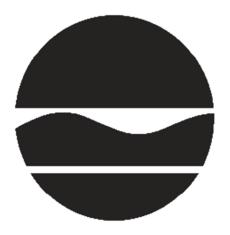
RECORD OF DECISION

Town and Country Dry Cleaners
State Superfund Project
Brighton, Monroe County
Site No. 828149
March 2017



Prepared by
Division of Environmental Remediation
New York State Department of Environmental Conservation

DECLARATION STATEMENT - RECORD OF DECISION

Town and Country Dry Cleaners State Superfund Project Brighton, Monroe County Site No. 828149 March 2017

Statement of Purpose and Basis

This document presents the remedy for the Town and Country Dry Cleaners site, a Class 2 inactive hazardous waste disposal site. The remedial program was chosen in accordance with the New York State Environmental Conservation Law and Title 6 of the Official Compilation of Codes, Rules and Regulations of the State of New York (6 NYCRR) Part 375, and is not inconsistent with the National Oil and Hazardous Substances Pollution Contingency Plan of March 8, 1990 (40CFR300), as amended.

This decision is based on the Administrative Record of the New York State Department of Environmental Conservation (the Department) for the Town and Country Dry Cleaners site and the public's input to the proposed remedy presented by the Department. A listing of the documents included as a part of the Administrative Record is included in Appendix B of the ROD.

Description of Selected Remedy

The elements of the selected remedy are as follows:

- 1. A remedial design program will be implemented to provide the details necessary for the construction, operation, optimization, maintenance, and monitoring of the remedial program. Green remediation principles and techniques will be implemented to the extent feasible in the design, implementation, and site management of the remedy as per DER-31. The major green remediation components are as follows;
- Considering the environmental impacts of treatment technologies and remedy stewardship over the long term;
- Reducing direct and indirect greenhouse gases and other emissions;
- Increasing energy efficiency and minimizing use of non-renewable energy;
- Conserving and efficiently managing resources and materials;
- Reducing waste, increasing recycling and increasing reuse of materials which would otherwise be considered a waste;
- Maximizing habitat value and creating habitat when possible;
- Fostering green and healthy communities and working landscapes which balance ecological, economic and social goals; and
- Integrating the remedy with the end use where possible and encouraging green and sustainable re-development.

- 2. Excavation and off-site disposal of all on-site soils which exceed commercial SCOs, as defined by 6 NYCRR Part 375-6.8. All off-site soils which exceed residential SCOs, as defined by 6 NYCRR Part 375-6.8, will be excavated and transported off-site for disposal. Clean fill meeting the requirements of 6 NYCRR Part 375-6.7(d) will be brought in to replace the excavated soil and establish the designed grades at the site.
- 3. In-Situ Enhanced Biodegradation will be employed to treat tetrachloroethene (PCE) and its associated degradation products in groundwater in an area to be determined during the remedial design. The biological breakdown of contaminants will be enhanced by the placement of microbial cultures to facilitate complete breakdown of chlorinated solvents. Injections may include electron donor compounds to enhance conditions for microbial growth as indicated by design phase testing.
- 4. A site cover currently exists in areas not occupied by buildings and will be maintained to allow for commercial use of the site. Any site redevelopment will maintain the existing site cover. The site cover may include paved surface parking areas, sidewalks or soil where the upper two feet of exposed surface soil meets the applicable soil cleanup objectives (SCOs) for commercial use. Any fill material brought to the site will meet the requirements for the identified site use as set forth in 6NYCRR part 375-6.7(d).
- 5. Imposition of an institutional control in the form of an environmental easement for the controlled property which will:
- require the remedial party or site owner to complete and submit to the Department a periodic certification of institutional and engineering controls in accordance with Part 375-1.8 (h)(3);
- allow the use and development of the controlled property for commercial use as defined by Part 375-1.8(g), although land use is subject to local zoning laws;
- restrict the use of groundwater as a source of potable or process water, without necessary ater quality treatment as determined by the County DOH; and
- require compliance with the Department approved Site Management Plan.
- 6. A Site Management Plan is required, which includes the following:

An Institutional and Engineering Control Plan that identifies all use restrictions and engineering controls for the site and details the steps and media-specific requirements necessary to ensure the following institutional and/or engineering controls remain in place and effective:

Institutional Controls: The Environmental Easement discussed above.

Engineering Controls: The sub-slab depressurization systems operating on-site and off-site discussed above.

This plan includes, but may not be limited to:

• an Excavation Plan which details the provisions for management of future excavations in areas of remaining contamination;

- a provision for the potential for soil vapor intrusion for any new buildings developed on the site, or in off-site areas of contamination, including provision for implementing actions recommended to address exposures related to soil vapor intrusion;
- a provision for further actions in the event that the on-site building is removed;
- provisions for the management and inspection of the identified engineering controls;
- maintaining site access controls and Department notification; and
- the steps necessary for the periodic reviews and certification of the institutional and/or engineering controls.

A Monitoring Plan to assess the performance and effectiveness of the remedy. The plan includes, but may not be limited to:

- monitoring of groundwater to assess the performance and effectiveness of the remedy;
- monitoring of on-site and off-site SSD systems to assess the performance and effectiveness of the remedy;
- a schedule of monitoring and frequency of submittals to the Department; and
- monitoring for vapor intrusion for any buildings, as may be required by the Institutional and Engineering Control Plan discussed above.

New York State Department of Health Acceptance

The New York State Department of Health (NYSDOH) concurs that the remedy for this site is protective of human health.

Declaration

The selected remedy is protective of human health and the environment, complies with State and Federal requirements that are legally applicable or relevant and appropriate to the remedial action to the extent practicable, and is cost effective. This remedy utilizes permanent solutions and alternative treatment or resource recovery technologies, to the maximum extent practicable, and satisfies the preference for remedies that reduce toxicity, mobility, or volume as a principal element.

March 31, 2017

Date

Robert W. Schick, P.E., Director Division of Environmental Remediation

Duschel

RECORD OF DECISION March 2017

RECORD OF DECISION

Town and Country Dry Cleaners Brighton, Monroe County Site No. 828149 March 2017

SECTION 1: SUMMARY AND PURPOSE

The New York State Department of Environmental Conservation (the Department), in consultation with the New York State Department of Health (NYSDOH), has selected a remedy for the above referenced site. The disposal of hazardous wastes at the site has resulted in threats to public health and the environment that would be addressed by the remedy. The disposal or release of hazardous wastes at this site, as more fully described in this document, has contaminated various environmental media. The remedy is intended to attain the remedial action objectives identified for this site for the protection of public health and the environment. This Record of Decision (ROD) identifies the selected remedy, summarizes the other alternatives considered, and discusses the reasons for selecting the remedy.

The New York State Inactive Hazardous Waste Disposal Site Remedial Program (also known as the State Superfund Program) is an enforcement program, the mission of which is to identify and characterize suspected inactive hazardous waste disposal sites and to investigate and remediate those sites found to pose a significant threat to public health and environment.

The Department has issued this document in accordance with the requirements of New York State Environmental Conservation Law and 6 NYCRR Part 375. This document is a summary of the information that can be found in the site-related reports and documents.

SECTION 2: CITIZEN PARTICIPATION

The Department seeks input from the community on all remedies. A public comment period was held, during which the public was encouraged to submit comment on the proposed remedy. All comments on the remedy received during the comment period were considered by the Department in selecting a remedy for the site. Site-related reports and documents were made available for review by the public at the following document repository:

Brighton Memorial Library Attn: Reference Desk 2300 Elmwood Avenue Brighton, NY 14618 Phone: (585) 784-5300

A public meeting was also conducted. At the meeting, the findings of the remedial investigation

(RI) and the feasibility study (FS) were presented along with a summary of the proposed remedy. After the presentation, a question-and-answer period was held, during which verbal or written comments were accepted on the proposed remedy.

Comments on the remedy received during the comment period are summarized and addressed in the responsiveness summary section of the ROD.

Receive Site Citizen Participation Information By Email

Please note that the Department's Division of Environmental Remediation (DER) is "going paperless" relative to citizen participation information. The ultimate goal is to distribute citizen participation information about contaminated sites electronically by way of county email listservs. Information will be distributed for all sites that are being investigated and cleaned up in a particular county under the State Superfund Program, Environmental Restoration Program, Brownfield Cleanup Program, Voluntary Cleanup Program, and Resource Conservation and Recovery Act Program. We encourage the public to sign up for one or more county listservs at http://www.dec.ny.gov/chemical/61092.html

SECTION 3: SITE DESCRIPTION AND HISTORY

Location: This site is located at 2308 and 2310 Monroe Avenue in the Town of Brighton, Monroe County. The 0.390 acre site is located in a mixed commercial/residential area on the northeast side of the town.

Site Features: The majority of the site is occupied by the on-site building with a paved parking area on the north side and a grassy area on the east side of the site. The on-site building is occupied by a dry cleaning business. The site is bound by Monroe Avenue to the south, commercial properties to the west and east and a residential neighborhood to the north.

Current Zoning/Use(s): The site is currently an active dry cleaner and is zoned for commercial use.

Historic Use(s): From 1969 to present day the site has operated commercially as a dry cleaner. While chlorinated solvents were previously used in the dry cleaning machines, they are now using a non-chlorinated solvent process (GreenEarth Cleaning).

Site Geology and Hydrogeology: The site is underlain by approximately 16 to 19 feet of overburden materials overlying bedrock. The overburden consists of gray and brown silty sand to sandy silt with little clay and gravel. Groundwater in the overburden beneath the site is 6 feet below ground surface with flow to the east.

A site location map is attached as Figure 1.

SECTION 4: LAND USE AND PHYSICAL SETTING

The Department may consider the current, intended, and reasonably anticipated future land use

of the site and its surroundings when evaluating a remedy for soil remediation. For this site, alternatives (or an alternative) that restrict(s) the use of the site to commercial use (which allows for industrial use) as described in Part 375-1.8(g) were/was evaluated in addition to an alternative which would allow for unrestricted use of the site.

A comparison of the results of the RI to the appropriate standards, criteria and guidance values (SCGs) for the identified land use and the unrestricted use SCGs for the site contaminants is included in the Tables for the media being evaluated in Exhibit A.

SECTION 5: ENFORCEMENT STATUS

Potentially Responsible Parties (PRPs) are those who may be legally liable for contamination at a site. This may include past or present owners and operators, waste generators, and haulers.

The PRPs for the site, documented to date, include:

Town & Country Cleaners, LTD

2308 Monroe Avenue, LLC

W. J. Dry Cleaning Co., Inc.

The PRPs for the site declined to implement a remedial program when requested by the Department. After the remedy is selected, the PRPs will again be contacted to assume responsibility for the remedial program. If an agreement cannot be reached with the PRPs, the Department will evaluate the site for further action under the State Superfund. The PRPs are subject to legal actions by the state for recovery of all response costs the state has incurred.

SECTION 6: SITE CONTAMINATION

6.1: Summary of the Remedial Investigation

A Remedial Investigation (RI) has been conducted. The purpose of the RI was to define the nature and extent of any contamination resulting from previous activities at the site. The field activities and findings of the investigation are described in the RI Report.

The following general activities are conducted during an RI:

- Research of historical information,
- Geophysical survey to determine the lateral extent of wastes,
- Test pits, soil borings, and monitoring well installations,
- Sampling of waste, surface and subsurface soils, groundwater, and soil vapor,

- Sampling of surface water and sediment,
- Ecological and Human Health Exposure Assessments.

The analytical data collected on this site includes data for:

- groundwater
- soil
- indoor air
- sub-slab vapor

6.1.1: Standards, Criteria, and Guidance (SCGs)

The remedy must conform to promulgated standards and criteria that are directly applicable or that are relevant and appropriate. The selection of a remedy must also take into consideration guidance, as appropriate. Standards, Criteria and Guidance are hereafter called SCGs.

To determine whether the contaminants identified in various media are present at levels of concern, the data from the RI were compared to media-specific SCGs. The Department has developed SCGs for groundwater, surface water, sediments, and soil. The NYSDOH has developed SCGs for drinking water and soil vapor intrusion. The tables found in Exhibit A list the applicable SCGs in the footnotes. For a full listing of all SCGs see: http://www.dec.ny.gov/regulations/61794.html

6.1.2: RI Results

The data have identified contaminants of concern. A "contaminant of concern" is a hazardous waste that is sufficiently present in frequency and concentration in the environment to require evaluation for remedial action. Not all contaminants identified on the property are contaminants of concern. The nature and extent of contamination and environmental media requiring action are summarized in Exhibit A. Additionally, the RI Report contains a full discussion of the data. The contaminant(s) of concern identified at this site is/are:

tetrachloroethene (PCE) vinyl chloride trichloroethene (TCE) cis-1,2-dichloroethene

As illustrated in Exhibit A, the contaminant(s) of concern exceed the applicable SCGs for:

- groundwater
- soil
- soil vapor intrusion

6.2: Interim Remedial Measures

An interim remedial measure (IRM) is conducted at a site when a source of contamination or exposure pathway can be effectively addressed before issuance of the Record of Decision.

The following IRM(s) has/have been completed at this site based on conditions observed during the RI.

IRM - Soil Removal / Catch Basin Replacement

In September 2015, the State's contractors completed a Soil Removal / Catch Basin Replacement IRM to mitigate soil impacted with PCE behind the former dry cleaner. The IRM included excavation and off-site disposal of contaminated soil and soil sampling from the excavation limits to document any remaining contaminant concentrations. Confirmation sampling results reveal that VOC contamination still exists on-site exceeding commercial SCOs. Clean fill meeting the requirements of 6 NYCRR Part 375-6.7(d) for commercial use was brought in to replace the excavated soil and establish the designed grades at the site. Details of the IRM, which removed 275 tons of soil, are presented in a Construction Completion Report (CCR), dated June 2016.

IRM - Sub Slab Depressurization System (SSD) Installation

The Department, in conjunction with NYDOH, performed Soil Vapor Intrusion (SVI) sampling during the heating seasons from 2013-2015 off-site, at structures in off-site areas potentially affected by contamination starting at the former drycleaner. Seventeen property owners agreed to sampling. Based on the sampling results, no further action was recommended for 16 residential structures and the installation of a sub-slab depressurization (SSD) system was recommended at one structure, immediately adjacent to the site, which was installed in November, 2015. Upon completion of the installation, vacuum field extension communication testing was performed across the sub-slab of the building. Evaluation indicated that the system was maintaining sufficient vacuum beneath the slab of the building. Sub-slab vacuum measurements range from 0.018 to 0.680 vacuum in negative water column inches. To evaluate the effectiveness of the SSDS, sampling was performed, including collection of one 24-hour indoor air sample from the basement and one ambient air sample. The samples were analyzed for volatile organic compounds by USEPA Method TO-15. PCE was detected in indoor air at 1.6 ug/m3. Pre-mitigation indoor air sampling detected PCE at 6.8 ug/m3. Details of the IRM, are presented in a Construction Completion Report (CCR), dated May 2016.

6.3: Summary of Environmental Assessment

This section summarizes the assessment of existing and potential future environmental impacts presented by the site. Environmental impacts may include existing and potential future exposure pathways to fish and wildlife receptors, wetlands, groundwater resources, and surface water.

Based upon the resources and pathways identified and the toxicity of the contaminants of ecological concern at this site, a Fish and Wildlife Resources Impact Analysis (FWRIA) was deemed not necessary for OU 01.

Soil and groundwater were analyzed for volatile organic compounds (VOCs), semi-volatile organic compounds (SVOCs), metals, polychlorinated biphenyls (PCBs), and pesticides. Based upon investigations conducted to date, the primary contaminants of concern include tetrachloroethene (PCE) and its associated degradation products.

Soil - Concentrations of PCE found on-site (2 ppm to 4,390 ppm) significantly exceed the soil cleanup objectives for commercial use (150 ppm) at depths ranging from 6 feet to 17.9 feet. Concentrations of PCE found off-site (nd to 140 ppm) exceed the soil cleanup objectives for residential use (5.5 ppm).

Groundwater - PCE and its associated degradation products are found in overburden groundwater at the north end of the site, exceeding groundwater standards (typically 5 ppb), with a maximum concentration of 90,000 ppb (PCE). PCE from the site above the 5 ppb groundwater standard has migrated about 700 feet down-gradient off-site to adjacent properties. PCE was detected in bedrock groundwater as high as 16 ppb, slightly exceeding groundwater standards (5 ppb). Degradation products including cis-1,2- dichloroethene and vinyl chloride indicate some natural degradation of source material is occurring.

Sub-slab Vapor and Indoor Air – Based on the results of a Phase II Environmental Site Assessment an initial vapor intrusion investigation was conducted at an off-site building, by others. The off-site building is separated into three individual storefronts with basements utilized for storage. Indoor air sampling included one Suma canister that was placed in each of the three stores to sample indoor air. Three canisters were installed to sample sub-slab vapor below the basement floor at each store. PCE was detected in the indoor air (nd – 1.6) ug/m³ and in the sub-slab (nd – 88) ug/m³. As a result of the sampling a sub-slab depressurization (SSD) system was installed by the property owner. No field extension testing documenting depressurization and post-indoor air concentrations were provided to the Department.

Sampling as part of the Brownfield Cleanup Program (BCP) in the on-site building detected PCE in the sub-slab vapor at 11,000 ug/m³ and in the indoor air at 15 ug/m³. As a result, a sub-slab depressurization (SSD) system was installed, in the on-site building, by the property owner. The Brownfield Agreement was terminated and no field extension testing documenting depressurization and post-indoor air samples were collected.

6.4: Summary of Human Exposure Pathways

This human exposure assessment identifies ways in which people may be exposed to site-related contaminants. Chemicals can enter the body through three major pathways (breathing, touching or swallowing). This is referred to as *exposure*.

People are not coming into contact with the contaminated groundwater because the area is served by a public water supply that is not affected by this contamination. Direct contact with contaminants in the soil is unlikely because the contamination is not accessible below the on-site building and pavement. Volatile organic compounds in the groundwater may move into the soil vapor (air between soil particles), which in turn may move into overlying buildings and affect the indoor air quality. This process, which is similar to the movement of radon gas from the subsurface into the indoor air of buildings, is referred to as soil vapor intrusion. Actions have been implemented where necessary to address the potential for inhalation of site-related contaminants via soil vapor intrusion in on- and off-site buildings.

6.5: **Summary of the Remediation Objectives**

The objectives for the remedial program have been established through the remedy selection process stated in 6 NYCRR Part 375. The goal for the remedial program is to restore the site to pre-disposal conditions to the extent feasible. At a minimum, the remedy shall eliminate or mitigate all significant threats to public health and the environment presented by the contamination identified at the site through the proper application of scientific and engineering

The remedial action objectives for this site are:

Groundwater

RAOs for Public Health Protection

- Prevent ingestion of groundwater with contaminant levels exceeding drinking water standards.
- Prevent contact with, or inhalation of volatiles, from contaminated groundwater.

RAOs for Environmental Protection

- Restore ground water aquifer to pre-disposal/pre-release conditions, to the extent practicable.
- Remove the source of ground or surface water contamination.

Soil

RAOs for Public Health Protection

- Prevent ingestion/direct contact with contaminated soil.
- Prevent inhalation of or exposure from contaminants volatilizing from contaminants in soil.

RAOs for Environmental Protection

Prevent migration of contaminants that would result in groundwater or surface water contamination.

Soil Vapor

RAOs for Public Health Protection

Mitigate impacts to public health resulting from existing, or the potential for, soil vapor intrusion into buildings at a site.

SECTION 7: SUMMARY OF THE SELECTED REMEDY

To be selected the remedy must be protective of human health and the environment, be costeffective, comply with other statutory requirements, and utilize permanent solutions, alternative

RECORD OF DECISION March 2017 Page 10 Town and Country Dry Cleaners, Site No. 828149

technologies or resource recovery technologies to the maximum extent practicable. The remedy must also attain the remedial action objectives identified for the site, which are presented in Section 6.5. Potential remedial alternatives for the Site were identified, screened and evaluated in the feasibility study (FS) report.

A summary of the remedial alternatives that were considered for this site is presented in Exhibit B. Cost information is presented in the form of present worth, which represents the amount of money invested in the current year that would be sufficient to cover all present and future costs associated with the alternative. This enables the costs of remedial alternatives to be compared on a common basis. As a convention, a time frame of 30 years is used to evaluate present worth costs for alternatives with an indefinite duration. This does not imply that operation, maintenance, or monitoring would cease after 30 years if remediation goals are not achieved. A summary of the Remedial Alternatives Costs is included as Exhibit C.

The basis for the Department's remedy is set forth at Exhibit D.

The selected remedy is referred to as the On and Off-Site Excavation and Bio-Augmentation of Groundwater remedy.

The estimated present worth cost to implement the remedy is \$1,400,000. The cost to construct the remedy is estimated to be \$954,000 and the estimated average annual cost is \$446,000.

The elements of the selected remedy are as follows:

- 1. A remedial design program will be implemented to provide the details necessary for the construction, operation, optimization, maintenance, and monitoring of the remedial program. Green remediation principles and techniques will be implemented to the extent feasible in the design, implementation, and site management of the remedy as per DER-31. The major green remediation components are as follows;
- Considering the environmental impacts of treatment technologies and remedy stewardship over the long term;
- Reducing direct and indirect greenhouse gases and other emissions;
- Increasing energy efficiency and minimizing use of non-renewable energy;
- Conserving and efficiently managing resources and materials;
- Reducing waste, increasing recycling and increasing reuse of materials which would otherwise be considered a waste;
- Maximizing habitat value and creating habitat when possible;
- Fostering green and healthy communities and working landscapes which balance ecological, economic and social goals; and
- Integrating the remedy with the end use where possible and encouraging green and sustainable re-development.
- 2. Excavation and off-site disposal of all on-site soils which exceed commercial SCOs, as defined by 6 NYCRR Part 375-6.8. All off-site soils which exceed residential SCOs, as defined by 6 NYCRR Part 375-6.8, will be excavated and transported off-site for disposal. Clean fill

meeting the requirements of 6 NYCRR Part 375-6.7(d) will be brought in to replace the excavated soil and establish the designed grades at the site.

- 3. In-Situ Enhanced Biodegradation will be employed to treat tetrachloroethene (PCE) and its associated degradation products in groundwater in an area to be determined during the remedial design. The biological breakdown of contaminants will be enhanced by the placement of microbial cultures to facilitate complete breakdown of chlorinated solvents. Injections may include electron donor compounds to enhance conditions for microbial growth as indicated by design phase testing.
- 4. A site cover currently exists in areas not occupied by buildings and will be maintained to allow for commercial use of the site. Any site redevelopment will maintain the existing site cover. The site cover may include paved surface parking areas, sidewalks or soil where the upper two feet of exposed surface soil meets the applicable soil cleanup objectives (SCOs) for commercial use. Any fill material brought to the site will meet the requirements for the identified site use as set forth in 6NYCRR part 375-6.7(d).
- 5. Imposition of an institutional control in the form of an environmental easement for the controlled property which will:
- require the remedial party or site owner to complete and submit to the Department a periodic certification of institutional and engineering controls in accordance with Part 375-1.8 (h)(3);
- allow the use and development of the controlled property for commercial use as defined by Part 375-1.8(g), although land use is subject to local zoning laws;
- restrict the use of groundwater as a source of potable or process water, without necessary water quality treatment as determined by the County DOH; and
- require compliance with the Department approved Site Management Plan.
- 6. A Site Management Plan is required, which includes the following:

An Institutional and Engineering Control Plan that identifies all use restrictions and engineering controls for the site and details the steps and media-specific requirements necessary to ensure the following institutional and/or engineering controls remain in place and effective:

Institutional Controls: The Environmental Easement discussed above.

Engineering Controls: The sub-slab depressurization systems operating on-site and off-site discussed above.

This plan includes, but may not be limited to:

- an Excavation Plan which details the provisions for management of future excavations in areas of remaining contamination;
- a provision for the potential for soil vapor intrusion for any new buildings developed on the site or in off-site areas of contamination, including provision for implementing actions recommended to address exposures related to soil vapor intrusion;
- a provision for further actions in the event that the on-site building is removed;

- provisions for the management and inspection of the identified engineering controls;
- maintaining site access controls and Department notification; and
- the steps necessary for the periodic reviews and certification of the institutional and/or engineering controls.

A Monitoring Plan to assess the performance and effectiveness of the remedy. The plan includes, but may not be limited to:

- monitoring of groundwater to assess the performance and effectiveness of the remedy;
- monitoring of on-site and off-site SSD systems to assess the performance and effectiveness of the remedy;
- a schedule of monitoring and frequency of submittals to the Department; and
- monitoring for vapor intrusion for any buildings, as may be required by the Institutional and Engineering Control Plan discussed above.

Exhibit A

Nature and Extent of Contamination

This section describes the findings of the Remedial Investigation for all environmental media that were evaluated. As described in Section 6.1, samples were collected from various environmental media to characterize the nature and extent of contamination.

For each medium for which contamination was identified, a table summarizes the findings of the investigation. The tables present the range of contamination found at the site in the media and compares the data with the applicable SCGs for the site. The contaminants are arranged into volatile organic compounds (VOCs). For comparison purposes, the SCGs are provided for each medium that allows for unrestricted use. For soil, if applicable, the Restricted Use SCGs identified in Section 4 and Section 6.1.1 are also presented.

Waste/Source Areas

As described in the RI report, waste/source materials were identified at the site and are impacting groundwater, soil and/or soil vapor.

Wastes are defined in 6 NYCRR Part 375-1.2(aw) and include solid, industrial and/or hazardous wastes. Source areas are defined in 6 NYCRR Part 375(au). Source areas are areas of concern at a site were substantial quantities of contaminants are found which can migrate and release significant levels of contaminants to another environmental medium.

As a result of the historic use of the site, dry cleaning chemicals were either spilled to the ground surface or to floor drains, where they flowed/leaked into the soil at the site. The historic source area was determined to be the former catch basin/dry well located in the rear parking area to the east-northeast of the site building. In September 2015, as part of an IRM, the former catch basin/dry well was removed and replaced. A total of 275 tons of hazardous soil were removed during the catch basin/dry well replacement. While a significant mass removal was achieved, a small source area under the parking lot remains.

Certain waste/source areas identified at the site were addressed by the IRM(s) described in Section 6.2. The remaining waste/source area(s) identified during the RI will be addressed in the remedy selection process.

Groundwater

Groundwater samples were collected from overburden and bedrock monitoring wells. The samples were collected to assess groundwater conditions on-site and off-site. The results indicate that contamination in shallow groundwater at the site exceeds the SCGs for volatile organic compounds. Contaminant levels in bedrock groundwater slightly exceeded the guidance values for volatile organic compounds. Sampling indicates some limited biodegradation is occurring. With the removal of the source area by excavation, we expect to be able to enhance existing microbial colonies to more completely break down the chlorinated solvents with in-situ treatment. Design phase sampling will be used to measure and improve as necessary the environment for further growth of microbial communities.

Table #1 - Groundwater

Detected Constituents	Concentration Range Detected (ppb) ^a	SCG ^b (ppb)	Frequency Exceeding SCG
VOCs			
Tetrachloroethene (PCE)	0.41 - 90000	5	19/33
Trichloroethene (TCE)	0.38 - 500	5	13/33
cis-1,2-Dichloroethene	0.45 - 890	5	16/33
Vinyl Chloride	0.34 - 260	2	3/33

a - ppb: parts per billion, which is equivalent to micrograms per liter, ug/L, in water.

Although several metals were detected in the groundwater samples at concentrations above groundwater SCGs, the Site is not considered to be a source of metals contamination. The majority of the metals detections were in the samples from MW-1 and MW-2, which were observed to have high turbidity, and it is likely that the detections are metals that are attached to soil particles, and not actually dissolved phase metals.

SVOCs, Pesticides, and PCBs were not detected in the three groundwater samples analyzed for these constituents.

Based on the findings of the RI, the presence of VOCs has resulted in the contamination of groundwater. The site contaminants that are considered to be the primary contaminants of concern which will drive the remediation of groundwater to be addressed by the remedy selection process are tetrachloroethene (PCE) and its associated degradation products.

Soil

Soil samples were collected at the site during the RI, from on-site and off-site locations to further delineate the historic source area. Soil samples were collected in the vicinity of the historic source area, east to an adjacent property for analytical analysis primarily for VOCs.

The RI soil sampling results were compared to the applicable Soil Cleanup Objectives (SCOs) for unrestricted use and commercial restricted use, as discussed in Section 3, and indicate that the primary contaminants of concern on-site are VOCs. Based on the comparison of the soil sampling results to the restricted use SCOs, the commercial SCOs were selected for the evaluation of the data.

During the September 2015 IRM 275 tons of soil were removed from the historic source area and the excavation was backfilled with clean soil. Confirmation sampling and soil VOC results reveal that a VOC contamination still exists on and off-site. The VOC contamination exceeding the unrestricted and commercial SCOs was determined to extend from the historic source area east beneath the back parking lot as shown in Figure 4. The estimated area of soil contamination is approximately 10,000 square feet and extends from approximately 3 to 20 feet bgs, for a total volume of approximately 7,425 cubic yards.

b- SCG: Standard Criteria or Guidance - Ambient Water Quality Standards and Guidance Values (TOGs 1.1.1), 6 NYCRR Part 703, Surface water and Groundwater Quality Standards, and Part 5 of the New York State Sanitary Code (10 NYCRR Part 5).

Table #2 - Soil - Post IRM

Detected Constituents	Concentration Range Detected (ppm) ^a	Unrestricted SCG ^b (ppm)	Frequency Exceeding Unrestricted SCG	Restricted Use SCG ^c (ppm)	Frequency Exceeding Restricted SCG	Restricted Use SCG ^d (ppm)	Frequency Exceeding Restricted SCG
	VOCs						
Tetrachloroethene (PCI	nd - 3890	1.3	49 / 93	5.5	49/93	150	9/93
Trichloroethene (TCE)	nd - 2.2	0.47	17 / 93	10	17/93	200	0/93
cis-1,2-Dichloroethene	nd - 3.2	0.25	22 / 93	59	0/93	500	0/93
Vinyl Chloride	nd - 0.58	0.02	17 / 93	0.21	0/93	13	0/93

- a ppm: parts per million, which is equivalent to milligrams per kilogram, mg/kg, in soil;
- b SCG: Part 375-6.8(a), Unrestricted Soil Cleanup Objectives.
- c SCG: Part 375-6.8(b), Restricted Use Soil Cleanup Objectives for the Protection of Public Health for Residential Use, unless otherwise noted.
- d SCG: Part 375-6.8(b), Restricted Use Soil Cleanup Objectives for the Protection of Public Health for Commercial Use, unless otherwise noted.

In addition to VOCs, two discrete soil samples were collected during the RI to assess for SVOC, metals, pesticides and PCBs Three background samples were also collected for analysis of SVOCs and metals. Sample SS-1, collected from the wooded area of the Site in the vicinity of the former railroad line, contained several SVOCs, specifically polyaromatic hydrocarbons, at concentrations above background and above the Part 375 SCOs for unrestricted and commercial use. Arsenic was also detected in SS-1 at a concentration (18.2 mg/Kg) slightly above the Part 375 SCGs for unrestricted use (16 mg/kg), although the concentration was below one the background concentration at BKSS-100 (33 mg/Kg).

Based on the findings of the Remedial Investigation, the presence of VOCs has resulted in the contamination of soil. The site contaminants identified in soil which are considered to be the primary contaminants of concern, to be addressed by the remedy selection process are, tetrachloroethene (PCE) and its associated degradation products.

Soil Vapor

The evaluation of the potential for soil vapor intrusion resulting from the presence of site related soil or groundwater contamination was evaluated by the sampling of sub-slab vapor under structures, and indoor air inside structures. At this site, due to the presence of buildings in the impacted area soil vapor intrusion (SVI) samples, consisting of sub-slab vapor and ambient indoor air, were collected to determine whether actions are needed to address exposures to site-related contaminants.

The soil vapor intrusion sampling was conducted by NYSDEC, in conjunction with NYSDOH, during the 2013 and 2014 heating seasons and included the sampling of 17 structures. For each structure sampled, sub-slab soil vapor and indoor air samples were collected in order to determine whether actions are needed to address exposures to site-related contaminants. The results of the soil vapor intrusion sampling primarily indicated the presence of PCE and TCE. Based on the SVI sampling results, no VOCs detected in an indoor air samples exceeded its respective SCG. Site related VOCs were found in sub-slab vapor at structures both on- and off-site.

Sample results were evaluated in accordance with the Guidance for Evaluating Soil Vapor Intrusion in the State of New York (DOH 2006) and subsequent updates in order to determine whether actions were needed to address

exposure via soil vapor intrusion. Based on the sampling results, actions, including installation of a sub-slab depressurization system at one off-site building was recommended.

Sampling, by others, at the on-site building detected PCE in the sub-slab vapors. Based on the sampling results, a sub-slab depressurization (SSD) system was installed, in the on-site building, by the property owner. An additional sub-slab depressurization (SSD) system was installed at an off-site property, to the northwest, immediately adjacent to the site, by others. No field extension testing documenting depressurization and post-indoor air concentrations were provided to the Department. The system was installed based on the sampling results from a Phase I/II conducted by others.

The nature and extent of the soil vapor contamination has been delineated based on the findings of the soil vapor intrusion investigations as well as the evaluation of the groundwater plume delineation.

Based on the concentration detected, and in comparison with the Guidance for Evaluating Soil Vapor Intrusion in the State of New York (DOH 2006) and subsequent updates, soil vapor contamination identified during the RI was addressed during the IRM described in Section 6.2.

Exhibit B

Description of Remedial Alternatives

The following alternatives were considered based on the remedial action objectives (see Section 6.5) to address the contaminated media identified at the site as described in Exhibit A.

Alternative 1: No Further Action

The No Further Action Alternative recognizes the remediation of the site completed by the IRM(s) described in Section 6.2. This alternative leaves the site in its present condition and does not provide any additional protection of human health and the environment.

Alternative 2: No Further Action with Site Management

The No Further Action with Site Management Alternative recognizes the remediation of the site completed by the IRM(s) described in Section 6.2 and Site Management, Institutional Controls and Engineering Controls are necessary to confirm the effectiveness of the IRMs. This alternative maintains engineering controls which were part of the IRMs and includes institutional controls, in the form of an environmental easement and site management plan, necessary to protect public health and the environment from contamination remaining at the site after the IRMs.

Present Worth:	\$376,000.00
Capital Cost:	\$46,000.00
Annual Costs:	\$330,000.00

Alternative 3: Restoration to Pre-Disposal or Unrestricted Conditions

This alternative achieves all of the SCGs discussed in Section 6.1.1 and Exhibit A and soil meets the unrestricted soil clean objectives listed in Part 375-6.8 (a). This alternative will involve excavation and off-site disposal of all waste and soil contamination above the unrestricted soil cleanup objectives. This alternative would also include the demolition and rebuilding of the on-site building and a garage on a neighboring property. There is no Site Management, no restrictions, and no periodic review. This remedy will have no annual cost, only the capital cost.

Capital Cost: \$3,936,000.00

Alternative 4: Off-Property Soil Excavation and Monitored Natural Attenuation

This alternative would include, excavation of off-site soils which exceed residential SCOs, as defined by 6 NYCRR Part 375-6.8, and transported off-site for disposal. Clean fill meeting the requirements of 6 NYCRR Part 375-6.7(d) will be brought in to replace the excavated soil and establish the designed grades at the site. Groundwater contamination (remaining after active remediation) will be addressed with monitored natural attenuation (MNA). Groundwater will be monitored for site related contamination and also for MNA indicators which will provide an understanding of the (biological activity) breaking down the contamination. This alternative includes engineering controls and institutional controls, in the form of an environmental easement and a site management plan, necessary to protect public health and the environment.

Present Worth:	\$972,000.00
Capital Cost:	\$526,000.00
Annual Costs:	\$446,000.00

Alternative 5: Off-Site Soil Excavation, On-Site Soil In-Situ Chemical Oxidation and In-Situ Enhanced Biodegradation

This alternative would include, excavation of off-site soils which exceed residential SCOs, as defined by 6 NYCRR Part 375-6.8, and transported off-site for disposal. Clean fill meeting the requirements of 6 NYCRR Part 375-6.7(d) will be brought in to replace the excavated soil and establish the designed grades at the site. Treatment of on-site soils, above commercial SCOs, would be implemented using in-situ chemical treatment, either chemical oxidation or chemical reduction depending on the results of the bench and pilot scale tests. The in-situ chemical treatment would be conducted via soil mixing. Groundwater contamination (remaining after active remediation) will be addressed with In-Situ Enhanced Biodegradation. In-Situ Enhanced Biodegradation would include excavating a trench on the west side of on-site building in a north-south orientation. The trench would be backfilled with crushed stone, and a perforated pipe with riser would be installed inside the trench. Select bio-amendments would then be added to the trench through the riser pipe to enhance biodegradation in the area. This alternative includes engineering controls and institutional controls, in the form of an environmental easement and a site management plan, necessary to protect public health and the environment.

Present Worth:	\$1,270,000.00
Capital Cost:	\$824,000.00
Annual Costs:	\$446,000.00

Alternative 6: Off-Site and On-Site Soil Excavation with In-Situ Enhanced-Biodegradation

This alternative would include, excavation of off-site soils which exceed residential SCOs and excavation of onsite soil which exceed commercial SCOs, as defined by 6 NYCRR Part 375-6.8, and transported off-site for disposal. Clean fill meeting the requirements of 6 NYCRR Part 375-6.7(d) will be brought in to replace the excavated soil and establish the designed grades at the site. Groundwater contamination (remaining after active remediation) will be addressed with In-Situ Enhanced Biodegradation. In-Situ Enhanced Biodegradation would include excavating a trench on the west side of on-site building in a north-south orientation. The trench would be backfilled with crushed stone, and a perforated pipe with riser would be installed inside the trench. Select bioamendments would then be added to the trench through the riser pipe to enhance biodegradation in the area. This alternative includes engineering controls and institutional controls, in the form of an environmental easement and a site management plan, necessary to protect public health and the environment.

Present Worth:	\$1,400,000.00
Capital Cost:	\$954,000.00
Annual Costs:	\$446,000.00

Exhibit C

Remedial Alternative Costs

Remedial Alternative	Capital Cost (\$)	Annual Costs (\$)	Total Present Worth (\$)
#1 No Action	0	0	0
#2 No Further Action with Site Management	\$46,000.00	\$330,000.00	\$376,000.00
#3 Restoration to Pre-Disposal or Unrestricted Conditions	\$3,936,000.00	0	\$3,936,000.00
#4 Off-Property Soil Excavation and Monitored Natural Attenuation	\$526,000.00	\$446,000.00	\$972,000.00
#5 Off-Site Soil Excavation, On- Site In-Situ Chemical Oxidation and Bio-Augmentation	\$824,000.00	\$446,000.00	\$1,270,000.00
#6 Off-Site Soil Excavation, On- Site Soil Excavation and In-Situ Enhanced Biodegradation	\$954,000.00	\$446,000.00	\$1,400,000.00

Exhibit D

SUMMARY OF THE SELECTED REMEDY

The Department is selecting Alternative 6, as the remedy for the site. Alternative 6 will achieve the remediation goals for the site by excavation of off-site soils which exceed residential SCOs and excavation of on-site soil which exceed commercial SCOs, as defined by 6 NYCRR Part 375-6.8, and transported off-site for disposal. Groundwater contamination will be addressed with In-Situ Enhanced Biodegradation. Soil vapor intrusion will be addressed by monitoring of on-site and off-site SSD systems to assess the performance and effectiveness of the remedy. This alternative includes engineering controls and institutional controls, in the form of an environmental easement and a site management plan, necessary to protect public health and the environment. The elements of this remedy are described in Section 7. The selected remedy is depicted in Figure 6.

Basis for Selection

The selected remedy is based on the results of the RI and the evaluation of alternatives. The criteria to which potential remedial alternatives are compared are defined in 6 NYCRR Part 375. A detailed discussion of the evaluation criteria and comparative analysis is included in the FS report.

The first two evaluation criteria are termed "threshold criteria" and must be satisfied in order for an alternative to be considered for selection.

1. <u>Protection of Human Health and the Environment.</u> This criterion is an overall evaluation of each alternative's ability to protect public health and the environment.

The selected remedy, Alternative 6, would satisfy this criterion by removing the contaminated soils from below and above the water table and transporting them off-site for disposal. Alternative 6 addresses the source of the groundwater contamination, which is the most significant threat to public health and the environment. Alternative 1 (No Action) does not provide any additional protection to public health and the environment and will not be evaluated further. Alternative 3, by removing all soil contaminated above the unrestricted soil cleanup objective, meets the threshold criteria. Alternatives 2, 4, and 5 also comply with this criterion but to a lesser degree or with lower certainty. Alternatives 2, 4 and 5 rely on a restriction of groundwater use at the site to protect human health. Alternative 3 may require a short-term restriction on groundwater use; however, it is expected the restriction will be able to be removed in approximately three years. Alternatives 2, 3, 4, 5 and 6 all rely on engineering controls and institutional controls, in the form of an environmental easement and a site management plan, necessary to protect public health and the environment. The potential for soil vapor intrusion will be significantly reduced by Alternatives 3 and 6 and, to a somewhat lesser extent, Alternative 5. The potential for soil vapor intrusion will remain high under Alternatives 2 and 4.

2. <u>Compliance with New York State Standards, Criteria, and Guidance (SCGs).</u> Compliance with SCGs addresses whether a remedy will meet environmental laws, regulations, and other standards and criteria. In addition, this criterion includes the consideration of guidance which the Department has determined to be applicable on a case-specific basis.

Alternative 6 complies with SCGs to the extent practicable. It addresses source areas of contamination and complies with the restricted use soil cleanup objectives at the surface. It also creates the conditions necessary to restore groundwater and soil vapor quality over time. Because Alternatives 2, 3, 4, and 5 satisfy the threshold criteria, the remaining criteria are particularly important in selecting a final remedy for the site. It is expected

Alternative 3 will achieve groundwater and soil vapor SCGs sooner, while groundwater and soil vapor contamination above SCGs will remain on-site under Alternatives 2, 4 and 5 for many years.

The next six "primary balancing criteria" are used to compare the positive and negative aspects of each of the remedial strategies.

3. <u>Long-term Effectiveness and Permanence</u>. This criterion evaluates the long-term effectiveness of the remedial alternatives after implementation. If wastes or treated residuals remain on-site after the selected remedy has been implemented, the following items are evaluated: 1) the magnitude of the remaining risks, 2) the adequacy of the engineering and/or institutional controls intended to limit the risk, and 3) the reliability of these controls.

Long-term effectiveness is best accomplished by those alternatives involving excavation of the contaminated overburden soils (Alternatives 3 and 6). Alternative 3 results in removal of all of the chemical contamination at the site and removes the need for property use restrictions and long-term monitoring. Alternative 6 would result in the removal of contaminated soil exceeding remediation goals and almost all of the contaminated soil below the water table, but it also requires engineering controls, institutional controls, in the form of an environmental easement, and long-term monitoring. For Alternative 2, site management remains effective, but it will not be desirable in the long term. The results of the pilot testing indicate some uncertainty regarding the long-term effectiveness of Alternative 5 due to the tightness of the soil.

4. <u>Reduction of Toxicity, Mobility or Volume.</u> Preference is given to alternatives that permanently and significantly reduce the toxicity, mobility or volume of the wastes at the site.

Alternatives 2 and 4 would control potential exposures with engineering controls and institutional controls only and will not reduce the toxicity, mobility or volume of contaminants remaining. Alternatives 3 and 6 will reduce the toxicity, mobility and volume of on-site waste by transferring the material to an approved off-site location. However, depending on the disposal facility, the volume of the material would not be reduced. Only Alternatives 3, 5 and 6 would to varying degrees permanently reduce the toxicity, mobility and volume of some portion of the contaminants by use of physical and chemical treatment.

5. <u>Short-term Impacts and Effectiveness.</u> The potential short-term adverse impacts of the remedial action upon the community, the workers, and the environment during the construction and/or implementation are evaluated. The length of time needed to achieve the remedial objectives is also estimated and compared against the other alternatives.

Alternatives 2 through 6 all have short-term impacts which could easily be controlled, however, Alternative 2 would have the least impact. While the short term impacts are greatest in terms of disruption due to construction with Alternatives 3 and 6, the time needed to achieve the remediation goals would be the shorter with these alternatives. Alternative 4 will take the longest to achieve the remediation goals.

6. <u>Implementability</u>. The technical and administrative feasibility of implementing each alternative are evaluated. Technical feasibility includes the difficulties associated with the construction of the remedy and the ability to monitor its effectiveness. For administrative feasibility, the availability of the necessary personnel and materials is evaluated along with potential difficulties in obtaining specific operating approvals, access for construction, institutional controls, and so forth.

Alternatives 2, 4 and 6 are favorable in that they are readily implementable. Alternative 3 is also implementable, but the volume of soil excavated under this alternative would necessitate increased truck traffic on local roads for

several months. The results of the pilot testing indicate some uncertainty regarding the implementability of Alternative 5 due to the nature of the soil.

- 7. <u>Cost-Effectiveness</u>. Capital costs and annual operation, maintenance, and monitoring costs are estimated for each alternative and compared on a present worth basis. Although cost-effectiveness is the last balancing criterion evaluated, where two or more alternatives have met the requirements of the other criteria, it can be used as the basis for the final decision. The costs of the alternatives vary significantly. Alternative 2 has a low cost, but the contaminated soil would not be addressed other than by institutional controls. With its large volume of soil to be handled, Alternative 3 (restoration to unrestricted conditions) would have the highest present worth cost. Excavation and off-site disposal (Alternative 6) would be less expensive than Alternative 3, yet it would provide equal protection of the groundwater resource.
- 8. <u>Land Use.</u> When cleanup to pre-disposal conditions is determined to be infeasible, the Department may consider the current, intended, and reasonable anticipated future land use of the site and its surroundings in the selection of the soil remedy.

Since the anticipated use of the site is commercial, Alternatives 2, 4 and 5 would be less desirable because at least some contaminated soil would remain on the property whereas Alternative 3 and 6 would remove or treat the contaminated soil. However, the remaining contamination with Alternatives 4 and would be controlled with the implementation of a Site Management Plan. With Alternative 3, all of the overburden would be removed and restrictions on the site use would not be necessary.

The final criterion, Community Acceptance, is considered a "modifying criterion" and is taken into account after evaluating those above. It is evaluated after public comments on the Proposed Remedial Action Plan have been received.

9. <u>Community Acceptance.</u> Concerns of the community regarding the investigation, the evaluation of alternatives, and the PRAP are evaluated. A responsiveness summary will be prepared that describes public comments received and the manner in which the Department will address the concerns raised. If the selected remedy differs significantly from the proposed remedy, notices to the public will be issued describing the differences and reasons for the changes.

Alternative 6 was selected because, as described above, it satisfies the threshold criteria and provides the best balance of the balancing criterion.

APPENDIX A

Responsiveness Summary

RESPONSIVENESS SUMMARY

Town and Country Dry Cleaners State Superfund Project Brighton, Monroe County, New York Site No. 828149

The Proposed Remedial Action Plan (PRAP) for the Town and Country Dry Cleaners site was prepared by the New York State Department of Environmental Conservation (the Department) in consultation with the New York State Department of Health (NYSDOH) and was issued to the document repositories on February 27, 2017. The PRAP outlined the remedial measure proposed for the contaminated soil, groundwater and soil vapor at the Town and Country Dry Cleaners site.

The release of the PRAP was announced by sending a notice to the public contact list, informing the public of the opportunity to comment on the proposed remedy.

A public meeting was held on March 16, 2017, which included a presentation of the remedial investigation/feasibility study (RI/FS) for the Town and Country Dry Cleaners as well as a discussion of the proposed remedy. The meeting provided an opportunity for citizens to discuss their concerns, ask questions and comment on the proposed remedy. These comments have become part of the Administrative Record for this site. The public comment period for the PRAP ended on March 27, 2017.

This responsiveness summary responds to all questions and comments raised during the public comment period. The following are the comments received, with the Department's responses:

COMMENT 1: When considering remedial options, why not look at capping with vents for groundwater? If it was a brownfield site, could you do the track 4 cleanup, remove the source, cap and biological controls for groundwater treatment? If the contamination is deeper than 2 feet below the surface, why not propose to leave it in place with capping? It may be more cost effective than digging up the parking lot.

RESPONSE 1: Capping would not reduce the overall volume or toxicity of the impacted soil, and would not address the source to groundwater contamination.

COMMENT 2: Is it too tight for a high pressure vacuum system? Did you consider dual phase vapor extraction to suck up the soil vapor and groundwater?

RESPONSE 2: The on-site soil is too tight for a high pressure vacuum system. Due to the tight soils, a dual phase vapor extraction system was rejected during the initial remedy screening.

COMMENT 3: Why not use in-situ chemical oxidation? Did you do any pilot testing for that?

RESPONSE 3: Chemical oxidation is an effective way to reduce volatile organic compound (VOC) concentrations in groundwater and soil, however, the oxidants must come in contact with the impacted media which is limited by the tight soil at the site. Permanganate was added to the open excavation during the catch basin replacement interim remedial measure (IRM), and conveyance piping was added to assist in future permanganate injections.

COMMENT 4: For the off-site soil removal, you want residential levels, if it's restricted to not residential, would it be necessary?

RESPONSE 4: When cleanup to pre-disposal conditions is determined to be infeasible, the Department may consider the current, intended, and reasonable anticipated future land use of the site and its surroundings in the selection of the soil remedy. Land use is subject to local zoning laws. The existing land use and zoning for the off-site area in question is residential.

COMMENT 5: Is there still a source area left?

RESPONSE 5: There is still a small source area remaining beneath the rear parking lot. Alternative 6 will remove the remaining source area to the extent practicable.

COMMENT 6: Where on the map is the residential area you want to remediate?

RESPONSE 6: The residential area is to the east of the on-site building. See Figure 6 of the ROD.

COMMENT 7: In the back parking lot, there is a historic trolley track. Is the residential area also part of the historic train track?

RESPONSE 7: The residential area is not part of the historic train track.

COMMENT 8: Polycyclic aromatic hydrocarbons (PAHs) may be from the train. Are you going to try to remediate PAHs or was there not enough of a significant threat?

RESPONSE 8: PAHs were not identified as a contaminant of concern.

COMMENT 9: I am the attorney for Town and Country and understand there are over 20 employees. It may put everyone out of work. A state superfund, once cleaned up, no one will touch it, because no one wants to be liable. It could be an empty storefront. I hope that Town and Country can stay in business and people not lose their jobs.

RESPONSE 9: Comment noted. It is not the State's intention to put companies out of business. If a company is unable to fully implement the selected remedial plan, they can provide financial information to the Department in order to reach a settlement that is manageable for that business.

COMMENT 10: How was it discovered?

RESPONSE 10: A Phase II Environmental Site Assessment undertaken in 2006, of a neighboring properly, found tetrachloroethene (PCE) and its daughter products in the soil and groundwater.

COMMENT 11: Is it possible to revise Option #3 cost estimates?

RESPONSE 11: Option 3 (unrestricted remediation) is an estimate that requires demolition of the building to access impacted soils. If one were to remediate only the area outside the footprint, it would not provide a significantly higher level of protection than the selected remedy and would likely result in a similar cost.

COMMENT 12: \$1.4 million is a lot of money. I'd rather spend \$4 million to make sure the site is completely mitigated. Monitoring over time, estimates are heavy. It could be decreased to get at the significant area of concern or another alternative.

RESPONSE 12: Comment noted.

COMMENT 13: How far back does #6 option go? To the pavement?

RESPONSE 13: The final limits of the excavation will be determined during the design.

COMMENT 14: Where do concentrations start falling off for soil and groundwater?

RESPONSE 14: Concentrations start falling off to the east of the on-site fence. See Figures 4 and 5 of the ROD.

COMMENT 15: Soil removal prevents further groundwater contamination. What does it do to groundwater?

RESPONSE 15: Soil removal creates the conditions necessary to restore groundwater quality over time.

COMMENT 16: Will the remedy include biological agents? How will it be injected? How many locations? How many times?

RESPONSE 16: Yes, the final remedy will include injections of biological agents. Details of the injections will be determined during the design phase.

COMMENT 17: How did the drain sump work? Did it act like a dry well?

RESPONSE 17: The catch basin that was excavated and replaced during the 2015 IRM was acting like a dry well.

COMMENT 18: How did the Perc get there in the first place? Was it cleaning filters?

RESPONSE 18: It is believed that dry cleaning chemicals were spilled or leaked onto the ground surface where they flowed/leaked into the soil at the site.

Gregory R. Meyer submitted an email dated March 16, 2017 which included the following comments:

COMMENT 19: For the record we did not receive a mailing and are wondering why no other neighbors were there. Is it possible that no other neighbors received a notice? The only reason we knew about this was due to my wife's colleague at the town of Brighton.

RESPONSE 19: A public meeting notice was distributed via the Department's listserv. The Division of Environmental Remediation is committed to informing and involving the public during the investigation and cleanup of contaminated sites being addressed under the State's various remedial programs. We encourage you to receive site information by email by signing up at the appropriate county listserv(s) identified below. It's quick, it's free, and it will help keep you better informed. See http://www.dec.ny.gov/chemical/61092.html

COMMENT 20: Please clarify the length of time it has taken for this project to be executed and we are still at least 12mos away from starting one of the design alternatives.

RESPONSE 20: Initially the site operator attempted to address the site under in the Brownfield Cleanup Program. After submission of several work plans, however, the remedial party determined that they were unable to fully fund the project. After review by Department attorneys, the site was referred for action using the State Superfund, under which two IRMs were undertaken to address the most immediate issues. Going forward, after the remedy is selected, the potentially responsible party(ies) (PRPs) will again be contacted to assume responsibility for the remedial program. If an agreement cannot be reached with the PRPs, the Department will evaluate the site for further action under State Superfund. The PRPs are subject to legal action by the state for recovery of all response cost the state has incurred.

COMMENT 21: Please provide the detailed cost data for each of the 6 estimates.

RESPONSE 21: See Appendix K.2 of the Feasibility Study (FS).

COMMENT 22: Without seeing the cost data it appears the scope assumptions on a total cleanup to pre-spill conditions, alt #3, are driving the costs higher than necessary. That is perhaps more reasonable approach is to not consider replacement of the Town and Country building but rather excavate and mitigate the area by extending the #6 option further to the north into the woods, or at least to the existing north T&C fence. Given the higher levels of concentrations in water it appears reasonable to extend the #6 scope to the north.

RESPONSE 22: Although cost-effectiveness is the last balancing criterion evaluated, as part of the Feasibility Study process, where two or more alternatives have met the requirements of the other criteria, it can be used as the basis for the final decision. Excavation and off-site disposal (Alternative 6) would be less expensive than Alternative 3, yet it would provide equal protection

of the groundwater resource. The final limits of the excavation will be determined during the design.

COMMENT 23: We have kids that that play in the woods, and there are a number of other neighborhood kids that play in the woods where potential exposure may be a concern.

RESPONSE 23: The potential for exposures to contaminated soil via direct contact is unlikely since the contamination was not found at the surface.

COMMENT 24: Human safety should outweigh economic issues, i.e. jobs.

RESPONSE 24: Comment noted.

COMMENT 25: Please add me to your distribution list for this project?

RESPONSE 25: As the owner of the property, we will add you to the distribution list for this project. Interested parties can sign up for listserv at the following website: www.dec.ny.gov/chemical/61092.html.

Gregory R. Meyer submitted an additional email dated March 27, 2017 which included the following comments:

COMMENT 26: As part of the work provide new plantings and landscaping after work is complete behind residences.

RESPONSE 26: Any plantings and/or landscaping removed during our work will be replaced in kind.

COMMENT 27: Provide a new attractive fence behind residences.

RESPONSE 27: Any fencing removed during our work will be replaced in kind.

Peter S. Morton of Ravi Engineering & Land Surveying, P.C. (RE&LS) submitted a letter via email dated March 27, 2017 which included the following comments:

COMMENT 28: If the proposed remedy is implemented and Town & Country Cleaners, Ltd. is found liable for the cost, it will put them out of business. It will be the end of a business that has operated for about 50 years in the Town of Brighton, and deprive the employees of their livelihoods.

RESPONSE 28: Comment noted. Please see Response 9.

COMMENT 29: RE&LS has studied the PRAP and developed a remedial alternative that will meet the objectives as outlined in the PRAP, and will also be more cost-effective, allowing for Town & Country Cleaners to remain in business.

RESPONSE 29: After the remedy is selected, the potentially responsible party(ies) (PRPs) will again be contacted to assume responsibility for the remedial program. At that time the PRPs can sign an Order on Consent and assume responsibility for the remedial program. Should significant new information become available that warrants a review of the selected remedy, the Department will assess the information at the time, and may make appropriate remedy modification(s), if warranted.

Alan J. Knauf of Knauf Shaw, LLP submitted a letter via email and fax dated March 27, 2017 which included the following comments:

COMMENT 30: The proposed remedy is not cost-effective, but rather calls for huge unnecessary expenses without corresponding benefits to public health or the environment. If Town & Country is found responsible for the \$1.4 million in projected costs, it would go out of business, and over 20 people will lose their jobs at a business that has been a fixture in the community for half a century.

RESPONSE 30: Comment noted. Please see Response 9.

COMMENT 31: Our client's consultant, Ravi Engineering & Land Surveying, P.C. ("Ravi") has proposed a cost-effective remedy ("Ravi Alternative") (see their enclosed letter) that will be protective of public health and the environment at a more reasonable cost of about \$80,000 to \$130,000, plus future monitoring costs. This is a feasible remedy that our client could bear and still stay in business.

RESPONSE 31: This plan would require acquisition of a portion of an adjacent parcel and rezoning of that property to commercial use. As such this remedy could not be implemented by the State. The Department must pick a remedy that best satisfies the criteria identified in 6 NYCRR Part 375-1.8, including current, intended, and reasonably anticipated future land uses of the site and its surroundings. If a remedial party chooses to enter into an Order on Consent with the Department and should significant new information become available (e.g., property rezoning), they may seek an alternative remedy at that time. Please see Response 29.

APPENDIX B

Administrative Record

Administrative Record

Town and Country Dry Cleaners State Superfund Project Brighton, Monroe County, New York Site No. 828149

- 1. Proposed Remedial Action Plan for the Town and Country Dry Cleaners site, dated February 2017, prepared by the Department.
- 2. Phase II Environmental Site Assessment 2290, 2294, 2298 Monroe Avenue, dated December 2006, prepared by GeoQuest Environmental, Inc.
- 3. Site Characterization Report, dated April 2009, prepared by Camp Dresser & McKee.
- 4. Brownfield Cleanup Program Application, dated September 21, 2009, prepared by Day Environmental, Inc.
- 5. Construction Completion Report, IRM No. 1, Soil Removal / Catch Basin Replacement, dated June 2016, prepared by MACTEC Engineering and Consulting, P.C.
- 6. Construction Completion Report, IRM NO. 2, Sub Slab Depressurization (SSD) Installation, dated September 2015, prepared by MACTEC Engineering and Consulting, P.C.
- 7. Remedial Investigation Report/Final Feasibility Study Report (RI/FS), dated December, 2016, prepared by MACTEC Engineering and Consulting, P.C.
- 8. Email dated March 16, 2017 from Gregory R. Meyer.
- 9. Letter via email dated March 27, 2017 from Peter S. Morton, P.G., C.P.G, Project Manager, Ravi Engineering & Land Surveying, P.C.
- 10. Email dated March 27, 2017 from Gregory R. Meyer.
- 11. Letter via email and fax dated March 27, 2017 from Alan J. Knauf, Attorney at Law, Knauf Shaw, LLP.

