	360	520	27	180 EJ	5
Phenanthrene	500	1,000	1,000	mg/kg	0.36 U	5.5 [6.1]	7.2 D	560 D	1,400 D	54	350 D	14 D
Anthracene	500	1,000	1,000	mg/kg	0.36 U	1.5 [1.2]	2.4	440	530	19	150 EJ	3.8
Fluoranthene	500	1,000	1,000	mg/kg	0.36 U	1.8 [1.2]	3.2	410 D	640 D	29	140 EJ	3.6
Pyrene	500	1,000	1,000	mg/kg	0.36 U	2.1 J [1.1 J]	4.3	640 D	1,000 D	52	180 EJ	5.6
Benzo(a)anthracene	5.6	11	1	mg/kg	0.36 U	1.2 [0.5]	2.2	540	450	16	88 EJ	2.2
Chrysene	56	110	1	mg/kg	0.36 U	1.2 [0.5]	2.2	520	440	18	85 EJ	2
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	0.36 U	1.1 [0.42]	1.8	290	220	10	38	1.1
Benzo(k)fluoranthene	56	110	1.7	mg/kg	0.36 U	0.48 [0.17 J]	0.62	110	79	4.4	16	0.38 J
Benzo(a)pyrene	1	1.1	22	mg/kg	0.36 U	1 [0.36 J]	1.8	380	280	12	57	1.4
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	0.36 U	0.99 [0.32 J]	1.4	220	140	7.4	27	0.55 J
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	0.36 U	0.26 J [0.079 J]	0.36 J	60	43	2.3 J	7.2	0.18 J
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	0.36 U	0.9 [0.29 J]	1.3	230	140	7.6	25	0.59
Total PAHs				mg/kg	ND	31.2 J [29.9 J]	46.8 J	5,760	7,010	313 J	2,730 J	83.5 J
Other Semivolatile Organics												
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	0.36 U	0.40 U [0.39 U]	0.38 U	44 U	42 U	4.1 U	4.9 U	0.56 U
2-Methylnaphthalene				mg/kg	0.36 U	39 D [58 D]	9.1 D	490	690 D	2.8 J	580 D	19 D
2-Methylphenol	500	1,000	0.33	mg/kg	0.36 U	0.40 U [0.39 U]	0.38 U	44 U	42 U	4.1 U	4.9 U	0.56 U
3,3'-Dichlorobenzidine				mg/kg	0.72 U	0.81 U [0.79 U]	0.77 U	89 U	83 U	8.1 U	9.8 U	1.1 U
4-Chloroaniline				mg/kg	0.36 U	0.40 U [0.39 U]	0.38 U	44 U	42 U	4.1 U	4.9 U	0.56 U
4-Methylphenol	500	1,000	0.33	mg/kg	0.36 U	0.40 U [0.39 U]	0.38 U	44 U	42 U	4.1 U	4.9 U	0.56 U
4-Nitrophenol				mg/kg	1.8 U	2.0 U [1.9 U]	1.9 U	220 U	200 U	20 U	24 U	2.7 U
Benzyl Alcohol				mg/kg	0.36 U	0.40 U [0.39 U]	0.38 U	44 U	42 U	4.1 U	4.9 U	0.56 U
bis(2-Ethylhexyl)phthalate				mg/kg	0.36 U	0.24 J [0.13 J]	1.0	44 U	42 U	0.68 J	1.5 J	0.25 J
Butylbenzylphthalate				mg/kg	0.36 U	0.40 U [0.39 U]	0.067 J	44 U	42 U	4.1 U	1.5 J	0.56 U
Carbazole				mg/kg	0.36 U	0.40 U [0.39 U]	0.16 J	44 U	42 U	4.1 U	4.6 J	0.11 J
Dibenzofuran	350	1,000	210	mg/kg	0.36 U	1.7 [2.3]	0.45	26 J	46	6.2	21	0.51 J
Di-n-Butylphthalate				mg/kg	0.36 U	0.40 U [0.39 U]	0.38 U	44 U	42 U	4.1 U	0.98 J	0.56 U
Di-n-Octylphthalate				mg/kg	0.36 U	0.40 U [0.39 U]	0.38 U	44 U	42 U	4.1 U	4.9 U	0.56 U
Isophorone				mg/kg	0.36 U	0.40 U [0.39 U]	0.38 U	44 U	42 U	4.1 U	4.9 U	0.56 U
N-Nitrosodiphenylamine				mg/kg	0.36 U	0.40 U [0.39 U]	0.38 U	44 U	42 U	4.1 U	4.9 U	0.56 U
Phenol	500	1,000	0.33	mg/kg	0.36 U	0.40 U [0.39 U]	0.38 U	44 U	42 U	4.1 U	4.9 U	0.56 U
Total Other SVOCs	-			mg/kg	ND	72 J [90 J]	58 J	6,300 J	7,800	320 J	3,300 J	100 J

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-111	SB-111	SB-111	SB-111	SB-112	SB-112	SB-112	SB-112
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		27 - 28	33 - 34	39 - 40	49 - 50	3	11 - 13	21	22 - 23
Date Collected:	SCOs	SCOs	of Groundwater	Units	03/03/08	03/03/08	03/03/08	03/03/08	01/14/08	01/16/08	01/16/08	01/16/08
SVOCs-PAHs												
Naphthalene	500	1,000	12	mg/kg	0.13 J	0.54 U	0.1 J [0.092 J]	0.36 U	0.69	0.17 J	630 D	4.9
Acenaphthylene	500	1,000	107	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.89	0.39 U	25 DJ	0.32 J
Acenaphthene	500	1,000	98	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	9.2	0.39 U	210 D	2
Fluorene	500	1,000	386	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	11	0.39 U	100 D	1
Phenanthrene	500	1,000	1,000	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	37	0.31 J	320 D	3.3 J
Anthracene	500	1,000	1,000	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	8.6	0.39 U	87 D	0.94
Fluoranthene	500	1,000	1,000	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	22	0.15 J	81 D	0.93
Pyrene	500	1,000	1,000	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	17	0.17 J	130 D	1.4
Benzo(a)anthracene	5.6	11	1	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	4.1	0.096 J	45 DJ	0.53 J
Chrysene	56	110	1	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	3.8	0.16 J	43 D	0.51 J
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	2.5 J	0.1 J	15 J	0.27 J
Benzo(k)fluoranthene	56	110	1.7	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.77 J	0.39 U	6 J	0.099 J
Benzo(a)pyrene	1	1.1	22	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	1.8 J	0.056 J	30 DJ	0.34 J
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.98 J	0.39 U	11 J	0.12 J
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.22 J	0.39 U	3.5 J	0.58 U
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.76 J	0.39 U	11 J	0.14 J
Total PAHs				mg/kg	0.13 J	ND	0.1 J [0.092 J]	ND	121 J	1.21 J	1,750 J	16.8 J
Other Semivolatile Organics												
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.14 J	0.39 U	1.0 U	0.58 U
2-Methylnaphthalene				mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	28	0.26 J	340 D	2.6
2-Methylphenol	500	1,000	0.33	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.35 U	0.39 U	1.0 U	0.58 U
3,3'-Dichlorobenzidine				mg/kg	1.1 U	1.1 U	0.75 U [0.76 U]	0.72 U	0.70 U	0.78 U	2.1 U	1.2 U
4-Chloroaniline				mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.35 U	0.39 U	1.0 U	0.58 U
4-Methylphenol	500	1,000	0.33	mg/kg	0.54 U	0.17 J	0.38 U [0.38 U]	0.36 U	0.35 U	0.39 U	1.0 U	0.58 U
4-Nitrophenol				mg/kg	2.6 U	2.6 U	1.8 U [1.8 U]	1.7 U	1.7 U	1.9 U	5.1 U	2.8 U
Benzyl Alcohol				mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.35 U	0.39 U	1.0 U	0.58 U
bis(2-Ethylhexyl)phthalate				mg/kg	0.57 U	0.54 U	0.092 J [0.38 U]	0.36 U	0.36	0.17 J	0.23 J	0.077 J
Butylbenzylphthalate				mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.35 U	0.39 U	1.0 U	0.58 U
Carbazole				mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	1.3	0.39 U	2.7	0.58 U
Dibenzofuran	350	1,000	210	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	5.6	0.39 U	7.9	0.12 J
Di-n-Butylphthalate				mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.056 J	0.39 U	0.21 J	0.58 U
Di-n-Octylphthalate				mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.35 U	0.39 U	1.0 U	0.58 U
Isophorone				mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.35 U	0.39 U	1.0 U	0.58 U
N-Nitrosodiphenylamine				mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.35 U	0.083 J	1.0 U	0.58 U
Phenol	500	1,000	0.33	mg/kg	0.54 U	0.54 U	0.38 U [0.38 U]	0.36 U	0.35 U	0.39 U	1.0 U	0.58 U
Total Other SVOCs				mg/kg	0.13 J	0.17 J	0.19 J [0.092 J]	ND	160 J	1.7 J	2,100 J	20 J

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-112	SB-112	SB-112	SB-113	SB-113	SB-113	SB-113	SB-114	SB-114
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		31 - 32	40 - 41	48 - 49	11	13	19	23	9	13
Date Collected:	SCOs	SCOs	of Groundwater	Units	03/05/08	03/05/08	03/05/08	01/18/08	01/18/08	01/18/08	01/18/08	01/24/08	01/24/08
SVOCs-PAHs													
Naphthalene	500	1,000	12	mg/kg	0.54 U	3,900 DJ	5.2	2.5	3.1 J	3,400 D	2.9	1.4	0.1 J
Acenaphthylene	500	1,000	107	mg/kg	0.54 U	180 J	0.34 J	4	4.5	100	0.42 J	0.62	0.092 J
Acenaphthene	500	1,000	98	mg/kg	0.54 U	930 J	2.2	1.6	9.3	1,200 D	2	1.7	0.084 J
Fluorene	500	1,000	386	mg/kg	0.54 U	510 J	1.3	2	11	590 D	0.97	2.2	0.12 J
Phenanthrene	500	1,000	1,000	mg/kg	0.54 U	1,500 J	3.7	3.1	9.1	2,000 D	3.2	18 D	0.49
Anthracene	500	1,000	1,000	mg/kg	0.54 U	400 J	1.1	3.3	7.7	580 D	1.1	3.8	0.15 J
Fluoranthene	500	1,000	1,000	mg/kg	0.54 U	360 J	1	7.6 D	25	550 D	1.2	12 D	0.37 J
Pyrene	500	1,000	1,000	mg/kg	0.54 U	580 J	1.7	20 D	64	910 D	1.8	14 D	0.45
Benzo(a)anthracene	5.6	11	1	mg/kg	0.54 U	220 J	0.6	5.2	16	330 DJ	0.71	5.8	0.21 J
Chrysene	56	110	1	mg/kg	0.54 U	190 J	0.55	5.3	15	300 DJ	0.7	5.6	0.22 J
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	0.54 U	96 J	0.28 J	3.6	9.1	110	0.35 J	4.5	0.22 J
Benzo(k)fluoranthene	56	110	1.7	mg/kg	0.54 U	35 J	0.11 J	1.4	4.4	42	0.15 J	1.6	0.086 J
Benzo(a)pyrene	1	1.1	22	mg/kg	0.54 U	140 J	0.38	2.1	5	200 DJ	0.47 J	4.4	0.16 J
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	0.54 U	55 J	0.15 J	2 J	3.3 J	78	0.18 J	3.2	0.1 J
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	0.54 U	180 UJ	0.37 U	0.62 J	1 J	22	0.54 U	0.78	0.39 U
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	0.54 U	58 J	0.15 J	1.6	2.9 J	82	0.2 J	3	0.098 J
Total PAHs				mg/kg	ND	9,150 J	18.8 J	65.9 J	190 J	10,500 J	16.4 J	82.6	2.95 J
Other Semivolatile Organics													
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	0.54 U	180 UJ	0.37 U	0.41 U	4.2 U	8.6 U	0.54 U	0.36 U	0.39 U
2-Methylnaphthalene				mg/kg	0.54 U	2,400 J	4.0	2.2	2.6 J	1,300 D	1.1	1.6	0.14 J
2-Methylphenol	500	1,000	0.33	mg/kg	0.54 U	180 UJ	0.37 U	0.41 U	4.2 U	8.6 U	0.54 U	0.36 U	0.39 U
3,3'-Dichlorobenzidine				mg/kg	1.1 U	360 UJ	0.75 U	0.81 U	8.4 U	17 U	1.1 U	0.72 U	0.78 U
4-Chloroaniline				mg/kg	0.54 U	180 UJ	0.37 U	0.41 U	4.2 U	8.6 U	0.54 U	0.36 U	0.39 U
4-Methylphenol	500	1,000	0.33	mg/kg	0.54 U	180 UJ	0.37 U	0.41 U	4.2 U	8.6 U	0.54 U	0.36 U	0.39 U
4-Nitrophenol	-		-	mg/kg	2.6 U	880 UJ	1.8 U	2.0 U	20 U	42 U	2.6 U	1.7 U	1.9 U
Benzyl Alcohol				mg/kg	0.54 U	180 UJ	0.37 U	0.41 U	4.2 U	8.6 U	0.54 U	0.36 U	0.39 U
bis(2-Ethylhexyl)phthalate	-			mg/kg	0.54 U	180 UJ	0.37 U	0.077 J	4.2 U	8.6 U	0.27 J	0.27 J	0.12 J
Butylbenzylphthalate				mg/kg	0.54 U	180 UJ	0.37 U	0.41 U	4.2 U	8.6 U	0.54 U	0.36 U	0.39 U
Carbazole				mg/kg	0.54 U	180 UJ	0.37 U	0.41 U	4.2 U	12	0.54 U	0.35 J	0.39 U
Dibenzofuran	350	1,000	210	mg/kg	0.54 U	45 J	0.11 J	0.56	3.1 J	37	0.13 J	0.50	0.39 U
Di-n-Butylphthalate				mg/kg	0.54 U	180 UJ	0.37 U	0.41 U	4.2 U	8.6 U	0.54 U	0.36 U	0.39 U
Di-n-Octylphthalate				mg/kg	0.54 U	180 UJ	0.37 U	0.41 U	4.2 U	8.6 U	0.54 U	0.36 U	0.39 U
Isophorone				mg/kg	0.54 U	180 UJ	0.37 U	0.41 U	4.2 U	8.6 U	0.54 U	0.36 U	0.39 U
N-Nitrosodiphenylamine				mg/kg	0.54 U	180 UJ	0.37 U	0.41 U	4.2 U	8.6 U	0.17 J	0.36 U	0.39 U
Phenol	500	1,000	0.33	mg/kg	0.54 U	180 UJ	0.37 U	0.41 U	4.2 U	8.6 U	0.54 U	0.36 U	0.39 U
Total Other SVOCs				mg/kg	ND	12,000 J	23 J	69 J	200 J	12,000 J	18 J	85 J	3.2 J

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-114	SB-114	SB-114	SB-114	SB-115	SB-115	SB-115	SB-116	SB-116
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		21	29 - 31	40 - 41	44 - 45	10 - 11	16 - 17	24 - 25	5.5	12 - 13
Date Collected:	SCOs	SCOs	of Groundwater	Units	01/24/08	01/28/08	01/29/08	01/29/08	02/14/08	02/14/08	02/14/08	02/18/08	02/18/08
SVOCs-PAHs													
Naphthalene	500	1,000	12	mg/kg	3,300 D	0.6 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	110
Acenaphthylene	500	1,000	107	mg/kg	140 EJ	0.6 U	0.37 U	0.37 U	2.3 J	0.62 U	0.49 U	0.12 J	70
Acenaphthene	500	1,000	98	mg/kg	650 D	0.6 U	0.37 U	0.37 U	12	0.62 U	0.49 U	0.37 U	98
Fluorene	500	1,000	386	mg/kg	400 DJ	0.6 U	0.37 U	0.37 U	18	0.62 U	0.49 U	0.37 U	87
Phenanthrene	500	1,000	1,000	mg/kg	1,200 D	0.6 U	0.37 U	0.37 U	96	0.62 U	0.49 U	0.16 J	290
Anthracene	500	1,000	1,000	mg/kg	330 DJ	0.6 U	0.37 U	0.37 U	35	0.62 U	0.49 U	0.062 J	86
Fluoranthene	500	1,000	1,000	mg/kg	320 DJ	0.6 U	0.37 U	0.37 U	100	0.62 U	0.49 U	0.088 J	76
Pyrene	500	1,000	1,000	mg/kg	520 D	0.6 U	0.37 U	0.37 U	94	0.62 U	0.49 U	0.6	120
Benzo(a)anthracene	5.6	11	1	mg/kg	200 EJ	0.6 U	0.37 U	0.37 U	45	0.62 U	0.49 U	0.17 J	46
Chrysene	56	110	1	mg/kg	190 DJ	0.6 U	0.37 U	0.37 U	40	0.62 U	0.49 U	0.084 J	45
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	93 EJ	0.6 U	0.37 U	0.37 U	41	0.62 U	0.49 U	0.16 J	23
Benzo(k)fluoranthene	56	110	1.7	mg/kg	31 J	0.6 U	0.37 U	0.37 U	18	0.62 U	0.49 U	0.37 U	7.6 J
Benzo(a)pyrene	1	1.1	22	mg/kg	120 EJ	0.6 U	0.37 U	0.37 U	36	0.62 U	0.49 U	0.16 J	29
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	37 J	0.6 U	0.37 U	0.37 U	23	0.62 U	0.49 U	0.078 J	11 J
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	11 J	0.6 U	0.37 U	0.37 U	4.9 J	0.62 U	0.49 U	0.37 U	3.4 J
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	36 J	0.6 U	0.37 U	0.37 U	22	0.62 U	0.49 U	0.1 J	13 J
Total PAHs				mg/kg	7,580 J	ND	ND	ND	587 J	ND	ND	1.78 J	1,120 J
Other Semivolatile Organics													
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	4.6 U	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	14 U
2-Methylnaphthalene	1			mg/kg	1,900 D	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	12 J
2-Methylphenol	500	1,000	0.33	mg/kg	4.6 U	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	14 U
3,3'-Dichlorobenzidine				mg/kg	9.2 U	1.2 U	0.73 U	0.74 U	21 U	1.2 U	0.99 U	0.73 U	28 U
4-Chloroaniline	-			mg/kg	4.6 U	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	14 U
4-Methylphenol	500	1,000	0.33	mg/kg	4.6 U	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	14 U
4-Nitrophenol				mg/kg	22 U	2.9 U	1.8 U	1.8 U	51 U	3.0 U	2.4 U	1.8 U	69 U
Benzyl Alcohol				mg/kg	4.6 U	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	14 U
bis(2-Ethylhexyl)phthalate				mg/kg	0.60 J	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.056 J	14 U
Butylbenzylphthalate				mg/kg	3.2 J	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	14 U
Carbazole				mg/kg	8.1	0.60 U	0.37 U	0.37 U	2.3 J	0.62 U	0.49 U	0.37 U	14 U
Dibenzofuran	350	1,000	210	mg/kg	40	0.60 U	0.37 U	0.37 U	6.6 J	0.62 U	0.49 U	0.37 U	7.3 J
Di-n-Butylphthalate				mg/kg	4.6 U	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	14 U
Di-n-Octylphthalate				mg/kg	4.6 U	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	14 U
Isophorone				mg/kg	4.6 U	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	14 U
N-Nitrosodiphenylamine				mg/kg	4.6 U	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	14 U
Phenol	500	1,000	0.33	mg/kg	4.6 U	0.60 U	0.37 U	0.37 U	11 U	0.62 U	0.49 U	0.37 U	14 U
Total Other SVOCs				mg/kg	9,500 J	ND	ND	ND	600 J	ND	ND	1.8 J	1,100 J

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:		Restricted	Restricted SCOs		SB-116	SB-116	SB-116	SB-118	SB-118	SB-118	SB-118	SB-118	SB-119
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		19 - 20	29 - 30	31 - 32	4 - 5	10 - 11	14.5 - 15	22 - 23	32 - 33	5
Date Collected:	SCOs	SCOs	of Groundwater	Units	02/18/08	02/18/08	02/18/08	03/07/08	03/07/08	03/07/08	03/07/08	03/07/08	01/21/08
SVOCs-PAHs													
Naphthalene	500	1,000	12	mg/kg	0.59 U	0.54 J	0.37 U	1.8	0.12 J	0.37 U	0.13 J	0.38 U	0.49
Acenaphthylene	500	1,000	107	mg/kg	0.59 U	0.42 UJ	0.37 U	4.7	0.22 J	0.37 U	0.54 U	0.38 U	0.24 J
Acenaphthene	500	1,000	98	mg/kg	0.59 U	0.26 J	0.37 U	0.35 J	0.38 U	0.37 U	0.54 U	0.38 U	0.68
Fluorene	500	1,000	386	mg/kg	0.59 U	0.097 J	0.37 U	0.68	0.38 U	0.37 U	0.54 U	0.38 U	0.73
Phenanthrene	500	1,000	1,000	mg/kg	0.59 U	0.36 J	0.37 U	1.7	0.3 J	0.082 J	0.54 U	0.38 U	1.7
Anthracene	500	1,000	1,000	mg/kg	0.59 U	0.42 U	0.37 U	2.6	0.17 J	0.37 U	0.54 U	0.38 U	0.37 J
Fluoranthene	500	1,000	1,000	mg/kg	0.59 U	0.42 U	0.37 U	3.3	0.32 J	0.065 J	0.54 U	0.38 U	0.38 J
Pyrene	500	1,000	1,000	mg/kg	0.59 U	0.42 U	0.37 U	4.1	1.2	0.16 J	0.54 U	0.38 U	0.68
Benzo(a)anthracene	5.6	11	1	mg/kg	0.59 U	0.42 U	0.37 U	3.8	0.32 J	0.056 J	0.54 U	0.38 U	0.27 J
Chrysene	56	110	1	mg/kg	0.59 U	0.42 U	0.37 U	3.5	0.28 J	0.37 U	0.54 U	0.38 U	0.35 J
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	0.59 U	0.42 U	0.37 U	3.5	0.44	0.37 U	0.54 U	0.38 U	0.2 J
Benzo(k)fluoranthene	56	110	1.7	mg/kg	0.59 U	0.42 U	0.37 U	1.3	0.16 J	0.37 U	0.54 U	0.38 U	0.079 J
Benzo(a)pyrene	1	1.1	22	mg/kg	0.59 U	0.42 U	0.37 U	4.2	0.5	0.07 J	0.54 U	0.38 U	0.2 J
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	0.59 U	0.42 U	0.37 U	3.2	0.37 J	0.069 J	0.54 U	0.38 U	0.17 J
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	0.59 U	0.42 U	0.37 U	0.72	0.077 J	0.37 U	0.54 U	0.38 U	0.38 U
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	0.59 U	0.42 U	0.37 U	3.5	0.39	0.093 J	0.54 U	0.38 U	0.21 J
Total PAHs	1		-	mg/kg	ND	1.26 J	ND	43 J	4.87 J	0.595 J	0.13 J	ND	6.75 J
Other Semivolatile Organics													
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	0.59 U	0.42 U	0.37 U	0.44 U	0.38 U	0.37 U	0.54 U	0.38 U	0.38 U
2-Methylnaphthalene				mg/kg	0.59 U	0.34 J	0.37 U	1.0	0.38 U	0.37 U	0.54 U	0.38 U	0.30 J
2-Methylphenol	500	1,000	0.33	mg/kg	0.59 U	0.42 U	0.37 U	0.44 U	0.38 U	0.37 U	0.54 U	0.38 U	0.38 U
3,3'-Dichlorobenzidine	-		-	mg/kg	1.2 U	0.83 U	0.74 U	0.88 U	0.76 U	0.74 U	1.1 U	0.76 U	0.77 U
4-Chloroaniline				mg/kg	0.59 U	0.42 U	0.37 U	0.44 U	0.38 U	0.37 U	0.54 U	0.38 U	0.38 U
4-Methylphenol	500	1,000	0.33	mg/kg	0.59 U	0.42 U	0.37 U	0.44 U	0.38 U	0.37 U	0.54 U	0.38 U	0.38 U
4-Nitrophenol	-		-	mg/kg	2.9 U	2.0 U	1.8 U	2.1 U	1.8 U	1.8 U	2.6 U	1.8 U	1.9 U
Benzyl Alcohol	-		-	mg/kg	0.59 U	0.42 U	0.37 U	0.44 U	0.38 U	0.37 U	0.54 U	0.38 U	0.38 U
bis(2-Ethylhexyl)phthalate	-		-	mg/kg	0.099 J	0.42 U	0.37 U	0.073 J	1.5	0.37 U	0.54 U	0.088 J	0.38 U
Butylbenzylphthalate				mg/kg	0.59 U	0.42 U	0.37 U	0.44 U	0.38 U	0.37 U	0.54 U	0.38 U	0.38 U
Carbazole	-		-	mg/kg	0.59 U	0.42 U	0.37 U	0.16 J	0.38 U	0.37 U	0.54 U	0.38 U	0.38 U
Dibenzofuran	350	1,000	210	mg/kg	0.59 U	0.42 U	0.37 U	0.22 J	0.38 U	0.37 U	0.54 U	0.38 U	0.17 J
Di-n-Butylphthalate				mg/kg	0.59 U	0.42 U	0.37 U	0.44 U	0.38 U	0.37 U	0.54 U	0.38 U	0.38 U
Di-n-Octylphthalate				mg/kg	0.59 U	0.42 U	0.37 U	0.44 U	0.38 U	0.37 U	0.54 U	0.38 U	0.38 U
Isophorone				mg/kg	0.59 U	0.42 U	0.37 U	0.44 U	0.38 U	0.37 U	0.54 U	0.38 U	0.38 U
N-Nitrosodiphenylamine			-	mg/kg	0.59 U	0.42 U	0.37 U	0.44 U	0.38 U	0.37 U	0.54 U	0.38 U	0.38 U
Phenol	500	1,000	0.33	mg/kg	0.59 U	0.42 U	0.37 U	0.44 U	0.38 U	0.37 U	0.54 U	0.38 U	0.38 U
Total Other SVOCs				mg/kg	0.099 J	1.6 J	ND	45 J	6.4 J	0.60 J	0.13 J	0.088 J	7.2 J

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-119	SB-119	SB-119	SB-120	SB-120	SB-120	SB-121	SB-121
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		7-8	9 - 10	11 - 12	6	13	17	6 - 7	10 - 11
Date Collected:	SCOs	SCOs	of Groundwater	Units	01/31/08	01/31/08	01/31/08	01/25/08	01/25/08	01/25/08	01/30/08	01/30/08
SVOCs-PAHs												
Naphthalene	500	1,000	12	mg/kg	3.7	0.4	12 D	1.6 J	1.9	19	0.59 J	1
Acenaphthylene	500	1,000	107	mg/kg	2.4	0.55	4.6	11	5.8	12	5.7	1.4
Acenaphthene	500	1,000	98	mg/kg	9.6	0.7	7.8 D	2.2 U	2.2	32	0.4 J	0.2 J
Fluorene	500	1,000	386	mg/kg	12	0.77	2.6	1 J	3	22	0.83 J	0.5 J
Phenanthrene	500	1,000	1,000	mg/kg	24	2 J	26 J	2.5	6.1	58	3.8	1
Anthracene	500	1,000	1,000	mg/kg	4.4	0.65	11 D	2.9	2.8	21	3.8	0.71 J
Fluoranthene	500	1,000	1,000	mg/kg	3.5	1.3	14 D	8	2.2	19	10	1.3
Pyrene	500	1,000	1,000	mg/kg	6.9	1.3	28 J	15	3	28	12	1.6
Benzo(a)anthracene	5.6	11	1	mg/kg	2 J	0.75	8.9 D	8.8	2.3	13	8	1.2
Chrysene	56	110	1	mg/kg	2.5	0.81	7.6 D	11	3.2	14	8.9	2.2
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	1.1 J	0.93 J	5.1 J	9.2	2.4	8.8 J	7.5	1.4
Benzo(k)fluoranthene	56	110	1.7	mg/kg	2.1 U	0.3 J	1.4 J	3.5	0.73 J	2.9	3	0.38 J
Benzo(a)pyrene	1	1.1	22	mg/kg	1 J	0.7 J	7.6 D	2.5	2.4	9.8	6.6	1.1
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	0.77 J	0.56 J	2.5 J	6.6	1.7	7.8	4.4	0.68 J
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	2.1 U	0.11 J	0.55 J	1.9 J	0.45 J	2 J	1.2 J	0.25 J
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	1 J	0.46 J	2.8 J	6.7	1.5	7.9	4.3	0.81 J
Total PAHs				mg/kg	74.9 J	12.3 J	142 J	92.2 J	41.7 J	277 J	81 J	15.7 J
Other Semivolatile Organics												
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	2.1 U	0.39 U	0.41 U	2.2 U	0.82 U	2.3 U	1.9 U	0.85 U
2-Methylnaphthalene				mg/kg	1.4 J	0.33 J	1.1	1.3 J	1.8	33	0.61 J	1.7
2-Methylphenol	500	1,000	0.33	mg/kg	2.1 U	0.39 U	0.41 U	2.2 U	0.82 U	NA	1.9 U	0.85 U
3,3'-Dichlorobenzidine			-	mg/kg	4.1 U	0.77 U	0.81 U	4.5 U	1.6 U	4.7 U	3.8 U	0.48 J
4-Chloroaniline				mg/kg	2.1 U	0.39 U	0.41 U	2.2 U	0.82 U	2.3 U	1.9 U	0.85 U
4-Methylphenol	500	1,000	0.33	mg/kg	2.1 U	0.39 U	0.41 U	2.2 U	0.82 U	2.3 U	1.9 U	0.85 U
4-Nitrophenol			-	mg/kg	9.9 U	1.9 U	2.0 U	11 U	4.0 U	11 U	9.1 U	1.1 J
Benzyl Alcohol				mg/kg	2.1 U	0.39 U	0.41 U	2.2 U	0.82 U	2.3 U	1.9 U	0.85 U
bis(2-Ethylhexyl)phthalate				mg/kg	2.1 U	0.19 J	0.39 J	2.2 U	0.82 U	0.95 J	1.9 U	0.85 U
Butylbenzylphthalate				mg/kg	2.1 U	0.39 U	0.41 U	2.2 U	0.82 U	2.3 U	1.9 U	0.17 J
Carbazole			-	mg/kg	2.1 U	0.090 J	0.16 J	2.2 U	0.82 U	0.68 J	1.9 U	0.35 J
Dibenzofuran	350	1,000	210	mg/kg	2.8	0.19 J	0.36 J	2.2 U	0.82 J	2.5	1.9 U	0.29 J
Di-n-Butylphthalate				mg/kg	2.1 U	0.39 U	0.41 U	2.2 U	0.82 U	2.3 U	1.9 U	0.85 U
Di-n-Octylphthalate				mg/kg	2.1 U	0.064 J	0.41 U	2.2 U	0.82 U	2.3 U	1.9 U	0.85 U
Isophorone				mg/kg	2.1 U	0.39 U	0.41 U	2.2 U	0.82 U	2.3 U	1.9 U	0.85 U
N-Nitrosodiphenylamine				mg/kg	2.1 U	0.39 U	0.41 U	2.2 U	0.82 U	2.3 U	1.9 U	0.85 U
Phenol	500	1,000	0.33	mg/kg	2.1 U	0.39 U	0.41 U	2.2 U	0.82 U	2.3 U	1.9 U	0.85 U
Total Other SVOCs				mg/kg	79 J	13 J	140 J	94 J	44 J	310 J	82 J	20 J

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-121	SB-121	SB-123	SB-123	SB-123	SB-123	SB-123	SB-124
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		13 - 14	17	4 - 5	19 - 20	23 - 24	34 - 35	44 - 45	9 - 10
Date Collected:	SCOs	SCOs	of Groundwater	Units	01/30/08	01/30/08	02/28/08	02/28/08	02/28/08	02/28/08	02/28/08	03/05/08
SVOCs-PAHs												
Naphthalene	500	1,000	12	mg/kg	100 D [140 D]	200 D	0.35 U	760 J	0.54 U	2,300 J	0.36 U	0.43 U
Acenaphthylene	500	1,000	107	mg/kg	7.8 [12]	5.4	0.35 U	100 J	0.54 U	99 J	0.36 U	0.43 U
Acenaphthene	500	1,000	98	mg/kg	24 [36 EJ]	72 D	0.35 U	320 J	0.54 U	350 J	0.36 U	0.43 U
Fluorene	500	1,000	386	mg/kg	30 [44 D]	35	0.35 U	210 J	0.54 U	360 J	0.36 U	0.43 U
Phenanthrene	500	1,000	1,000	mg/kg	86 D [120 D]	86 D	0.35 U	520 J	0.54 U	1,100 J	0.36 U	0.11 J
Anthracene	500	1,000	1,000	mg/kg	20 [29]	28	0.35 U	180 J	0.54 U	290 J	0.36 U	0.43 U
Fluoranthene	500	1,000	1,000	mg/kg	21 [32 EJ]	21	0.35 U	160 J	0.54 U	300 J	0.36 U	0.23 J
Pyrene	500	1,000	1,000	mg/kg	26 [41 D]	34	0.35 U	270 J	0.54 U	490 J	0.36 U	0.22 J
Benzo(a)anthracene	5.6	11	1	mg/kg	12 [18]	13	0.35 U	95 J	0.54 U	190 J	0.36 U	0.17 J
Chrysene	56	110	1	mg/kg	13 [17]	11	0.35 U	85 J	0.54 U	170 J	0.36 U	0.16 J
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	6.4 J [10 J]	6.8	0.35 U	54 J	0.54 U	91 J	0.36 U	0.23 J
Benzo(k)fluoranthene	56	110	1.7	mg/kg	2.2 J [2.9 J]	2.3 J	0.35 U	18 J	0.54 U	31 J	0.36 U	0.086 J
Benzo(a)pyrene	1	1.1	22	mg/kg	6.6 J [10 J]	8.6	0.35 U	78 J	0.54 U	130 J	0.36 U	0.17 J
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	2.7 J [3.2 J]	4.1	0.35 U	89 J	0.54 U	180 J	0.36 U	0.17 J
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	0.78 J [0.85 J]	1.1 J	0.35 U	70 J	0.54 U	150 J	0.36 U	0.43 U
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	2.4 J [2.8 J]	4.2	0.35 U	88 J	0.54 U	180 J	0.36 U	0.14 J
Total PAHs				mg/kg	361 J [519 J]	533 J	ND	3,100 J	ND	6,410 J	ND	1.69 J
Other Semivolatile Organics												
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	2.0 U [0.33 J]	2.6 U	0.35 U	82 UJ	0.54 U	180 UJ	0.36 U	0.43 U
2-Methylnaphthalene				mg/kg	180 D [250 D]	120 D	0.35 U	430 J	0.54 U	1,300 J	0.36 U	0.43 U
2-Methylphenol	500	1,000	0.33	mg/kg	2.0 U [1.9 U]	2.6 U	0.35 U	82 UJ	0.54 U	180 UJ	0.36 U	0.43 U
3,3'-Dichlorobenzidine				mg/kg	4.0 U [3.8 U]	5.2 U	0.69 U	160 UJ	1.1 U	360 UJ	0.72 U	0.86 U
4-Chloroaniline				mg/kg	2.0 U [1.9 U]	2.6 U	0.35 U	82 UJ	0.54 U	180 UJ	0.36 U	0.43 U
4-Methylphenol	500	1,000	0.33	mg/kg	2.0 U [1.9 U]	2.6 U	0.35 U	82 UJ	0.54 U	180 UJ	0.36 U	0.43 U
4-Nitrophenol				mg/kg	9.6 U [9.3 U]	13 U	1.7 U	400 UJ	2.6 U	880 UJ	1.7 U	2.1 U
Benzyl Alcohol				mg/kg	2.0 U [1.9 U]	2.6 U	0.35 U	82 UJ	0.54 U	180 UJ	0.36 U	0.43 U
bis(2-Ethylhexyl)phthalate				mg/kg	2.0 U [1.9 U]	2.6 U	0.35 U	82 UJ	0.54 U	180 UJ	0.36 U	0.69 U
Butylbenzylphthalate				mg/kg	2.0 U [1.9 U]	2.6 U	0.35 U	82 UJ	0.54 U	180 UJ	0.36 U	0.43 U
Carbazole				mg/kg	2.0 U [1.9 U]	0.49 J	0.35 U	82 UJ	0.54 U	180 UJ	0.36 U	0.43 U
Dibenzofuran	350	1,000	210	mg/kg	3.9 [5.8]	3.1	0.35 U	19 J	0.54 U	34 J	0.36 U	0.43 U
Di-n-Butylphthalate				mg/kg	2.0 U [1.9 U]	2.6 U	0.35 U	82 UJ	0.54 U	180 UJ	0.36 U	0.43 U
Di-n-Octylphthalate				mg/kg	2.0 U [1.9 U]	2.6 U	0.35 UJ	82 UJ	0.54 UJ	180 UJ	0.36 UJ	0.43 U
Isophorone				mg/kg	2.0 U [1.9 U]	2.6 U	0.35 U	82 UJ	0.54 U	180 UJ	0.36 U	0.43 U
N-Nitrosodiphenylamine				mg/kg	2.0 U [1.9 U]	2.6 U	0.35 U	82 UJ	0.54 U	180 UJ	0.36 U	0.43 U
Phenol	500	1,000	0.33	mg/kg	2.0 U [1.9 U]	2.6 U	0.35 U	82 UJ	0.54 U	180 UJ	0.36 U	0.43 U
Total Other SVOCs				mg/kg	550 J [780 J]	660 J	ND	3,600 J	ND	7,700 J	ND	1.7 J

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-124	SB-124	SB-124	SB-124	SB-124	SB-125	SB-125	SB-125	SB-125
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		15 - 16	20 - 21	22 - 23	36 - 36.5	47 - 48	5 - 6	11 - 13	17 - 18	23 - 25
Date Collected:	SCOs	SCOs	of Groundwater	Units	03/05/08	03/05/08	03/05/08	03/05/08	03/05/08	02/19/08	02/19/08	02/19/08	02/19/08
SVOCs-PAHs													
Naphthalene	500	1,000	12	mg/kg	12,000 DJ	290 D	0.1 J	37 D	0.36 U	4	0.87 J	6,300 J	0.54 U
Acenaphthylene	500	1,000	107	mg/kg	510 J	28 D	0.56 U	7.8	0.36 U	2.2 U	3.3	200 J	0.54 U
Acenaphthene	500	1,000	98	mg/kg	2,500 J	89 D	0.56 U	32 D	0.36 U	4.8	1.6	1,600 J	0.54 U
Fluorene	500	1,000	386	mg/kg	1,500 J	55 D	0.56 U	22 D	0.36 U	6.7	0.87 U	840 J	0.54 U
Phenanthrene	500	1,000	1,000	mg/kg	3,900 J	140 D	0.15 J	69 D	0.36 U	18	2.5	2,500 J	0.14 J
Anthracene	500	1,000	1,000	mg/kg	1,200 J	56 D	0.56 U	18 D	0.36 U	4.5	0.3 J	780 J	0.54 U
Fluoranthene	500	1,000	1,000	mg/kg	940 J	49 D	0.56 U	18 D	0.36 U	4.6	2.1	750 J	0.54 U
Pyrene	500	1,000	1,000	mg/kg	1,600 J	82 D	0.56 U	29 D	0.36 U	9 J	3.8	1,100 J	0.54 U
Benzo(a)anthracene	5.6	11	1	mg/kg	550 J	31 D	0.56 U	12 DJ	0.36 U	3.8 J	1.1	460 J	0.54 U
Chrysene	56	110	1	mg/kg	540 J	26 D	0.56 U	10 DJ	0.36 U	7.3 J	1.2	430 J	0.54 U
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	270 J	11 J	0.56 U	3.2 J	0.36 U	3.5 J	0.65 J	210 J	0.54 U
Benzo(k)fluoranthene	56	110	1.7	mg/kg	110 J	3.2 J	0.56 U	1.2 J	0.36 U	1 J	0.19 J	87 J	0.54 U
Benzo(a)pyrene	1	1.1	22	mg/kg	380 J	15 J	0.56 U	4.7 J	0.36 U	4 J	0.76 J	300 J	0.54 U
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	150 J	7.1	0.56 U	2.2 D	0.36 U	1.2 J	0.46 J	140 J	0.54 U
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	440 UJ	1.7	0.56 U	0.52 J	0.36 U	0.51 J	0.87 U	41 J	0.54 U
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	170 J	6.2 J	0.56 U	2.1 J	0.36 U	2.6 J	1.3 J	160 J	0.54 U
Total PAHs				mg/kg	26,300 J	890 J	0.25 J	269 J	ND	75.5 J	20.1 J	15,900 J	0.14 J
Other Semivolatile Organics													
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	440 UJ	1.0 U	0.56 U	0.36 U	0.36 U	2.2 U	0.87 U	78 UJ	0.54 U
2-Methylnaphthalene				mg/kg	5,800 J	190 D	0.56 U	4.8	0.36 U	14	1.2	3,000 J	0.17 J
2-Methylphenol	500	1,000	0.33	mg/kg	440 UJ	1.0 U	0.56 U	0.36 U	0.36 U	2.2 U	0.87 U	78 UJ	0.54 U
3,3'-Dichlorobenzidine				mg/kg	890 UJ	2.1 U	1.1 U	0.73 U	0.71 U	4.4 U	1.7 U	160 UJ	1.1 U
4-Chloroaniline				mg/kg	440 UJ	1.0 U	0.56 U	0.36 U	0.36 U	2.2 U	0.87 U	78 UJ	0.54 U
4-Methylphenol	500	1,000	0.33	mg/kg	440 UJ	1.0 U	0.56 U	0.36 U	0.36 U	2.2 U	0.87 U	78 UJ	0.17 J
4-Nitrophenol				mg/kg	2,200 UJ	5.0 U	2.7 U	1.8 U	1.7 U	11 UJ	4.2 UJ	380 UJ	2.6 U
Benzyl Alcohol				mg/kg	440 UJ	1.0 U	0.56 U	0.36 U	0.36 U	2.2 U	0.87 U	78 UJ	0.52 J
bis(2-Ethylhexyl)phthalate				mg/kg	440 UJ	NA	0.56 U	0.36 U	0.36 U	2.2 U	0.87 U	78 UJ	0.54 U
Butylbenzylphthalate				mg/kg	440 UJ	0.28 J	0.56 U	0.36 U	0.36 U	2.2 U	0.87 U	78 UJ	0.54 U
Carbazole				mg/kg	440 UJ	0.97 J	0.56 U	0.22 J	0.36 U	2.2 U	0.87 U	28 J	0.54 U
Dibenzofuran	350	1,000	210	mg/kg	120 J	4.1	0.56 U	1.2 J	0.36 U	2.2	0.87 U	84 J	0.54 U
Di-n-Butylphthalate				mg/kg	440 UJ	1.0 U	0.56 U	0.36 U	0.36 U	2.2 U	0.87 U	78 UJ	0.54 U
Di-n-Octylphthalate				mg/kg	440 UJ	1.0 U	0.56 U	R	0.36 U	2.2 U	0.87 U	78 UJ	0.54 U
Isophorone				mg/kg	440 UJ	1.0 U	0.56 U	0.36 U	0.36 U	2.2 U	0.29 J	78 UJ	0.54 U
N-Nitrosodiphenylamine				mg/kg	440 UJ	1.0 U	0.56 U	0.36 U	0.36 U	2.2 U	0.87 U	78 UJ	0.54 U
Phenol	500	1,000	0.33	mg/kg	440 UJ	1.0 U	0.56 U	0.36 U	0.36 U	2.2 U	0.87 U	78 UJ	0.54 U
Total Other SVOCs				mg/kg	32,000 J	1,100 J	0.25 J	280 J	ND	92 J	22 J	19,000 J	1.0 J

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-125	SB-125	SB-126	SB-126	SB-126	SB-126	SB-126	SB-126
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		37 - 38	39 - 40	3 - 5	15 - 16	25 - 26	34 - 35	37 - 38	46 - 47
Date Collected:	SCOs	SCOs	of Groundwater	Units	02/19/08	02/19/08	02/20/08	02/20/08	02/20/08	02/20/08	02/20/08	02/20/08
SVOCs-PAHs												
Naphthalene	500	1,000	12	mg/kg	720	0.42 U	0.71 U	3.7	8.4	950	240	0.37 UJ [0.37 U]
Acenaphthylene	500	1,000	107	mg/kg	34	0.42 U	0.23 J	1.1	0.56 U	44	28	0.37 U [0.37 U]
Acenaphthene	500	1,000	98	mg/kg	180	0.42 U	0.71 U	4	0.37 J	230	52	0.37 UJ [0.37 U]
Fluorene	500	1,000	386	mg/kg	110	0.42 U	0.71 U	1.7	0.15 J	84	42	0.37 U [0.37 U]
Phenanthrene	500	1,000	1,000	mg/kg	280	0.14 J	0.39 J	7.3	0.56 U	390	110	0.37 U [0.37 U]
Anthracene	500	1,000	1,000	mg/kg	85	0.42 U	0.19 J	2.9	0.56 U	61	29	0.37 U [0.37 U]
Fluoranthene	500	1,000	1,000	mg/kg	79	0.42 U	0.75	3.1	0.56 U	56	28	0.37 U [0.37 U]
Pyrene	500	1,000	1,000	mg/kg	120	0.42 U	0.47 J	3.6	0.56 U	81	45	0.37 U [0.37 U]
Benzo(a)anthracene	5.6	11	1	mg/kg	46	0.42 U	0.4 J	2	0.56 U	34	17 J	0.37 U [0.37 U]
Chrysene	56	110	1	mg/kg	43	0.42 U	0.44 J	2	0.56 U	30	15 J	0.37 U [0.37 U]
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	23	0.42 U	0.55 J	1.3	0.56 U	14	5.4 J	0.37 U [0.37 U]
Benzo(k)fluoranthene	56	110	1.7	mg/kg	7.8	0.42 U	0.18 J	0.51 J	0.56 U	6.1 J	2.4 J	0.37 U [0.37 U]
Benzo(a)pyrene	1	1.1	22	mg/kg	30	0.42 U	0.36 J	1.5	0.56 U	22	11 J	0.37 U [0.37 U]
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	12	0.42 U	0.24 J	0.62 J	0.56 U	9.3	3.4 J	0.37 U [0.37 U]
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	3.5 J	0.42 U	0.71 U	0.18 J	0.56 U	2.8 J	1.1 J	0.37 U [0.37 U]
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	13	0.42 U	0.22 J	0.58 J	0.56 U	9.9	3.3 J	0.37 U [0.37 U]
Total PAHs				mg/kg	1,790 J	0.14 J	4.42 J	36.1 J	8.92 J	2,020 J	633 J	ND [ND]
Other Semivolatile Organics												
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	7.6 U	0.42 U	0.71 U	0.79 U	0.56 U	7.6 U	0.47 U	R [0.37 U]
2-Methylnaphthalene				mg/kg	340	0.085 J	0.71 U	1.0	2.1	490	150	0.37 UJ [0.37 U]
2-Methylphenol	500	1,000	0.33	mg/kg	7.6 U	0.42 U	0.71 U	0.79 U	0.56 U	7.6 U	0.47 U	0.37 UJ [0.37 U]
3,3'-Dichlorobenzidine				mg/kg	15 U	0.84 U	1.4 U	1.6 U	1.1 U	15 U	0.93 U	0.74 U [0.75 U]
4-Chloroaniline	-			mg/kg	7.6 U	0.42 U	0.71 U	0.79 U	0.56 U	7.6 U	0.47 U	0.37 UJ [0.37 U]
4-Methylphenol	500	1,000	0.33	mg/kg	7.6 U	0.42 U	0.71 U	0.79 U	0.56 U	7.6 U	0.47 U	0.37 UJ [0.37 U]
4-Nitrophenol	-			mg/kg	37 U	2.0 U	3.4 U	3.8 U	2.7 U	37 U	2.3 U	1.8 U [1.8 U]
Benzyl Alcohol				mg/kg	7.6 U	0.42 U	0.71 U	0.79 U	0.56 U	7.6 U	0.47 U	0.37 UJ [0.37 U]
bis(2-Ethylhexyl)phthalate				mg/kg	7.6 U	0.42 U	0.71 U	0.36 J	0.56 U	7.6 U	0.47 U	0.37 U [0.37 U]
Butylbenzylphthalate				mg/kg	7.6 U	0.42 U	0.71 U	0.79 U	0.56 U	7.6 U	0.47 U	0.37 U [0.37 U]
Carbazole				mg/kg	2.8 J	0.42 U	0.71 U	0.79 U	0.56 U	1.6 J	0.72	0.37 U [0.37 U]
Dibenzofuran	350	1,000	210	mg/kg	10	0.42 U	0.71 U	0.21 J	0.56 U	7.2 J	3.4	0.37 U [0.37 U]
Di-n-Butylphthalate				mg/kg	7.6 U	0.42 U	0.71 U	0.79 U	0.56 U	7.6 U	0.47 U	0.37 U [0.37 U]
Di-n-Octylphthalate				mg/kg	7.6 U	0.42 U	0.71 U	0.79 U	0.56 U	7.6 U	0.47 U	0.37 U [0.37 U]
Isophorone				mg/kg	7.6 U	0.42 U	0.71 U	0.79 U	0.56 U	7.6 U	0.47 U	0.37 UJ [0.37 U]
N-Nitrosodiphenylamine				mg/kg	7.6 U	0.42 U	0.71 U	0.79 U	0.56 U	7.6 U	0.47 U	0.37 U [0.37 U]
Phenol	500	1,000	0.33	mg/kg	7.6 U	0.42 U	0.71 U	0.79 U	0.56 U	7.6 U	0.47 U	R [0.37 U]
Total Other SVOCs				mg/kg	2,100 J	0.23 J	4.4 J	38 J	11 J	2,500 J	790 J	ND [ND]

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-127	SB-127	SB-127	SB-127	SB-127	SB-128	SB-128	SB-128
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		14 - 15	18 - 18.5	25 - 26	39.5	41 - 42	3 - 4	10 - 11	19 - 20
Date Collected:	SCOs	SCOs	of Groundwater	Units	02/21/08	02/21/08	02/21/08	02/21/08	02/21/08	02/27/08	02/27/08	02/28/08
SVOCs-PAHs												
Naphthalene	500	1,000	12	mg/kg	1.3	210	0.56 U [0.57 U]	20	0.36 U	0.24 J	8.5 U	1,000 J
Acenaphthylene	500	1,000	107	mg/kg	0.45 U	51	0.56 U [0.57 U]	4.9	0.36 U	0.5	36	79 J
Acenaphthene	500	1,000	98	mg/kg	2.5	260	0.56 U [0.57 U]	14	0.36 U	0.3 J	52	360 J
Fluorene	500	1,000	386	mg/kg	2.9	63	0.56 U [0.57 U]	10	0.36 U	0.29 J	8 J	200 J
Phenanthrene	500	1,000	1,000	mg/kg	4.4	340	0.56 U [0.57 U]	28	0.36 U	5.1	140	600 J
Anthracene	500	1,000	1,000	mg/kg	1.4	120	0.56 U [0.57 U]	7.7	0.36 U	1.5	61	200 J
Fluoranthene	500	1,000	1,000	mg/kg	1.5	99	0.56 U [0.57 U]	4.8	0.36 U	9.7	92	190 J
Pyrene	500	1,000	1,000	mg/kg	2.8	140	0.56 U [0.57 U]	10	0.36 U	11	130	300 J
Benzo(a)anthracene	5.6	11	1	mg/kg	0.62	59	0.56 U [0.57 U]	3	0.36 U	6.6	60	120 J
Chrysene	56	110	1	mg/kg	0.71	58	0.56 U [0.57 U]	2.9	0.36 U	6.6	58	110 J
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	0.31 J	28 J	0.56 U [0.57 U]	1.2	0.36 U	6.8	30	56 J
Benzo(k)fluoranthene	56	110	1.7	mg/kg	0.13 J	10 J	0.56 U [0.57 U]	0.45	0.36 U	2.3	10	19 J
Benzo(a)pyrene	1	1.1	22	mg/kg	0.32 J	37	0.56 U [0.57 U]	1.8	0.36 U	5.5	42	78 J
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	0.14 J	18 J	0.56 U [0.57 U]	0.75	0.36 U	5.1	23	75 J
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	0.45 U	5.4 J	0.56 U [0.57 U]	0.26 J	0.36 U	1.2	10	56 J
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	0.15 J	16 J	0.56 U [0.57 U]	8.0	0.36 U	5.1	23	73 J
Total PAHs				mg/kg	19.2 J	1,510 J	ND [ND]	111 J	ND	67.8 J	775 J	3,520 J
Other Semivolatile Organics												
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.41 U	0.36 U	0.37 U	8.5 U	65 UJ
2-Methylnaphthalene				mg/kg	0.68	58	0.56 U [0.57 U]	32	0.36 U	0.12 J	8.5 U	520 J
2-Methylphenol	500	1,000	0.33	mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.41 U	0.36 U	0.37 U	8.5 U	65 UJ
3,3'-Dichlorobenzidine				mg/kg	0.91 U	57 U	1.1 U [1.1 U]	0.82 U	0.72 U	0.75 U	17 U	130 UJ
4-Chloroaniline				mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.41 U	0.36 U	0.37 U	8.5 U	65 UJ
4-Methylphenol	500	1,000	0.33	mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.41 U	0.36 U	0.37 U	8.5 U	65 UJ
4-Nitrophenol				mg/kg	2.2 U	140 U	2.7 U [2.8 U]	2.0 U	1.8 U	1.8 U	41 U	310 UJ
Benzyl Alcohol				mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.41 U	0.36 U	0.37 U	8.5 U	65 UJ
bis(2-Ethylhexyl)phthalate				mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.41 U	0.36 U	0.37 U	8.5 U	65 UJ
Butylbenzylphthalate				mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.41 U	0.36 U	0.37 U	8.5 U	65 UJ
Carbazole				mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.11 J	0.36 U	0.27 J	8.5 U	65 UJ
Dibenzofuran	350	1,000	210	mg/kg	0.80	8.4 J	0.56 U [0.57 U]	0.71	0.36 U	0.21 J	2.8 J	19 J
Di-n-Butylphthalate				mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.41 U	0.36 U	0.37 U	8.5 U	65 UJ
Di-n-Octylphthalate				mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.41 U	0.36 U	0.37 U	8.5 U	65 UJ
Isophorone				mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.41 U	0.36 U	0.37 U	8.5 U	65 UJ
N-Nitrosodiphenylamine				mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.41 U	0.36 U	0.37 U	8.5 U	65 UJ
Phenol	500	1,000	0.33	mg/kg	0.45 U	28 U	0.56 U [0.57 U]	0.41 U	0.36 U	0.37 U	8.5 U	65 UJ
Total Other SVOCs				mg/kg	21 J	1,600 J	ND [ND]	140 J	ND	68 J	780 J	4,100 J

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Location ID:	Restricted	Restricted	Restricted SCOs		SB-128	SB-128	SB-128
Sample Depth(Feet):	Commercial Use	Industrial Use	Use for Protection		25 - 26	30.5 - 31	44 - 45
Date Collected:	SCOs	SCOs	of Groundwater	Units	02/27/08	02/27/08	02/27/08
SVOCs-PAHs							
Naphthalene	500	1,000	12	mg/kg	0.55 U	0.14 J	0.33 U
Acenaphthylene	500	1,000	107	mg/kg	0.55 U	0.37 U	0.33 U
Acenaphthene	500	1,000	98	mg/kg	0.55 U	0.37 U	0.33 U
Fluorene	500	1,000	386	mg/kg	0.55 U	0.071 J	0.33 U
Phenanthrene	500	1,000	1,000	mg/kg	0.55 U	0.3 J	0.33 U
Anthracene	500	1,000	1,000	mg/kg	0.55 U	0.064 J	0.33 U
Fluoranthene	500	1,000	1,000	mg/kg	0.55 U	0.064 J	0.33 U
Pyrene	500	1,000	1,000	mg/kg	0.55 U	0.099 J	0.33 U
Benzo(a)anthracene	5.6	11	1	mg/kg	0.55 U	0.37 U	0.33 U
Chrysene	56	110	1	mg/kg	0.55 U	0.37 U	0.33 U
Benzo(b)fluoranthene	5.6	11	1.7	mg/kg	0.55 U	0.37 U	0.33 U
Benzo(k)fluoranthene	56	110	1.7	mg/kg	0.55 U	0.37 U	0.33 U
Benzo(a)pyrene	1	1.1	22	mg/kg	0.55 U	0.37 U	0.33 U
Indeno(1,2,3-cd)pyrene	5.6	11	8.2	mg/kg	0.55 U	0.37 U	0.33 U
Dibenzo(a,h)anthracene	0.56	1.1	1,000	mg/kg	0.55 U	0.37 U	0.33 U
Benzo(g,h,i)perylene	500	1,000	1,000	mg/kg	0.55 U	0.37 U	0.33 U
Total PAHs				mg/kg	ND	0.738 J	ND
Other Semivolatile Organics							
1,2-Dichlorobenzene	500	1,000	1.1	mg/kg	0.55 U	0.37 U	0.33 U
2-Methylnaphthalene	1			mg/kg	0.55 U	0.37 U	0.33 U
2-Methylphenol	500	1,000	0.33	mg/kg	0.55 U	0.37 U	0.33 U
3,3'-Dichlorobenzidine	-			mg/kg	1.1 U	0.74 U	0.66 U
4-Chloroaniline	-			mg/kg	0.55 U	0.37 U	0.33 U
4-Methylphenol	500	1,000	0.33	mg/kg	0.55 U	0.37 U	0.33 U
4-Nitrophenol				mg/kg	2.7 U	1.8 U	1.6 U
Benzyl Alcohol	-			mg/kg	0.55 U	0.37 U	0.33 U
bis(2-Ethylhexyl)phthalate	-			mg/kg	0.55 U	0.37 U	0.33 U
Butylbenzylphthalate	-			mg/kg	0.55 U	0.37 U	0.33 U
Carbazole	-			mg/kg	0.55 U	0.37 U	0.33 U
Dibenzofuran	350	1,000	210	mg/kg	0.55 U	0.37 U	0.33 U
Di-n-Butylphthalate				mg/kg	0.55 U	0.37 U	0.33 U
Di-n-Octylphthalate				mg/kg	0.55 UJ	0.37 UJ	0.33 UJ
Isophorone				mg/kg	0.55 U	0.37 U	0.33 U
N-Nitrosodiphenylamine				mg/kg	0.55 U	0.37 U	0.33 U
Phenol	500	1,000	0.33	mg/kg	0.55 U	0.37 U	0.33 U
Total Other SVOCs				mg/kg	ND	0.74 J	ND

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - 1066 ZEREGA AVENUE, BRONX, NY SOIL SAMPLING RESULTS FOR DETECTED SVOCs

Notes:

- 1. This table includes detected compounds only.
- 2. Bolded data indicates exceedances of Restricted Commercial Use criteria as per NYCRR Part 375, Table 375-6.8(b).
- 3. Shaded data indicates exceedances of Protection of Groundwater Use criteria as per NYCRR Part 375, Table 375-6.8(b).
- 4. Italicized data indicates exceedances of Industrial Use criteria as per NYCRR Part 375, Table 375-6.8(b).
- 5. Samples were collected by ARCADIS.
- 6. Samples were analyzed by TestAmerica, Inc. of Shelton, Connecticut.
- 7. Data validated by ARCADIS.
- 8. Results reported are [] are for field duplicate sample collected at that location.
- 9. J = estimated value.
 - UJ = estimated detection limit.
 - U = compound not detected at indicated detection limit.
 - ND = none detected.
 - R = rejected.
 - EJ = estimated value detected at concentration exceeding calibration range.

TABLE 7

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR INORGANICS

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-101	SB-101	SB-101	SB-102	SB-102	SB-102
Sample Depth(Feet):	Commercial Use	Industrial Use	for Protection of		6 - 7	11 - 13	17 - 19	3 - 5	11 - 12	15 - 16
Date Collected:	SCOs	SCOs	Groundwater	Units	02/04/08	02/04/08	02/04/08	02/12/08	02/12/08	02/12/08
Inorganics-8 RCRA Metals										
Arsenic	16	16	16	mg/kg	29.6	7 J	7 J	29.6 J	13.5 J	37.4 J
Barium	400	10,000	820	mg/kg	69.3	18.9	74.3	85.6	38.1	1,020
Cadmium	9.3	60	7.5	mg/kg	1.9 J	6 U	6.7 U	5.3 U	5.9 U	9.2 U
Chromium				mg/kg	13.7 J	12 J	10 J	21 J	29.6 J	36.1 J
Lead	1,000	3,900	450	mg/kg	1,050	10.3	678	668 J	69.8 J	1,720 J
Mercury	2.8	5.7	0.73	mg/kg	0.78	0.19	0.62	7.3 J	0.22 J	8.4 J
Selenium	1,500	6,800	4	mg/kg	4.6 J	2.4 J	2.8 J	5.2 J	3.6 J	10.1 J
Silver	1,500	6,800	8.3	mg/kg	0.39 J	3.6 U	4 U	3.2 U	3.5 U	1.6 J
Other Inorganics										
Aluminum				mg/kg	2,700	2,620	3,080	3,310	8,270	3,810
Antimony				mg/kg	R	R	R	3.20 J	11.7 UJ	17.6 J
Beryllium	590	2,700	47	mg/kg	1.70 J	2.40 U	2.70 U	1.50 U	0.620 J	2.60 U
Calcium				mg/kg	10,900	842	5,320	2,190 J	1,440 J	33,400 J
Cobalt				mg/kg	7.70	3.80	4.20	5.40	10.1	9.20
Copper	270	10,000	1,720	mg/kg	90.2 J	209 J	156 J	215 J	613 J	191 J
Iron				mg/kg	26,800	5,290	19,500	69,700	16,400	216,000
Magnesium				mg/kg	642	92.9	764	938	264	3,110
Manganese	10,000	10,000	2,000	mg/kg	158	6.80 J	126	183 J	41.8 J	2,640 J
Nickel	310	10,000	130	mg/kg	17.9	13.0	15.3	14.5	25.3	28.2
Potassium				mg/kg	336	67.7 J	246 J	1,180 J	134 J	608 J
Sodium				mg/kg	183 J	240 U	342	408	235 U	2,150
Thallium				mg/kg	18.5 U	18.0 U	20.2 U	7.40 U	8.20 U	4.80 J
Vanadium				mg/kg	18.2	39.0	24.3	39.4	40.9	28.3
Zinc	10,000	10,000	2,480	mg/kg	208	55.0	127	46.5	224	915
Cyanide	27,000	10,000,000	40,000	ug/kg	530 J	640 U	670 U	27,000	340 J	2,200
Total Other Inorganics				mg/kg	42,600 J	9,240 J	29,700 J	105,000 J	27,800 J	265,000 J

TABLE 7

CONSOLIDATED EDISON COMPANY OF NEW YORK, INC. FORMER UNIONPORT GAS WORKS MGP SITE - BRONX, NY

SOIL SAMPLING RESULTS FOR INORGANICS

Location ID:	Restricted	Restricted	Restricted SCOs Use		SB-102	SB-102	SB-102	SB-103	SB-103	SB-103
Sample Depth(Feet):	Commercial Use	Industrial Use	for Protection of		28 - 29	34 - 35	45 - 46	5 - 6	10 - 13	14 - 16
Date Collected:	SCOs	SCOs	Groundwater	Units	02/12/08	02/12/08	02/12/08	02/08/08	02/08/08	02/08/08
Inorganics-8 RCRA Metals										
Arsenic	16	16	16	mg/kg	3.2 J	5.6 UJ	5.1 UJ	27.9 J	7.7 J [6.7 J]	29.3 J
Barium	400	10,000	820	mg/kg	39.2	124	383	145	31.2 [20.7]	269
Cadmium	9.3	60	7.5	mg/kg	5.6 U	5.6 U	5.1 U	7.5 U	6.1 U [5.1 U]	8.3 U
Chromium				mg/kg	23.8 J	27.4 J	63.8 J	25.1 J	11.6 J [7.5 J]	10 J
Lead	1,000	3,900	450	mg/kg	11.2 J	3.4 J	6 J	200 J	10 J [11.5 J]	321 J
Mercury	2.8	5.7	0.73	mg/kg	0.02 J	0.053 U	0.053 U	0.14 J	0.062 J [0.049 J]	0.48 J
Selenium	1,500	6,800	4	mg/kg	11.3 UJ	11.3 UJ	2.5 J	5.3 J	2 J [1.8 J]	8.1 J
Silver	1,500	6,800	8.3	mg/kg	3.4 U	3.4 U	3 U	4.5 U	3.7 U [3.1 U]	0.51 J
Other Inorganics										
Aluminum				mg/kg	17,100	11,100	29,300	5,200	2,060 [802]	4,020
Antimony				mg/kg	11.3 UJ	11.3 UJ	10.2 UJ	2.70 J	12.2 UJ [10.2 UJ]	16.7 UJ
Beryllium	590	2,700	47	mg/kg	0.530 J	1.60 U	1.40 U	2.10 U	1.70 U [1.40 U]	0.850 J
Calcium				mg/kg	492 J	1,400 J	3,270 J	16,100 J	2,060 J [557 J]	3,840 J
Cobalt				mg/kg	5.80	9.10	22.7	3.80	2.10 J [2.10]	5.30
Copper	270	10,000	1,720	mg/kg	13.9 J	30.7 J	72.1 J	172 J	88.7 J [61.6 J]	61.5 J
Iron				mg/kg	21,000	19,500	48,700	99,700	27,800 [23,000]	38,200
Magnesium				mg/kg	4,260	4,450	13,800	4,080	164 [103]	439
Manganese	10,000	10,000	2,000	mg/kg	214 J	386 J	331 J	551 J	42.1 J [42.3 J]	227 J
Nickel	310	10,000	130	mg/kg	13.9	21.3	45.8	25.2	11.8 [10.7]	14.0
Potassium				mg/kg	1,200 J	4,580 J	17,300 J	871 J	207 J [96.0 J]	254 J
Sodium				mg/kg	872	225 U	659	938	244 U [204 U]	548
Thallium				mg/kg	7.90 U	7.90 U	7.10 U	10.6 U	8.50 U [7.10 U]	11.7 U
Vanadium				mg/kg	33.8	33.7	93.1	54.0	55.2 [41.3]	15.3
Zinc	10,000	10,000	2,480	mg/kg	39.1	40.0	106	64.5	7.80 J [8.80 J]	1,360
Cyanide	27,000	10,000,000	40,000	ug/kg	610 U	560 U	570 U	70,600	10,900 [8,200]	690 J
Total Other Inorganics				mg/kg	45,200 J	41,600 J	114,000 J	198,000 J	43,400 J [32,900 J]	49,700 J