

CITY OF LOCKPORT

*SITE INVESTIGATION / REMEDIAL
ALTERNATIVES REPORT
RICHMOND AVENUE SITE
LOCKPORT, NEW YORK*

14 MARCH 2003

Prepared for:

The City of Lockport
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Lockport, New York 14094

Prepared by:

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InteGreyted Project No. 0107016P

New York State Department of Environmental Conservation

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SI/RAR Report of 3/14/03
.....

☒ Approved ☐ Approved As Noted ☐ Resubmit With Revisions ☐ Disapproved

COMMISSIONER OF ENVIRONMENTAL CONSERVATION

.....
Designated Representative

Daniel K. King

Date Feb. 19, 2004

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Attachment 2: Summary of Validated Test Results and Form 1s

Attachment 3: Asbestos Abatement Summaries

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EXECUTIVE SUMMARY

Project Objectives

The Richmond Avenue Project Site (the Site) is located at Richmond Avenue and Niagara Street in the City of Lockport, Niagara County, New York. Analytical data collected during previous site assessment and site investigation activities indicated that shallow soils across various areas of the Site may have been affected by volatile organic compounds (VOCs), semi-volatile organic compounds (SVOCs) and metals at concentrations in excess of the NYSDEC TAGM 4046 recommended soil cleanup objectives (TAGM 4046). In order to support future redevelopment of the site it was necessary to define the potential environmental and human health hazards associated with the Site. Therefore, the City of Lockport entered into an agreement with New York State Department of Environmental Conservation (NYSDEC) to conduct a Site Investigation/Remedial Alternatives Report (SI/RAR) at the Site. The objectives of the SI/RAR were to define environmental conditions in a manner consistent with the NYS 1996 Clean Water/Clean Air Bond Act Environmental Restoration Project – Title 5, December 1997 and USEPA objectives as recommended in the USEPA Guidance document entitled *Guidance for Conducting Remedial Investigations and Feasibility Studies under CERCLA*, dated October 1988. As such, the objectives of the SI/RAR included the following:

- the determination and definition of the nature and extent of chemical constituents in various environmental media (soil and groundwater, if present) and the extent to which they exceed their respective regulatory levels at the Site;
- the acquisition of analytical data to support a baseline risk assessment to evaluate potential on-site and off-site risks (if any) posed by chemical constituents identified at the Site;

- the implementation of interim remedial measures (IRMs), to remove immediate threats to human health or the environment; and
- the development and screening of remedial alternatives for the Site.

Site Description

The Site is located in the City of Lockport at approximately 43° 10'N latitude, 78° 41' W longitude and is comprised of nine parcels (street addresses 18 Church Street, 3 Niagara Street and 49, 51, 53, 57, 69, 79 and 81 Richmond Avenue) totaling approximately 2 +/- acres. The Site is bounded by Richmond Avenue, Church Street and Ontario Street and is immediately adjacent to the Erie Barge Canal. At the initiation of SI/RAR activities, an estimated 90 percent of the Site was occupied by vacant or underutilized buildings (primarily multi-story masonry structures) and associated paved parking and access driveways. Previous uses and types of operations conducted at these parcels included: automotive repair, gasoline service station, automotive sales, dry cleaner, machine shop, junkyard, leather goods and miscellaneous manufacturing operations.

SI/RAR Scope of Work

The SI/RAR was performed in three stages as described below:

- 1) Initial Site Investigation and Interim Remedial Measures (IRMs) – January to April 2002 – Site investigation activities included the installation of test borings, test pits, temporary monitoring wells, and the collection and analysis of soil samples. IRMs included asbestos abatement, building demolition, tank removals, and removal of petroleum affected soil.

- 2) Additional Site Investigation – May 2002 – Additional investigation activities included the installation of test borings and the collection and analysis of soil samples.
- 3) Additional IRMs – October 2002 – Additional IRMs included removal of petroleum-affected soil, hazardous and non-hazardous metal affected soil and replacement with “clean” backfill.

Initial Site Investigation

During the Initial Site Investigation soil borings were advanced at 31 exterior and the two interior locations across the Site. Soil samples were collected continuously at each boring location from grade to a completion depth of approximately eight feet below grade or bedrock refusal. Approximately two samples from each exterior boring location (62 total) were analyzed for total metals by NYS ASP methods. Five of these samples were also analyzed for metals by the Toxicity Characteristic Leaching Procedure (TCLP). Nine soil samples were also collected from three representative background locations and analyzed for RCRA metals.

Ten test pits were excavated across the site to depths of approximately eight feet below grade or bedrock refusal. Nine soil samples (eight from test pits and one from a test boring) were analyzed for VOCs and SVOCs by ASP methods.

Three surface soil samples were obtained and analyzed for RCRA Metals, VOCs, SVOCs, Pesticides, and PCBs to determine if analytes of concern existed at the ground surface.

Temporary monitoring wells were installed at four locations using direct push sampling techniques. One soil sample was selected and analyzed for VOCs and SVOCs. Following completion of each soil boring, one-inch-diameter PVC monitoring well was installed in

each boring. Water levels in the temporary monitoring wells were measured for one week. Groundwater was not observed in any of the temporary monitoring wells during this time.

Interim Remedial Measures

An abandoned in-ground hydraulic lift unit located in the rear of 49-53 Richmond Avenue property and all below-grade equipment were removed. Two confirmation soil samples were collected from the excavation and analyzed for VOCs, SVOCs, PCBs and total metals.

An above ground storage tank (AST) and associated petroleum-contaminated soil located in the basement of 49 Richmond Avenue was removed. Asbestos abatement was performed in the basement prior to initiating the removal of the petroleum-contaminated soil and AST.

An asbestos survey of the roof material and interior materials of the building located at 69 Richmond Avenue was performed. Sample results indicated approximately 5,300 square feet of the roof material contained asbestos material. Interior samples did not indicate the presence of ACM. Asbestos abatement on the non-friable ACM on the roof was performed during the IRM.

Petroleum contamination associated with two underground storage tanks (USTs) was encountered in soils under the building at 69 Richmond Avenue. In order to remove the soil the existing building was demolished. During demolition several infrastructure features were encountered and also removed from the site. Following removal, six soil borings were installed within the footprint of the demolished building to obtain an estimate of the extent and depth of petroleum-contaminated soil associated with these features. Following demolition of the building approximately 270 tons of the petroleum affected soil was excavated and disposed offsite. Upon completion of the excavation

activities confirmation soil samples were collected and analyzed for STARS VOCs and SVOCs.

Additional Site Investigation

Analysis of the analytical data collected during the Initial Site Investigation indicated that elevated concentrations of metals (arsenic, barium, chromium, lead, mercury, silver), SVOCs, VOCs, and one pesticide were present at the Site. Based on these findings it was determined that an Additional Investigation was needed to more accurately determine the extent of affected soils at the Site. As part of this investigation twenty-six soil borings were advanced at the Site to further characterize the horizontal and vertical extent of metals in soils and to assess the presence and extent of SVOCs and PCBs in soils. One soil sample from each of twenty-four selected borings (from the 0-2' interval) was analyzed for total metals analyses (arsenic, chromium, lead and mercury). Selected samples were also analyzed for SVOCs (six samples total) and PCBs (five samples total). In addition, five of the highest total metal samples were selected for TCLP metals analysis.

Additional IRM Measures

Analysis of the analytical data collected during the Initial and Additional Site Investigation activities indicated that elevated concentrations of metals (arsenic, barium, chromium, lead, mercury, silver), SVOCs, VOCs, and one pesticide were present at various locations of the Site. Based on these findings, additional IRMs were conducted at the Site. These IRMs consisted of: the removal and offsite disposal of hazardous metals containing soils; the removal and offsite disposal of non-hazardous metals containing soils and petroleum-contaminated soils.

Nature and Extent of Contamination

A review of analytical data for soil samples collected during the Initial Site Investigation and Additional Site Investigation indicated that soils across various areas of the site were impacted by up to six metals (arsenic, barium, chromium, lead, mercury, and silver), seven SVOCs, three VOCs, and one pesticide at concentrations in excess of NYSDEC TAGM 4046 soil cleanup objectives. Impacted soils were generally located in the upper 0 to 4 feet of soils at the site. However, in some isolated areas, impacted soils extended to depths of up to 8 feet below grade. Concentrations of contaminants detected in onsite soils were generally at levels that classified soils as non-hazardous by nature. However, concentrations of lead in several samples were at levels which classified soils as hazardous by nature.

Based on the analytical data, a total of six areas of non-hazardous soils which contained elevated concentrations of metals were delineated at the site. Four areas of non-hazardous petroleum-containing soils were also delineated at the site. In addition, two areas of hazardous soils, which were impacted by metals, were also delineated at the site. The extent of these areas is detailed further within the report and on the various figures included with the report.

Soil Removal IRM Summary

As part of the SI/RAR, IRMs consisting of the removal and offsite disposal of approximately 195 tons of hazardous metals containing soils; the removal and offsite disposal of approximately 1,300 tons of non-hazardous metals containing soils and 600 tons of petroleum-contaminated soils were conducted at the site. The completed IRMs provided for: the elimination of direct exposure threats from surface soil contamination; a reduction in contaminant concentration in the upper two feet of soil to levels below or near TAGM levels; limited residual contamination in soils below two feet; elimination of soils designated as hazardous waste; and establishment of residual concentrations of site analytes, which are acceptable for future planned use of the properties.

Following completion of the soil removal IRMs, confirmation soil samples were collected from the excavations to document the effectiveness of the IRMs and to establish the residual levels of analytes remaining at the site. A review of the analytical data from these soil samples indicated that up to three metals (arsenic, lead, and mercury) and up to five SVOCs were detected in confirmation soil samples at concentrations slightly exceeding NYSDEC TAGM 4046 soil cleanup objectives. The data also indicated that concentration ranges of metals and SVOCs that were detected above the TAGM 4046 cleanup objectives were generally below those that were detected during the Initial and Additional Site Investigation activities. In addition, the analytical data indicated that VOCs and pesticides were not detected in the confirmation soil samples at concentrations in excess of TAGM 4046 soil cleanup objectives.

Risk Assessment Summary

Analytical data collected during the Initial and Additional Site Investigation activities of the SI/RAR was combined by type and utilized for the development of a Baseline Risk Assessment for the Site. A list of sixteen substances of potential concern was assembled, including each substance detected in any environmental medium at levels exceeding its regulatory benchmark value. Values of input parameters were selected conservatively. Reference individuals of potential concern included on-site construction workers and commercial employees, and off-site residents. Complete exposure pathways of potential concern included air and soil pathways, but not groundwater pathways, given that groundwater was not encountered during the SI/RAR.

Based upon the findings, total potential incremental cancer and non-cancer risks were qualified. With respect to cancer risks, chromium and carcinogenic SVOC, mainly benzo(a)pyrene, constituted the substances of concern, which needed to be addressed during site remediation. With respect to non-cancer risks, lead constituted the main substance of concern.

Development and Screening of Remedial Alternatives

Remedial Action Objectives (RAOs) consisting of medium-specific goals for protecting human health were developed for the site. RAOs included preventing ingestion, direct contact, and inhalation of soil having non-carcinogen(s) (lead) at concentrations in excess of reference doses, and preventing ingestion, direct contact, and inhalation of soil having carcinogen(s) (chromium and carcinogenic SVOCs, mainly benzo (a) pyrene) at concentrations in excess of acceptable risks.

Medium-specific General Response Actions (GRAs) were developed to satisfy the RAOs for the Site. GRAs considered for the site were developed to address near surface soils (0 to 2 feet below grade) and subsurface soils (over 2 feet below grade) and included: No Action; Engineering/Institutional Controls; and Soil Removal and Replacement.

Potential remedial alternatives were identified for affected medium from various technologies and processes, which passed initial screening. A detailed analysis of each remedial alternative was then conducted to support final selection of a remedy. As part of this task each alternative was screened against seven evaluation criteria, which consisted of; (1) compliance with SCGs, (2) protection of human health and the environment, (3) short term effectiveness, (4) long term effectiveness, (5) reduction of toxicity, mobility or volume, (6) implementability, and (7) cost.

Recommended Future Remedial Action

Data developed during the SI/RAR revealed potential worst-case residual risks to off-site residential and on-site commercial receptors that are within the range of traditionally accepted risks for both cancer and non-cancer risks prior to the implementation of any remedy. Based on the results of the Risk Assessment, the “No Action” alternative could be acceptable for this Site. However, to provide additional protection at limited additional cost, the Engineering/Institutional Controls alternative is recommended for the Site. This Alternative must include institutional restrictions such as deed restrictions (commercial

site with residential allowed on the second floors and above) and implementation of a soil management plan that will address any excavation into areas below the clean backfill that contain residual substances of concern.

1.0 INTRODUCTION

The Richmond Avenue Project Site (the Site) is located at Richmond Avenue and Niagara Street in the City of Lockport, Niagara County, New York. The subject Site is a triangular-shaped property consisting of nine separate tax parcels totaling 2 +/- acres. The Site is bounded by Richmond Avenue, Church Street and Ontario Street and is immediately adjacent to the Erie Barge Canal. All of the nine tax parcels are municipally owned by the City of Lockport (the Municipality). Parcels were owned as follows prior to purchase by the Municipality in December 2001:

- Walter A. and Anna P. Kohl- 18 Church Street;
- Walter Kohl- 3 Niagara Street;
- Walter A. and Anna P. Kohl- 49,51,53 Richmond Avenue;
- Licata Vending, Inc.- 69 Richmond Avenue;
- Joseph Royal Enterprises, Inc. - 79 Richmond Avenue;
- Augustine and Vincent Sansone – 81 Richmond Avenue.

A tax map showing the designation of each parcel is provided in Appendix A.

1.1 PURPOSE OF THIS REPORT

Analytical data collected during previous site assessment and site investigation activities indicated that soils across various areas of the Site may have been affected by petroleum-related compounds (including volatile organic compounds (VOCs) and semi-volatile organic compounds (SVOCs)) and metals at concentrations in excess of the NYSDEC TAGM 4046 recommended soil cleanup objectives (TAGM 4046). This previous information indicated that potential contaminants are limited in extent to near – surface soils and that groundwater underlying the Site may not be affected.

Available laboratory analytical data, findings of previous site activities, and site history have established the need to define the potential environmental and human health hazards

associated with the Site. Therefore, the City of Lockport (“Municipality”) entered into an agreement with New York State Department of Environmental Conservation (NYSDEC) to conduct a Site Investigation/Remedial Alternatives Report (SI/RAR) at this site. The objectives of the SI/RAR for the Site are to define environmental conditions in a manner consistent with the NYS 1996 Clean Water/Clean Air Bond Act Environmental Restoration Project – Title 5, December 1997 and USEPA objectives as recommended in the USEPA Guidance document entitled *Guidance for Conducting Remedial Investigations and Feasibility Studies under CERCLA*, dated October 1988. As such, the objectives of this SI/RAR are consistent with CERCLA and include the following:

- determine and define the presence and extent of chemical constituents in soil and, if present, shallow groundwater that may occur in soil at the Site. This will be accomplished by accurately locating, defining, and characterizing onsite contaminant source areas, “hotspots”, and other areas of concern;
- determine and define the extent of chemical constituents in environmental media that exceed their respective regulatory levels;
- provide data for completion of a baseline risk assessment which will evaluate potential on-site and off-site risks (if any) posed by chemical constituents identified at the Site;
- implement interim remedial measure (IRM), remove all known and/or discovered on-site tanks, drums or vessels and associated contamination, and any material that is deemed a threat to human health or the environment; and
- provide the necessary data from the SI to prepare a RAR that accurately identifies, develops, and screens effective remedial alternatives at the Site.

This report presents the results of the SI/RAR activities conducted at the site and provides all data and documentation required to support the SI/RAR. As required, this report

provides a sufficient basis for NYSDEC to prepare a Proposed Remedial Action Plan (PRAP) and present it to the public.

1.2 REPORT ORGANIZATION

This document represents the SI/RAR that was developed by InteGreyted Consultants, LLC (InteGreyted) for the Municipality. This SI/RAR consists of the following items.

- A summary of the Site location and physical setting, the Site background and history, results of previous investigations, current operational status, and future use considerations.
- A detailed presentation of the activities, observations and results related to the Site Investigation that was performed to evaluate the nature and extent of contamination.
- A description of the Interim Remedial Measures conducted at the Site during the SI/RAR.
- An evaluation of potential contaminate fate and transport based on potential routes of migration and contaminate persistence.
- A baseline Risk Assessment consisting of a qualitative exposure assessment prepared specifically for the Site. The goal of the risk assessment was to identify and characterize the following: (1) the sources and toxicity of identified compounds in relevant site media; (2) environmental fate and transport mechanisms within specific environmental media; (3) potential exposure pathways and extent of actual or expected exposure; (4) potential receptor population; (5) the extent of expected impact or threat and the likelihood of each occurring; and (6) level(s) of uncertainty associated with each item. At a minimum, the baseline risk assessment incorporated the components outlined in

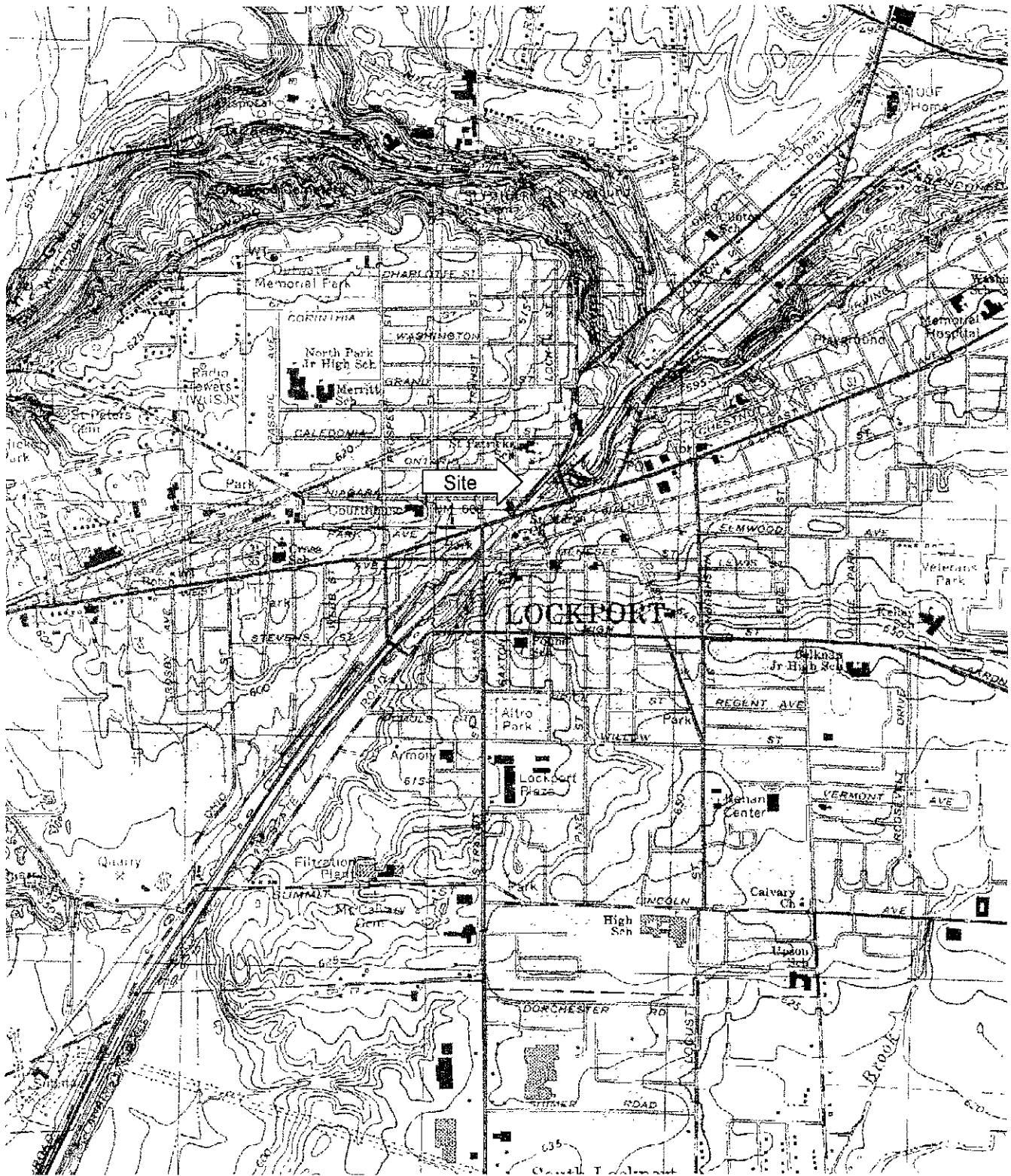
- the New York State Department of Health (NYSDOH), *Guidelines for Qualitative Human Health Exposure Assessment*.
- An evaluation of potential risks associated with the site that may need to be further addressed by IRM activities. This evaluation included predictive risk assessment activities that estimated the effectiveness of potential IRMs.
- A Remedial Alternatives evaluation that provides an assessment of potential remedial alternatives to address residual site conditions and identifies the most feasible remedial alternative for this site (the RAR).

The RAR was prepared under the direction of, and certified by, a NYS Licensed Professional Engineer. As required by law, the firm performing the RAR was a licensed NYS professional engineering firm authorized to provide engineering services per Article 145 of the New York Education Law.

1.3 SITE BACKGROUND

1.3.1 Physical Setting

The Site is located in the City of Lockport at approximately 43° 10'N latitude, 78° 41' W longitude (Figure 1-1). Site location street addresses include 18 Church Street, 3 Niagara Street and 49, 51, 53, 57, 69, 79 and 81 Richmond Avenue (Figure 1-2). The Site is comprised of nine parcels, many of which contain either vacant or underutilized buildings. Previous uses and types of operations conducted at these parcels included: automotive repair, gasoline service station, automotive sales, dry cleaner, machine shop, junkyard, leather goods manufacturing, and miscellaneous manufacturing operations. It is probable that petroleum products including gasoline, motor oils and other oils and lubricants were used by past owners or operators of the Property. Antifreeze, dry cleaning fluids, paints and miscellaneous chemicals including household cleaners,



Map from U.S.G.S. - Lockport, NY Quadrangle -1980 Revision

InteGred

4 Jamesville Road
 Syracuse, New York 13214
 Phone: (315) 445-0224
 Fax: (315) 445-0793

Drawn by:

PJM

Project No.:

0107016P

Date:

12-18-02

Scale:

1"=25,000'

SITE LOCATION MAP

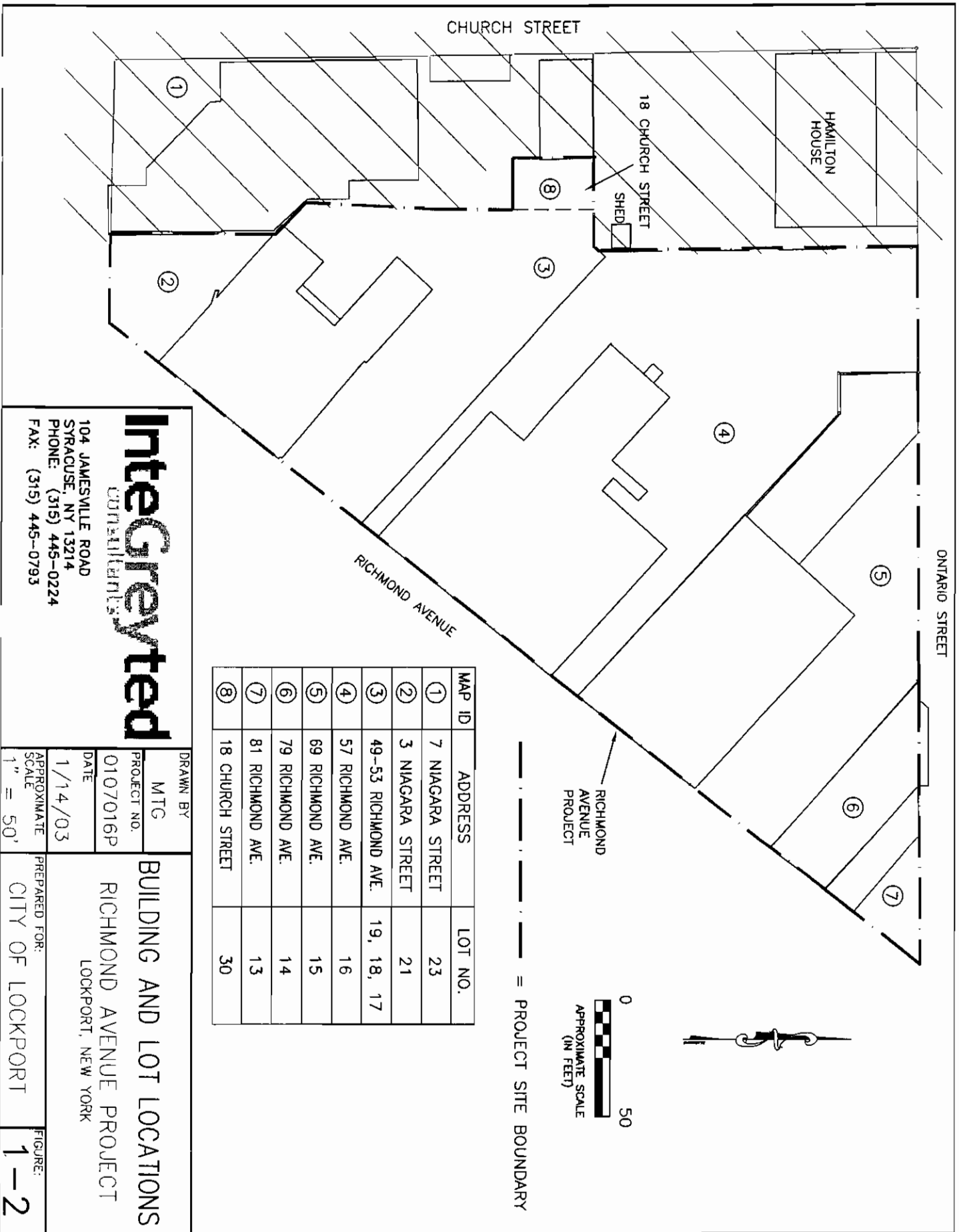
Richmond Avenue Project
 Lockport, NY

PREPARED FOR

Greater Lockport Development Corp.

FIGURE:

1-1



InteGreyted

CONSULTANTS

104 JAMESVILLE ROAD
SYRACUSE, NY 13214
PHONE: (315) 445-0224
FAX: (315) 445-0793

DRAWN BY

MTG

PROJECT NO.

0107016P

DATE

1/14/03

APPROXIMATE SCALE

1" = 50'

BUILDING AND LOT LOCATIONS

RICHMOND AVENUE PROJECT

LOCKPORT, NEW YORK

PREPARED FOR:

CITY OF LOCKPORT

FIGURE:

1-2

solvents, floor adhesives and paints, lead car batteries and roofing compounds may have also been used by past owners or operators of the subject parcel. Through the use of these products, by-products or wastes may have been generated, some of which may have been hazardous. Environmental permits or approvals obtained by previous operators, and any orders, decrees or legal documents in violation of federal, state or local laws, are unknown. Current knowledge indicates that the Site, and the parcels comprising the Site, were not present on any State or Federal lists of environmental waste sites/petroleum release sites at the initiation of SI/RAR activities.

The Site is currently serviced by the City of Lockport Water and Sewer. Electric and gas service is available from New York State Electric and Gas (NYSEG). Available information indicates that there are no septic fields/leach fields located within Site boundaries.

At the initiation of SI/RAR activities, an estimated 90 percent of the Site was occupied by buildings (primarily multi-story masonry structures) and associated paved parking and access driveways. There are no surface water bodies or mapped wetlands located on the Site.

1.3.2 Site Geology and Hydrogeology

The site is located within the Huron plain of the central lowland physiographic province in an area located just south of the Niagara escarpment. Limestone bedrock units associated with the Lockport dolomite formation are the principal bedrock units that underlie the area and which compose the bluffs of the Niagara escarpment. Overlying soil deposits typically consist of a mixture of glacial till and lacustrine silt and clay deposits. Groundwater is typically encountered in the bedrock units at variable depths.

Soil borings and test pit excavations advanced at the site indicated that there are up to twelve feet of fill material (cobbles and boulders, limestone rock fragments from an off-

site source, bricks, debris, sand and gravel) overlying soils containing clay, silt, sand and some gravel. Limestone bedrock was typically encountered at depths of six to twelve feet below grade. Groundwater was not encountered in any of the fill materials or soils overlying bedrock at the site. Based on site topography, water levels in the adjacent canal and site observations, groundwater below the site is likely to be present in bedrock at a depth greater than 25 feet below grade.

1.3.3 Site History

Review of historical records (including Sanborn Maps – previously presented in InteGreyted's 28 June 2001 SI/RAR Work Plan) indicates that the Site was developed in the mid-to-late 1800's and has been the location of various residential, commercial and light industrial use. An 1886 historic map indicates the presence of a feed and hay store, hotel and livery (47-51 Richmond); wagon shop (57 Richmond), paint shop and inn (69 Richmond); and barber shop and bakery (79 Richmond). Similar use is shown on a 1909 map, with manufacturing at 57 Richmond shown as Covert Motor Vehicle Company, including a machine shop and adjacent "junk yard". A 1914 map also shows similar use, with 57 Richmond now the location of "E.H. Ferree Co., manufacturer of chains, hairpins, and novelties". This business would later produce wallets and other leather goods. Significant change in use was shown on a 1928 historic map, indicating dry cleaning at 3 Niagara, car repair at the rear of 49-53 Richmond, wholesale grocery at 57 Richmond, automobile sales and service (including spray painting in the rear) at 69 Richmond, and automobile radiator repair in the rear of 79 Richmond.

On-site buildings have recently fallen into disrepair and many of the buildings are currently vacant. More recent use of these properties is summarized below:

18 Church Street – vacant lot with hydraulic lift and miscellaneous debris storage.

3 Niagara Street – vacant lot with vehicles and debris storage.

49-51 Richmond Avenue – recent use as a motorcycle shop and residence, now closed, vacant and empty.

53 Richmond Avenue – vacant lot used for vehicle and debris storage (lot is mostly covered with concrete slab), available reports indicate that underground storage tanks (USTs) may have been associated with recent property use.

57 Richmond Avenue – most recently the Lockport Senior Center, now vacant.

69 Richmond Avenue – recent use as a storage space for Licata Brothers Vending, including repair and maintenance of company vehicles in the rear of the building.

79 Richmond Avenue – recent use as a restaurant and bar, a radiator repair shop was recently located in the rear of this building.

81 Richmond Avenue - now vacant, this property was recently used as a taxi depot; historic photographs indicate that a gasoline station was present here in the 1940's and 1950's.

1.3.4 Previous Investigations

In 1999, InteGreyted (formerly called Greystone Environmental) was retained to perform a focused environmental evaluation of the Site. At that time, Zimmie's Tire Store (7 Niagara Street) was included within the project Site. Zimmie's is no longer considered part of the Site as the City has determined that this operating, viable business should not be part of the restoration area. However, findings of InteGreyted's 1999 evaluation regarding Zimmie's may be pertinent due to "neighboring property" considerations.

InteGreyted's 1999 Scope of Work included a site visit, review of historic documents, summary of current site conditions, and presentation of Phase II recommendations. Upon acceptance, InteGreyted performed Phase II sampling, which included advancing 12 soil borings and 24 test pits at the Site. A total of 13 soil samples were submitted for analyses (groundwater was not encountered at any of the sampling locations). An asbestos assessment was also conducted on all Site buildings.

InteGreyted's limited site investigation discovered two 1,000-gallon USTs at 69 Richmond Avenue. Stained soil was encountered at several locations. Analytical results are summarized as follows:

- nine samples were analyzed for PCBs, this analyte was not detected in any sample;
- seven samples were analyzed for cyanide, this analyte was not detected in any sample;
- nine samples were analyzed for metals, at least one metal exceeded the referenced guidance value for all nine samples;
- nine samples were analyzed for VOCs, only one sample (TP-4@7") contained one compound (1,3,5-trimethylbenzene at 140 ppb) that exceeded a referenced guidance value; and
- four samples were analyzed for SVOCs, one compound is sample TP-6@1-2' and five compounds in sample TP-21@.5-1.5' exceeded a referenced guidance value. (Note: TP-21 was located on 7 Niagara Street, which is no longer considered part of the Site).

InteGreyted's 1999 Phase I and Phase II findings are summarized on Table 1-1 (note: materials listed as being inside the Kohl buildings have since been removed). Boring and test pit locations related to Site properties are shown on Figure 1-3. InteGreyted's 25 February 2000 report, describing 1999 activities and including analytical data, has previously been provided in Appendix A of InteGreyted's 28 June 2001 Work Plan.

1.3.5 Future Use

The proposed future use of the Site will be commercial and light industrial. The expeditious remediation of the Site will act as a precursor to revitalization of a city block located adjacent to the historic Erie Barge Canal. The Project will stimulate future redevelopment, which will generate additional tax revenue from the Site properties and potentially from additional neighboring redevelopment. The Project will also enhance the

Table 1-1
Summary of Findings
1999 Phase I / Phase II Environmental Site Assessment
Richmond Avenue Project, Lockport, New York

Location Of Finding	Summary of 1999 Phase I Findings	1999 Phase II Summary
Vacant Lot 3 Niagara Street Map ID #2	A 1928 Sanborn map indicates that a dry cleaner may have been on this lot. Old vehicles and debris are now located on this property.	Test Pit No.22 and Test Boring No 12 were completed in this area. No significant environmental considerations were encountered, although ash and slag were present in fill material at location TB-12.
Kohl Buildings 49-51 Richmond Avenue Map ID #3	<p>Site observations include the items listed below.</p> <ol style="list-style-type: none"> 1) Four (4) 55 gallon drums 2) Three (3) aboveground storage tanks (ASTs), abandoned. 3) Miscellaneous Containers. 4) Storage Cabinets. 5) Fertilizer Bags and Pesticides. 6) Cylinders and Tanks. 7) Miscellaneous debris and solid waste. 8) Tires. 9) Asbestos - containing material. 	<p>Two drums are empty, one contains wheel bearing grease and the contents of the fourth drum is unknown.</p> <p>Abandonment confirmed - All ASTs are 275 gallon capacity.</p> <p>Numerous containers (from pint size to 5-gallon buckets) of spray paint, adhesives, paint, roof compounds, pipe joint compounds, carpet adhesives, drain cleaners and household cleaners</p> <p>Five cabinets with fuel and radiator conditioners, transmission cleaners, grease, oil, de-icers, ignition and fuel cleaners, additives, solvents and antifreeze.</p> <p>Numerous empty fertilizer packages throughout the three floors of the structure(s) and several one and three gallon containers of pesticide in the back store room of the main building.</p> <p>Numerous empty to full containers of oxygen,</p> <p>Wall to wall debris and "collectables" stashed in almost all rooms of the structure.</p> <p>Hundreds of tires in the basement of the main structure.</p> <p>All of the tile and plaster that was sampled in this building contained asbestos; therefore, all of these materials throughout the building are assumed to be ACM. Boiler breaching and pipe insulation is obvious ACM. Roof materials were not sampled and are assumed to be ACM.</p>

Table 1-1 (continued)

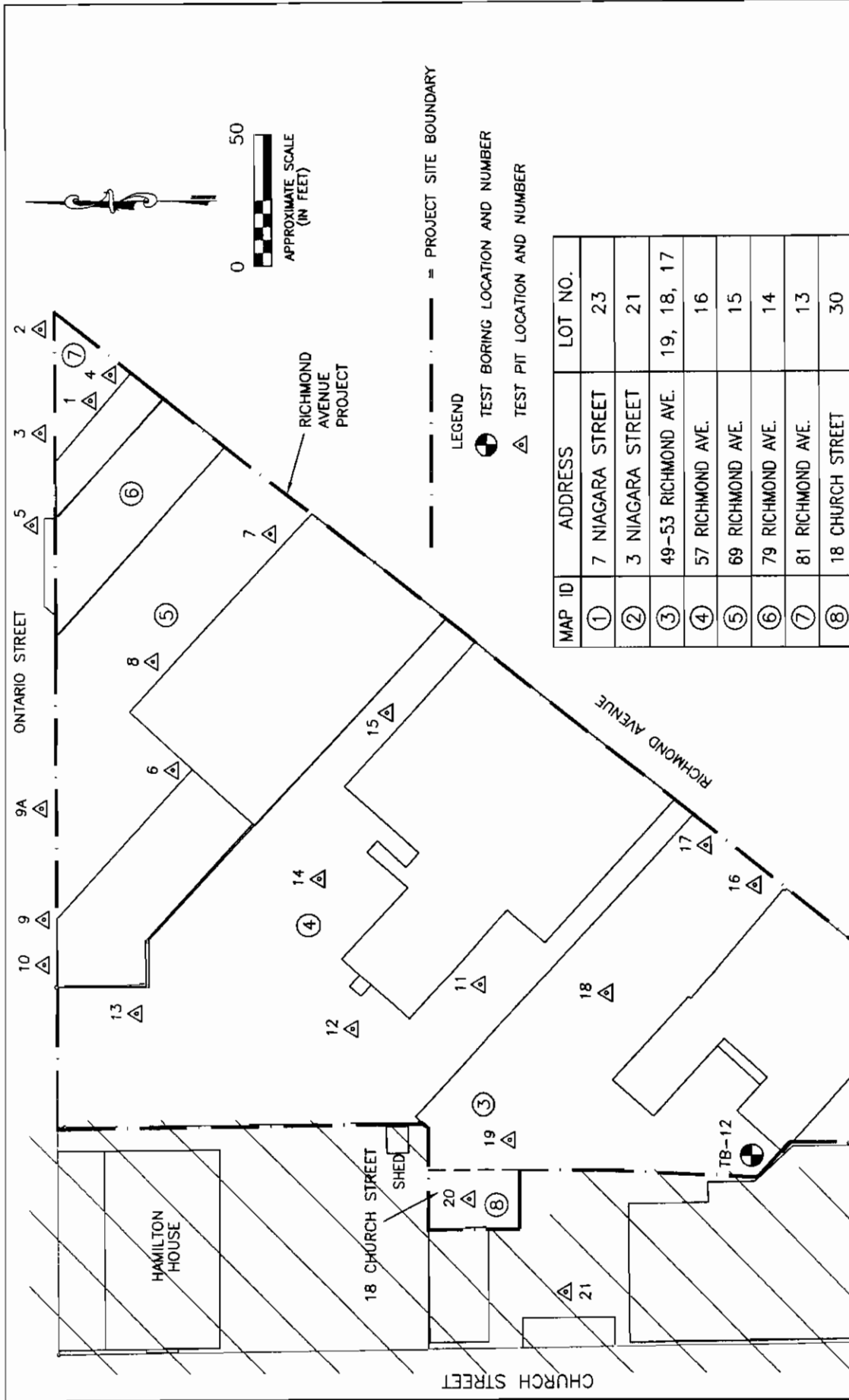
Location Of Finding	Summary of 1999 Phase I Findings	1999 Phase II Summary
<p>vacant Lot 53 Richmond Avenue Map ID #3</p>	<p>City directories and Sanborn maps indicate that automobile repairs were performed in the building formerly located on the present-day vacant lot. This activity took place from approximately the 1920's to the 1970's. Automobile repair may have been located primarily on the northwest extension of the property (north of Zimmerman property).</p> <p>According to a 1994 Phase I report, three gasoline USTs may be located at site: two at the Front (Richmond Avenue side) of the vacant lot and one on the west side. The location and condition of these USTs is unknown. Old vehicles were stored on this lot.</p>	<p>Test Pits 16 through 20 were completed in this area. All pits were excavated through a 4-inch concrete slab. Beneath the slab in the area of the old building (Test Pits 16-19) was a prior sub-grade basement area. This area was filled with rock and debris associated with the fire which destroyed the old structure. Test Pit No. 20 was excavated adjacent to the abandoned hydraulic lift in the area north of the Zimmerman property. No environmental issues of concern were detected in Test Pit No. 20. Selenium was above NYS guidance values in TP-19 at 3.0'-6.0'.</p> <p>Test Pits 16 and 17 were excavated in the assumed area of the tanks. Tanks were not located. These tanks (if present) may be under the sidewalk or in the road. These areas are inaccessible due to utility constraints. Old vehicles are still present on-site.</p>
<p>GLDC Building 57 Richmond Avenue Map ID # 4</p>	<p>Sanborn maps dating back to 1914 indicate that this property was the location of a machine shop. Covert Motors occupied the property in a 1909 Sanborn map. E.H. Ferree Manufacturing (including chain manufacture) was depicted on a 1928 Sanborn map. A junkyard is depicted on the north-northeast portion of the property in the 1909 and 1928 maps. According to city directories, small scale leather manufacturing (wallets, etc.) occurred on the property from the 1920's to the 1970's. Recently used as Senior Center.</p> <p>A recent Phase I report indicates that a fuel oil UST was removed from the rear of the senior citizens center building in about 1990; there is no further documentation on this removal.</p> <p>Fluorescent Lights.</p> <p>Miscellaneous chemicals.</p> <p>Asbestos-containing material.</p>	<p>Test Pit Nos. 11- 15 were completed in this area. Laboratory test results of samples from common materials in Test Pits 13 and 15 indicate concentrations of arsenic, barium, cadmium, chromium and selenium above NYS Cleanup Guidance.</p> <p>Test Pit No 11 was completed in this area. No tank was observed and field screening with the PID did not indicate the presence of any petroleum products.</p> <p>Potential for ballasts to contain PCBs.</p> <p>Scattered household cleaners and solvents, floor adhesives and paints.</p> <p>ACM is present in floor tiles, linoleum, pipe insulation, and boiler breaching. Roofing material was not tested and was assumed to be ACM.</p>

Table 1-1
Summary of Findings
1999 Phase I / Phase II Environmental Site Assessment
Richmond Avenue Project, Lockport, New York

Location Of Finding	Summary of 1999 Phase I Findings	1999 Phase II Summary
Licata Building 69 Richmond Avenue Map ID #5	<p>According to city directories, this property was the location of Mullane Motors Auto Sales from the early 1950's to the 1970's. Most recent use was as storage space for Licata Brothers Vending, activities included repair and maintenance of company vehicles in rear of building.</p> <p>Sanborn maps indicate that spray painting was conducted in the rear (northwest extension) of the property.</p> <p>At the time of the 1999 field visit, the garage in the rear of the building was being used to repair company vehicles.</p> <p>Floor Drains.</p> <p>Hydraulic Lifts.</p> <p>Asbestos-containing material.</p>	<p>Test Pit Nos 6 and 7 indicated the presence of two 1,000-gallon USTs. Waste Oil was present in the tank located adjacent to Test Pit No. 6. Laboratory test results on samples associated with Test Pit No. 6 indicated that NYS Cleanup Guidance were exceeded for Benzo(b)fluoranthene, cadmium, chromium, selenium and mercury.</p> <p>Laboratory test results on samples associated with Test Pit No. 6, 8 and 9 indicated that NYS Cleanup Guidance were exceeded for one or more of the following metals: cadmium, selenium and mercury.</p> <p>Numerous containers of solvents, waste oils and refrigerants were noted in this area. Two 55-gallon drums of waste oil were also observed in this area.</p> <p>Empty to City of Lockport Storm Sewer.</p> <p>This area was not sampled due to access restrictions.</p> <p>Roofing material may contain asbestos.</p>
Model T Bar 79 Richmond Avenue Map ID #6	<p>According to a 1952 city directory listing, this property may once have been a part of Mullane Motors. Also, a radiator repair shop was once located in the rear of the present-day building. Most recently used as a restaurant/bar.</p> <p>Survey of the rear storage area indicated several issues of environmental concern.</p> <p>Miscellaneous chemicals.</p> <p>Asbestos-containing material.</p>	<p>Test Pit No. 5 was excavated in this area. Field screening with the PID indicated that volatile organic compounds in the soil were not a concern at this location.</p> <p>At least 24 lead car batteries.</p> <p>Abandoned 275-gallon fuel oil tank. Corrosive 55-gallon carcass.</p> <p>Antifreeze, oils, wax and roofing compounds.</p> <p>Floor tiles and pipe insulation are obvious ACM (note: these materials were not sampled). Roof material was not sampled and is assumed ACM.</p>

Table 1-1 (continued)

Location Of Finding	Summary of 1999 Phase I Findings	1999 Phase II Summary
<p>Sansone Property 81 Richmond Avenue Map ID #7</p>	<p>City directories and historic photographs indicate that this property was the site of a gasoline station in the 1940's and 1950's (Bernd Service). Interviews with city personnel indicated that a dry cleaner may have been located on this lot at one time. Most recently used as a taxi cab depot.</p> <p>Asbestos-containing material.</p>	<p>Test Pits Nos 1 - 4 were excavated in this area. Several abandoned supply and return lines were encountered in TP-1; however, no USTs or their "graves" were observed. Potential for buried USTs to be under sidewalks, in the road, or partially under the building. Utilities limited excavations.</p> <p>Arsenic was detected at a level above the NYS Cleanup Guidance in the laboratory sample from TP-1 at a depth of 3.0-6.0 feet.</p> <p>Pipe insulation is obvious ACM. Roof materials were not sampled and may be ACM.</p>



LEGEND

⊕ TEST BORING LOCATION AND NUMBER

△ TEST PIT LOCATION AND NUMBER

--- PROJECT SITE BOUNDARY

MAP ID	ADDRESS	LOT NO.
①	7 NIAGARA STREET	23
②	3 NIAGARA STREET	21
③	49-53 RICHMOND AVE.	19, 18, 17
④	57 RICHMOND AVE.	16
⑤	69 RICHMOND AVE.	15
⑥	79 RICHMOND AVE.	14
⑦	81 RICHMOND AVE.	13
⑧	18 CHURCH STREET	30

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DRAWN BY

MTG

PROJECT NO.

0107016P

DATE

11/14/03

APPROXIMATE SCALE

1" = 50'

1999 PHASE II ACTIVITIES
RICHMOND AVENUE PROJECT
LOCKPORT, NEW YORK

PREPARED FOR:

CITY OF LOCKPORT

FIGURE:

1-3

City of Lockport's canal area, which will boost future canal revitalization and tourism efforts and create both temporary and permanent employment.

There is a tremendous opportunity for the Site to be used for recreational purposes. The Site is located along the historic Erie Barge Canal, directly across from Locks 34 and 35. Preliminary plans for the Site include: improved access to Locks 34 and 35; creation of a public gathering space, which may accommodate several uses including a farmers' market, community picnics, ethnic festivals or art shows; establishment of a museum catering to local and regional visitors; and construction of a bell tower which will provide a viewing area to allow visitors to view the canal and the entire City.

Prior to realizing the future use potential of this site, environmental conditions needed to be fully evaluated by implementing the SI/RAR.

To obtain partial funding for this SI/RAR, the Municipality submitted an application to the New York State Department of Environmental Conservation (NYSDEC) for State assistance under the Clean Water/Clean Air Bond Act (application number B00154-9, dated 27 June 2000. A copy of the application has previously been provided in Appendix A of InteGreyted's 28 June 2001 SI/RAR Work Plan.) This application was accepted by NYSDEC and, in January 2001, the Governor's office announced that the Municipality was awarded a Clean Water/Clean Air Act grant to investigate the Site. In January/February 2002, the State Assistance Contract (SAC) was signed and is incorporated into this document (Appendix A).

2.0 FIELD INVESTIGATION

Upon approval of the SI/RAR Work Plan by NYSDEC, the Municipality solicited and received competitive bids to implement the fieldwork portion of the SI. Based on the bid process, SLC Constructors, Inc. (SLC) of Lockport, New York, was selected to perform the field investigation. All fieldwork was monitored and documented by InteGreyted on behalf of the Municipality.

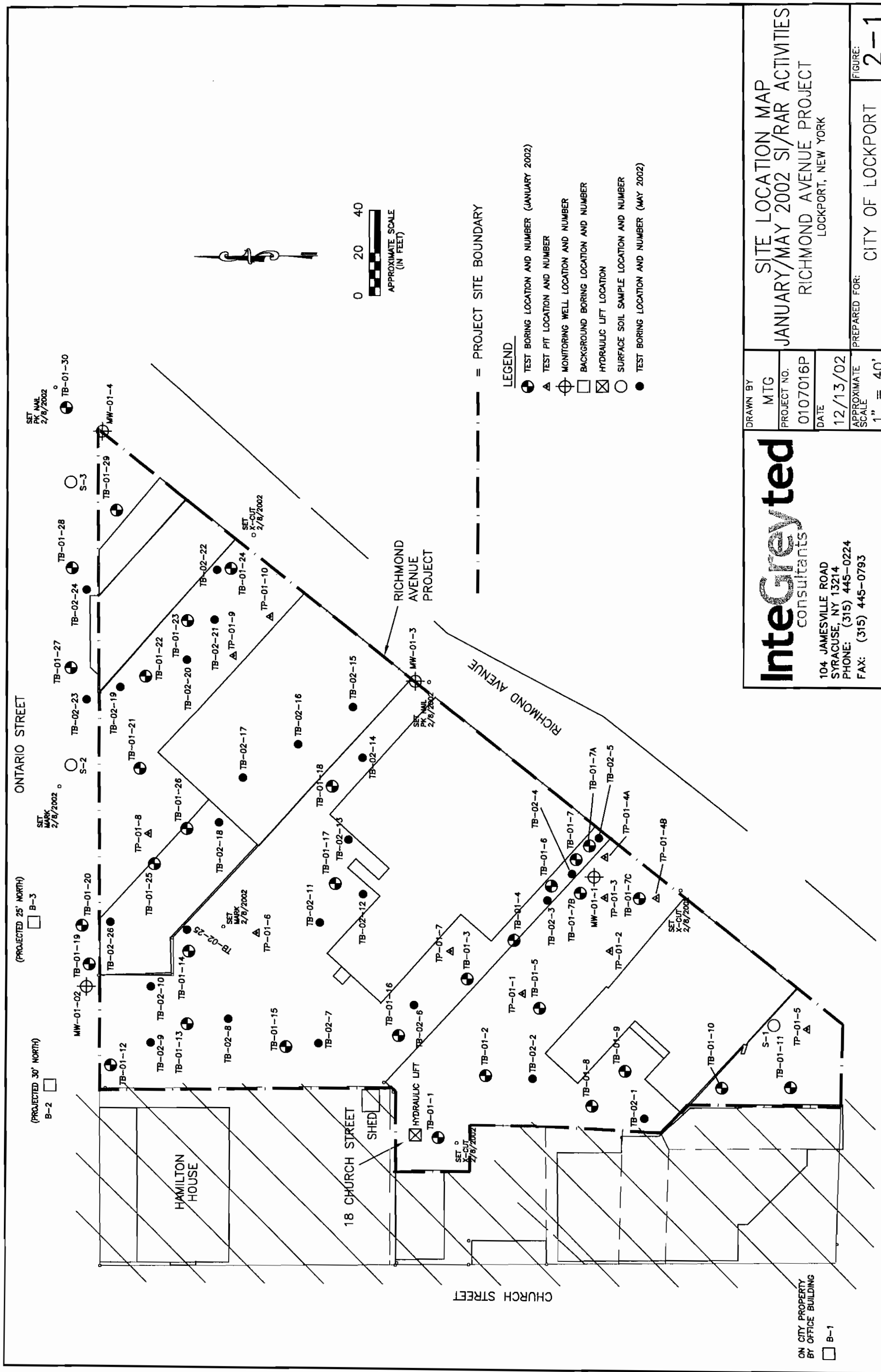
2.1 INVESTIGATION ACTIVITY LOCATIONS

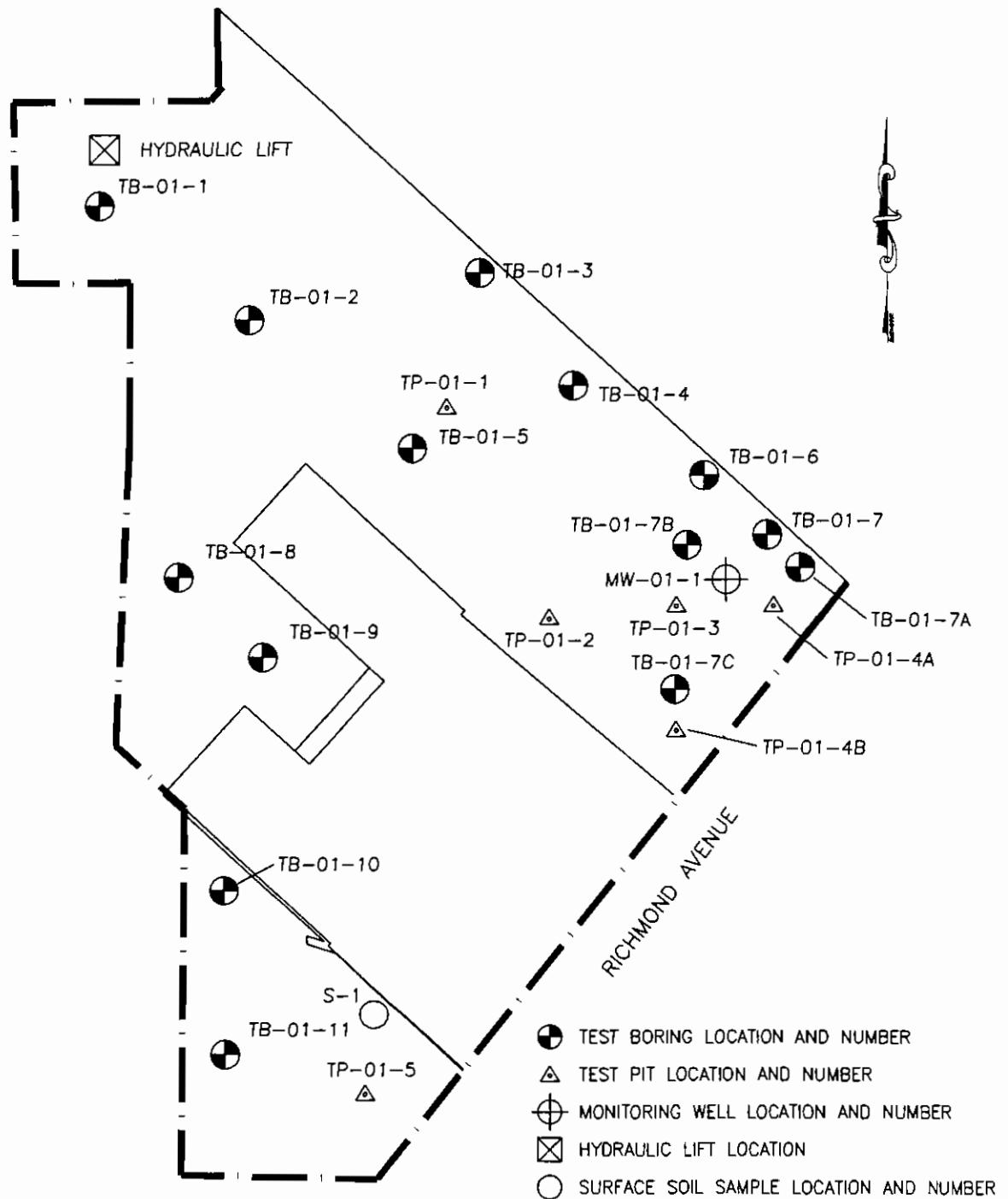
Investigative field activities performed on each parcel within the Site boundary are described below. The Site Location Map – 2002 SI/RAR Activities, with all investigated locations, is presented on Figure 2-1. Site activity locations for specific portions of the Site are shown on Figure 2-2 through Figure 2-5.

Test borings and monitoring wells were installed and sampled on 28 and 29 January 2002. The test pits and test trenches were excavated and sampled on 30 and 31 January 2002. All test boring, monitoring well, test pit and test trench locations were located by survey techniques on 7 and 8 February 2002.

2.1.1 Parcel 2: 3 Niagara Street

Four exterior direct – push soil borings (TB-01-8 to TB-01-11) were advanced on this parcel and **one test pit** (TP-01-5) was excavated to evaluate soil conditions and document the extent of ash and slag, collect soil samples for metals analyses, determine the depth to bedrock, and confirm the absence of shallow groundwater. Ten RCRA Metal samples, one TCLP RCRA Metal sample and appropriate QA/QC samples were obtained for laboratory analyses from the four soil borings. One VOC/SVOC sample was obtained from the excavated test pit for laboratory analyses. Laboratory Test Results are presented and discussed in Section 3.2. This parcel and associated sampling locations are presented on Figure 2-2.





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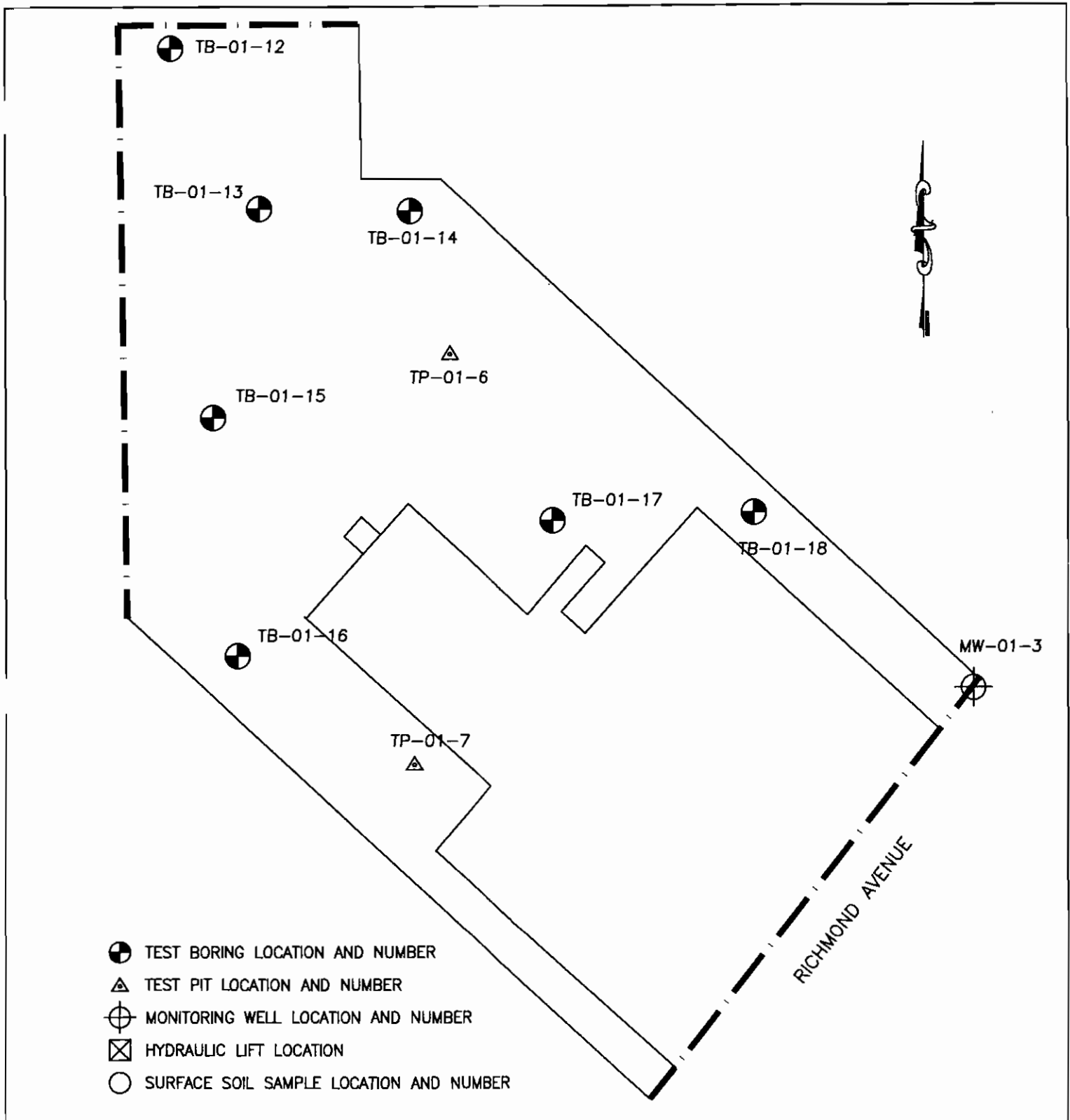
104 JAMESVILLE ROAD
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DRAWN BY
MTG
PROJECT NO.
0107016P
DATE
1/14/03
APPROXIMATE
SCALE
1" = 30'

3 NIAGARA STREET AND
49-53 RICHMOND AVENUE
RICHMOND AVENUE PROJECT
LOCKPORT, NEW YORK

PREPARED FOR:
CITY OF LOCKPORT

FIGURE:
2-2



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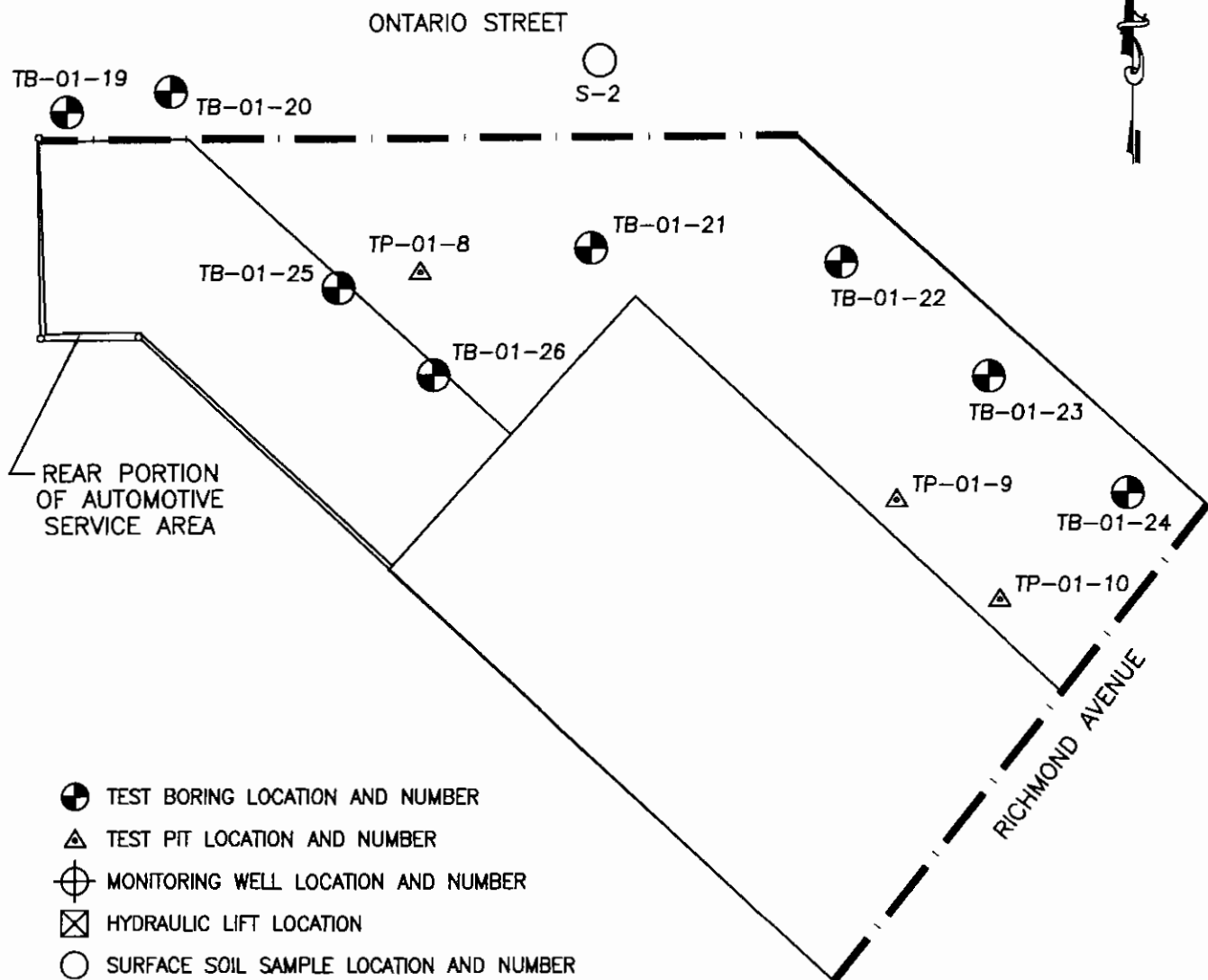
104 JAMESVILLE ROAD
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DRAWN BY
MTG
PROJECT NO.
0107016P
DATE
12/13/02
APPROXIMATE
SCALE
1" = 30'

57 RICHMOND AVENUE
RICHMOND AVENUE PROJECT
LOCKPORT, NEW YORK

PREPARED FOR:
CITY OF LOCKPORT

FIGURE:
2-3



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DRAWN BY

MTG

PROJECT NO.

0107016P

DATE

12/13/02

APPROXIMATE
SCALE

1" = 30'

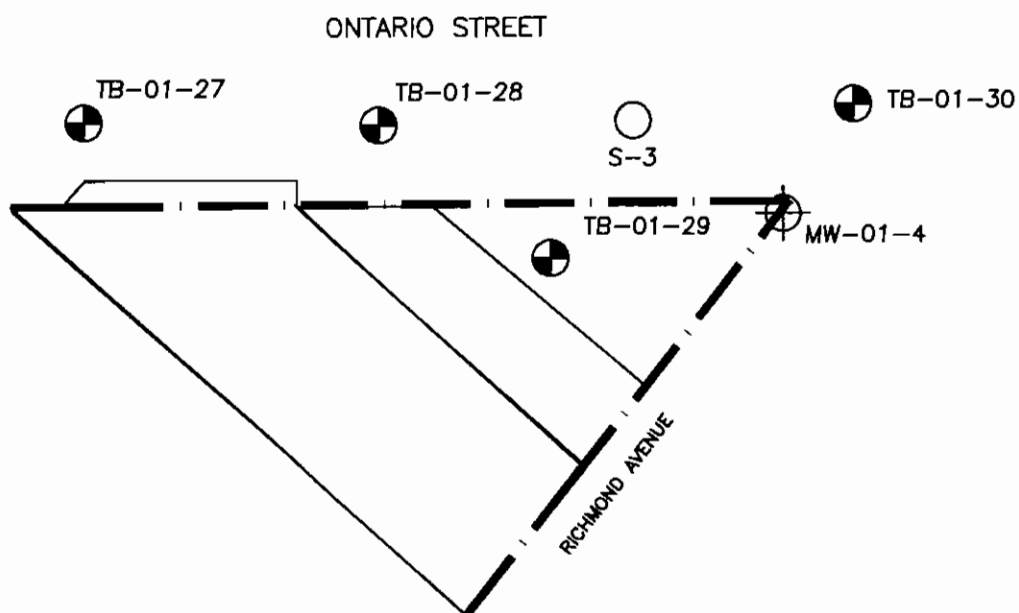
69 RICHMOND AVENUE
RICHMOND AVENUE PROJECT
LOCKPORT, NEW YORK

PREPARED FOR:

CITY OF LOCKPORT

FIGURE:

2-4



- TEST BORING LOCATION AND NUMBER
- △ TEST PIT LOCATION AND NUMBER
- ⊕ MONITORING WELL LOCATION AND NUMBER
- ⊠ HYDRAULIC LIFT LOCATION
- SURFACE SOIL SAMPLE LOCATION AND NUMBER

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PROJECT NO.	0107016P
DATE	20/02/02
APPROXIMATE SCALE	1" = 30'

79 AND 81 RICHMOND AVENUE
RICHMOND AVENUE PROJECT
LOCKPORT, NEW YORK

PREPARED FOR:
CITY OF LOCKPORT

FIGURE:
2-5

2.1.2 Parcel 3: 49 – 53 Richmond Avenue

Ten exterior direct – push borings (TB-01-1 to TB-01-7, TB-01-7A, TB-01-7B and TB-01-7C) and **three test pits** (TP-01-1 to TP-01-3) were advanced on this parcel to evaluate subsurface conditions, collect soil samples for metals analyses, evaluate fill within the former building footprint (below the existing slab); and confirm the absence of shallow groundwater. Fifteen RCRA Metal samples, one TCLP RCRA Metal sample and one VOCs/SVOCs sample were obtained for laboratory analyses from the ten soil borings. Three VOCs/SVOCs samples were obtained from the excavated test pit for laboratory analyses. Laboratory Test Results are presented and discussed in Section 3.2.

Also, a detailed metal detection survey and utility marking effort was conducted along Richmond Avenue allowing for excavation of **two test trenches** (TP-01-4 and TP-01-4A) along Richmond Avenue to assess the suspected UST area. One VOCs/SVOCs sample was obtained from TP-01-4 for laboratory analyses. Laboratory Test Results are presented and discussed in Section 3.2. Note: USTs were not encountered in this area.

One temporary groundwater monitoring well (MW-01-1) was installed as described in Section 2.3.1 at the southeast border of this parcel to assess groundwater conditions. An IRM, related to a potential hydraulic lift, was also conducted on this parcel as described in Section 4.1.1. This parcel and associated sampling locations are presented on Figure 2-2.

2.1.3 Parcel 4: 57 Richmond Avenue

Seven exterior direct – push borings (TB-01-12 to TB-01-18) and **two test pits** (TP-01-6 and TP-01-7) were advanced on this parcel to evaluate subsurface conditions, collect soil samples for metals analyses, further evaluate fill below the parking area, evaluate a former UST location, and confirm the absence of shallow groundwater. Fifteen RCRA Metal samples, two TCLP RCRA Metal samples, one VOCs/SVOCs sample and appropriate QA/QC samples were obtained for laboratory analyses from the seven soil

borings. Two VOCs/SVOCs samples were obtained from the excavated test pits for laboratory analyses. Laboratory Test Results are presented and discussed in Section 3.2.

Two temporary groundwater monitoring wells (one in the southeast corner, MW-01-3, and one in the northwest corner, MW-01-2) were installed as described in Section 2.3.1 to assess groundwater conditions. This parcel and associated sampling locations are presented on Figure 2-3.

2.1.4 Parcel 5: 69 Richmond Avenue

Six exterior direct – push soil borings (TB-01-19 to TB-01-24) were advanced on this parcel to evaluate soil conditions and allow for collection of soil samples for metal analyses. Additionally, **two interior soil borings** (TB-01-25 and TB-01-26) were advanced immediately adjacent to the floor trench drain inside the maintenance garage (parallel to the overhead doors) to determine if soil contamination is present adjacent to this feature. **One test trench** (TP-01-8) was excavated along the exterior of the main portion of the maintenance garage to assess soil conditions related to the floor trench and two sumps. Fourteen RCRA Metal samples, one TCLP RCRA Metal sample and appropriate QA/QC samples were obtained for laboratory analyses from the eight soil borings. One VOCs/SVOCs sample was obtained from the excavated test pit for laboratory analyses. Laboratory Test Results are presented and discussed in Section 3.2.

IRMs related to three USTs were performed as described in Section 4.2.3. This parcel and associated sampling locations are presented on Figure 2-4.

2.1.5 Parcel 6: 79 Richmond Avenue

One exterior direct – push soil boring (TB-01-27) was be advanced in the northwest portion of this parcel to evaluate soil conditions and allow for the soil samples for metals analyses. Two RCRA Metal samples were obtained for laboratory analyses from this soil

borings. Laboratory Test Results are presented and discussed in Section 3.2. This parcel and associated sampling locations are presented on Figure 2-5.

2.1.6 Parcel 7: 81 Richmond Avenue

Three exterior direct – push soil borings (TB-01-28 to TB-01-30) were advanced on this parcel to evaluate soil conditions and determine what affect (if any) the former gasoline station USTs and pump island may have had on subsurface soils. Six RCRA Metal samples and one TCLP RCRA Metal sample were obtained for laboratory analyses from the three soil borings. Laboratory Test Results are presented and discussed in Section 3.2.

One temporary monitoring well (MW-01-4) was installed as described in Section 2.3.1 in the northeast corner of the parcel to access groundwater conditions at the Site. This parcel and associated sampling locations are presented on Figure 2-5.

2.2 SOIL BORING AND TEST PIT INSTALLATIONS

2.2.1 Soil Boring Installations

Soil borings were advanced by SLC on 28-29 January 2002 at the 31 exterior and the two interior locations across the site by utilizing either a Ford F-350 pickup with a SIMCO Earthprobe 200 or a track-mounted Geoprobe Model 54LT using direct push sampling techniques. Macro-Core™ samplers having a minimum inside diameter (ID) of 1.9 inches were used to obtain representative soil samples at each sampling interval. Soil samples were collected continuously at each boring location from grade to a completion depth of eight feet below grade or, in several instances where competent bedrock was encountered, at depths less than or greater than eight feet below grade. The Macro-Core™ samplers were used to collect the soil samples in accordance with generally accepted industry practices. Upon extraction from the borehole, a geologist logged each soil core. Soil

type, color, moisture, staining and any other pertinent observations will be recorded on a boring log. Logs of each soil boring as prepared by SLC are presented in Attachment 1.

Each soil core was sectioned and soil from each respective sampling interval was carefully handled to minimize the potential for loss of volatiles. Each sampling interval was scanned with a Photoionization Detector (PID) to estimate if Volatile Organic Compounds (VOCs) may be present in the sample. Upon completion, each boring was backfilled with bentonite.

At each exterior boring location, soil samples were typically collected from depth intervals of 0 to 2 feet, 2 to 4 feet and 4 to 8 feet below grade. If insufficient or poor sample recovery occurs at a location, additional borings were advanced in an area immediately surrounding the initial boring in an effort to obtain a representative soil sample from the selected sampling interval. Soil samples from the selected sampling intervals were submitted to the analytical laboratory for analysis. Approximately two samples from each exterior boring location were analyzed for total metals by NYS ASP methods resulting in a total of 62 metals analyses. Remaining samples (4 to 6 feet; 6 to 8 feet) were archived for potential future metals analysis. Additionally, eight of these samples were analyzed for metals by the Toxicity Characteristic Leaching Procedure (TCLP). Nine samples were collected from three representative background locations (labeled B-1, B-2, and B-3 in the logs presented in Appendix C) and analyzed for total RCRA metals. A detailed summary of soil borings by location and analyses conducted by depth interval is provided in Table 2-1.

2.2.2 Test Pit Installations

Ten test pits were excavated across the site by SLC utilizing a Caterpillar Model 416 backhoe on 30-31 January 2002. Soil samples were occasionally collected at each test pit location from grade to a completion depth of eight feet below grade or, in several instances where competent bedrock was encountered, at depths less than or greater than

TABLE 2-1
Summary of Test Borings – Depths and Analyses

Location	Number of Soil Borings	Sample Depth 0'-2' And Analyses	Sample Depth 2'-4' And Analyses	Sample Depth >4' And Analyses
3 Niagara Street	4	4- RCRA Metals	4- RCRA Metals 1- TCLP Pb	2- RCRA Metals
49-53 Richmond Avenue	10	7- RCRA Metals 1- TCLP Metals	7- RCRA Metals	1- RCRA Metals 1- SVOC/VOC
57 Richmond Avenue	7	7-RCRA Metals 1- TCLP Metals 1- TCLP Lead 1- TCLP Merc.	7- RCRA Metals 1- TCLP Metals	1- RCRA Metals 1- SVOC/VOC
69 Richmond Avenue	8	5- RCRA Metals	4- RCRA Metals 1- TCLP Metals	5- RCRA Metals
79 Richmond Avenue	1	1-RCRA Metals		1-RCRA Metals
81 Richmond Avenue	3	1-RCRA Metals	2- RCRA Metals 1- TCLP Metals	3-RCRA Metals
Monitoring Wells	4			1-SVOC/VOC
Background Samples	3	3-RCRA Metals	3- RCRA Metals	3-RCRA Metals

eight feet below grade. Upon extraction from the test pit excavation, a geologist logged each soil sample. Soil type, color, moisture, staining and any other pertinent observations will be recorded on a test pit log. Logs of each test pit as prepared by SLC are presented in Attachment 1.

Each soil sample collected was carefully handled to minimize the potential for loss of volatiles. Each collected sample was scanned with a Photoionization Detector (PID) to estimate if Volatile Organic Compounds (VOCs) may be present in the sample. Upon completion, each test pit was backfilled with the excavated material.

Nine sample locations (eight from test pits and one from a test boring) were also analyzed to assess the potential presence and extent of VOCs and SVOCs by the appropriate ASP methods. These nine samples were collected based on various criteria including PID headspace readings, evidence of staining or odors, and/or the operational history of an area. A detailed summary of test pits by location and analyses conducted by depth interval is provided in Table 2-2.

In addition, three surface samples (locations labeled S-1, S-2, and S-3 on the Site Figures) were obtained and analyzed for RCRA Metals, VOCs/SVOCs and Pesticides/PCBs to determine if a potential exposure to analytes of concern exists at the ground surface. Samples were collected from the zero to six-inch interval from unpaved areas. Exact locations were selected in the field in consultation with NYSDEC. All laboratory test results are presented, summarized and evaluated in Section 3.2.

TABLE 2-2**Summary of Test Pits – Depths and Analyses**

Location	Number of Pits/Trenches	Sample Depth 0'-2' And Analyses	Sample Depth 2'-4' And Analyses	Sample Depth >4' And Analyses
3 Niagara Street	1	NA	NA	1-SVOC/VOC
49-55 Richmond Avenue	4	NA	NA	4- SVOC/VOC
57 Richmond Avenue	2	NA	NA	2- SVOC/VOC
69 Richmond Avenue	1	NA	NA	1-SVOC/VOC

2.3 GROUNDWATER

2.3.1 Temporary Well Installation

Temporary monitoring wells were installed at the four locations described above utilizing either a Ford F-350 pickup with a SIMCO Earthprobe 200 or a track-mounted Geoprobe Model 54LT using direct push sampling techniques. Macro-Core™ samplers having a minimum inside diameter (ID) of 1.9 inches were used to obtain representative soil samples at each sampling interval. These samples were scanned with a PID to determine if VOCs were present at each sampling location. All borings were advanced to the top of the bedrock surface which ranged from 6.0 to 12.0 feet below the ground surface.

Upon extraction from ~~the~~ each temporary monitoring well location, all soil samples were scanned with PID and logged. Logs of temporary monitoring well ~~the~~ locations, as prepared by SLC, are presented in Attachment 1. Soil samples were selected and submitted to the laboratory for VOC and SVOC analysis only if field observations and screening indicated a significant potential for contamination. Only one sample, MW-01-1 @ 11' indicated the potential for petroleum residuals as evidenced by a PID reading of approximately 160 parts per million (ppm). The Laboratory Test Result is presented and discussed in Section 3.2.2.

Following completion of soil boring at the temporary monitoring well locations, a one-inch-diameter PVC monitoring well was installed in each boring to the top of bedrock at depths of 6.0 to 12.0 feet below grade. The wells were constructed with a minimum of 2.5 to 5.0 feet of screen so that the well screen would adequately straddle any shallow water table (if present). A geologist from SLC supervised all monitoring well construction activities and prepared the temporary well construction logs presented in Attachment 1.

These four temporary monitoring wells were measured daily for a period of one week. Groundwater was not observed in any of the four temporary monitoring wells during this time frame. Upon obtaining the last measurement in each temporary monitoring well, the one-inch-diameter PVC well was removed from the soil boring and each boring was backfilled with bentonite.

2.4 SURVEYING

Upon completion of the field tasks, the horizontal and vertical locations of all sampling locations were surveyed on 7 and 8 February 2002. Vertical elevations were recorded to the nearest 0.01-foot. All surveying was performed by Deborah A. Naybor, a New York State (NYS) licensed land surveyor under contract to SLC. Locations were referenced to the New York Trans Mercator (NYTM) coordinate system.

2.5 COMMUNITY AIR MONITORING

Community air monitoring was conducted during implementation of the SI/RAR Work Plan for the Richmond Avenue Site in Lockport, New York. Real-time air monitoring for particulate levels and volatile organic compounds (VOCs) was conducted at the perimeter of the exclusion zone. This monitoring was conducted throughout the duration of all field activities that could result in generation of contaminated airborne particulates or volatile organic vapors, respectively. In general, particulate monitoring was conducted during handling, excavation, movement or placement of all soil that may contain metal concentrations exceeding NYSDEC TAGM 4046 soil cleanup objectives.

Furthermore, community air monitoring included continuous monitoring for volatile organic vapor emissions while performing intrusive activities in areas that may include soil contaminated with VOCs and/or during UST removal activities.

Particulates were continuously monitored downwind of the exclusion zone with a portable particulate monitor that included an alarm set at 150 ug/m^3 . An MIE DataRAM

having a detection range of 0.1 ug/m³ to 399.9 ug/m³ was used to monitor particulates downwind of field activities that could generate particulates with elevated metals concentrations. If downwind particulate levels, averaged over a period of 15 minutes, exceed 150 ug/m³, then particulate levels upwind of the survey or work site were planned to be measured. If the downwind particulate level was more than 100 ug/m³ greater than the upwind particulate level, then intrusive activities would have been stopped and corrective action taken.

Volatile organic compounds were monitored continuously in the work area breathing zone during all field activities that were conducted in areas of known VOCs and in areas that had the potential to release VOCs to the ambient air. These work areas included tank excavation areas and possible underground storage tank locations. If total organic vapor levels had exceeded 5 ppm above background, drilling/excavation activities would have been halted and monitoring would have continued under the provisions of the Vapor Emission Response Plan described in Attachment 3, Health and Safety Plan, of the 28 June 2001 SI/RAR Work Plan.

3.0 OBSERVATIONS AND RESULTS

3.1 FIELD OBSERVATIONS

3.1.1 Surficial Soils

Soil borings and test pit excavations advanced at the Site revealed up to twelve feet of fill material (cobbles and boulders, limestone rock fragments from an off-site source, bricks, debris, sand and gravel) over soil containing clay, silt, sand and some gravel. Limestone bedrock was typically encountered at depths of six to twelve feet below grade.

Groundwater was not encountered in any of the test borings/test pits advanced on-site. Based on site topography, water level in the adjacent canal and site observations, groundwater below the Site is likely present in bedrock at a depth greater than 25 feet below ground surface.

3.1.2 Hydrogeology

All information gathered to date indicates that groundwater is not present in the materials overlying bedrock at the Site. It is likely that groundwater below the Site occurs in deep bedrock formations, at least 25 feet below the ground surface.

3.1.3 Community Air Monitoring Results

Real-time air monitoring for particulate levels and volatile organic compounds (VOCs) was conducted at the perimeter of the exclusion zone. Particulate monitoring was conducted during handling, excavation, movement or placement of all soil that may contain metal concentrations exceeding NYSDEC TAGM 4046 soil cleanup objectives. Volatile organic vapor emissions were also monitored while performing intrusive activities in areas that may have included soil contaminated with VOCs and/or during UST removal activities.

Particulate readings occasionally indicated the presence of dust; however, particulate readings did not ever reach the action levels discussed in Section 2.5 above. Volatile organic readings occasionally indicated the presence of volatile organic compounds; however, readings did not ever reach the action levels discussed in Section 2.5 above. All readings were recorded by SLC in their field logbook and are available for State (DEC and DOH) personnel to review.

3.2 ANALYTICAL RESULTS

A review of the analytical data from the January to April 2002 field investigation indicated that soils at the site were impacted by metals, SVOCs, VOCs, and pesticides at concentrations in excess of NYSDEC Soil Cleanup objectives. A detailed summary of the analytical results for the initial investigation work is presented in the following sections of this report. Analytical data is provided on Tables 3-1 to 3-4, which are referenced in the following sections, as appropriate.

3.2.1 RCRA Metals

Table 3-1, pages 1, 2 and 3 of 3 present a summary of the laboratory analytical results for RCRA Metals collected from soil samples during this SI/RAR. The Summary of Validated Test Results and the Form 1s for all analytical results presented in Section 3.2 are presented in Attachment 2.

As shown on Table 3-1, pages 1 and 2, concentrations of RCRA Metals above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 were detected in a portion of the 62 soil samples from the Test Borings. The detection of arsenic above the applicable NYS cleanup objective of 7.5 mg/kg was observed in 19 of the soil samples from the Test Borings. Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 7.6 to 62 mg/kg.

TABLE 3-1
SI/RAR Sample Analytical Results - RCRA Metals
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis	Cleanup Objective*	Sample ID												TB-01-4 0'-2'
		TB-01-1 0'-2'	TB-01-1 2'-4'	TB-01-2 0'-2'	TB-01-2 2'-4'	TB-01-3 0'-2'	TB-01-3 2'-4'	TB-01-3 MS	TB-01-3 MSD	TB-01-7 0'-2'	TB-01-7 2'-4'	TB-01-7 MS	TB-01-7 MSD	TB-01-8 0'-2'
Analysis														
Metals (mg/kg)														
Arsenic	7.5 or SB	4.10	8.40	3.30	5.10	8.50	4.60	8.40	4.30	4.30	4.30	4.30	4.30	4.90
Barium	300 or SB	66.90	108	28.2J	17.8J	73.00	168	184.00	15.8	15.8	15.8	15.8	15.8	53.60
Cadmium	10 or SB	2.18J	1.65J	1.35J	0.798J	1.13J	1.22J	4.64J	1.23J	0.97J	0.97J	0.97J	0.97J	0.97J
Chromium	50 or SB	8.05	4.25	4.86J	4.06J	5.92	5.02	20.70	4.30	4.30	4.30	4.30	4.30	4.73
Lead	400** or SB	57.8J	35.3J	12.00	23.90	45.1J	63.4J	168J	53.2J	400J	400J	400J	400J	400J
Mercury	0.10	0.058J	0.031BJ	ND	ND	3.03J	1.1J	0.15J	0.58J	1.67J	1.67J	1.67J	1.67J	1.67J
Selenium	2 or SB	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Silver	0.9 (SB)	ND	0.726BJ	ND	ND	ND	ND	4.58	ND	ND	ND	ND	ND	ND
Analysis														
Metals (mg/kg)														
Arsenic	7.5 or SB	6.40	3.70	4.20	4.70	3.30	7.30	8.90	8.10	8.10	8.10	8.10	8.10	15.00
Barium	300 or SB	36.50	26.10	6.91B	136.00	95.60	37.60	176J	161J	377J	377J	377J	377J	377J
Cadmium	10 or SB	1.38J	1.32J	0.81J	1.4J	1.27J	1.65J	2.03J	1.48J	6.21J	6.21J	6.21J	6.21J	6.21J
Chromium	50 or SB	4.01	4.93	4.95	12.80	5.74	5.75	9.42J	5.52J	29.7J	29.7J	29.7J	29.7J	29.7J
Lead	400** or SB	244J	25.4J	17.4J	960J	200J	114J	1620	679	893	893	893	893	893
Mercury	0.10	1.7J	0.079J	ND	3.42J	1.2J	0.174J	2.73	3.44	6.3J	6.3J	6.3J	6.3J	6.3J
Selenium	2 or SB	ND	ND	ND	ND	ND	ND	ND	ND	2WB	2WB	2WB	2WB	2WB
Silver	0.9 (SB)	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Analysis														
Metals (mg/kg)														
Arsenic	7.5 or SB	12.00	1.80	5.80	9.90	6.40	3.30	3.00	5.80	1.70	1.70	1.70	1.70	1.70
Barium	300 or SB	262J	47.2J	182	195	179J	55J	29.5J	318J	64.5J	64.5J	64.5J	64.5J	64.5J
Cadmium	10 or SB	9.5J	1.19J	6.79J	2.82J	2J	3.08	2.01	5.44J	0.644J	0.644J	0.644J	0.644J	0.644J
Chromium	50 or SB	15J	6.76J	35.70	10.20	18.3J	14.30	11.90	33.1J	11.6J	11.6J	11.6J	11.6J	11.6J
Lead	400** or SB	162.00	43.90	3060J	235J	186J	20.6J	3.9J	98.6J	52.6J	52.6J	52.6J	52.6J	52.6J
Mercury	0.10	0.572	0.021	1.27J	1.53J	0.116	0.0278J	ND	0.303	ND	ND	ND	ND	ND
Selenium	2 or SB	ND	ND	ND	ND	ND	ND	ND	169	ND	ND	ND	ND	ND
Silver	0.9 (SB)	1.75J	ND	1.49J	1.13BJ	0.788J	ND	ND	4.57	ND	ND	ND	ND	ND
Analysis														
Metals (mg/kg)														
Arsenic	7.5 or SB	7.60	3.00	2.80	5.30	7.50	15.00	6.60	46.00	5.50	5.50	5.50	5.50	5.50
Barium	300 or SB	46.90	52.1J	44.1J	68.8J	380J	317	158.00	92.1J	55.4J	55.4J	55.4J	55.4J	55.4J
Cadmium	10 or SB	2.28	2.03	1.87	1.47J	2.99J	3.06J	4.41J	4.42J	2.12J	2.12J	2.12J	2.12J	2.12J
Chromium	50 or SB	12.50	12.50	10.30	5.75J	38.7J	22.30	16.70	6.99J	12.8J	12.8J	12.8J	12.8J	12.8J
Lead	400** or SB	5.00	10.9J	4.4J	59.7J	314J	753J	167J	57.3J	25.4J	25.4J	25.4J	25.4J	25.4J
Mercury	0.10	ND	ND	ND	0.105	1.370	8.46J	1.37J	0.049B	0.497	0.497	0.497	0.497	0.497
Selenium	2 or SB	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Silver	0.9 (SB)	ND	ND	ND	ND	ND	1.33J	ND	ND	ND	ND	ND	ND	ND

Notes: * Recommended Soil Cleanup Objective as per TAGM 4046

** Background levels for lead vary widely. The USEPA's Interim Lead Hazard Guidance (July 14, 1994) establishes a residential screening level of 400 ppm.

SB- Site Background ND- Compound not detected. NA- Not Analyzed.

B= Analyte was detected in the method or trip blank. W= Post spike recovery out of limits.

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

TABLE 3-1
SI/RAR Sample Analytical Results - RCRA Metals
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Sample ID											
Analysis	Cleanup Objective*	TB-01-14 4'-7'	TB-01-15 0'-2'	TB-01-15 2'-4'	TB-01-16 0'-2'	TB-01-16 2'-4'	TB-01-17 0'-2'	TB-01-17 2'-4'	TB-01-18 0'-2'	TB-01-18 2'-4'	
Metals (mg/kg)											
Arsenic	7.5 or SB	3.50	9.40	14.00	5.20	5.40	13.00	6.40	13.00	7.00	
Barium	300 or SB	64.1J	654	297.00	175.00	20.3B	196J	26.4J	419J	195J	
Cadmium	10 or SB	2.83J	ND	2.65J	2.08J	1.37J	1.82J	ND	2.83J	1.26J	
Chromium	50 or SB	14J	27.50	19.90	13.40	5.05	50.6J	26.9J	12.6J	8.82J	
Lead	400** or SB	14.90	4120J	853J	1240J	37.5J	976J	1910J	2330J	619J	
Mercury	0.10	0.037B	3.66J	193J	2.45J	0.112J	0.46J	ND	4.10	190	
Selenium	2 or SB	ND	ND	ND	ND	ND	ND	ND	ND	ND	
Silver	0.9 (SB)	ND	ND	1.178J	ND	ND	ND	ND	ND	ND	
Analysis											
Metals (mg/kg)											
Arsenic	7.5 or SB	12.00	7.40	45.00	5.60	2.10	5.30	7.60	3.60	2.40	
Barium	300 or SB	255J	105J	151J	22.1BJ	70.1J	108J	247.00	56.50	27.2J	
Cadmium	10 or SB	2.73J	3.96	2.02	0.70	1.37J	3.08J	6.44J	2.7J	0.67	
Chromium	50 or SB	10.9J	17.30	7.97	4.73	9.52J	12.9J	27.7J	9.26J	67.10	
Lead	400** or SB	1790J	24.3J	49.2J	1.1J	17.4J	19.9J	97.5J	56.3J	63J	
Mercury	0.10	2.780	0.067J	0.218J	ND	ND	0.083	0.246	ND	0.065J	
Selenium	2 or SB	ND	ND	ND	ND	ND	ND	ND	ND	ND	
Silver	0.9 (SB)	ND	ND	ND	ND	ND	ND	4.8J	ND	ND	
Analysis											
Metals (mg/kg)											
Arsenic	7.5 or SB	9.70	3.20	3.20	4.80	5.10	6.00	3.90	1.20	5.90	
Barium	300 or SB	61.8J	148J	70.2J	9.72BJ	79.1J	111J	73.7J	22.40	18.8BJ	
Cadmium	10 or SB	6.25	1.39	1.77	0.89	1.55	1.65	3.03	1.96	1.12	
Chromium	50 or SB	ND	24.90	322	10.20	7.43	11.00	15.60	6.87	5.07	
Lead	400** or SB	65.1J	34.5J	134J	25.5J	43.1J	353J	13.1J	5.00	17.3J	
Mercury	0.10	1.390	0.029BJ	ND	ND	0.002J	0.885J	ND	ND	0.031BJ	
Selenium	2 or SB	ND	ND	ND	ND	ND	ND	ND	ND	ND	
Silver	0.9 (SB)	0.97	ND	ND	ND	ND	ND	ND	ND	ND	
Analysis											
Metals (mg/kg)											
Arsenic	7.5 or SB	13.00	0.85B	3.40	3.30	26.00	62.00	5.70	3.20		
Barium	300 or SB	235J	10.8BJ	76.9J	53.8J	70.3J	351J	20.50BJ	37.1J		
Cadmium	10 or SB	4.60	ND	1.32	1.32	1.43	3.01	0.73	2.31		
Chromium	50 or SB	8.86	2.52	6.05	4.14	6.54	5.74	5.31	4.11		
Lead	400** or SB	1170J	5.3J	107J	16J	124J	1200J	15.9J	53.7J		
Mercury	0.10	0.298J	ND	0.625J	0.024BJ	0.21J	0.25J	0.088J	0.031BJ		
Selenium	2 or SB	ND	ND	ND	ND	ND	ND	ND	ND		
Silver	0.9 (SB)	ND	ND	ND	ND	ND	ND	ND	0.595B		

Notes: * Recommended Soil Cleanup Objective as per TACM 4046

** Background levels for lead vary widely. The USEPA's Interim Lead Hazard Guidance (July 14, 1994) establishes a residential screening level of 400 ppm

SB= Site Background. ND= Compound not detected. NA= Not Analyzed.

J= Analyte was detected in the method or trip blank.

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

TABLE 3-1
SI/RAR Sample Analytical Results - RCRA Metals
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Sample ID										
Analysis	Cleanup	B-01-1 0'-2'	B-01-1 2'-4'	B-01-1 4'-8'	B-01-2 0'-2'	B-01-2 2'-4'	B-01-2 4'-5'	B-01-3 0'-2'	B-01-3 2'-4'	B-01-3 4'-8'
Metals (mg/kg)										
Arsenic	7.5 or SB	4.40	4.80	2.10	3.20	4.80	1.90	4.10	4.70	4.50
Barium	300 or SB	67.1J	126J	72.6J	64.7J	88.6J	47.2J	109J	55.2J	56.4J
Cadmium	10 or SB	1.09J	1.85J	1.23J	0.85J	1.2J	0.638J	1.38J	1.58J	1.05J
Chromium	50 or SB	7.33	13.50	8.64	6.63	8.16	7.48	8.94	8.48	6.50
Lead	400** or SB	92.8J	171J	6.3J	24.9J	249J	25J	123J	51.2J	33.3J
Mercury	0.10	0.430	0.610	0.026	0.100	0.081	0.061	0.640	0.120	0.210
Selenium	2 or SB	ND	ND	ND	ND	ND	ND	ND	ND	ND
Silver	SB	ND	1.01B	ND	ND	ND	ND	0.846B	0.79B	0.913B
Analysis	Cleanup	S-01-1 0"-6"	S-01-2 0"-6"	S-01-3 0"-6"	MS 0"-6"	MSD 0"-6"		HL-1 3'-4'	HL-2 Composite	
Metals (mg/kg)										
Arsenic	7.5 or SB	2.90	4.30	3.70	9.00	4.30		0.97B	1.10	
Barium	300 or SB	59.7J	132J	61.4J	351J	339		51.3J	31.9J	
Cadmium	10 or SB	1.57J	2.41	0.934J	7.39	2.12		1.04	1.30	
Chromium	50 or SB	11.60	12.50	4.38J	32.70	12.70		6.46	5.68	
Lead	400** or SB	79.9J	67J	73.4J	120J	121.00		11J	24.7J	
Mercury	0.10	0.120	1.320	0.120	1.400	1.200		0.039B	6.790	
Selenium	2 or SB	ND	ND	ND	ND	ND		ND	ND	
Silver	0.9 (SB)	ND	0.992B	ND	5.86	0.946B		ND	ND	

Notes: * Recommended Soil Cleanup Objective as per TAGM 4046

** Background levels for lead vary widely. The USEPA's Interim Lead Hazard Guidance (July 14, 1994) establishes a residential screening level of 400 ppm.

SB: Site Background. ND: Compound not detected. NA: Not Analyzed.

B= Analyte was detected in the method or trip blank.

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

0.430 Sample above Recommended Soil Cleanup objective.

The detection of barium above the applicable NYS cleanup objective of 300 mg/kg was observed in six of the soil samples from the Test Borings. Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 317 to 1,380 mg/kg.

The detection of chromium above the applicable NYS cleanup objective of 50 mg/kg was observed in three of the soil samples from the Test Borings. Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 50.6 to 322 mg/kg.

The detection of lead above the applicable NYS cleanup objective of 400 mg/kg was observed in 17 of the soil samples from the Test Borings. Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 432 to 4120 mg/kg.

The detection of mercury above the applicable NYS cleanup objective of 0.10 mg/kg was observed in 34 of the soil samples from the Test Borings. Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 0.112 to 9.56 mg/kg.

The detection of silver above the applicable NYS cleanup objective of 0.9 mg/kg (Site Background (SB)) was observed in eight of the soil samples from the Test Borings. Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 0.97 to 4.81 mg/kg.

Table 3-1, page 3 of 3, presents a summary of analytical results for RCRA Metals from the nine background samples, the three surface soil samples and the two subsurface samples associated with the hydraulic lift. Review of the results indicates concentrations of RCRA Metals above the applicable NYSDEC soil cleanup objectives as specified in

NYSDEC TAGM HWR-94-4046 were detected in a portion of the 14 soil samples from the above-referenced locations.

The detection of mercury above the applicable NYS cleanup objective of 0.10 mg/kg was observed in five of the nine background soil samples. Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 0.120 to 0.640 mg/kg. The detection of mercury above the applicable NYS cleanup objective of 0.10 mg/kg was also observed in four of the five surface soil samples and the subsurface hydraulic lift samples. Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 0.120 to 6.790 mg/kg.

Silver was detected at a range of 0.79 to 1.01 mg/kg in four of the nine background samples. An average (0.90) of these four values was used as the Site background (SB) value for this project. The detection of silver above the SB of 0.9 mg/kg was observed in one of the five surface soil samples and the subsurface hydraulic lift samples. The concentration above the SB level was 0.992 mg/kg.

Table 3-2 presents a summary of the laboratory analytical results for TCLP RCRA Metals collected from nine soil samples (including the two highest (totals) lead and highest mercury samples) during this SI/RAR. All TCLP results, except from TB-01-9 at 0'-2', were either not detected (ND) at laboratory detection limits or were detected well below Hazardous Waste Standards. The concentration of lead in TB-01-9 at 0'-2' was 14.4 mg/l which is above the hazardous waste concentration level of 5.0 mg/l.

3.2.2 VOCs and SVOCs

Table 3-3, pages 1, 2, 3 and 4 of 4 present a summary of the laboratory analytical results for VOCs and SVOCs on soil samples collected from Test Borings, Test Pits, Monitoring Wells, Surface, and Hydraulic Lift areas during this SI/RAR.

TABLE 3-2
SI/RAR Sample Analytical Results - TCLP Metals
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis Metals (mg/l)	Sample ID									
	Haz. Waste Standard*	TB-01-5 0'-2'	TB-01-9 0'-2'	TB-01-9 2'-4'	TB-01-13 0'-2'	TB-01-15 0'-2'	TB-01-15 2'-4'	TB-01-17 0'-2'	TB-01-23 2'-4'	TB-01-30 2'-4'
Arsenic	5.00	ND	NA	ND	NA	NA	ND	ND	ND	ND
Barium	100.00	0.90	NA	1.47	NA	NA	0.72	2.14	ND	0.34
Cadmium	1.00	ND	NA	0.07	NA	NA	ND	ND	ND	ND
Chromium	5.00	ND	NA	ND	NA	NA	ND	ND	ND	ND
Lead	5.00	ND	14.40	ND	NA	4.57	ND	2.18	ND	ND
Mercury	0.20	ND	NA	ND	ND	NA	ND	ND	ND	ND
Selenium	1.00	ND	NA	ND	NA	NA	ND	ND	ND	ND
Silver	5.00	ND	NA	ND	NA	NA	ND	ND	ND	ND

Notes:

* Maximum Concentration of Contamination as presented in Table 1 of 40 CFR - Chapter I - Part 261.24

ND = Not Detected at laboratory detection limit.

NA = Not Analyzed.

14.40

Sample above Maximum Concentration of Contamination.

TABLE 3-3

SI/RAR Sample Analytical Results - VOCs - Test Pits
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis	Sample ID									
	Cleanup Objective*	TP-01-1 7'-8'	TP-01-2 5'-6'	TP-01-3 10'-11'	TP-01-4 11'-12'	TP-01-4 Duplicate	TP-01-5 7'-8'	TP-01-6 4'-6'	TP-01-7 7'-9'	TP-01-8 4'-6'
	Volatile Organic Compounds (ug/kg)									
1, 2, 3 trimethyl benzene	NS	ND	ND	ND	ND	ND	ND	ND	ND	ND
1, 2, 3, 4 - tetramethyl benzene	NS	ND	ND	ND	ND	ND	ND	ND	ND	ND
1, 2, 3, 5 - Tetramethylbenzene	NS	ND	ND	ND	20,000	ND	ND	ND	ND	ND
1, 2, 4 - Trimethylbenzene	10,000	ND	ND	ND	ND	ND	ND	ND	ND	ND
1, 2, 4, 5-Tetramethylbenzene	NS	ND	ND	ND	ND	22,000	ND	ND	ND	ND
1,1-Dichloroethene	400	ND	ND	ND	ND	ND	ND	ND	ND	ND
1-ethyl-2 methyl benzene	NS	ND	ND	ND	ND	ND	ND	ND	ND	ND
1-ethyl-2, 4-dimethyl benzene	NS	ND	ND	ND	17,000	ND	ND	ND	ND	ND
1-ethyl-4-(1-methylethyl) benzene	NS	ND	ND	ND	21,000	ND	ND	ND	ND	ND
1-methyl-3-1(1 methyl ethyl) benzene	NS	ND	ND	ND	ND	20,000	ND	ND	ND	ND
2 - ethyl - 1, 4 - dimethyl benzene	NS	ND	ND	ND	ND	ND	ND	ND	ND	ND
2, 3 - dihydro - 5- methyl - 1H - Idene	NS	ND	ND	ND	ND	20,000	ND	ND	ND	ND
Benzene	60	ND	ND	ND	ND	ND	ND	ND	ND	ND
Bromomethane	NS	ND	ND	ND	790J	840J	ND	ND	ND	ND
Chlorobenzene	1,700	ND	ND	ND	ND	ND	ND	ND	ND	ND
decahydro - 2 - methyl naphthalene	NS	ND	ND	ND	ND	ND	ND	ND	ND	ND
Ethylbenzene	5,500	ND	ND	ND	ND	ND	ND	ND	ND	ND
Isopropylbenzene	5,000	ND	ND	ND	ND	ND	ND	ND	ND	ND
m + o + p Xylene	1,200	ND	ND	ND	ND	ND	ND	ND	ND	ND
Methylcyclohexane	NS	ND	ND	ND	ND	ND	ND	ND	ND	ND
Methylene Chloride	100	ND	ND	ND	810JBU	810JBU	ND	8JBU	ND	ND
Toluene	1,500	ND	ND	ND	ND	ND	ND	ND	ND	ND
Trichloroethene	700	ND	ND	ND	ND	ND	ND	ND	ND	ND
unknown hydrocarbons	NS	ND	ND	ND	18,000	ND	ND	ND	ND	ND
unknowns	NS	ND	ND	ND	74,000	108,000	ND	ND	ND	ND

Notes * = New York State Soil Cleanup Objective as outlined in NYS TAGM HWR-94-4046, Appendix A, Table 1.

ND: Compound not detected.

NS = No soil cleanup objective listed in NYS TAGM HWR-94-4046.

B= Analyte was detected in the method or trip blank.

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

810 Sample above indicated Soil Cleanup Objective.

U= Flagged as undetected due to method blank contamination

TABLE 3-3

SI/RAR Sample Analytical Results - VOCs - Test Borings
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis	Sample ID										HL-2 Composite
	Cleanup Objective*	MW-01-1 11'	TB-01-7C 9'-10.5'	TB-01-16 12'	S-01-1 0"-6"	S-01-2 0"-6"	S-01-3 0"-6"	S-01-2 MS/MSD	HL-1 3'-4'		
Volatile Organic Compounds (ug/kg)											
1, 2, 3 trimethyl benzene	NS	170000J	ND	ND	ND	ND	ND	ND	ND	ND	
1, 2, 3, 4 - tetramethyl benzene	NS	69000J	ND	ND	ND	ND	ND	ND	ND	ND	
1, 2, 4 - Trimethylbenzene	10,000	70000J	ND	ND	ND	ND	ND	ND	ND	ND	
1,1-Dichloroethene	400	ND	ND	ND	ND	ND	ND	ND	ND	ND	
1-ethyl-2 methyl benzene	NS	86000J	ND	ND	ND	ND	ND	ND	ND	ND	
1-methyl-3-(1 methyl ethyl) benzene	NS	69000J	ND	ND	ND	ND	ND	ND	ND	ND	
2 - ethyl - 1, 4 - dimethyl benzene	NS	110000J	ND	ND	ND	ND	ND	ND	ND	ND	
2, 3 - dihydro - 5- methyl - 1H - Idene	NS	83000J	ND	ND	ND	ND	ND	ND	ND	ND	
Benzene	60	ND	ND	ND	ND	ND	ND	64J	ND	ND	
Chlorobenzene	1,700	ND	ND	ND	ND	ND	ND	56	ND	ND	
decahydro -2 - methyl naphthalene	NS	ND	1,500	1,500	ND	ND	ND	ND	ND	ND	
Ethylbenzene	5,500	11000J	ND	ND	ND	ND	ND	ND	ND	ND	
Isopropylbenzene	5,000	3,700J	ND	ND	ND	ND	ND	ND	ND	ND	
m + o + p Xylene	1,200	45,600J	ND	ND	ND	ND	5J	ND	ND	ND	
Methylcyclohexane	NS	12000J	ND	ND	ND	ND	ND	ND	ND	ND	
Methylene Chloride	100	2,800JBU	9JBU	ND	5JBU	7JBU	6JBU	16BU	ND	ND	
Toluene	1,500	ND	ND	ND	ND	ND	8J	75J	ND	ND	
Trichloroethene	700	ND	ND	ND	ND	ND	ND	54J	ND	ND	
unknown hydrocarbons	NS	ND	ND	1,300	ND	ND	ND	ND	ND	ND	
unknowns	NS	271000J	ND	16,200	ND	ND	ND	ND	ND	ND	

Notes * = New York State Soil Cleanup Objective as outlined in NYS TAGM HWR-94-4046, Appendix A, Table 1.

ND: Compound not detected.

NS = No soil cleanup objective listed in NYS TAGM HWR-94-4046.

B= Analyte was detected in the method or trip blank.

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

70,000 Sample above indicated Soil Cleanup Objective.

U= Flagged as undetected due to method blank contamination

TABLE 3-3

SI/RAR Sample Analytical Results - SVOCs - Test Pits
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis	Sample ID									
	Cleanup Objective*	TP-01-1 7'-8'	TP-01-2 5'-6'	TP-01-3 10'-11'	TP-01-4 11'-12'	TP-01-4 Duplicate	TP-01-5 7'-8'	TP-01-6 4'-6'	TP-01-7 7'-9'	TP-01-8 4'-6'
Semi-Volatile Organic Compounds (ug/kg)										
1,1'-Biphenyl	50,000	ND(R)	ND(R)	ND	ND	ND	380J	ND	ND	ND
2,4-Dinitrotoluene	50,000	ND(R)	ND(R)	ND	ND	ND	ND	ND	ND	ND
2-Chlorophenol	800	ND(R)	ND(R)	ND	ND	ND	ND	ND	ND	ND
2-Methylnaphthalene	36,400	ND(R)	ND(R)	ND	58J	ND	1200J	ND	ND	ND
4-Chloro-3-methylphenol	240	ND(R)	ND(R)	ND	ND	ND	ND	ND	ND	ND
4-Nitrophenol	100	ND(R)	ND(R)	ND	ND	ND	ND	ND	ND	ND
Acenaphthene	50,000	ND(R)	ND(R)	ND	ND	ND	1400J	380J	ND	ND
Anthracene	50,000	ND(R)	ND(R)	ND	ND	ND	2,200	1000J	ND	ND
Benzo(a)anthracene	224	ND(R)	ND(R)	ND	ND	ND	2,700	5300J	ND	ND
Benzo(a)pyrene	61	ND(R)	ND(R)	ND	ND	ND	ND	4100J	ND	ND
Benzo(b)fluoranthene	1,100	ND(R)	ND(R)	ND	ND	ND	1700J	7300J	ND	ND
Benzo(g,h,i)perylene	50,000	ND(R)	ND(R)	ND	ND	ND	ND	1200J	ND	ND
Benzo(k)fluoranthene	1,100	ND(R)	ND(R)	ND	ND	ND	990J	2800J	ND	ND
Bis-2-ethylhexyl phthalate	50,000	42J(R)	ND(R)	120JBU	ND	ND	ND	ND	ND	ND
Carbazole	50,000	ND(R)	ND(R)	ND	ND	ND	930J	660J	ND	ND
Chrysene	400	ND(R)	ND(R)	ND	ND	ND	1,800	5,400	ND	ND
Dibenz(a,h)anthracene	14	ND(R)	ND(R)	ND	ND	ND	280J	510J	ND	ND
Dibenzofuran	6,200	ND(R)	ND(R)	ND	ND	ND	2000J	220J	ND	ND
Fluorene	50,000	ND(R)	ND(R)	ND	ND	ND	2400J	340J	ND	ND
Fluoranthene	50,000	ND(R)	ND(R)	ND	ND	ND	4,900	8,900	ND	ND
Indeno(1,2,3-cd)pyrene	3,200	ND(R)	ND(R)	ND	ND	ND	ND	2000J	ND	ND
Naphthalene	13,000	ND(R)	ND(R)	ND	ND	ND	1300J	ND	ND	ND
N-Nitrosodi-N-propylamine	50,000	ND(R)	ND(R)	ND	ND	ND	ND	ND	ND	ND
Pentachlorophenol	1,000	ND(R)	ND(R)	ND	ND	ND	ND	ND	ND	ND
Phenanthrene	50,000	ND(R)	ND(R)	ND	ND	ND	7,100	5,100	ND	ND
Phenol	30	ND(R)	ND(R)	ND	ND	ND	ND	ND	ND	ND
Pyrene	50,000	ND(R)	ND(R)	ND	ND	ND	760J	9,300	ND	ND
TICS	NS	270(R)	ND(R)	ND	17,790	8,560	21,680	12,820	ND	2,310

Notes * = New York State Soil Cleanup Objective as outlined in NYS TAGM HWR-94-4046, Appendix A, Table 1.

NS = No soil cleanup objective listed in NYS TAGM HWR-94-4046.

ND: Compound not detected.

B = Analyte was detected in the method or trip blank.

U = Flagged as undetected due to method blank contamination

Sample above indicated Soil Cleanup Objective.

J = Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

(R) = Data should be considered unusable due to surrogate recoveries that were reported as less than 10%.

(MDL): Laboratory Method Detection Limit

TABLE 3-3

SI/RAR Sample Analytical Results - SVOCs - Test Borings
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis	Sample ID										HL-2 Composite
	Cleanup Objective*	MW-01-1 11'	TB-01-7C 9'-10.5'	TB-01-16 12'	S-01-1 0"-6"	S-01-2 0"-6"	S-01-3 0"-6"	S-01-2 MSMSD	HL-1 3'-4'		
Semi-Volatile Organic Compounds (ug/kg)											
2-Methylnaphthalene	36,400	ND	ND	870J	ND	ND	ND	ND	ND	ND	
2,4-Dinitrotoluene	50,000	ND	ND	ND	ND	ND	ND	1,200	ND	ND	
2-Chlorophenol	800	ND	ND	ND	ND	ND	ND	1,600	ND	ND	
4-Chloro-3-methylphenol	240	ND	ND	ND	ND	ND	ND	1,800	ND	ND	
4-Nitrophenol	100	ND	ND	ND	ND	ND	ND	2,100	ND	ND	
Acenaphthene	50,000	ND	ND	87J	150J	ND	ND	990	ND	120J	
Anthracene	50,000	ND	ND	ND	ND	ND	ND	ND	ND	660J	
Benzo(a)anthracene	224	ND	ND	ND	2,100	74J	ND	110J	ND	1600J	
Benzo(a)pyrene	61 or MDL (390)	ND	ND	ND	1,700	69J	ND	100J	ND	1000J	
Benzo(b)fluoranthene	1,100	ND	ND	ND	3,100	100J	ND	150J	ND	1700J	
Benzo(g,h,i)perylene	50,000	ND	ND	ND	660J	ND	ND	45J	ND	280J	
Benzo(k)fluoranthene	1,100	ND	ND	ND	980	ND	ND	52J	ND	520J	
Bis-2-ethylhexyl phthalate	50,000	54JBU	ND	ND	ND	ND	130J	ND	66J	ND	
Butylbenzyl phthalate	50,000	ND	ND	ND	570J	ND	50J	ND	ND	ND	
Carbazole	50,000	ND	ND	ND	390J	ND	ND	ND	ND	300J	
Chrysene	400	ND	ND	ND	2,100	82J	ND	120J	ND	1500J	
Dibenzo(a,h)anthracene	14	ND	ND	ND	190J	ND	ND	ND	ND	190J	
Dibenzofuran	6,200	ND	ND	ND	290J	ND	ND	ND	ND	290J	
Di-n-butyl phthalate	8,100	ND	ND	ND	ND	ND	67J	67J	ND	ND	
Fluorene	50,000	ND	ND	88J	610J	ND	ND	ND	ND	120J	
Fluoranthene	50,000	ND	ND	ND	3,700	130J	ND	210J	ND	2,800	
Indeno(1,2,3-cd)pyrene	3,200	ND	ND	ND	1,100	55J	ND	63J	ND	750J	
N-Nitrosodi-N-propylamine	50,000	ND	ND	ND	ND	ND	ND	1,200	ND	ND	
Pentachlorophenol	1,000	ND	ND	ND	3,600	ND	ND	1,700	ND	ND	
Phenanthrene	50,000	ND	ND	170J	840	81J	ND	140J	ND	3,000	
Phenol	30	ND	ND	ND	ND	ND	ND	1,600	ND	ND	
Pyrene	50,000	ND	ND	ND	4,300	130J	ND	1,300	ND	3200J	
TICs	NS	ND	ND	12,461	4,420	ND	2,740	ND	ND	3,670	

Notes * = New York State Soil Cleanup Objective as outlined in NYS TAGM HWR-94-4046, Appendix A, Table 1.

NS = No soil cleanup objective listed in NYS TAGM HWR-94-4046. ND: Compound not detected.

2,100 Sample above indicated Soil Cleanup Objective.

B= Analyte was detected in the method or trip blank.

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

U= Flagged as undetected due to method blank contamination

(MDL) = Laboratory Detection Limit

As shown on Table 3-3, pages 1 and 2, concentrations of VOCs above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 were detected in a portion of the 16 soil samples from Test Borings, Test Pits, Monitoring Wells, Surface, and Hydraulic Lift areas. The detection of methylene chloride above the applicable NYS cleanup objective of 100 ug/kg was observed in two of the soil samples. Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 810 to 2800 ug/kg.

In addition to methylene chloride, three additional VOCs were encountered above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 in the sample at a depth of 11 feet below grade from the MW-01-1 location. These VOCs were 1,2,4 – Trimethylbenzene at a concentration of 70,000 ug/kg, ethylbenzene at a concentration of 11,000 ug/kg and m+o+p Xylene at a concentration of 45,600 ug/kg. The soil cleanup objectives for these compounds are 10,000, 5,500 and 1,200 ug/kg; respectively.

Total VOCs were encountered above the applicable NYSDEC cleanup objective of 10,000 ug/kg in three of the sixteen sample locations. These locations included TP-01-4 at 11'-12'; MW-01-1 at 11' and TB-01-16 at 12'. The concentrations were 151,600; 1,003,100 and 19,000 ug/kg, respectively.

As shown on Table 3-3, pages 3 and 4, concentrations of SVOCs above the laboratory Method Detection Limit (MDL) or the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 were detected in a portion of the 16 soil samples from Test Borings, Test Pits, Monitoring Wells, Surface, and Hydraulic Lift areas. The detection of two compounds (Benzo(a)anthracene and Benzo(b)fluoranthene) above the MDL values or the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 of 390 and 1,100 ug/kg; respectively, was observed in four of the soil samples. These four soil locations were TP-01-5 at 7'-8'; TP-01-6 at 4'-6'; S-01-1 at 0'-6"; and HL-2, Composite. Concentrations above the MDL value or the

applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 ranged from 1,600 to 7,300 ug/kg.

In addition, five additional SVOCs were encountered above the MDL value or the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 in various samples at the four locations referenced above. These SVOCs were Benzo(a)pyrene at concentrations of 1,000 to 4,100 ug/kg; Benzo(k)fluoranthene at a concentration of 2,800 ug/kg; Chrysene at concentrations of 1,500 to 5,400 ug/kg; Dibenzo(a, h) anthracene at concentrations of 190 to 280 ug/kg; and Pentachlorophenol at a concentration of 3,600 ug/kg. The MDL values or the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 for these compounds are 60, 1,100, 400, 140 and 1,000 ug/kg, respectively.

3.2.3 Pesticides/PCBs

Table 3-4 present a summary of the laboratory analytical results for pesticides and polychlorinated biphenyls (PCBs) collected from specific soil sample locations during this SI/RAR.

As shown on Table 3-4, concentrations of pesticides above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 were detected in one of the five soil sample locations (three surface sample locations and two subsurface samples associated with the removed hydraulic lift.). The detection of 4,4' DDT above the applicable NYS cleanup objective of 2.10 mg/kg was observed in sample S-01-1 at 0"-6" at a concentration of 2.90 mg/kg.

As shown on Table 3-4, concentrations of PCBs were not detected above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046.

TABLE 3-4

SI/RAR Sample Analytical Results - Pesticides and PCBs
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis	Sample ID						
	Cleanup Objective*	S-01-1 0"-6"	S-01-2 0"-6"	S-01-3 0"-6"	HL-1 3'-4'	HL-2 Composite	
Pesticides (mg/kg)							
4,4' DDD	2.90	0.82J	ND	ND	NA	NA	
4,4' DDE	2.10	0.19J	ND	ND	NA	NA	
4,4' DDT	2.10	2.9J	ND	ND	NA	NA	
PCBs (mg/kg or ug/wipe)							
Aroclor-1254	1.00	ND	ND	ND	ND	ND	
Aroclor-1260	1.00	ND	ND	ND	ND	ND	
Total PCBs	1.00	ND	ND	ND	ND	ND	

Notes:

* = New York State Soil Cleanup Objective as outlined in NYS TAGM HWR-94-4046, Appendix A, Table 3.

ND: Compound not detected. NA: Not Analyzed.

2.90 Sample above indicated Soil Cleanup Objective.

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

4.0 INTERIM REMEDIAL MEASURES

A summary of interim remedial measures (IRMs) conducted by area is presented on Table 4-1, with details of each IRM presented in the following sections.

4.1 49-53 RICHMOND AVENUE

4.1.1 Hydraulic Lift

An abandoned in-ground hydraulic lift unit was present in the rear of 49-53 Richmond Avenue. The age and condition of the feature was unknown. To address any potential contamination related to this equipment, the following Interim Remedial Measures (IRMs) were performed by SLC on 31 January 2002.

- the hydraulic lift and all associated below-grade equipment, containment vessel and hardware were removed;
- two confirmation soil samples were collected from the hydraulic lift excavation and these samples were analyzed for VOCs, SVOCs, PCBs and total metals; and
- the excavation was backfilled with excavated materials.

Containers of waste previously on-site (5-gallon pail of waste oil, 25-gallon drum of oil, four 5-gallon pails marked "flammable", and one pressurized vessel) were removed from the Site prior to InteGreyted performance of the SI/RAR.

4.1.2 Asbestos Abatement

Petroleum-contaminated soil relating to minor overfills of an aboveground storage tank (AST) in the basement (dirt floor) of 49 Richmond Avenue had to be removed as part of the Site IRM. Due to the presence of friable asbestos containing material (ACM) on the

TABLE 4-1

Summary of IRM Measures – January to April 2002

Location	Number of USTs	Number of ASTs	Number of Hydraulic Lifts	Approx. Tons of Affected Soil Removed	Asbestos Removal	Building Demolition
3 Niagara Street	NA	NA	NA	NA	NA	NA
49-53 Richmond Avenue	NA	1 –500 gallon fuel oil tank	1	4	Friable-Furnace, floor and pipes	NA
57 Richmond Avenue	NA	NA	NA	NA	NA	NA
69 Richmond Avenue	By others- 1,000 gal. Waste oil; 500 gal. Fuel Oil; This IRM – 1,000 gal. Fuel oil	NA	3 hydraulic lifts plus a cistern, floor drains, sumps and pits	265	Non-Friable - Roof	Yes
79 Richmond Avenue	NA	NA	NA	NA	NA	NA
81 Richmond Avenue	NA	NA	NA	NA	NA	NA

dirt floor of the basement and on overhead pipes, asbestos abatement had to be performed prior to initiating the removal of the petroleum-contaminated soil and the AST. This work was not described in the original SI/RAR Work Plan but was described in an Addendum prepared by InteGreyted, dated 18 January 2002. This Addendum was accepted by the NYSDEC on 28 January 2002.

Asbestos abatement of the friable ACM in the basement of 49 Richmond Avenue was performed by SLC's subcontractor, Modern Environmental of North Tonowanda (Modern), New York on 5 – 8 March 2002. Since this was a small project as determined by New York State Department of Labor (NYSDOL) standards, notification for this project was not required. Modern has prepared documentation describing the activities performed during the abatement process and this documentation and monitoring results are provided in Attachment 3.

4.1.3 Aboveground Tank Closure

As stated in Section 4.1.2, petroleum-contaminated soil relating to minor overfills of an aboveground storage tank (AST) was present in the basement (dirt floor) of 49 Richmond Avenue. The AST and the petroleum-contaminated soil were removed by SLC on 11 April 2002 as part of the Site IRM. Activities performed are described below:

- Accessed the AST (approximately 500-gallon tank), removed approximately 35 gallons of No. 2 fuel oil remaining in the AST and removed the tank from the basement area. The fuel oil was collected in a 55-gallon drum, covered and stored on-site until accepted by Corbett Management on 26 April 2002 for transportation by St. Joseph Motor Line to the General Environmental Management Facility in Cleveland, Ohio for disposal.
- Following removal, the AST was inspected and found to be free of any holes or rust areas. The AST was transported to SLC's local office/maintenance facility where, on 12 April 2002, the AST was cut open, cleaned, and disposed at David Dunn's Salvage, Inc. of Middleport, New York as scrap metal. All wash water

- and “tank bottom” sludge that was generated was containerized and combined with the staged fuel oil at 49 Richmond Avenue until accepted by Corbett Management on 26 April 2002 for transportation by St. Joseph Motor Line to the General Environmental Management Facility in Cleveland, Ohio for disposal.
- Petroleum impacted soils was excavated and transported by wheel barrel to 69 Richmond Avenue where it was loaded on a truck and transported to the Modern Landfill for use as daily cover.
- InteGreyted documented all AST removal and soil excavation activities. Upon completion of excavation activities, one bottom confirmation soil sample was collected from the excavation and analyzed for NYSDEC STARS volatile and semi-volatile organic compounds per NYSDEC guidance.
- Backfill was not placed in the area as disturbance was deemed minimal.

Laboratory test results indicate that VOCs and SVOCS were not present at the post-excavation AST site location. Laboratory results are presented on Table 4-1 (See Page 4-10).

4.2 69 RICHMOND AVENUE

Prior to initiation of this SI/RAR, Galloway Tank Services (Galloway) of Lockport, New York initiated the removal of the two underground storage tanks (USTs) at 69 Richmond Avenue. At that time, the property was owned by Licata Vending, Inc. (Licata) and the work was contracted by, and performed for, Licata without the City’s knowledge. During the tank removal process, Galloway encountered petroleum contamination which extended under the slab of the existing Licata building. Galloway notified the NYSDEC of the encountered petroleum contamination and a Spill No. (0175398) was assigned to the site.

Due to the pending sale of the property, Licata stopped all work related to the USTs. On 11 January 2002, the City of Lockport purchased the property from Licata. In order to properly remove the petroleum-contaminated soil and to close the assigned Spill No., InteGreyted proposed the demolition of the building located at 69 Richmond Avenue as an additional IRM. The Work Plan for the demolition of 69 Richmond Avenue was prepared by InteGreyted in the above-referenced 18 January 2002 Addendum (See Section 4.1.2).

4.2.1 *Asbestos Abatement Survey*

A survey of the roof material was performed by SLC's asbestos survey subcontractor, C.E.M., Inc. of Buffalo, New York, on 13 February 2002. Sample results indicated approximately 5,300 square feet of the roof material contained asbestos material. In addition, SLC's demolition subcontractor suspected potential ACM on the interior of the building. C.E.M. Inc. obtained six additional interior samples on 28 February 2002. The results of these six samples did not indicate the presence of any ACM. All survey sample results are presented in Attachment 3.

Asbestos abatement on the non-friable ACM on the roof of 69 Richmond Avenue was performed by SLC's subcontractor, Modern Environmental of North Tonawanda, New York, on 11-15 March 2002. Notification for this project was required. Modern has prepared documentation describing the activities performed during the abatement process and this documentation, the Notification and project monitoring results are provided in Attachment 3.

4.2.2 *Building Demolition*

As stated in Section 4.2, petroleum contamination relating to two petroleum USTs was encountered under the building at 69 Richmond Avenue and a NYSDEC Spill No. has been assigned to this petroleum release. In order to properly remove the petroleum contamination and close the associated Spill No., the existing building at 69 Richmond

Avenue had to be demolished during the IRM portion of this project to allow safe access to areas of concern and complete required remediation.

Cambria Construction, Inc. of Cambria, New York, SLC's Building Demolition subcontractor, performed the required demolition of 69 Richmond Avenue on 18-21 March 2002. Activities performed by Cambria are described below.

- Developed a demolition plan for the existing building, considering applicable codes and project goals.
- Implemented the demolition plan after removal of non-friable asbestos containing material from the roof, including removal of approximately 9,600 square-foot portion of building which was the approximate area of the structure.
- Removed concrete building floor(s).
- Removed drywell (cistern), floor drains, sumps, pits and three hydraulic lifts associated with the former automobile service area of Mullane Motors.
- Exposed an additional 1,000-gallon fuel oil tank below the floor slab of the structure.

As discussed above, Cambria encountered and removed several infrastructure features associated with the facility when it was owned and occupied by Mullane Motors. The structures are identified and their original field locations are presented on Figure 4-1.

In addition, on 21 March 2002, SLC, under the direction of InteGreyted, used their Ford F-350 pickup with a SIMCO Earthprobe 200 and installed six geoprobe borings within the footprint of the demolished building at the locations presented on Figure 4-1. The purpose of these boring was to obtain an estimate of the extent and depth of petroleum-contaminated soil associated with the encountered features. Details of the probe borings

are presented in Tabular Form on Figure 4-1. This information obtained from the geoprobe borings was used as a guide by InteGreyted to estimate and determine the quantity and location of petroleum-contaminated soil that needed to be removed from the area of 69 Richmond Avenue. Petroleum-contaminated soil removal is discussed in further detail in Section 4.2.4.

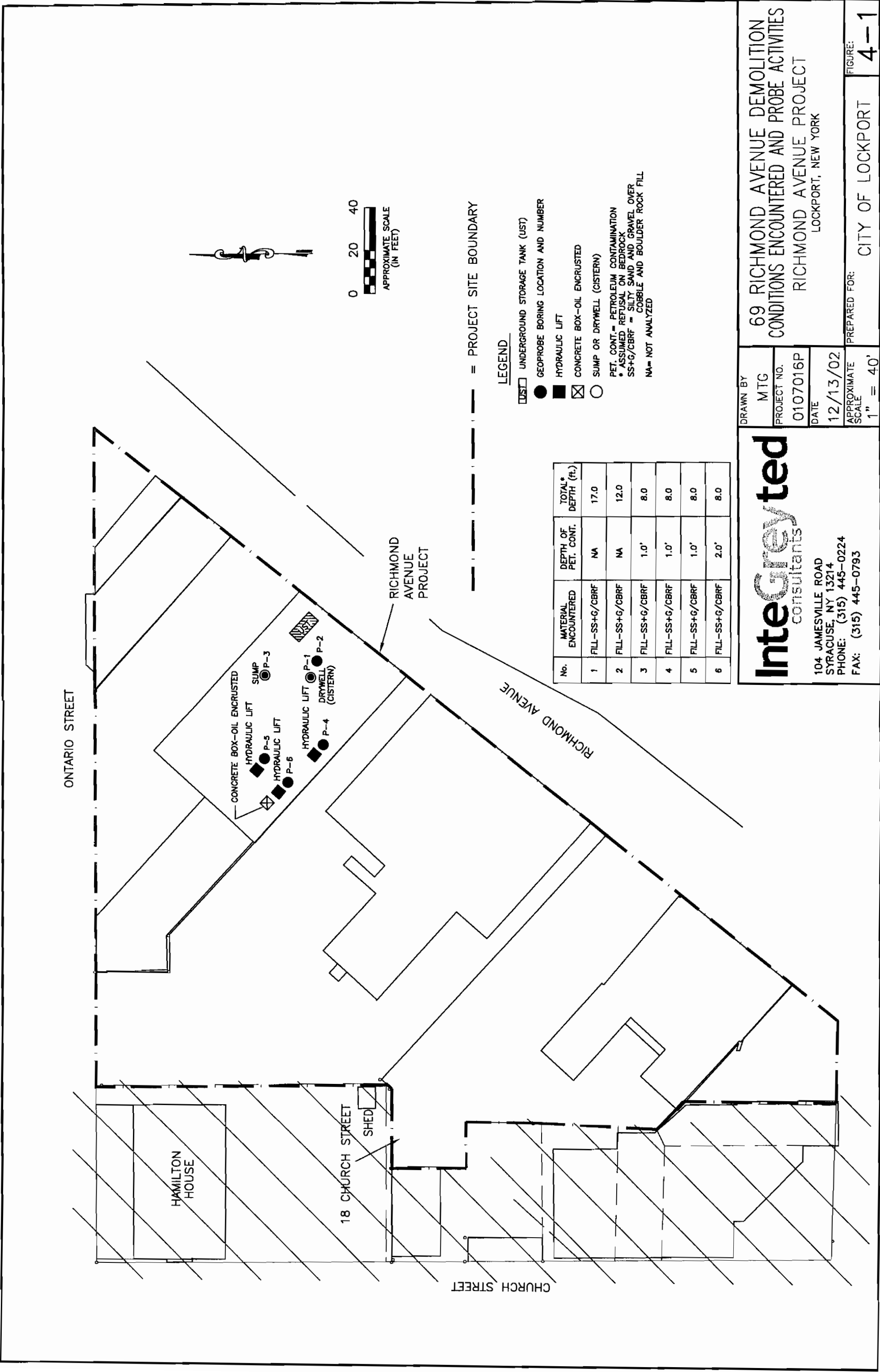
SLC, under the direction of InteGreyted, obtained on 21 March 2002, a composite sample of all the recently encountered petroleum-contaminated soil at 69 Richmond Avenue. This composite sample was obtained for waste profiling purposes and results are presented in Attachment 4.

4.2.3 *Underground Tank Closures*

As previously stated in Section 4.2, Galloway of Lockport, New York initiated the removal of the two underground storage tanks (USTs) that were located immediately adjacent to the building at 69 Richmond Avenue. An additional UST was encountered under the building by Cambria during the demolition of the facility at 69 Richmond Avenue. The locations and descriptions of the tank size and product which was contained in each tank are presented on Figure 4-2.

InteGreyted has been unable to obtain any information as to the excavation, removal, cleaning and disposal of the 1,000-gallon waste oil tank (G-1 on Figure 4-2) and the 500-gallon fuel oil tank (G-2 on Figure 4-2) removed by Galloway. Soil associated with the G-1 UST was originally stockpiled adjacent to the excavation. Prior to Cambria initiating demolition at 69 Richmond Avenue, the stockpiled material was placed back into the excavation for access purposes. SLC located the four corners of the excavation prior to backfilling by Cambria.

SLC also performed waste profile sampling on G-1 excavated soil material prior to Cambria placing it back in the excavation. Due to conversations with former Licata personnel who indicated that the tank was used for liquid disposal, this G-1 material was



ONTARIO STREET

HAMILTON
HOUSE

18 CHURCH STREET

SHED

CHURCH STREET

RICHMOND AVENUE

RICHMOND
AVENUE
PROJECT

UST-N
UST LOCATION
UST-E
UST-S
UST-BOTTOM
UST-W



PROJECT SITE BOUNDARY

LEGEND

UNDERGROUND STORAGE TANK
LOCATION AND IDENTIFICATION

STARS SAMPLING LOCATION AND NO.

TANK No.	REMOVE BY	APPROX. SIZE (GALLONS)	PRODUCT
G-1	GALLOWAY	1,000	WASTE OIL
G-2	GALLOWAY	500	FUEL OIL
UST	SLC	1,000	FUEL OIL

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SYRACUSE, NY 13214
PHONE: (315) 445-0224
FAX: (315) 445-0783

DRAWN BY

MTG

PROJECT NO.

0107016P

DATE

12/13/02

APPROXIMATE
SCALE

1" = 50'

69 RICHMOND AVENUE
UNDERGROUND STORAGE
TANK LOCATIONS

RICHMOND AVENUE PROJECT
LOCKPORT, NEW YORK

PREPARED FOR:

CITY OF LOCKPORT

FIGURE:

4-2

considered a single waste stream. Waste Profile results, presented in Attachment 4, indicate that this material was hazardous for lead and had to be excavated, transported and disposed as a hazardous waste.

Galloway had placed backfill in the excavation associated with the G-2 UST prior to any work being performed during this SI/RAR. SLC excavated a test pit (TP-01-9) in this area on 31 January 2002. Upon completion of the excavation to a depth of six feet, SLC performed STARS sampling of the bottom of the excavation and each of the four walls. Results of this sampling event are presented on Table 4-1. As shown on Table 4-1, several SVOCs were above the respective soil cleanup value. Based on these results, additional petroleum contaminated soil was removed as discussed in Section 4.2.4.

SLC also excavated and removed the 1,000-gallon fuel oil UST that had been discovered during building demolition (UST on Figure 4-2). This UST was removed on 11 April 2002 as part of the Site IRM. Activities performed were as follows:

- Accessed the UST, removed approximately 30 gallons of No. 2 fuel oil remaining in the UST and removed the tank from the tank grave. The fuel oil was collected in a 55-gallon drum, covered and stored on-site until accepted by Corbett Management on 26 April 2002 for transportation by St. Joseph Motor Line to the General Environmental Management Facility in Cleveland, Ohio for disposal.
- Following removal, the UST was inspected and found to be free of any holes or rust areas. The UST was transported to SLC's local office/maintenance facility where on 12 April 2002, the UST was cut open, cleaned, and disposed at David Dunn's Salvage, Inc., as scrap metal. All wash water and "tank bottom" sludge that was generated was containerized and combined with the staged fuel oil at 49 Richmond Avenue until accepted by Corbett Management on 26 April 2002 for transportation by St. Joseph Motor Line to the General Environmental Management Facility in Cleveland, Ohio for disposal.

TABLE 4-2
SI/RAR Sample Analytical Results - STARS VOCs and SVOCs
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis	Sample ID					
	Guidance Value*	UST-W 2' BG	UST-E 2' BG	UST-S 2' BG	UST-Bottom 5' BG	UST-N 2' BG
Volatile Organic Compounds (ug/kg)						
1, 2, 4 - Trimethylbenzene	NS	ND	ND	ND	ND	ND
1, 3, 5 - Trimethylbenzene	NS	ND	ND	ND	ND	ND
4-Isopropyltoluene	NS	ND	ND	ND	ND	ND
Benzene	600	ND	ND	ND	ND	ND
Ethylbenzene	5,500	ND	ND	ND	ND	ND
Isopropylbenzene	NS	ND	ND	ND	ND	ND
m+p Xylene	1,200	ND	ND	ND	ND	ND
Methyl-tert-butyl-ether (MTBE)	NS	ND	ND	ND	ND	ND
n-Butylbenzene	NS	ND	ND	ND	ND	ND
n-Propylbenzene	NS	ND	ND	ND	ND	ND
sec-butylbenzene	NS	ND	ND	ND	ND	ND
tert-Butylbenzene	NS	ND	ND	ND	ND	ND
Toluene	1,500	ND	ND	ND	ND	ND
Total VOCs	10,000	NA	NA	NA	NA	NA
Semi-Volatile Organic Compounds (ug/kg)						
Acenaphthalene	41,000	ND	ND	ND	ND	ND
Acenaphthene	50,000	ND	ND	ND	ND	ND
Anthracene	50,000	ND	ND	ND	ND	ND
Benzo(a)anthracene	290 (MDL)	ND	ND	ND	ND	ND
Benzo(a)pyrene	290 (MDL)	ND	ND	ND	140J	ND
Benzo(b)fluoranthene	1,100	ND	ND	ND	170 J	ND
Benzo(g,h,i)perylene	50,000	ND	ND	ND	ND	ND
Benzo(k)fluoranthene	1,100	ND	ND	ND	ND	ND
Chrysene	400	ND	ND	ND	ND	ND
Dibenz(a,h)anthracene	290 (MDL)	ND	ND	ND	ND	ND
Fluoranthene	50,000	ND	ND	ND	ND	ND
Fluorene	50,000	ND	ND	ND	ND	ND
Indeno(1,2,3-cd)pyrene	3,200	ND	ND	ND	110J	ND
Naphthalene	13,000	2B	1B	ND	ND	ND
Phenanthrene	50,000	ND	ND	ND	ND	ND
Pyrene	50,000	ND	ND	ND	ND	ND
Total SVOCs	50,000	2B	1B	NA	420J	NA
Carcinogenic PAHs	NS	2B	1B	NA	420J	NA
Benzo(a)pyrene equivalents	NS	NA	NA	NA	3.00	NA

Notes: * = New York State Soil Cleanup Objective as outlined in NYS TAGM HWR-94-4046, Appendix A, Tables 1 and 2.

NS = No soil cleanup objective listed in NYS TAGM HWR-94-4046.

ND= Not Detected above laboratory detection limit.

(MDL) Method Detection Limit

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries greater than the advisory limits.

NA= Not Analyzed or Not Applicable.

B= Analyte detected in method blank.

- InteGreyted documented all UST removal activities. Upon completion of removal activities, one bottom confirmation soil sample and four wall soil samples were collected from the excavation and analyzed for NYSDEC STARS volatile and semi-volatile organic compounds per NYSDEC guidance.
- Site material was used to backfill the UST excavation.

Laboratory test results indicate that VOCs and SVOCs were not present at the UST excavation site location. Laboratory results are presented on Table 4-2.

4.2.4 Petroleum-Contaminated Soil Removal

Two waste profiles were developed by SLC under the direction of InteGreyted for the petroleum-contaminated soil discussed in Sections 4.2.2 and 4.2.3 (G-2 at the location of TP-01-9). The waste profiles are presented in Attachment 4. Based on the results of the profiles and the acceptance by Modern Landfill, SLC excavated and removed petroleum-contaminated soil from 69 Richmond Avenue on 11 April 2002. SLC used a Komatsu PC 220 excavator to remove the petroleum-contaminated soil from the areas presented in Figure 4-3.

SLC excavated and directly loaded the petroleum-contaminated soil into trucks supplied by Modern Disposal Services, Inc. of Model City, New York. Twelve loads, for a total of 269.16 tons of petroleum-contaminated soil, were transported to the Modern Landfill in Model City, New York. This landfill is owned and operated by Modern Landfill, Inc. under NYSDEC Permit Numbers 9-2924-00016/00022-0 and 9-2924-00016/00031-0. Manifest documentation for the twelve loads is provided in Attachment 4.

Upon completion of the excavation of petroleum-contaminated soil from an area, confirmation sampling based on STARS Protocol was performed. Samples were taken at the locations shown on Figure 4-3. Laboratory test results indicate that concentrations of several SVOCs were present at the site above the applicable NYSDEC soil cleanup

TABLE 4-3
SI/RAR Sample Analytical Results - STARS VOCs and SVOCs
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Sample ID		Guidance Value*	UST-W 2' BG	UST-E 2' BG	UST-S 2' BG	UST-Bottom 5' BG	UST - N 2' BG
Analysis							
Volatile Organic Compounds (ug/kg)							
1, 2, 4 - Trimethylbenzene	NS	ND	ND	ND	ND	ND	ND
1, 3, 5 - Trimethylbenzene	NS	ND	ND	ND	ND	ND	ND
4-Isopropyltoluene	NS	ND	ND	ND	ND	ND	ND
Benzene	600	ND	ND	ND	ND	ND	ND
Ethylbenzene	5,500	ND	ND	ND	ND	ND	ND
Isopropylbenzene	NS	ND	ND	ND	ND	ND	ND
m+o+p Xylene	1,200	ND	ND	ND	ND	ND	ND
Methyl-tert-butyl-ether (MTBE)	NS	ND	ND	ND	ND	ND	ND
n-Butylbenzene	NS	ND	ND	ND	ND	ND	ND
n-Propylbenzene	NS	ND	ND	ND	ND	ND	ND
sec-butylbenzene	NS	ND	ND	ND	ND	ND	ND
tert-Butylbenzene	NS	ND	ND	ND	ND	ND	ND
Toluene	1,500	ND	ND	ND	ND	ND	ND
Total VOC's	10,000	NA	NA	NA	NA	NA	NA
Semi-Volatile Organic Compounds (ug/kg)							
Acenaphthalene	41,000	ND	ND	ND	ND	ND	ND
Acenaphthene	50,000	ND	ND	ND	ND	ND	ND
Anthracene	50,000	ND	ND	ND	ND	ND	ND
Benzo(a)anthracene	290 (MDL)	ND	ND	ND	ND	ND	ND
Benzo(a)pyrene	290 (MDL)	ND	ND	ND	ND	140J	ND
Benzo(b)fluoranthene	1,100	ND	ND	ND	ND	170 J	ND
Benzo(g,h,i)perylene	50,000	ND	ND	ND	ND	ND	ND
Benzo(k)fluoranthene	1,100	ND	ND	ND	ND	ND	ND
Chrysene	400	ND	ND	ND	ND	ND	ND
Dibenzo(a,h)anthracene	290 (MDL)	ND	ND	ND	ND	ND	ND
Fluoranthene	50,000	ND	ND	ND	ND	ND	ND
Fluorene	50,000	ND	ND	ND	ND	ND	ND
Indeno(1,2,3-cd)pyrene	3,200	ND	ND	ND	ND	110J	ND
Naphthalene	13,000	2B	IB	IB	ND	ND	ND
Phenanthrene	50,000	ND	ND	ND	ND	ND	ND
Pyrene	50,000	ND	ND	ND	ND	ND	ND
Total SVOCs	50,000	2B	IB	IB	NA	420J	NA
Carcinogenic PAHs	NS	2B	IB	IB	NA	420J	NA
Benzo(a)pyrene equivalents	NS	NA	NA	NA	NA	3.00	NA

Notes: * = New York State Soil Cleanup Objective as outlined in NYS TAGM HWR-94-4046, Appendix A, Tables 1 and 2.

NS = No soil cleanup objective listed in NYS TAGM HWR-94-4046.

ND= Not Detected above laboratory detection limit.

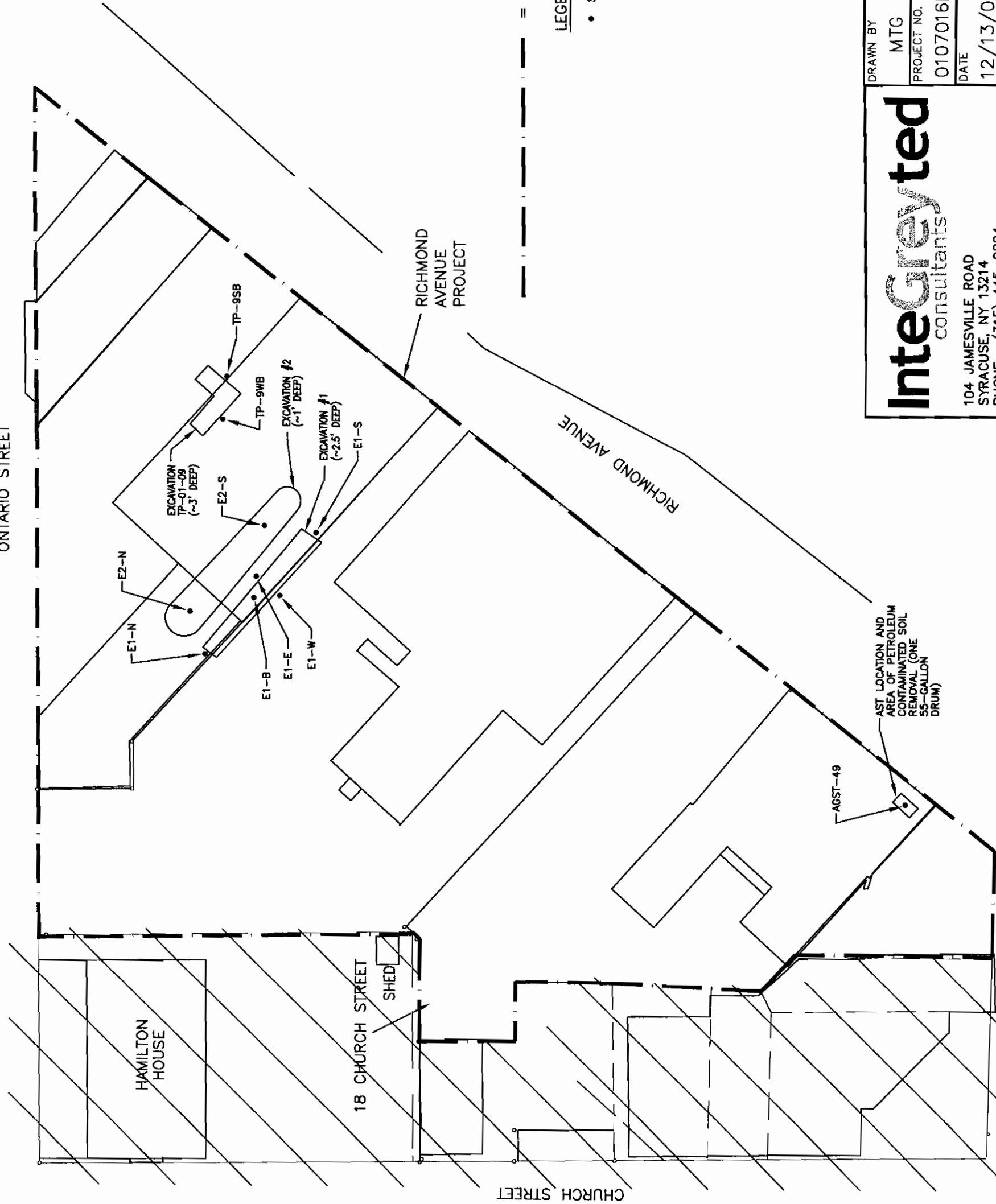
(MDL): Method Detection Limit

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries greater than the advisory limits.

NA= Not Analyzed or Not Applicable.

B= Analyte detected in method blank.

ONTARIO STREET



0 20 40
APPROXIMATE SCALE
(IN FEET)

--- = PROJECT SITE BOUNDARY

LEGEND

- STARS SAMPLING LOCATION AND NO.

DRAWN BY
MTG
PROJECT NO.
0107016P
DATE
12/13/02
APPROXIMATE
SCALE
1" = 40'

69 RICHMOND AVENUE
LOCATIONS OF PETROLEUM CONTAMINATED SOIL REMOVAL
RICHMOND AVENUE PROJECT
LOCKPORT, NEW YORK

InteGreyted
consultants

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PHONE: (315) 445-0224
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AST LOCATION AND
AREA OF PETROLEUM
CONTAMINATED SOIL
REMOVAL (ONE
55-GALLON
DRUM)

PREPARED FOR: CITY OF LOCKPORT
FIGURE: 4-3

TABLE 4-4

SI/RAR Sample Analytical Results - STARS VOCs and SVOCs
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis	Sample ID									
	Guidance Value*	E1 - W 1' BG	E1 - B 2.5' BG	E1 - S 1' BG	E1 - E 1' BG	E1 - N 1' BG	TP-9SB 2' BG	TP-9WB 2' BG	E2 - S 1' BG	E2 - N 1' BG
Volatile Organic Compounds (ug/kg)										
1, 2, 4 - Trimethylbenzene	NS	ND	ND	ND	ND	ND	ND	ND	ND	8
1, 3, 5 - Trimethylbenzene	NS	ND	ND	ND	ND	ND	ND	ND	ND	ND
4-Isopropyltoluene	NS	ND	ND	ND	ND	ND	ND	ND	ND	5
Benzene	600	ND	ND	ND	ND	ND	ND	ND	ND	ND
Ethylbenzene	5,500	ND	ND	ND	ND	ND	ND	ND	ND	ND
Isopropylbenzene	NS	ND	ND	ND	ND	ND	ND	ND	ND	ND
m-o-p Xylene	1,200	ND	ND	ND	ND	ND	ND	ND	ND	4
Methyl-tert-butyl-ether (MTBE)	NS	ND	ND	ND	ND	ND	ND	ND	ND	ND
n-Butylbenzene	NS	ND	ND	ND	ND	ND	ND	ND	ND	6
n-Propylbenzene	NS	ND	ND	ND	ND	ND	ND	ND	ND	ND
sec-butylbenzene	NS	ND	ND	ND	ND	ND	ND	ND	ND	3
tert-Butylbenzene	NS	ND	ND	ND	ND	ND	ND	ND	ND	ND
Toluene	1,500	I	ND	ND	ND	ND	ND	ND	ND	ND
Total VOCs	10,000	I	NA	NA	NA	NA	NA	NA	NA	26
Semi-Volatile Organic Compounds (ug/kg)										
Acenaphthalene	41,000	ND	ND	ND	ND	ND	ND	ND	ND	ND
Acenaphthene	50,000	ND	110J	170J	1,300J	ND	92J	110J	ND	ND
Anthracene	50,000	ND	340	410	2,700J	ND	170J	260J	ND	ND
Benzo(a)anthracene	290 (MDL)	140J	1,200	1,800	7,200	1,100	470	670	130J	150J
Benzo(a)pyrene	290 (MDL)	130J	1,000	1,600	6,500	900	520	680	100J	150J
Benzo(b)fluoranthene	1,100	200J	1,500	2,700	8,600	1,500	770	1,000	ND	250J
Benzo(g,h,i)perylene	50,000	NA	NA	NA	NA	NA	NA	NA	NA	NA
Benzo(k)fluoranthene	1,100	ND	620	700	3,400	520	350	380	180J	ND
Chrysene	400	180J	1,200	1,900	6,900	1,200	510	730	150J	200J
Dibenzo(a,h)anthracene	290 (MDL)	ND	ND	ND	NA	140J	ND	ND	ND	ND
Fluoranthene	50,000	250J	2,400	3,200	15,000	1,800	900	1,300	ND	300
Fluorene	50,000	ND	170J	180J	1,200J	ND	75J	100J	ND	ND
Indeno(1,2,3-cd)pyrene	3,200	ND	560	1,100	NA	470	250J	320	ND	130J
Naphthalene	13,000	ND	ND	250J	1,400J	ND	96J	140J	ND	3B
Phenanthrene	50,000	130J	1,800	1,800	11,000	620	720	1,100	100J	170J
Pyrene	50,000	260J	2,300	3,700	14,000	1,700	840	1,300	ND	470
Total SVOCs	50,000	1290J	13,200	19,510	79,200	9,950	5,763	8,090	660J	1,823
Carcinogenic PAHs	NS	1290J	13,200	19,510	79,200	9,950	5,763	8,090	660J	1,823
Benzo(a)pyrene Equivalents	NS	9.92	13.20	12.19	12.18	11.06	11.08	11.90	6.60	12.15

Notes: * = New York State Soil Cleanup Objective as outlined in NYS TAGM HWR-94-4046, Appendix A, Tables 1 and 2

NS = No soil cleanup objective listed in NYS TAGM HWR-94-4046.

1,200 Sample above indicated Soil Cleanup Objective.

ND= Not Detected above laboratory detection limits.

NA= Not Analyzed or Not Applicable.

BG= Below Grade

B= Analyte detected in method blank.

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries greater than the advisory limits.

objectives as specified in NYSDEC TAGM HWR-94-4046. Laboratory results are presented on Table 4-3.

All areas excavated by SLC on 11 April 2002 were later backfilled with imported soil from an approved source, MKB Sand and Gravel on Sand Pit Road in Lockport, New York. In areas that were excavated to a depth exceeding one foot, the backfill material was placed in one-foot lifts and compacted with the bucket and/or tracks of the Komatsu excavator.

5.0 *ADDITIONAL INVESTIGATION ACTIVITIES: MAY 2002*

Analysis of the data received and reviewed during the initial investigation (January to April 2002) previously described indicated that elevated concentrations of arsenic, chromium, lead, mercury and several poly-nuclear aromatic hydrocarbons (PAHs) compounds were present at the Site. Preliminary volume calculations were performed to estimate the potential volume of soil that needs to be evaluated during the Remedial Alternatives evaluation process. However, an additional investigation was needed to more accurately determine the extent of affected soil material at the Site.

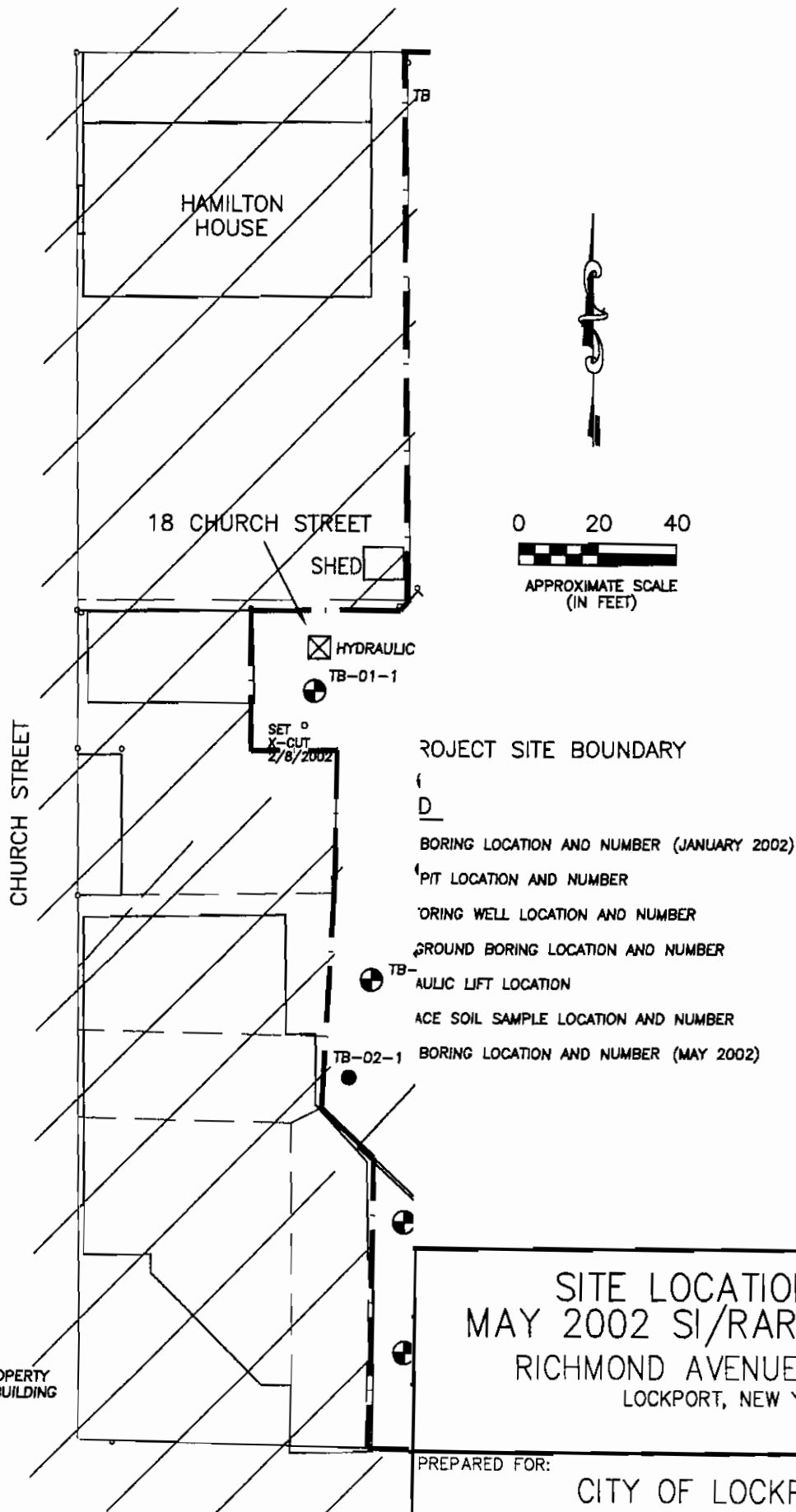
All data received and reviewed during the initial January to April 2002 investigation was informally presented to the NYSDEC by InteGreyted at a meeting held on 16 May 2002 at the 270 Michigan Avenue office of the NYSDEC. Based on the results of the discussions at the 16 May 2002 meeting with the NYSDEC, InteGreyted prepared a Work Plan document, dated 17 May 2002, which described the additional scope of field work to be performed as part of the SI/RAR, as an addendum to the SI/RAR Work Plan. Based upon verbal approval of this document from the NYSDEC on Monday, 20 May 2002, initiation of the additional field work was started. Written approval of this additional work plan addendum was received by the Municipality on 27 May 2002.

5.1 *ADDITIONAL INVESTIGATION FIELD WORK*

Based on the bid process, SLC Constructors, Inc. (SLC) of Lockport, New York, was selected to perform the January to April 2002 field work. The additional field work (May 2002) was also performed by SLC under a field order and all work was monitored and documented by InteGreyted on behalf of the Municipality.

Twenty-six (26) borings were advanced across areas requiring further delineation at the Site to characterize the horizontal and vertical extent of metals in soils. Selected soil borings were also used to assess the potential presence and extent of SVOCs and PCBs in Site soils. The approximate locations of the additional borings were presented at the 16 May 2002 meeting and are also presented on Figure 5-1.

(PROJECTED 3
B-2



The additional soil borings were advanced by SLC on 22 May 2002 at the 26 exterior locations across the site by utilizing a Ford F-350 pickup with a SIMCO Earthprobe 200 using direct push sampling techniques. Macro-Core™ samplers having a minimum inside diameter (ID) of 1.9 inches were used to obtain representative soil samples at each sampling interval. Soil samples were collected continuously at each boring location from grade to a completion depth of eight feet below grade or, in several instances where competent bedrock was encountered, at depths less than or greater than eight feet below grade. The Macro-Core™ samplers were used to collect the soil samples in accordance with generally accepted industry practices. Upon extraction from the borehole, a geologist logged each soil core. Soil type, color, moisture, staining and any other pertinent observations will be recorded on a boring log. Logs of each soil boring as prepared by SLC are presented in Attachment 1.

At each exterior boring location, soil samples were typically collected from depth intervals of 0 to 2 feet, 2 to 4 feet and 4 to 8 feet below grade. If insufficient or poor sample recovery occurs at a location, additional borings were advanced in an area immediately surrounding the initial boring in an effort to obtain a representative soil sample from the selected sampling interval. Soil samples from the selected sampling intervals were submitted to the analytical laboratory for analysis. At least one sample from a majority of the borings (from the 0-2' interval) was prepared for total metals analyses (arsenic, chromium, lead and mercury only); selected samples were also be submitted for SVOC analyses and / or PCB analyses based on location and required data needed.

Laboratory analyses is consisted of twenty –four (24) soil samples for the four selected metals, six (6) soil samples for SVOCs and five (5) samples for PCBs [**Note:** The addition of PCB analyses was at the request of the NYSDEC]. Additionally, five of the highest total metal samples were selected for metals analysis using the toxic characterization leaching potential (TCLP) method to evaluate the mobility of metals in

soil. Soil samples not sent for analyses were archived pending results of the first round of analyses.

Soil samples collected from selected locations during this additional investigation Phase of the SI/RAR were not submitted for laboratory analysis by Analytical Service Program (ASP) protocol, and analytical results were not subject to data validation because these data were generated only to support volume calculations. All other soil boring and soil sampling performed during this phase of the SI/RAR were conducted in accordance with the SAP.

Upon completion of the additional field work, the horizontal and vertical locations of all additional boring locations were surveyed on 7 June 2002. Vertical elevations were recorded to the nearest 0.01-foot. All surveying was performed by McIntosh Surveying, a New York State (NYS) licensed land surveyor under contract to SLC. Locations were referenced to the New York Trans Mercator (NYTM) coordinate system

Community air monitoring was conducted during implementation of the Additional Investigation Work Plan for the Richmond Avenue Site in Lockport, New York. Real-time air monitoring for particulate levels was conducted at the perimeter of the exclusion zone. This monitoring was conducted throughout the duration of all field activities that could result in generation of contaminated airborne particulates. In general, particulate monitoring was conducted during handling, excavation, movement or placement of all soil that may contain metal concentrations exceeding NYSDEC TAGM 4046 soil cleanup objectives.

Particulates were continuously monitored downwind of the exclusion zone with a portable particulate monitor that included an alarm set at 150 ug/m^3 . An MIE DataRAM having a detection range of 0.1 ug/m^3 to 399.9 ug/m^3 was used to monitor particulates downwind of field activities that could generate particulates with elevated metals concentrations. If downwind particulate levels, averaged over a period of 15 minutes, exceed 150 ug/m^3 , then particulate levels upwind of the survey or work site were planned

to be measured. If the downwind particulate level was more than 100 ug/m³ greater than the upwind particulate level, then intrusive activities would have been stopped and corrective action taken.

5.2 OBSERVATIONS AND RESULTS

5.2.1 Field Observations

Soil borings advanced during the additional investigation at the Site revealed up to eight feet of fill material (cobbles and boulders, limestone rock fragments from an off-site source, bricks, debris, sand and gravel) over soil containing clay, silt, sand and some gravel. Limestone bedrock was typically encountered at depths of six to eight feet below grade. Groundwater was not encountered in any of the test borings advanced on-site. Based on site topography, water level in the adjacent canal and site observations, groundwater below the Site is likely present in bedrock at a depth greater than 25 feet below ground surface.

All information gathered to date indicates that groundwater is not present in the materials overlying bedrock at the Site. It is likely that groundwater below the Site occurs in deep bedrock formations, at least 25 feet below the ground surface.

Real-time air monitoring for particulate levels was conducted at the perimeter of the exclusion zone. Particulate monitoring was conducted during handling, excavation, movement or placement of all soil that may contain metal concentrations exceeding NYSDEC TAGM 4046 soil cleanup objectives. Particulate readings occasionally indicated the presence of dust; however, particulate readings did not ever reach the action levels discussed in Section 2.5 above. All readings were recorded by SLC in their field logbook and are available for State (DEC and DOH) personnel to review.

5.2.2 *Analytical Results*

Table 5-1, present a summary of the laboratory analytical results for RCRA Metals collected from soil samples during this additional investigation. The Form 1s for all analytical results presented in Section 5.2.2 are presented in Attachment 2.

As shown on Table 5-1, concentrations of RCRA Metals above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 were detected in a portion of the 24 soil samples from the Test Borings. The detection of arsenic above the applicable NYS cleanup objective of 7.5 mg/kg was observed in 10 of the soil samples from the Test Borings. Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 8.11 to 37.1 mg/kg.

The detection of chromium above the applicable NYS cleanup objective of 50 mg/kg was observed in one of the soil samples from the Test Borings. This concentration above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 was 310 mg/kg.

The detection of lead above the applicable NYS cleanup objective of 400 mg/kg was observed in 11 of the soil samples from the Test Borings. Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 473 to 2960 mg/kg.

The detection of mercury above the applicable NYS cleanup objective of 0.10 mg/kg was observed in 20 of the soil samples from the Test Borings. Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 0.130 to 11.00 mg/kg.

TABLE 5-1

SI/RAR Sample Analytical Results - RCRA Metals - May 2002
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis Metals (mg/kg)	Sample ID									
	Cleanup Objective*	TB-02-1 0'-2'	TB-02-2 0'-2'	TB-02-3 0'-2'	TB-02-4 0'-2'	TB-02-5 0'-2'	TB-02-6 0'-2'	TB-02-7 0'-2'	TB-02-8 0'-2'	TB-02-9 0'-2'
Arsenic	7.5 or SB	3.26	11.50	8.17	5.14	6.53	8.58	10.20	32.50	5.13
Chromium	50 or SB	21.60	8.95	16.10	16.20	6.89	7.19	43.20	26.40	6.95
Lead	400** or SB	229	797	2,820	2,560	280	379	2,960	1,280	104
Mercury	0.10	0.240	3.900	3.900	11,000	ND	1,540	1,450	2,010	0.130
Analysis Metals (mg/kg)	Sample ID									
	Cleanup Standard*	TB-02-10 0'-2'	TB-02-11 0'-2'	TB-02-12 0'-2'	TB-02-13 0'-2'	TB-02-14 0'-2'	TB-02-17 0'-2'	TB-02-19 0'-2'	TB-02-20 0'-2'	TB-02-21 0'-2'
Arsenic	7.5 or SB	37.10	2.49	4.20	5.43	9.39	3.29	5.40	8.11	4.42
Chromium	50 or SB	31.40	6.20	5.27	11.30	15.40	4.80	11.40	19.00	15.90
Lead	400** or SB	637	303	1.18	473	1,320	30	138	1,710	164
Mercury	0.10	1.070	0.180	0.244	0.141	4,500	0.096	1.60	0.36	0.38
Analysis Metals (mg/kg)	Sample ID									
	Cleanup Standard*	TB-02-22 0'-2'	TB-02-22 4'-8'	TB-02-23 0'-2'	TB-02-24 0'-2'	TB-02-25 0'-2'	TB-02-26 0'-2'			
Arsenic	7.5 or SB	4.50	9.59	4.40	10.30	4.14	6.12			
Chromium	50 or SB	310.00	36.10	9.23	15.70	7.34	9.26			
Lead	400** or SB	137	745	81	659	109	69			
Mercury	0.10	ND	0.850	0.47	1.110	0.270	ND			

Notes: * Recommended Soil Cleanup Objective as per TAGM 4046

** Background levels for lead vary widely. The USEPA's Interim Lead Hazard Guidance (July 14, 1994) establishes a residential screening level of 400 ppm.

SB: Site Background. ND: Compound not detected.

11.60 Sample above Recommended Soil Cleanup objective.

Table 5-2 presents a summary of the laboratory analytical results for TCLP RCRA Metals collected from six soil samples (including the four highest (totals) chromium, lead and mercury samples) during this SI/RAR. All TCLP results were either not detected (ND) at laboratory detection limits or were detected well below Hazardous Waste Standards.

Table 5-3 presents a summary of the laboratory analytical results for SVOCs on soil samples collected from the Test Borings during this additional investigation. As shown on Table 5-3, concentrations of SVOCs above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 were detected in one of the 6 soil samples from the additional test borings. The detection of three compounds (Benzo(a)anthracene, Benzo(a)pyrene and Chrysene) above the applicable NYS cleanup objectives of 290, 290 and 400 ug/kg; respectively, was observed in TB-02-16 at 0'-2'.

Table 5-4 present a summary of the laboratory analytical results for poly-chlorinated bi-phenols (PCBs) collected from five specific soil sample locations during this additional investigation. As shown on Table 5-4, concentrations of PCBs were not detected above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046.

TABLE 5-2
SI/RAR Sample Analytical Results - TCLP Metals - May 2002
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Sample Id.							
	Haz. Waste Standard*	TB-02-1 0'-2'	TB-02-4 0'-2'	TB-02-7 0'-2'	TB-02-9 0'-2'	TB-02-19 0'-2'	TB-02-20 0'-2'
Analysis							
Metals (mg/l)							
Arsenic	5.00	NA	NA	NA	NA	NA	NA
Barium	100.00	NA	NA	NA	NA	NA	NA
Cadmium	1.00	NA	NA	NA	NA	NA	NA
Chromium	5.00	NA	NA	NA	ND	0.105	NA
Lead	5.00	ND	0.52	1.76	NA	NA	ND
Mercury	0.20	NA	ND	NA	NA	NA	NA
Selenium	1.00	NA	NA	NA	NA	NA	NA
Silver	5.00	NA	NA	NA	NA	NA	NA

Notes:

* Maximum Concentration of Contamination as presented in Table 1 of 40 CFR - Chapter 1 - Part 261.24

ND = Not Detected at laboratory detection limit.

NA = Not Analyzed.

TABLE 5-3
SI/RAR Sample Analytical Results - STARS SVOCs
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis	Sample ID						
	Cleanup Objective	TB-02-15 0'-2'	TB-02-16 0'-2'	TB-02-17 0'-2'	TB-02-18 0'-2'	TB-02-19 0'-2'	TB-02-22 0'-2'
Semi-Volatile Organic Compounds (ug/kg)							
Acenaphthalene	41,000	ND	ND	ND	ND	ND	ND
Acenaphthene	50,000	ND	70J	ND	ND	ND	ND
Anthracene	50,000	ND	180J	ND	ND	ND	ND
Benzo(a)anthracene	290 (MDL)	200J	540	190J	ND	ND	88J
Benzo(a)pyrene	290 (MDL)	230J	510	270J	ND	68J	100J
Benzo(b)fluoranthene	1,100	360	920	470	ND	87J	160J
Benzo(g,h,i)perylene	50,000	ND	280J	ND	ND	ND	ND
Benzo(k)fluoranthene	1,100	ND	280	ND	ND	ND	ND
Chrysene	400	290J	640	280J	ND	ND	110J
Dibenz(a,h)anthracene	14	ND	ND	ND	ND	ND	ND
Fluoranthene	50,000	440	1,100	230J	ND	ND	ND
Fluorene	50,000	ND	75J	ND	ND	ND	ND
Idene(1,2,3-cd)pyrene	3,200	ND	280J	160J	ND	ND	ND
Naphthalene	13,000	ND	94J	ND	ND	ND	ND
Phenanthrene	50,000	240J	740	160J	ND	110J	58J
Pyrene	50,000	440	1,600	240J	ND	ND	ND
Total SVOCs	50,000	2,200	7,309	2,000	ND	265	516
Carcinogenic PAHs	NS	2,200	7,309	2,000	ND	265	516
Benzo(a)pyrene Equivalents	NS	9.56	14.33	7.41	ND	3.90	5.16

Notes: * - New York State Soil Cleanup Objective as outlined in NYS TAGM HWR-94-4046, Appendix A, Tables 1 and 2. (MDL): Laboratory Method Detection Limit
 NS = No soil cleanup objective listed in NYS TAGM HWR-94-4046 ND= Not Detected above laboratory detection limits
 J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries greater than the advisory limits Sample above indicated Soil Cleanup Objective. NA= Not Analyzed or Not Applicable.
 B= Analyte detected in method blank.

TABLE 5-4

SI/RAR Sample Analytical Results - Pesticides and PCBs - May 2002
 Clean Water/Clean Air Bond Act - Application Number: B00154-9
 Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis PCBs (mg/kg or ug/wipe)	Sample Id.					
	Cleanup Objective*	TB-02-1 0'-1'	TB-02-10 0'-1'	TB-02-16 0'-1'	TB-02-21 0'-1'	TB-02-24 0'-1'
Aroclor-1016	1.00	ND	ND	ND	ND	ND
Aroclor-1221	1.00	ND	ND	ND	ND	ND
Aroclor-1232	1.00	ND	ND	ND	ND	ND
Aroclor-1242	1.00	ND	ND	ND	ND	ND
Aroclor-1248	1.00	ND	ND	ND	ND	ND
Aroclor-1254	1.00	ND	ND	ND	ND	ND
Aroclor-1260	1.00	ND	ND	ND	ND	ND
Total PCBs	1.00	ND	ND	ND	ND	ND

Notes:

* - New York State Soil Cleanup Objective as outlined in NYS TAGM HWR-94-4046, Appendix A, Table 3.

ND: Compound not detected.

6.0 ADDITIONAL INTERIM REMEDIAL MEASURES: October 2002

This section describes the remediation work performed under the Additional IRM activities as described in “Addendum No. 3, SI/RAR Work Plan Addendum, Lockport, NY,” dated 27 September 2002.

Data developed during the two earlier phases of field work, January to April 2002 and May to June 2002 (see Sections 3 and 5), indicated that elevated concentrations of arsenic, barium, chromium, lead, mercury, silver and several poly-nuclear aromatic hydrocarbon (PAH) compounds were present at various locations of the Site. In addition, the data also indicated that elevated concentrations of volatile organic compounds (VOCs) and one pesticide were present at isolated locations onsite.

Results of all sample analyses and data evaluations performed in the two earlier phases of fieldwork were presented to the NYSDEC by InteGreyted at two separate meetings. These meetings were held on 16 May 2002 at the 270 Michigan Avenue office of the NYSDEC in Buffalo, NY and on 27 June 2002 at the Greater Lockport Development Corporation (GLDC) office at One Lock Place in Lockport, NY. A review and Summary of the information presented at those meetings is presented below.

Summary tables for all laboratory analytical results collected from soil samples during the two earlier phases of the SI/RAR were developed and presented to the NYSDEC during the 16 May 2002 and 27 June 2002 informational meetings. These Summary Tables indicated that several RCRA Metals, semi-volatile organic compounds (SVOCs), VOCs and one pesticide were present in the Site soils at concentrations above NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 (NYSDEC TAGM value). A summary of the contaminants of concern detected, along with concentration ranges and frequency of samples exceeding cleanup objectives for samples collected during the initial investigation (January to April 2002) and the additional investigation

(May 2002), are provided on Table 6-1. A summary of the data by contaminant class is further detailed in the following sections.

Metals

The detection of arsenic above the NYSDEC TAGM value of 7.5 mg/kg was observed in twenty-nine (29) of the one-hundred (100) soil samples from the test borings (see Tables 3-1 and 5-1). Twenty (20) of the detections were encountered in the fifty-five (55) samples from 0'-2' below grade. Six (6) of the detections were encountered in the twenty-seven (27) samples from 2'-4' below grade and three (3) of the detections were encountered in the eighteen (18) samples at depths greater than four (4) feet below grade. Concentrations above the NYSDEC TAGM value ranged from 7.6 to 62 mg/kg.

The detection of barium above the NYSDEC TAGM value of 300 mg/kg was observed in six (6) of the soil samples from the test borings (see Tables 3-1 and 5-1). Four (4) of the detections were encountered in the thirty-two (32) samples from a depth of 0' to 2' below grade. One (1) of the detections was encountered in the twenty-seven (27) samples from a depth of 2' – 4' below grade and one (1) was detected in the seventeen (17) samples at depths greater than 4' below grade. Concentrations above the NYSDEC TAGM value ranged from 317 to 1,380 mg/kg.

The detection of chromium above the NYSDEC TAGM value of 50 mg/kg was observed in four (4) of the one hundred (100) soil samples from the test borings (see Tables 3-1 and 5-1). All four (4) detections were encountered in the fifty-five (55) samples obtained from a depth of 0'-2' below grade. Concentrations above the NYSDEC TAGM value ranged from 50.6 to 322 mg/kg.

The detection of lead above the NYSDEC TAGM value of 400 mg/kg was observed in twenty-eight (28) of the one hundred (100) soil samples from the test borings (see Tables 3-1 and 5-1). Twenty-one (21) of the detections were encountered in the fifty-five (55)

TABLE 6-1
SI/RAR Sample Analytical Results Summary - Site Investigation
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Surface Soil 0 - 2' Depth	Contaminants of Concern	Concentration Range Detected	SCG*	Frequency of Exceeding SCG*
Metals (ppm)	Arsenic	1.2 - 46	7.5	20 of 55
	Barium	22.4 - 654	300	4 of 32
	Chromium	4.73 - 322	50	4 of 55
	Lead	10.9 J - 4,120 J	400	21 of 55
	Mercury	ND - 11	0.1	41 of 55
	Silver	ND - 3.47	SB 0.9	4 of 32
Semi-Volatile Organic Compounds (SVOCs) (ppb)	Benzo(a)anthracene	ND - 2,100	224 or MDL (290)	2 of 9
	Benzo(a)pyrene	ND - 1,700	61 or MDL (290)	2 of 9
	Benzo(b)fluoranthene	ND - 3,100	1,100	1 of 9
	Benzo(k)fluoranthene	ND - 980	1,100	0 of 9
	Chrysene	ND - 2,100	400	1 of 9
	Dibenzo(a, h)anthracene	ND - 190 J	14	1 of 9
Volatile Organic Compounds (VOCs) (ppb)	Pentachlorophenol	ND - 3,600	1,000	1 of 6
	1,2,4 Trimethylbenzene	ND	10,000	0 of 3
	Ethylbenzene	ND	5,500	0 of 3
	M, O, P - Xylenes	ND	1,200	0 of 3
	Total VOCs	ND - 13	10,000	0 of 3
	PCBs (ppm)	ND	1	0 of 8
Pesticides (ppm)	4, 4' DDT	ND - 2.9 J	2.1	1 of 3

Notes.

*: SCG = Standards, criteria or guidance The New York State Soil Cleanup Objectives as outlined in NYS TAGM HWR-94-4046, Appendix A, were utilized as the applicable SCGs.

ND: Compound Not Detected

NA: Not Analyzed

(MDL): Laboratory Detection Limit

SB Site Background

J = Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRs samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

TABLE 6-1
SI/RAR Sample Analytical Results Summary - Site Investigation
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Subsurface Soil 2' - 4' Depth	Contaminants of Concern	Concentration Range Detected	SCG*	Frequency of Exceeding SCG*
Metals (ppm)	Arsenic	2.8 - 14	7.5	6 of 27
	Barium	691.13 - 1,380 J	300	1 of 27
	Chromium	ND - 38.7 J	50	0 of 27
	Lead	3.9 J - 1,910 J	400	6 of 27
	Mercury	ND - 3.44	0.1	16 of 27
	Silver	ND - 3.73	SB 0.9	4 of 27
Semi-Volatile Organic Compounds (SVOCs) (ppb)	Benzo(a)anthracene	ND	224 or MDL (290)	0 of 1
	Benzo(a)pyrene	ND	61 or MDL (290)	0 of 1
	Benzo(b)fluoranthene	ND	1,100	0 of 1
	Benzo(k)fluoranthene	ND	1,100	0 of 1
	Chrysene	ND	400	0 of 1
	Dibenzo(a, h)anthracene	ND	14	0 of 1
	Pentachlorophenol	ND	1,000	0 of 1
	1,2,4 Trimethylbenzene	ND	10,000	0 of 1
Volatile Organic Compounds (VOCs) (ppb)	Ethylbenzene	ND	5,500	0 of 1
	M,O,P - Xylenes	ND	1,200	0 of 1
	Total VOCs	ND	10,000	0 of 1
PCBs (ppm)	PCBs	ND	10	0 of 1
Pesticides (ppm)	4, 4' DDT	NA	2.1	0 of 0

Notes.

*. SCG = Standards, criteria or guidance. The New York State Soil Cleanup Objectives as outlined in NYS TAGM HWR-94-4046, Appendix A, were utilized as the applicable SCGs.

ND: Compound Not Detected

NA: Not Analyzed

(MDL): Laboratory Detection Limit

SB: Site Background

J = Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDC samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

TABLE 6-1
SI/RAR Sample Analytical Results Summary - Site Investigation
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Subsurface Soil > 4' Depth	Contaminants of Concern	Concentration Range Detected	SCG*	Frequency of Exceeding SCG*
Metals (ppm)	Arsenic	1.9 - 62	7.5	3 of 18
	Barium	9.72 BJ - 351	300	1 of 17
	Chromium	2.52 - 36	50	0 of 18
	Lead	5 - 1,200 J	400	1 of 18
	Mercury	ND - 0.885 J	0.1	6 of 18
	Silver	ND - 0.78 BJ	SB 0.9	0 of 17
Semi-Volatile Organic Compounds (SVOCs) (ppb)	Benzo(a)anthracene	ND - 5,300	224 or MDL (290)	3 of 12
	Benzo(a)pyrene	ND - 4,100	61 or MDL (290)	2 of 12
	Benzo(b)fluoranthene	ND - 7,300	1,100	3 of 12
	Benzo(k)fluoranthene	ND - 2,800	1,100	1 of 12
	Chrysene	ND - 5,400	400	3 of 12
	Dibenzo(a,h)anthracene	ND - 510 J	14	3 of 12
	Pentachlorophenol	ND	1,000	0 of 12
Volatile Organic Compounds (VOCs) (ppb)	1,2,4 Trimethylbenzene	ND - 70,000 J	10,000	1 of 12
	Ethylbenzene	ND - 11,000 J	5,500	1 of 12
	M,O,P - Xylenes	ND - 45,600 J	1,200	1 of 12
	Total VOCs	ND - 1,003,100	10,000	3 of 12
PCBs (ppm)	PCBs	ND	10	0 of 1
Pesticides (ppm)	4,4' DDT	NA	2.1	0 of 0

Notes:
 *. SCG = Standards, criteria or guidance The New York State Soil Cleanup Objectives as outlined in NYS TAGM HWR 94-4046, Appendix A, were utilized as the applicable SCGs.
 ND: Compound Not Detected
 NA Not Analyzed
 (MDL): Laboratory Detection Limit
 SB: Site Background
 J = Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRC samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

samples from a depth of 0'-2' below grade. Six (6) of the detections were encountered in the twenty-seven (27) samples from 2'-4' below grade and one (1) detection was encountered in the eighteen (18) samples at depths greater than four (4) feet below grade. Concentrations above the NYSDEC TAGM value ranged from 432 to 4120 mg/kg.

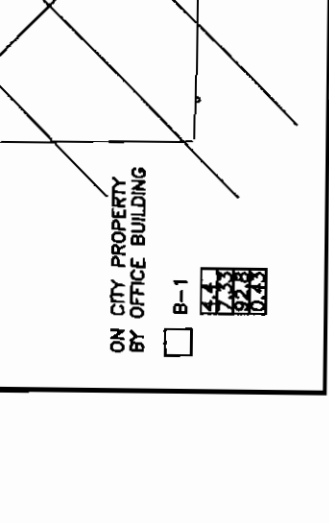
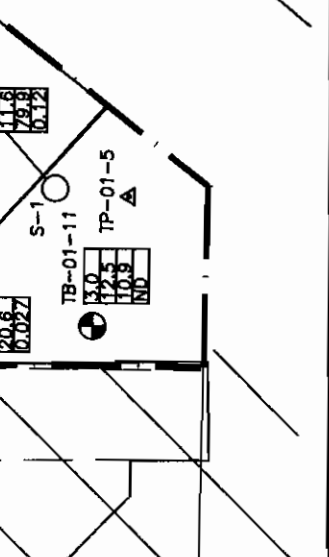
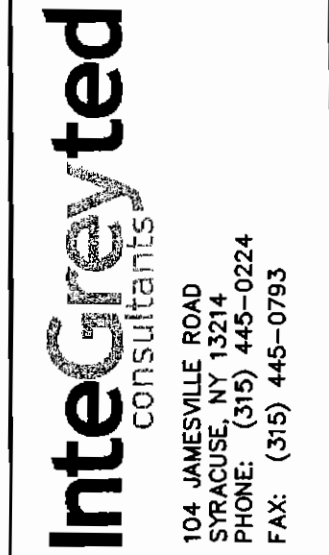
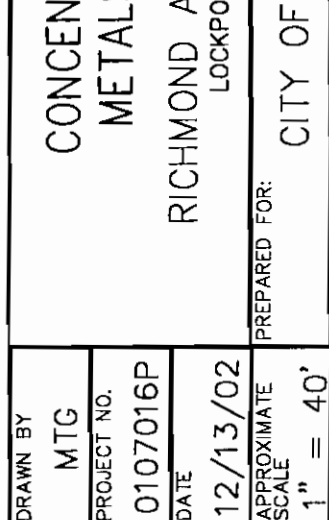
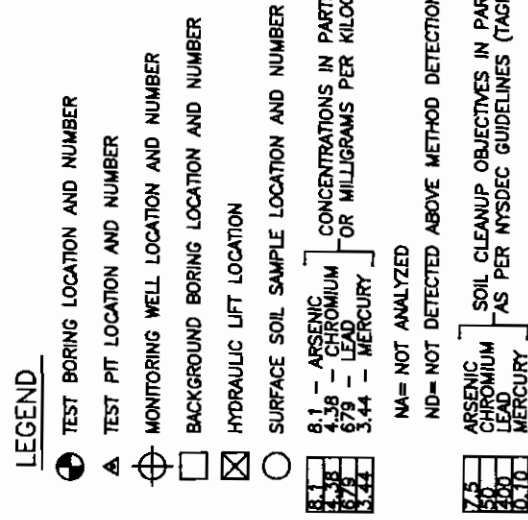
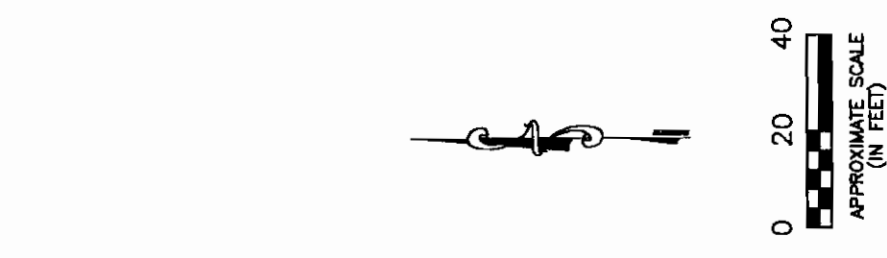
The detection of mercury above the NYSDEC TAGM value of 0.10 mg/kg was observed in sixty-three (63) of the one hundred (100) soil samples from the test borings (see Tables 3-1 and 5-1). Forty-one (41) of the detections were encountered in the fifty-five (55) samples from 0'-2' below grade. Sixteen (16) of the detections were encountered in the twenty-seven (27) samples from 2'-4' below grade and six (6) of the detections were encountered in the eighteen (18) samples at depths greater than four (4) feet below grade. Concentrations above the NYSDEC value ranged from 0.112 to 11.00 mg/kg.

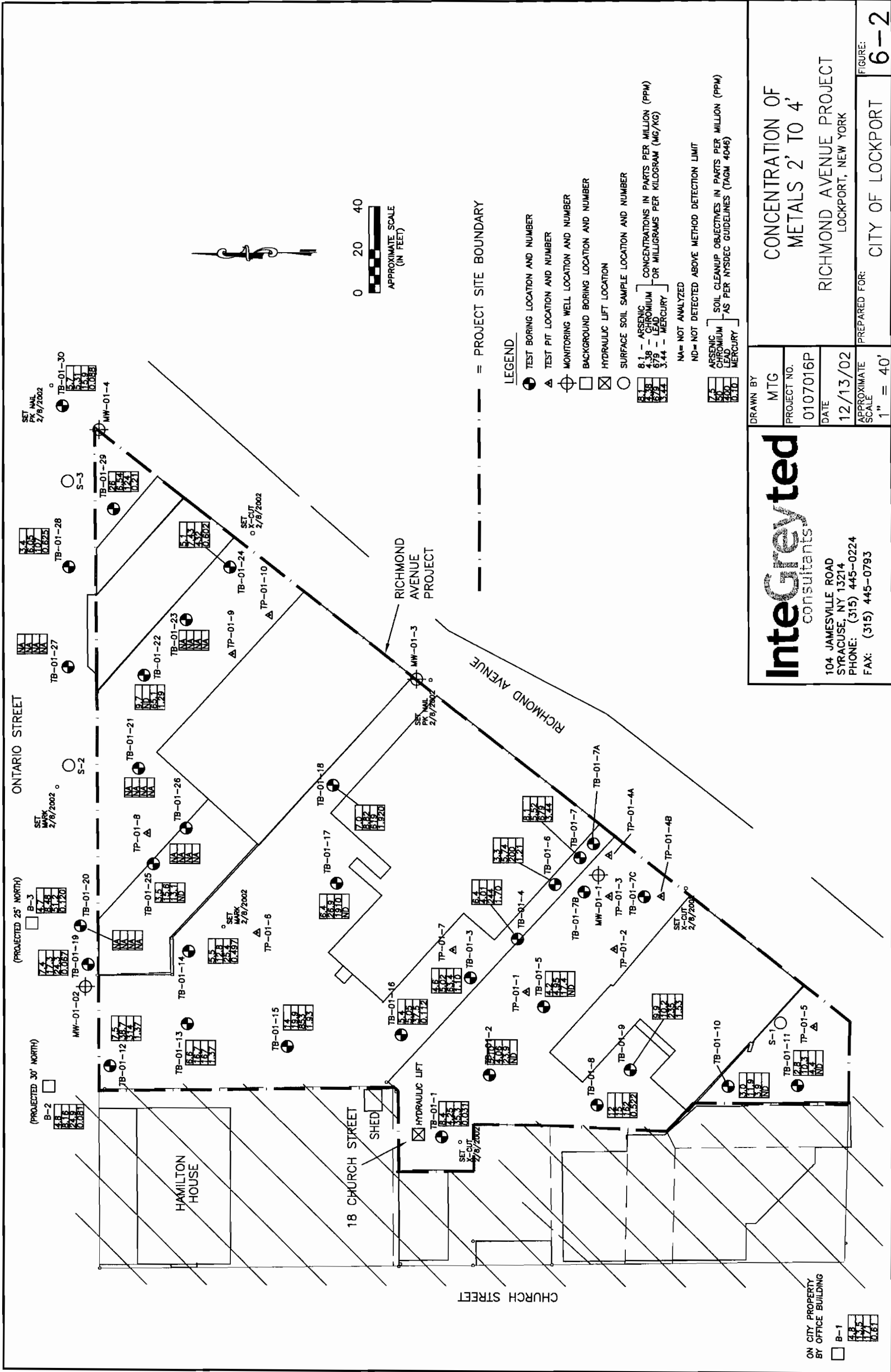
The detection of silver above the NYSDEC TAGM value of 0.9 mg/kg (site background) was observed in eight (8) of the samples from the test borings (see Tables 3-1 and 5-1). Four (4) of the detections were encountered in thirty-two (32) of the samples from a depth of 0' – 2' below grade and four (4) were detected in the twenty-seven (27) samples at depths between 2' and 4' below grade. Concentrations above the NYSDEC TAGM value ranged from 1.13 to 3.73 mg/kg.

Concentrations of arsenic, chromium, lead and mercury at the 0'-2' depth interval are presented on Figure 6-1. Concentrations of arsenic, chromium, lead and mercury at 2'-4' below grade are presented on Figure 6-2 and concentrations of arsenic, chromium, lead and mercury at depths greater than 4' are presented on Figure 6-3.

Semi-Volatile Organic Compounds

Laboratory analytical results (See Tables 3-3 and 5-3) for semi-volatile organic compounds (SVOCs) analyzed in the first two phases of the SI/RAR indicated





ON CITY PROPERTY BY OFFICE BUILDING

B-1

4.8
13.5
17.1
0.61

CONCENTRATION OF METALS 2' TO 4'

RICHMOND AVENUE PROJECT
LOCKPORT, NEW YORK

PREPARED FOR: CITY OF LOCKPORT

DRAWN BY: MTG

PROJECT NO.: 0107016P

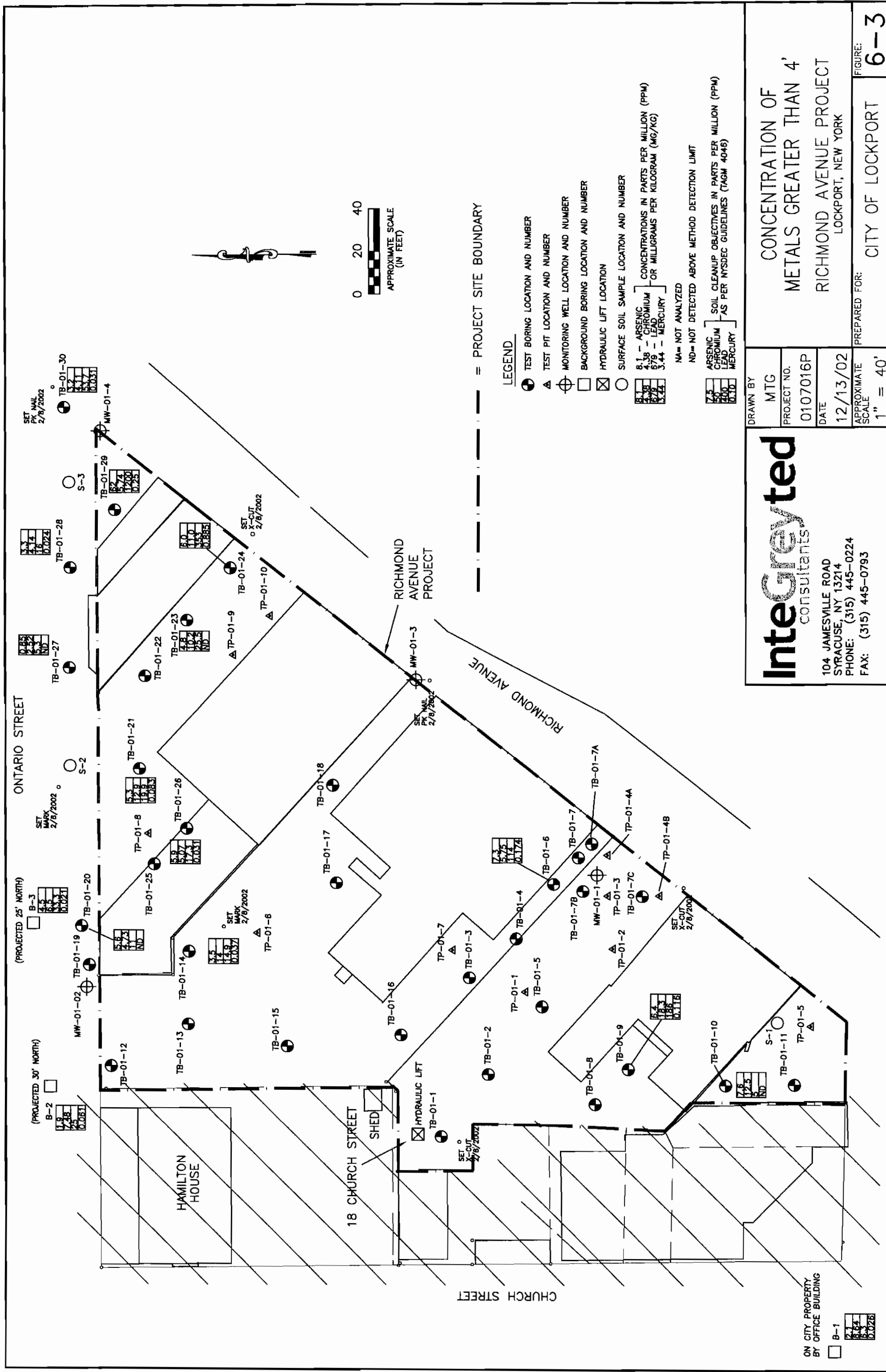
DATE: 12/13/02

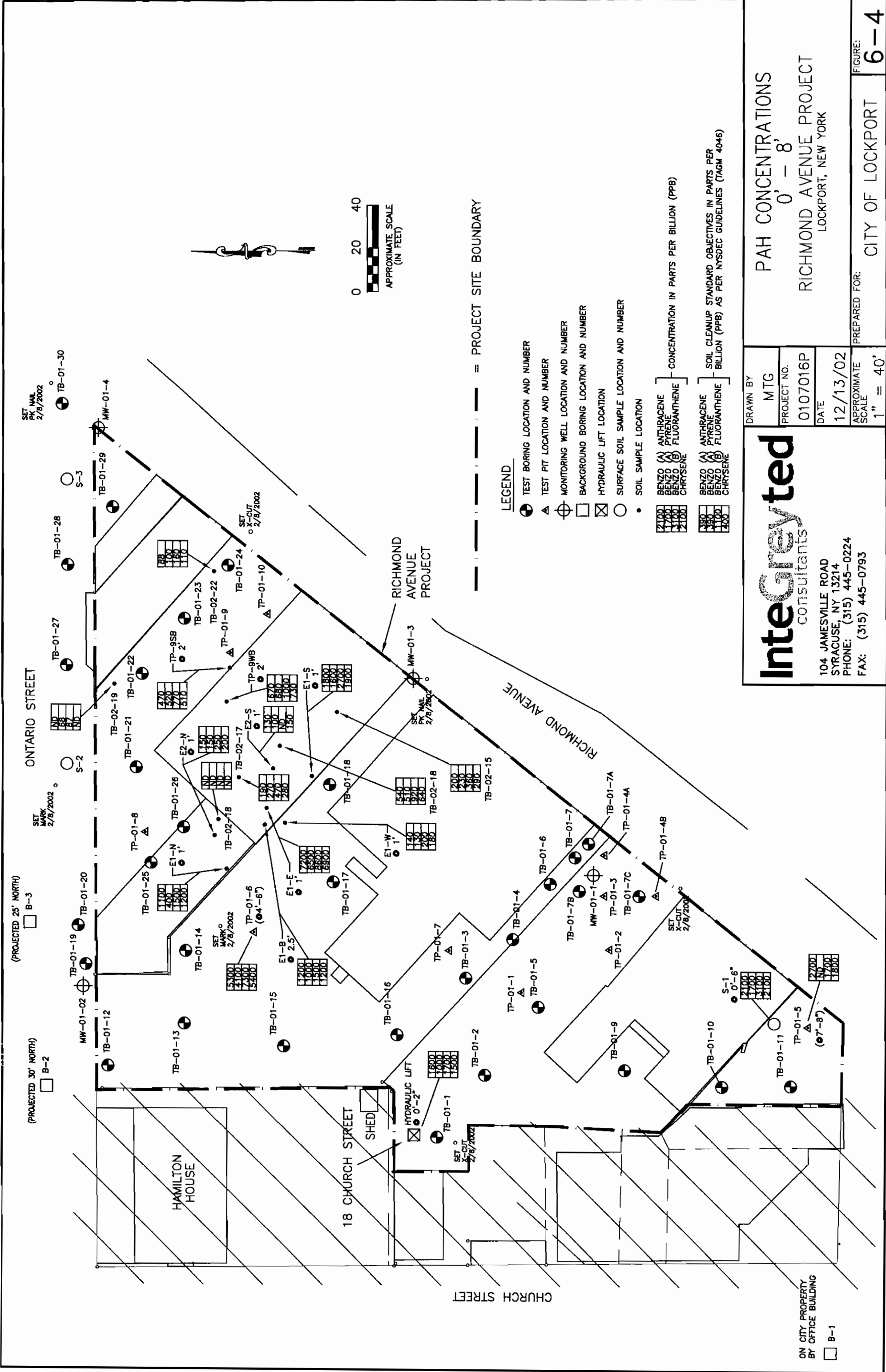
APPROXIMATE SCALE: 1" = 40'

FIGURE: 6-2

InteGrated
consultants

104 JAMESVILLE ROAD
SYRACUSE, NY 13214
PHONE: (315) 445-0224
FAX: (315) 445-0793





ON CITY PROPERTY BY OFFICE BUILDING

B-1

InteGready consultants

104 JAMESVILLE ROAD
SYRACUSE, NY 13214
PHONE: (315) 445-0224
FAX: (315) 445-0793

DRAWN BY

MTG

PROJECT NO.

0107016P

DATE

12/13/02

APPROXIMATE SCALE

1" = 40'

PAH CONCENTRATIONS

0' - 8'

RICHMOND AVENUE PROJECT

LOCKPORT, NEW YORK

PREPARED FOR:

CITY OF LOCKPORT

FIGURE:

6-4

concentrations of SVOCs above the laboratory method detection limit (MDL) or at concentrations above NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 in a portion of the twenty-two (22) soil samples from Test Borings, Test Pits, Monitoring Wells, Surface, and Hydraulic Lift areas. The detection of two compounds (Benzo(a)anthracene and Benzo(b)fluoranthene) above the MDL value or at concentrations above NYSDEC soil cleanup objectives of 224 or MDL of 290 and 1,100 ug/kg; respectively, was observed in five (5) of the twenty-two (22) soil samples. These five soil locations were TP-01-5 at 7'-8' deep; TP-01-6 at 4'-6' deep; S-01-1 at 0'-6" deep; HL-2, Composite; and TB-02-16 at 0'-2' deep. Concentrations above the MDL value or at concentrations above NYSDEC soil cleanup objectives ranged from 540 to 7,300 ug/kg.

Five additional SVOCs were encountered above the MDL value or at concentrations above NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046. These SVOCs were Benzo(a)pyrene at concentrations of 510 to 4,100 ug/kg; Benzo(k)fluoranthene at a concentration of 2,800 ug/kg; Chrysene at concentrations of 640 to 5,400 ug/kg; Dibenzo(a, h) anthracene at concentrations of 190 to 510 ug/kg; and Pentachlorophenol at a concentration of 3,600 ug/kg. The MDL values or concentrations as noted in the NYSDEC soil cleanup objectives for these compounds are 61 or MDL of 290, 1,100, 400, 14 and 1,100 ug/kg, respectively.

Concentrations of SVOCs encountered at 0'-8' below grade in the two initial phases of the SI/RAR are presented on Figure 6-4.

Volatile Organic Compounds

Laboratory analytical results (see Table 3-3) for volatile organic compounds (VOCs) analyzed in the first two phases of the SI/RAR indicated concentrations of VOCs above the laboratory detection limit (MDL) or at concentrations above NYSDEC soil cleanup

objectives as specified in NYSDEC TAGM HWR-94-4046 in a portion of the sixteen (16) soil samples from test borings, test pits, monitoring wells, surface and hydraulic lift areas. Three VOCs were encountered above the applicable NYSDEC soil cleanup objectives in the sample at a depth of 11 feet below grade from the MW-01-1 location. These VOCs were 1,2,4 – Trimethylbenzene at a concentration of 70,000 ug/kg, ethylbenzene at a concentration of 11,000 ug/kg and m+o+p Xylene at a concentration of 45,600 ug/kg. The soil cleanup objectives for these compounds are 10,000, 5,500 and 1,200 ug/kg; respectively.

Total VOCs were encountered above the applicable NYSDEC cleanup objective of 10,000 ug/kg in three of the sixteen sample locations. These locations included TP-01-4 at 11'-12'; MW-01-1 at 11' and TB-01-16 at 12'. The concentrations were 151,600; 1,003,100 and 19,000 ug/kg, respectively.

Pesticides / PCBs

Laboratory analytical results (see Tables 3-4 and 5-4) for pesticides and PCBs analyzed in the first two phases of the SI / RAR indicated concentrations of pesticides above the laboratory detection limit (MDL) or at concentrations above NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 in one of the three surface soil sampling areas. 4,4'-DDT was detected in Sample S-01-1 at a depth of 0" – 6" at a concentration of 2.90 mg/kg, which is above the NYSDEC cleanup objective of 2.10 mg/kg.

PCBs were not detected in any of the soil samples analyzed during the SI / RAR.

InteGreyted prepared a Work Plan describing additional IRM activities to address shallow soil conditions. This Work Plan, dated 27 September 2002, was approved by the NYSDEC and presented to the community in an availability session held on 10 October

2002 from 4:00 to 6:30 p.m. at the Lockport Municipal Building in the City of Lockport, New York. Representatives of the NYSDEC, the NYSDOH, and the Greater Lockport Development Corporation, along with the Mayor of the City of Lockport, the Commissioner of Public Works of the City of Lockport, and several members of the public (four to six individuals) attended this meeting. Mr. Dan King of the NYSDEC discussed a community facts sheet and answered relevant questions. A copy of the information presented at the availability session is presented along with the SAC in Appendix A, Part B.

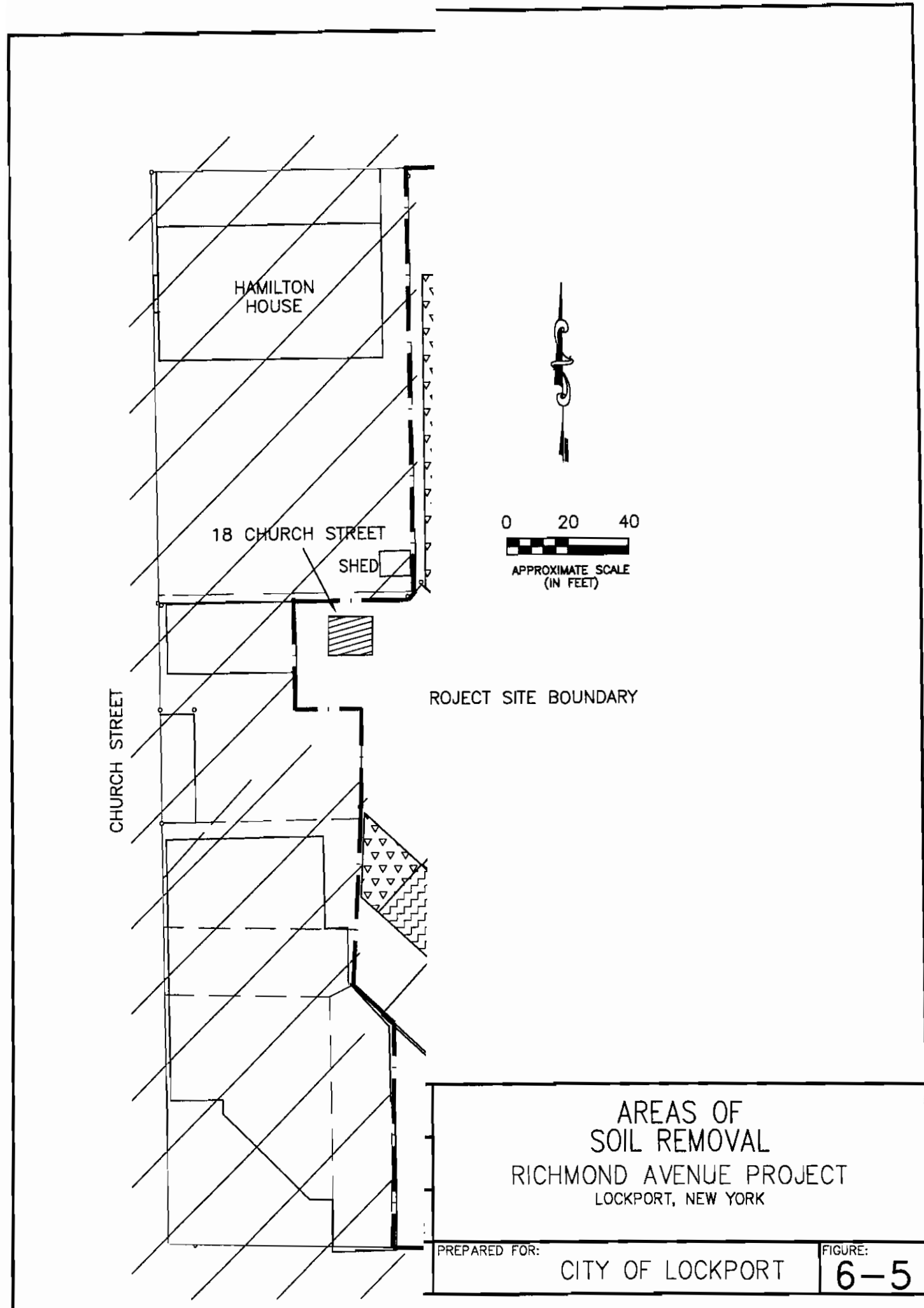
Areas of soil removal were divided into three categories based on the results of laboratory testing: 1) Non-Hazardous Metal Soils; 2) Petroleum-contaminated Soil and 3) Hazardous Metal Soils. The areas of soil removal are shown in Figure 6-5.

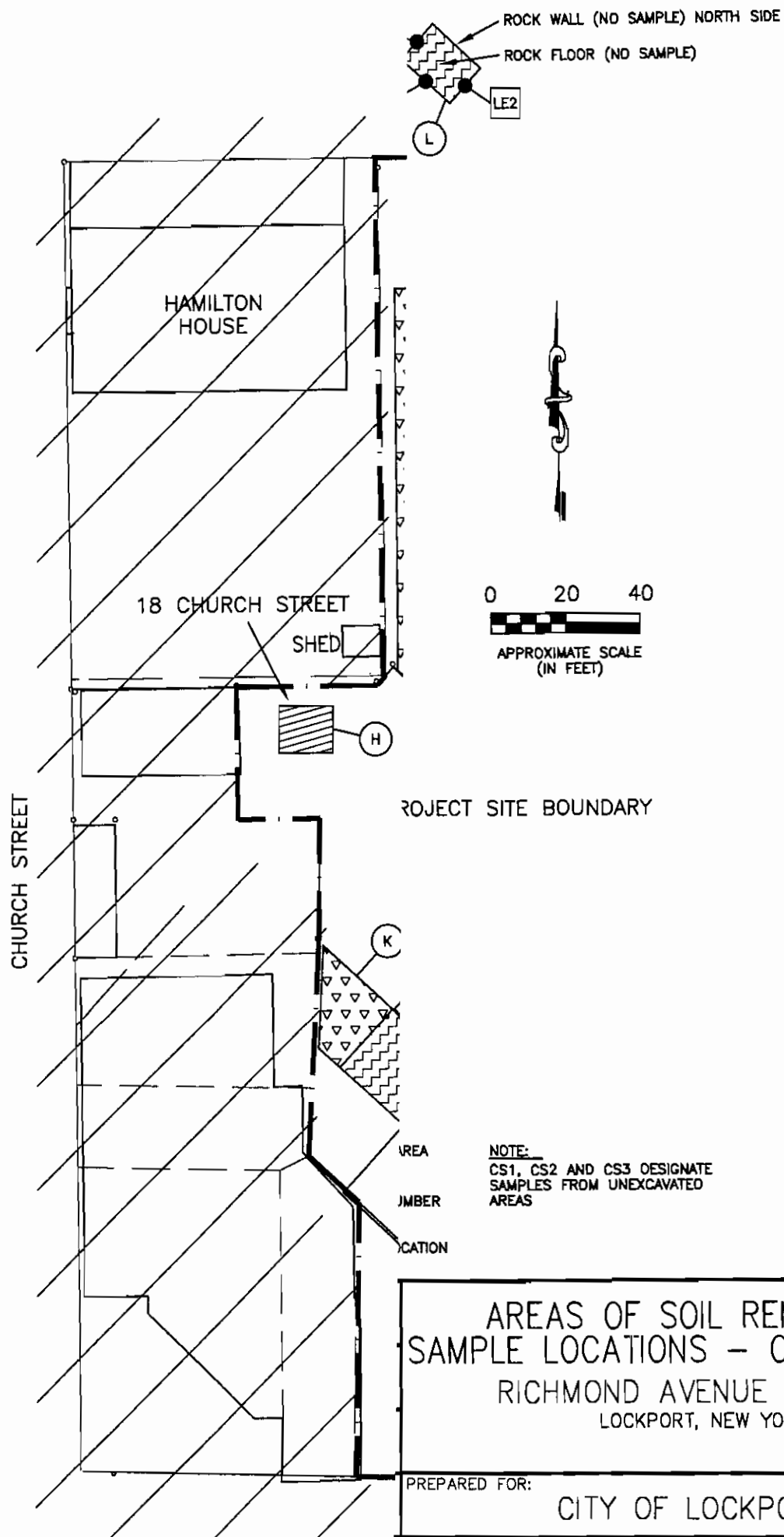
Some confirmatory samples were provided in excavated and unexcavated areas to document the concentrations of analytes remaining below the excavated areas and to confirm that any residual concentrations near the surface were in the range of concentrations detected during the initial two phases of the SI/RAR. The actual number and location of these samples was determined in the field by the NYSDEC and InteGreyted project managers.

Analytes of concern in these areas were as follows:

Metals:

- Arsenic
- Barium
- Chromium
- Lead
- Mercury
- Silver





Semi-Volatiles:

- Benzo(a)anthracene
- Benzo(a)pyrene
- Benzo(b)fluoranthene
- Benzo(k)fluoranthene
- Chrysene
- Dibenzo(a, h)anthracene
- Pentachlorophenol

Volatiles:

- 1, 2, 4 – trimethylbenzene
- ethylbenzene
- Xylenes

Pesticides:

- 4, 4'-DDT

Laboratory Test results for the October 2002 IRM are presented in Section 6.1.5 below.

6.1 FIELD WORK – OCTOBER 2002

The following work was implemented under the October 2002 IRM:

- Removal of soils exceeding TCLP criteria;
- Removal of soils 0 to 2 feet depth exceeding TAGM 4046 guidance values; and
- Backfill of all excavations with clean soil fill.

The completed IRM provided for:

- Elimination of direct exposure threat from surface soil contamination;

- Reduction in contaminant concentration in the upper two feet of soil to levels below or near TAGM levels;
- Limited residual contamination in soils below two feet;
- Elimination of soils designated as hazardous waste; and
- Establishing residual levels of contamination that are acceptable for future planned use of the properties.

Matt Forcucci from NYSDOH was on site 22 October 2002. Jim Tuk and Abul Barkat from the NYSDEC were on site several times during remediation activities. Jim Tuk from NYSDEC was on site during excavation of the hazardous areas and directly observed and commented on the excavation of Area L.

All areas to be excavated were surveyed by the survey crew prior to 22 October and marked off in the field with paint. All the non-hazardous areas and petroleum areas were excavated to a depth of two feet below surface. The hazardous area west of the former Kohl building (49 Richmond Avenue) was excavated to a depth of two feet below surface. The hazardous area at the west end of the former 69 Richmond Avenue was excavated to a depth of about 12 feet below surface. All areas were backfilled with clean soil and graded on 24 October. The hazardous area (Area L) was excavated and backfilled on 31 October. The total volume of non-hazardous and petroleum material removed is estimated as 1,899.53 tons and backfill in place is estimated as 1,111 cubic yards. The hazardous soil weight is 195.53 tons.

6.1.1 *Non-Hazardous Metal Soils*

Six areas of non-hazardous soil were removed. The areas are designated A, C, E, G, J, and K as shown on Figure 6-6. The non-hazardous metal soils were excavated and disposed off-site and the excavation areas were backfilled with clean soil and graded. Non-hazardous metal soils were excavated by SLC using a Komatsu 400 backhoe, transported by permitted haulers and disposed off-site at an approved disposal facility

(Modern Landfill, Inc.). Documentation is provided in Attachment 4. Soil was direct-loaded and transported to the disposal facility by haulers under contract with Modern Disposal Services, Inc. There was no water in the excavation at any time. Level D personal protection was used during excavation and backfill. Air monitoring was performed using a PDM-3 dust meter, but due to the dust control provided by intermittent light rain over the course of the work, only a few readings were deemed necessary. All dust monitoring readings showed 1.0 ug/cm. Upon completion of excavation activities, five confirmation soil samples were collected from the excavation areas (Areas A, C, E, and J at locations where previous sampling showed the highest concentrations) to document the residual concentrations of analytes left in soil below the two-foot depth. Soil samples collected during this IRM were submitted for laboratory analysis by Analytical Services Program (ASP) protocol. Each sample was analyzed for the six metals, two VOCs and seven SVOCs listed above in Section 6.0. The analytical results were subject to data validation as described in the original Work Plan SAP and QAPP. All soil sampling procedures relative to this IRM were conducted in accordance with the approved SAP. The excavation was backfilled with imported “clean” backfill from MKB, Inc. Sand & Gravel. Backfill was placed in one-foot loose lifts and compacted with a minimum of four passes of a vibratory roller. Backfill documentation including the chemical testing of the backfill is included in Attachment 4. Field in-place density measurements were made by Quality Inspection Services, Inc. following compaction of backfilled soil. A total of 15 tests were made in the non-hazardous excavation areas. The percent compaction ranged from 95.1 to 99.5.

6.1.2 *Petroleum-Contaminated Soil*

Four areas of petroleum-contaminated soil were removed. The areas are designated B, D, H, and I as shown on Figure 6-6. The petroleum-contaminated soils were excavated, disposed, and the excavation was backfilled with clean soil and graded. Petroleum-contaminated soils were removed by SLC using a Komatsu 400 backhoe, transported by permitted haulers and disposed off-site at an approved disposal facility (Modern Landfill,

Inc.). Documentation is provided in Attachment 4. Soil was direct-loaded and transported to the disposal facility by haulers under contract with Modern Disposal Services, Inc. There was no water in the excavation at any time. Level D personal protection was used during excavation and backfill. Air monitoring was performed using a PDM-3 dust meter, but due to the dust control provided by intermittent light rain over the course of the work, only a few readings were deemed necessary. All dust monitoring readings taken showed 1.0 µg/cm. Upon completion of excavation activities, one confirmation soil sample was collected from excavation area D to document the residual concentrations of analytes left in soil below the two-foot depth. Soil samples collected during this IRM were submitted for laboratory analysis by Analytical Services Program (ASP) protocol. Each sample was analyzed for the six metals and seven SVOCs listed above in Section 6.0, and the analytical results were subject to data validation as described in the original Work Plan SAP and QAPP. All soil sampling procedures relative to this IRM were conducted in accordance with the approved SAP. The excavation was backfilled with imported “clean” backfill from MKB, Inc. Sand & Gravel. Backfill was placed in one-foot loose lifts and compacted with a minimum of four passes of a vibratory roller. Backfill documentation including the chemical testing of the backfill is included in Attachment 4. Field in-place density measurements were made by Quality Inspection Services, Inc. following compaction of backfilled soil. One test was made in the petroleum-contaminated area D and the percent compaction was 95. A small portion of Area E (easternmost end) could not be rolled since the roller would not fit the excavation. In this case the backhoe was used to compact the soil by using successive blows of the back of the bucket.

6.1.3 *Hazardous Metal Contaminated Soil*

Two areas of hazardous soils were removed. The areas are designated F and L as shown on Figure 6-6. Hazardous soils were excavated and disposed off-site and the excavation areas were backfilled with clean soil and graded. Hazardous soils were excavated by SLC Environmental Services using a Komatsu 400 backhoe, transported by permitted haulers

and disposed off-site at an approved disposal facility (CWM Chemical Services, LLC.). Documentation is provided in Attachment 4. Soil was direct-loaded, with the exception of soils from Area F which due to space restrictions, were first stockpiled on plastic and transported to the disposal facility by haulers under contract with CWM Chemical Services, LLC. There was no water in the excavation at any time. Level D personal protection was used during excavation and backfill. Air monitoring was performed using a PDM-3 dust meter, but due to the dust control provided by intermittent light rain over the course of the work, only a few readings were deemed necessary. All dust monitoring readings taken showed 1.0 µg/cm. Upon completion of excavation activities, one confirmation soil sample was collected from Area F and three confirmation samples were collected from Area L. The sample from Area F was analyzed for the six metals and seven SVOCs listed above in Section 6.0, and the samples from Area L were also analyzed for TCLP metals. Analytical results were subject to data validation as described in the original Work Plan SAP and QAPP. All soil sampling procedures relative to this IRM were conducted in accordance with the approved SAP. The excavation was backfilled with imported “clean” backfill from MKB, Inc. Sand & Gravel. Backfill was placed in one-foot loose lifts and compacted with a minimum of four passes of a vibratory roller. Backfill documentation including the chemical testing of the backfill is included in Attachment 4. Field in-place density measurements were made by Quality Inspection Services, Inc. following compaction of backfilled soil. A total of two tests were made in the hazardous excavation areas. The percent compaction was 100 for both tests. The roller could not be placed in the deep excavation at Area L so each lift was compressed with successive blows from the back of the backhoe bucket (58-inch bucket).

6.1.4 Additional Sampling

Some confirmatory samples were taken in unexcavated areas to confirm any additional concentrations near the surface were in the range of concentrations detected during the initial two phases of the SI/RAR. Three samples were taken from surface to 2-foot depth at three locations approved by Abul Barkat at the NYSDEC and observed by Jim Tuk,

NYSDEC. The three samples were analyzed for RCRA metals per discussions with Mr. Barkat. The sample locations are shown on Figure 6-6 and labeled as CS-1, CS-2, and CS-3. Discussions of these results are presented in Section 6.1.5 with the sample results presented on Table 6-5.

6.1.5 Additional IRM Analytical Results

A summary of the contaminants of concern detected, along with concentration ranges and frequency of samples exceeding cleanup objectives for samples collected during implementation of additional interim remedial measures (October 2002), are provided on Table 6-2. A detailed summary of the analytical data is further detailed in the following sections.

Non-Hazardous Metal Excavations

Table 6-3 presents a summary of the laboratory analytical results for samples collected from the Non-Hazardous Metal Excavations during the October 2002 IRM. The Form 1s for all analytical results associated with the October 2002 IRM in this Section are presented in Attachment 2.

As shown on Table 6-3, concentrations of RCRA Metals above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 were detected in all five of the soil samples from the bottom of each excavation. The detection of arsenic above the applicable NYS cleanup objective of 7.5 mg/kg was observed in all five of the soil samples with concentrations above the soil cleanup objective ranging from 8.59 to 12.2 mg/kg.

The detection of lead above the applicable NYS cleanup objective of 400 mg/kg was observed in four of the five soil samples from the bottom of each excavation.

TABLE 6-2
SI/RAR Sample Analytical Results Summary - Additional IRMs
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Surface Soil 0 - 2' Depth	Contaminants of Concern	Concentration Range Detected	SCG*	Frequency of Exceeding SCG*
Metals (ppm)	Arsenic	4.58 - 12.10	7.5	2 of 3
	Barium	44 J - 115 J	300	0 of 3
	Chromium	7.5 - 14.2	50	0 of 3
	Lead	79.9 - 569	400	1 of 3
	Mercury	ND - 0.250	0.1	1 of 3
	Silver	ND	SB 0.9	0 of 3
Semi-Volatile Organic Compounds (SVOCs) (ppb)	NA	NA	NA	0 of 0
Volatile Organic Compounds (VOCs) (ppb)	NA	NA	NA	0 of 0
Pesticides (ppm)	4, 4' DDT	NA	NA	0 of 0
TCLP Lead (ppm)	Lead	NA	5	0 of 0

Notes:

*: SCG = Standards, criteria or guidance. The New York State Soil Cleanup Objectives as outlined in NYS TAGM HWR-94-4046, Appendix A, were utilized as the applicable SCGs.

ND: Compound Not Detected

NA: Not Analyzed

(MDL): Laboratory Detection Limit

SB: Site Background

J = Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRC samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits

TABLE 6-2
SI/RAR Sample Analytical Results Summary - Additional IRMs
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Subsurface Soil 2' - 4' Depth	Contaminants of Concern	Concentration Range Detected	SCG*	Frequency of Exceeding SCG*
Metals (ppm)	Arsenic	3.6 - 12.2	7.5	6 of 7
	Barium	40.6 J - 240 J	300	0 of 7
	Chromium	7.1 J - 49.1 J	50	0 of 7
	Lead	99.6 J - 1,990 J	400	4 of 7
	Mercury	0.19 - 3.30	0.10	7 of 7
	Silver	ND	SB 0.9	0 of 7
	Selenium	ND	SB 0.9	0 of 7
Semi-Volatile Organic Compounds (SVOCs) (ppb)	Benzo(a)anthracene	ND - 11,000	224	5 of 7
	Benzo(a)pyrene	ND - 12,000	61 or MDL (290)	5 of 7
	Benzo(b)fluoranthene	ND - 12,000	1,100	3 of 7
	Benzo(k)fluoranthene	ND - 4,800	1,100	3 of 7
	Chrysene	ND - 12,000	400	5 of 7
	Dibenzo(a,h)anthracene	ND	14	0 of 7
	Pentachlorophenol	ND	1,000	0 of 7
Volatile Organic Compounds (VOCs) (ppb)	1,2,4 Trimethylbenzene	ND	10,000	0 of 7
	Ethylbenzene	ND	5,500	0 of 7
Pesticides (ppm)	4, 4' DDT	ND	2.1	0 of 1
TCLP Lead (ppm)	Lead	ND	5	0 of 1

Notes:
 *: SCG = Standards, criteria or guidance. The New York State Soil Cleanup Objectives as outlined in NYS TAGM 11WR-94-4046, Appendix A, were utilized as the applicable SCGs.
 ND= Compound Not Detected
 NA = Not Analyzed
 (MDL)= Laboratory Detection Limit
 SB: Site Background
 J = Results below the quantitation limit or flagged as estimates due to percent recoveries for the CLRC samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits

TABLE 6-2
SI/RAR Sample Analytical Results Summary - Additional IRMs
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Subsurface Soil > 4' Depth	Contaminants of Concern	Concentration Range Detected	SCG*	Frequency of Exceeding SCG*
Metals (ppm)	Arsenic	5.1 - 15.4	7.5	1 of 3
	Barium	9,46 J - 253 J	300	0 of 3
	Chromium	14.4 - 20.2	50	0 of 3
	Lead	23.1 - 1,490	400	2 of 3
	Mercury	0.17 - 0.42	0.10	3 of 3
	Silver	ND	SB 0.9	0 of 3
Semi-Volatile Organic Compounds (SVOCs) (ppb)	Benzo(a)anthracene	ND - 150 J	224	0 of 3
	Benzo(a)pyrene	ND - 140 J	61 or MDL (290)	0 of 3
	Benzo(b)fluoranthene	ND - 180 J	1,100	0 of 3
	Benzo(k)fluoranthene	ND - 86 J	1,100	0 of 3
	Chrysene	ND - 170 J	400	0 of 3
	Dibenzo(a,h)anthracene	ND	14	0 of 3
Volatile Organic Compounds (VOCs) (ppb)	Pentachlorophenol	ND	1,000	0 of 3
	1,2,4 Trimethylbenzene	ND - 19	10,000	0 of 3
	Ethylbenzene	ND	5,500	0 of 3
Pesticides (ppm)	4,4' DDT	NA	2.1	0 of 0
TCLP Lead (ppm)	Lead	ND	5	0 of 3

Notes
 *: SCG = Standards, criteria or guidance. The New York State Soil Cleanup Objectives as outlined in NYS TAGM HWR-94-4046, Appendix A, were utilized as the applicable SCGs.
 ND: Compound Not Detected
 NA: Not Analyzed
 (MDL): Laboratory Detection Limit
 SB: Site Background
 J = Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDC samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

TABLE 6-3
SI/RAR Sample Analytical Results - Non-Hazardous Metal Soils - October 2002
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis	Sample ID							
	Cleanup Objective*	A-1 2'-3'	C-1 2'-3'	E-1 2'-3'	E-2 2'-3'	MS 2'-3'	MSD 2'-3'	J-1 2'-3'
Metals (mg/kg)								
Arsenic	7.5 or SB	10.30	8.59	10.70	10.00	19.20	9.60	12.20
Barium	300 or SB	47.2 J	146 J	240 J	155 J	276.00	137.00	239 J
Chromium	50 or SB	7.1 J	15.6 J	16.3 J	12.6 J	26.90	11.10	17.9 J
Lead	400** or SB	119 J	643 J	1990 J	670 J	428.00	997.00	686 J
Mercury	0.10	0.960	1.200	1.200	1.510	1.760	1.470	1.400
Silver	0.9 (SB)	ND J	ND J	ND J	ND J	4.33	ND	ND J
Analysis	Cleanup Objective*							
Volatiles (ug/kg)								
1,2,4 Trimethylbenzene	10,000	ND	ND	ND	ND	15	15	ND
Ethylbenzene	5,500	ND	ND	ND	ND	35	34	ND
Analysis	Cleanup Objective***							
Semi-Volatiles (ug/kg)								
Benzo(a)anthracene	224	ND	570	840	6,200	5,400	8,700	4,200
Benzo(a)pyrene	61 or MDL (290)	ND	820	800	5,000	4,600	7,900	4,000
Benzo(b)fluoranthene	1,100	ND	920	1,000	5,800	5,000	8,300	5,100
Benzo(k)fluoranthene	1,100	ND	350 J	420 J	21,000	3,300	4,900	1,900
Chrysene	400	ND	650	970	6,400	5,400	9,000	4,200
Dibenzo(a,h)anthracene	14	ND	ND	ND	ND	2,500 J	2,700	ND
Pentachlorophenol	1,000	ND	ND	ND	ND	2,600 J	3,100 J	ND

Notes: * Recommended Soil Cleanup Objective as per TAGM 4046

** Background levels for lead vary widely. The USEPA's Interim Lead Hazard Guidance (July 14, 1994) establishes a residential screening level of 400 ppm.

*** Recommended Soil Cleanup Objective as per TAGM 4046 is generally the laboratory detection limit for the listed analytes.

SB: Site Background. ND: Compound not detected.

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits

10.30

Concentrations above the soil cleanup objective as specified in NYSDEC TAGM HWR-94-4046 ranged from 428 to 1,990 mg/kg.

The detection of mercury above the applicable NYS cleanup objective of 0.10 mg/kg was observed in all five of the soil samples from the bottom of each excavation. Concentrations above the soil cleanup objective ranged from 0.960 to 1.510 mg/kg.

The concentrations of each of these detected metals are at or below the ranges indicated in the two previous phases of this SI/RAR.

Table 6-3 also presents a summary of the laboratory analytical results for VOCs and SVOCs on soil samples collected from the bottom of the excavations during the October 2002 IRM. The VOCs, 1,2,4, Trimethylbenzene and ethylbenzene were not detected in these five samples.

As shown on Table 6-3, concentrations of SVOCs above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 were detected in four of the five soil samples. The detection of five compounds (Benzo(a)anthracene, Benzo(a)pyrene, Benzo(b)fluoranthene, Benzo(k)fluoranthene and Chrysene) above the applicable NYS cleanup objectives of 390, 390, 1,100, 1,100 and 400 ug/kg; respectively, was observed in C-1, E-1, E-2 and J-1. Benzo(a)anthracene concentrations above the applicable NYS cleanup objective of 390 ranged from 570 to 6,200 ug/kg. Benzo(a)-Pyrene concentrations above the applicable NYS cleanup objective of 390 ranged from 620 to 5,000 ug/kg. Benzo(b)fluoranthene concentrations above the applicable NYS cleanup objective of 1,100 ranged from 5,100 to 5,800 ug/kg. Benzo(k)fluoranthene concentrations above the applicable NYS cleanup objective of 1,100 ranged from 1,800 to 2,100 ug/kg. Chrysene concentrations above the applicable NYS cleanup objective of 400 ranged from 650 to 6,400 ug/kg.

The concentrations of each of these detected SVOCs is at or below the ranges indicated in the two previous phases of this SI/RAR.

Table 6-4 presents a summary of the laboratory analytical results for samples collected from the Petroleum Contaminated Soil and Hazardous Metal Excavations during the October 2002 IRM. The Form 1s for all analytical results associated with the October 2002 IRM in this Section are presented in Attachment 2.

As shown on Table 6-4, concentrations of RCRA Metals above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 were detected in five of the six soil samples from some of the excavations. The detection of arsenic above the applicable NYS cleanup objective of 7.5 mg/kg was observed in two of the six soil samples with concentrations above the soil cleanup objective ranging from 9.10 to 15.40 mg/kg.

The detection of lead above the applicable NYS cleanup objective of 400 mg/kg was observed in two of the six soil samples from some of the excavations. Concentrations above the soil cleanup objective ranged from 1,100 to 1,490 mg/kg.

The detection of mercury above the applicable NYS cleanup objective of 0.10 mg/kg was observed in five of the six soil samples from some of the excavations. Concentrations above the soil cleanup objective ranged from 0.170 to 3.30 mg/kg.

The concentrations of each of these detected metals are at or below the ranges indicated in the two previous phases of this SI/RAR.

Table 6-4 also presents a summary of the laboratory analytical results for VOCs, SVOCs and pesticides on soil samples collected from the bottom of the excavations during the October 2002 IRM. The VOCs, 1,2,4, Trimethylbenzene and ethylbenzene were not detected above the NYS Cleanup standard in any of these six samples.

TABLE 6-4
SI/RAR Sample Analytical Results - Petroleum Contaminated Soils and Hazardous Metal Soils - October 2002
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Analysis	Sample 1D										LE-MSD
	Cleanup Objective*	D-1 2'-3'	F-1 2'-3'	I-1 2'-3'	LE-1 5'-7'	LS-1 5'-7'	LW-1 5'-7'	LE-MS	5'-7'	LE-MSD	5'-7'
Metals (mg/kg)											
Arsenic	7.5 or SB	3.60	9.10	NA	5.10	15.40	6.65	16.90	5.96	5.96	
Barium	300 or SB	40.6 J	189 J	NA	253 J	239 J	94.6 J	570	291	291	
Chromium	50 or SB	7.35 J	49.1 J	NA	20.20	16.70	14.40	41.60	21.80	21.80	
Lead	400** or SB	99.6 J	368 J	NA	1,100	1,490	23.10	1,410	1,280	1,280	
Mercury	0.10	0.190	3.300	NA	0.350	0.420	0.170	0.560	0.35	0.35	
Silver	0.9 (SB)	ND J	ND J	NA	ND J	ND J	ND J	4.86	ND	ND	
Analysis	Cleanup										
Volatiles (ng/kg)	Objective***										
1,2,4 Trimethylbenzene	10,000	ND	ND	NA	8	19	ND	16	33	33	
Ethylbenzene	5,500	ND	ND	NA	ND	ND	ND	27	30	30	
Analysis	Cleanup										
Semi-Volatiles (ug/kg)	Objective*										
Benzo(a)anthracene	224.00	120 J	11,000	NA	ND J	150 J	ND	2,400	2,700	2,700	
Benzo(a)pyrene	61 or MDL (390)	130 J	12,000	NA	ND J	140 J	ND	2,500	2,700	2,700	
Benzo(b)fluoranthene	1,100	180 J	12,000	NA	ND J	180 J	ND	3,000	3,500	3,500	
Benzo(k)fluoranthene	1,100	ND	4,800	NA	ND J	86 J	ND	2,400	2,900	2,900	
Chrysene	400	160 J	12,000	NA	ND J	170 J	ND	2,500	3,500	3,500	
Dibenz(a,h)anthracene	14	ND	ND	NA	ND J	ND	ND	1,600	1,500	1,500	
Pentachlorophenol	1,000	ND	ND	NA	ND J	ND	ND	5,600	6,900	6,900	
Analysis	Cleanup										
Pesticides (mg/kg)	Objective*										
4,4' - DDT	2.10	NA	NA	ND	NA	NA	NA	NA	NA	NA	

Notes: * Recommended Soil Cleanup Objective as per TAGM 4046.

(MDL) = Laboratory Detection Limit

Notes: Samples D and I are from Petroleum related excavations. Samples F and L are from Hazardous Metal related excavations.

** Background levels for lead vary widely. The USEPA's Interim Lead Hazard Guidance (July 14, 1994) establishes a residential screening level of 400 ppm.

*** Recommended Soil Cleanup Objective as per TAGM 4046 is generally the laboratory detection limit for the listed analytes.

SB: Site Background. ND: Compound not detected. NA: Not Analyzed.

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

As shown on Table 6-4, concentrations of SVOCs above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 were detected in one of the six soil samples. The detection of five compounds (Benzo(a)anthracene, Benzo(a)pyrene, Benzo(b)fluoranthene, Benzo(k)fluoranthene and Chrysene) above the applicable NYS cleanup objectives of 390, 390 1,100, 1,100 and 400 ug/kg; respectively, was observed in F-1. The Benzo(a)anthracene concentration above the applicable NYS cleanup objective of 390 was 11,000 ug/kg. The Benzo(a)-pyrene concentration above the applicable NYS cleanup objective of 390 was 12,000 ug/kg. The Benzo(b)fluoranthene concentration above the applicable NYS cleanup objective of 1,100 was 12,000 ug/kg. The Benzo(k)fluoranthene concentration above the applicable NYS cleanup objective of 1,100 was 4,800 ug/kg. The Chrysene concentration above the applicable NYS cleanup objective of 400 was 12,000 ug/kg.

The concentrations of each of these detected SVOCs is slightly above the ranges indicated in the two previous phases of this SI/RAR.

The pesticide 4, 4' -DDT was not detected in Sample I-1.

Table 6-5 presents a summary of the laboratory analytical results for samples collected from the Additional Surface Soil Sample Locations and the TCLP Lead results from the Hazardous Metals Excavations during the October 2002 IRM. The Form 1s for all analytical results associated with the October 2002 IRM in this Section are presented in Attachment 2.

As shown on Table 6-5, concentrations of RCRA Metals above the applicable NYSDEC soil cleanup objectives as specified in NYSDEC TAGM HWR-94-4046 were detected in all three of the additional surface soil samples. The detection of arsenic above the applicable NYS cleanup objective of 7.5 mg/kg was observed in two of the three additional surface soil samples with concentrations above the soil cleanup objective ranging from 9.34 to 12.10 mg/kg.

TABLE 6-5
SI/RAR Sample Analytical Results - Additional Surface Soil Samples and Requested TCLP Results - October 2002
Clean Water/Clean Air Bond Act - Application Number: B00154-9
Richmond Avenue Project - City of Lockport - Lockport, New York

Sample ID									
	Cleanup	CS-1	CS-2	CS-3	F-1	LE-1	LEMS	LS-1	LW-1
Analysis	Objective*	0'-1'	0'-1'	0'-1'	2'-3'	5'-7'	5'-7'	5'-7'	5'-7'
Metals (mg/kg)									
Arsenic	7.5 or SB	12.10	4.58	9.34	X	X	X	X	X
Barium	300 or SB	68.4 J	44 J	115 J	X	X	X	X	X
Chromium	50 or SB	7.50	14.20	8.88	X	X	X	X	X
Lead	400** or SB	79.90	560	272	X	X	X	X	X
Mercury	0.10	0.030B	0.250	ND	X	X	X	X	X
Silver	0.9 (SB)	ND J	ND J	ND J	X	X	X	X	X
Analysis	Cleanup								
TCLP (mg/l)	Standard***								
Lead	5	NA	NA	NA	ND	ND	10.40	ND	ND

Notes: * Recommended Soil Cleanup Objective as per TAGM 4046

X = Sample Data presented on Table 6-4.

** Background levels for lead vary widely. The USEPA's Interim Lead Hazard Guidance (July 14, 1994) establishes a residential screening level of 400 ppm.

*** Maximum Concentration of Contamination as presented in Table 1 of 40 CFR - Chapter I - Part 261.24

SB: Site Background, ND: Compound not detected, NA: Not Analyzed.

Sample above Recommended Soil Cleanup objective.

J= Results below the quantitation limit or flagged as estimates due to percent recoveries for the CDRL samples that were outside control limits or due to surrogate recoveries that were greater than the advisory limits.

The detection of lead above the applicable NYS cleanup objective of 400 mg/kg was observed in one of the three additional surface soil samples. The concentration above the soil cleanup objective was 569 mg/kg.

The detection of mercury above the applicable NYS cleanup objective of 0.10 mg/kg was observed in one of the three additional surface soil samples. The concentration above the soil cleanup objective was 0.250 mg/kg.

The concentrations of each of these detected metals are at or below the ranges indicated in the two previous phases of this SI/RAR.

Table 6-5 also presents a summary of the laboratory analytical results for TCLP Lead on soil samples collected from Hazardous Metal excavations during the October 2002 IRM. All four of the sample results indicated a TCLP value below the laboratory detection limit.

7.0 RISK ASSESSMENT

7.1 BASELINE RISK ASSESSMENT

InteGreyted, through their associated Toxicology and Risk Assessment Consultant, Robert A. Michaels, PhD, CEP and President of RAM TRAC Corporation, prepared a report entitled, “Assessment of Potential Risks to Public Health Posed by the Richmond Avenue Site in Lockport, Niagara County, New York under a Baseline (No Remedial Action) Scenario” dated 30 April 2002.

That report, presented in Attachment 5, assesses risks to public health potentially posed by residues of chemical pollutants detected in sampled environmental media during the initial phase of this SI/RAR (January to April 2002) at the Richmond Avenue Site. The purpose of the Baseline Health Risk Assessment (BHRA) was to determine if pre-remedial site conditions, with respect to such residues of chemical pollutants, potentially posed unacceptable risks to public health and, if so, to quantify the total cancer and non-cancer risks and the fractional contribution of each substance of potential concern to the total. Examination of spatial distribution of each contributing chemical of concern, and its fractional contribution to total risk, can guide project developers toward the efficient remediation of potentially unacceptable baseline risks.

Potential worst-case risks were assessed via standard, approved methods as detailed in Attachment 5. Findings were made regarding environmental sampling data, substances of potential concern, values of substance-specific risk assessment input parameters, values of other risk assessment input parameters, reference individuals of potential concern and exposure pathways of potential concern. Data provided by InteGreyted from the initial phase of the SI/RAR were aggregated by type for input to the BHRA. A list of sixteen (16) substances of potential concern was assembled, including each substance detected in any environmental medium at levels exceeding its regulatory benchmark value. Values of input parameters were selected conservatively. Reference individuals of potential concern included on-site construction workers and commercial employees, and off-site

residents. Complete exposure pathways of potential concern included air and soil pathways, but not groundwater pathways, given that groundwater was not encountered during the initial phase of the SI/RAR or during any additional on-site investigations or IRMs.

Based upon the findings made, total potential incremental cancer and non-cancer risks were qualified. With respect to cancer risks, chromium and carcinogenic PAHs, mainly benzo(a)pyrene, constituted the contaminants of concern required removal during Site remediation. With respect to non-cancer risks, lead and ethylbenzene constituted the contaminants of concern. However, due to the limited extent of the ethylbenzene (limited to the immediate area around MW-01-1) and the depth (between 11 and 12 feet below grade), remediation associated with ethylbenzene was deemed not recommended. Therefore, the Baseline HRA determined that remedial considerations for non-cancerous risks should focus only on the areas of elevated lead.

The BHRA documented that pre-remedial site conditions did not pose a threat to off-site receptors. However, pre-remedial site conditions did pose a threat to on-site commercial receptors. That risk was due primarily to residual lead, chromium, and Polynuclear Aromatic Hydrocarbons (PAHs) in surface soil. The 30 April 2002 BHRA concluded that an efficient remediation plan would consist of remediating sections of the Site contributing most to the total risks, i.e. areas of elevated lead, chromium and PAHs in surface soil.

7.2 *ADDENDUM TO BASELINE RISK ASSESSMENT*

The Baseline Health Risk Assessment (BHRA dated 30 April 2002) indicated that residues of chemical pollutants present at the Richmond Avenue Site posed unacceptable cancer and non-cancer risks to on-site receptors only, assuming that no remediation occurred. Therefore, an addendum to the BHRA was prepared to evaluate the reduction of risk that would be realized under two remedial scenarios, as follows:

Scenario 1: Excavation of “hot spots of site contamination”;

Scenario 2: Excavation of “hot spots of site contamination” plus excavation of additional soil containing elevated concentrations of contaminants of concern.

This Addendum to the BHRA is dated 7 May 2002 and is provided in Attachment 5.

Evaluation of Scenario 1 indicated that implementation of this scenario would result in reducing cancer risk to an acceptable level but would not reduce non-cancer risks for on-site commercial receptors to an acceptable level [recall that there were no risks to off-site receptors under pre-remedial conditions]. The residual risk to on-site receptors, under Scenario 1, was due to residual lead in surface soil.

Evaluation of Scenario 2, which considers excavation of “hot spots” plus areas of elevated lead concentrations in soil, indicated that implementation of this scenario would reduce on-site risk to a level acceptable for residential use.

Highly conservative assumptions were made in the Baseline Risk Assessment that caused the overestimation of cancer risks. For example, highly conservative U.S. EPA cancer potency factors incorporated, usually consisting of the 95-percent upper bound on the slope of the cancer potency dose-response curve. Likewise, the Baseline Risk Assessment used the 95-percent upper bound on the concentrations of substances of potential concern at the Site, rather than using actual concentrations revealed by sampling and laboratory analysis. With a high degree of scientific certainty, therefore, actual cancer risks will be significantly lower than the estimated worst-case risks. As a final consideration supporting this conclusion, the Baseline Risk Assessment and the Addendum to the Baseline Risk Assessment omitted any mitigation of cancer and non-cancer risks associated with capping and paving of the majority of the surface area not occupied by buildings.

Based on the results of the Baseline HRA and the Addendum to the Baseline HRA, InteGreyted developed site maps delineating all areas of elevated surficial PAHs and metals. Because previous sampling depths were typically 0 to 2 feet, removal of soil to a depth of two feet in all delineated areas was determined to be a very conservative approach to obtaining the risk reduction goals as stated in the BHRA, with addendum. As previously described, IRMs were then implemented to accomplish soil removal as deemed necessary and appropriate.

8.0 REMEDIAL ALTERNATIVES EVALUATION

As previously stated in Section 1.3.4, the proposed future use of the Site may include some or all of the following: a restaurant, senior center, artisan shops, offices, a museum and bell tower with access to the Erie Canal locks, parking areas, and public gathering space which can be used for a variety of civic activities. Some adaptive reuse of on-site buildings is also contemplated. Residential use may be contemplated, but only for upper stories of new or revitalized buildings (i.e., no “first floor” residential use).

The expeditious remediation of the Site will act as a precursor to revitalization of a city block located adjacent to the historic Erie Barge Canal. The Project will stimulate future redevelopment, which will generate additional tax revenue from the Site properties and potentially from additional neighboring redevelopment. The Project will also enhance the City of Lockport's canal area, which will boost future canal revitalization and tourism efforts and create both temporary and permanent employment.

In light of the proposed site use and existing conditions, only a few potential exposure pathways were identified during the Baseline Health Risk Assessment (BHRA) and the Addendum to the Baseline Risk Assessment (ABHRA). As discussed in Section 7.0, the BHRA and the ABHRA identified several potential constituents of concern with respect to human health risk for potential on-site receptors. As described in Sections 4.0 and 6.0, IRMs were performed to address all risks identified by the BHRA and ABHRA. This remedial alternatives evaluation addresses post-IRM site conditions.

8.1 REMEDIAL ACTION OBJECTIVES

Remedial Action Objectives (RAOs) consisting of medium-specific goal(s) for protecting human health were developed for the Site based on existing site information, an understanding of sources, exposure pathways (soil and air) and potential receptors (contruction workers, commercial employees, and off-site residents). RAOs included

preventing ingestion, direct contact, and inhalation of soil having non-carcinogen(s) (lead) at concentrations in excess of reference doses, and preventing ingestion, direct contact, and inhalation of soil having carcinogen(s) (chromium and carcinogenic SVOCs, mainly Benzo(a)pyrene) at concentrations in excess of acceptable cancer risk(s).

8.2 GENERAL RESPONSE ACTIONS

Medium-specific general response actions (GRAs) were developed to satisfy the RAOs for the Site. GRAs considered for the Site were developed to address near surface soils (0' – 2' below grade) that may not have been addressed by the IRM [NOTE: Nearly all surface (0 – 2 feet) soils were addressed by the IRMs described herein.] and subsurface soils (greater than 2' below grade) and included: No Action, Engineering / Institutional Controls, and Soil Removal and Replacement.

8.3 SCREENING OF REMEDIAL ALTERNATIVES

Potential remedial alternatives were identified for affected medium at the Site from technologies and process options which passed initial screening criteria. These alternatives were then screened with the goal of reducing the number of technologies and alternatives for further analysis while preserving a viable range of remedial options. The screening was accomplished by principally evaluating the remedial alternatives on the basis of effectiveness and implementability. Based on the screening process, three remedial alternatives were selected for a detailed analysis. These included No Action, Engineering / Institutional Controls (capping and deed restrictions), and Soil Removal and Replacement.

8.4 DETAILED ANALYSIS OF REMEDIAL ALTERNATIVES

A detailed analysis of each remedial alternative was conducted to provide information necessary for selection of appropriate post-IRM remedial alternatives at the Site. As part of the analysis, each alternative was assessed against a set of seven evaluation criteria as

follows: (1) compliance with NYS SCGs; (2) protection of human health and the environment; (3) short-term effectiveness; (4) long-term effectiveness and permanence; (5) reduction of toxicity, mobility or volume; (6) implementability; and (7) cost.

8.4.1 No Action

The NYSDEC requires that the No Action alternative be considered during the evaluation of Remedial Alternatives. The No Action alternative serves as a baseline for comparing the effectiveness of other remedial alternatives. The No Action alternative would not utilize any remedial technologies for reduction of the concentrations of the constituents of concern. The Site would be allowed to remain in its current (post-IRM) condition.

Compliance with SCGS

The No Action alternative would allow soils with analytes above applicable TAGM 4046 soil cleanup objectives to remain in place at the Site.

Protection of Human Health

The No Action alternative would be protective of human health; however, limited areas of residual metals in soil may result in the perception of risk, based on the contemplated use of the site.

Short-Term Effectiveness

The No Action alternative would not actively reduce toxicity, mobility or volume of chemical constituents present at the Site in the short term.

Long-Term Effectiveness

The No Action alternative would not actively reduce toxicity, mobility or volume of chemical constituents present at the Site in the long term.

Reduction of Toxicity, Mobility or Volume

The No Action alternative would not reduce toxicity, mobility or volume of chemical constituents present in soils at the Site.

Implementability

The No Action alternative is easily implemented; however, it may not appropriately consider the intended end-use of the Site.

Costs

There are no significant engineering costs associated with the No Action alternative.

8.4.2 Engineering / Institutional Controls

Under the Engineering / Institutional Controls alternative, portions of the Site not occupied by buildings will be paved and/or covered with decorative brick, sidewalk or vegetation. This alternative also includes institutional restrictions such as deed restrictions (commercial site with residential allowed on the second floors and above) and a soil management plan that will address any excavation into areas below the clean backfill that contain residual analytes of concern.

Compliance with SCGs

The Engineering / Institutional Controls alternative would allow soils with analytes of concern above TAGM 4046 soil cleanup objectives to remain in place at the Site. However, the alternative would eliminate exposure to these materials, thereby reducing risk potentials.

Protection of Human Health

The Engineering / Institutional Controls alternative would be protective of human health, as this alternative would eliminate human exposure to affected soils via the identified exposure pathways (inhalation, ingestion and direct contact). The alternative would also provide for proper management of soils if there was ever a need to perform activities in areas containing residual analytes of concern.

Short-Term Effectiveness

The Engineering / Institutional Controls alternative would effectively control unauthorized use or access to the Site by current landowners and the public and would limit mobility of chemical constituents that could potentially be exposed at the Site.

Long-Term Effectiveness

The Engineering / Institutional Controls alternative would effectively control unauthorized use or access to the Site by future landowners and the public and would limit mobility of chemical constituents and control the volume of chemical constituents that could potentially be exposed at the Site in the future.

Reduction of Toxicity, Mobility or Volume

The Engineering / Institutional Controls alternative would not reduce toxicity or volume of chemical constituents present in soils at the Site but would limit mobility by eliminating exposure to natural elements (wind, precipitation, etc.) and site activities (traffic, etc.).

Implementability

Any development of the Site will be under the direct control of the Municipality and will be based on agreements with the NYSDEC upon acceptance of this report, and will also be easily implemented as part of site development.

Costs

Costs associated with institutional controls (e.g. deed restriction) are minimal. Cost associated with engineering controls (e.g. paving) would be incorporated into overall Site development costs.

8.5 ADDITIONAL SOIL REMOVAL / REPLACEMENT

Based upon an estimate prepared for the previously referenced document (Addendum No. 3, SI/RAR Work Plan Addendum, Lockport, NY dated 27 September 2002), an estimated 2,220 tons of soil with concentrations of at least one analyte above NYSDEC TAGM values presently remain at the Site below a depth of 2.0 feet. As part of this remedial alternative, these soils could be excavated and disposed offsite at a proper waste disposal facility using methodologies similar to those utilized during the additional IRMs that were performed at the Site in October 2002. Following removal, each excavation would be filled with clean offsite fill material.

Compliance with SCGs

The Soil Removal alternative would provide for removal of all impacted soils at the Site with site-specific analytes above TAGM 4046 soil cleanup objectives. Following implementation of the remedial alternative, remaining soils would not contain analytes above applicable cleanup objectives, and therefore the Site would be in compliance with NYS SCGs.

Protection of Human Health

The Soil Removal alternative would be protective of human health because the alternative would remove materials that could potentially pose a risk to human health should subsurface materials be exposed. This alternative would eliminate all exposure pathways at the Site.

Short-Term Effectiveness

The Soil Removal alternative would be effective in the short-term as the toxicity, mobility and volume of chemical constituents were reduced at the Site during the implementation period.

Long-Term Effectiveness

The Soil Removal alternative would be effective in the long term because toxicity, mobility and volume of chemical constituents would be reduced during the implementation period. Therefore, in the long term there would be no associated exposure risk at the Site.

Reduction of Toxicity, Mobility or Volume

The Soil Removal alternative would reduce the toxicity, mobility and volume of chemical constituents present at the Site.

Implementability

This alternative would be similar to the work performed in October 2002 but would require the excavation, stockpiling, replacing and re-compaction of approximately 2,000 tons of previously placed fill material. Potential issues with structural shoring will also have to be considered as some excavations could potentially undermine existing historic structures which are planned to remain on Site as part of the new development. Based on the time frame required for the October 2002 fieldwork, approximately three weeks of field time would be required to perform this work if structural concerns were not encountered. However, shoring, building stabilization and other geotechnical and safety considerations would greatly complicate further excavation activities and significantly extend the schedule. Therefore, implementing this alternative would be difficult.

Costs

The capital cost can be estimated based on the October 2002 IRM. The quantity is approximately the same; however, as stated above approximately 2,000 tons of previously placed material will have to be excavated to remove the additional 2,200 tons. If structural concerns are not encountered the estimated capital cost would be approximately \$375,000. If structural concerns are encountered, this cost could increase by up to an order of magnitude.

8.6 COMPARISON OF REMEDIAL ALTERNATIVES

Compliance with SCGs

The No Action and Engineering / Institutional Controls alternatives would allow soils with chemical constituents above TAGM 4046 soil cleanup objectives to remain in place at the Site, whereas the Soil Removal alternative would remove all soils with constituents above the applicable SCGs. Implementation of the Soil Removal alternative would allow for the Site to be in compliance with the SCGs.

Protection of Human Health

All evaluated alternatives would be protective of human health. However, the Engineering / Institutional Controls and Soil Removal alternatives would be more protective of human health, as these alternatives would either limit and restrict access to chemical constituents of concern at the Site, in the case of Engineering / Institutional Controls, or remove the constituents from the Site altogether in the case of the Soil Removal alternative.

Short-Term Effectiveness

The No Action alternative would not effectively reduce toxicity, mobility or volume of chemical constituents present at the Site, whereas the Engineering / Institutional Controls alternatives would effectively limit exposure to and mobility of materials remaining at the Site. The Soil Removal alternative would reduce toxicity, mobility and volume by removing the constituents from the Site.

Long-Term Effectiveness

The No Action alternative would not effectively reduce toxicity, mobility or volume of chemical constituents present at the Site, whereas the Engineering / Institutional Controls

and Soil Removal alternatives would effectively control use of the Site and limit toxicity, mobility and volume of materials that could be exposed at the Site or, in the case of the Soil Removal alternative, remove the constituents and any risk of exposure.

Reduction of Toxicity, Mobility or Volume

The No Action alternative would not reduce toxicity, mobility or volume of chemical constituents at the Site. Engineering / Institutional Controls would reduce mobility, whereas the Soil Removal alternative would reduce toxicity, mobility and volume.

Implementability

All three alternatives are implementable. No Action requires no additional work. All work associated with the Engineering/Institutional Alternative would consist of standard procedures for the development of the Site. The Additional Removal/Replacement alternative could be standard excavation and backfill operations as long as structural concerns associated with existing building foundations are not encountered. However, structural concerns would greatly complicate implementation of the Additional Removal/Replacement scenario.

Costs

There are no capital costs associated with the No Action alternative. Cost for the Engineering/Institutional alternative will be built into the development of the Site and may require oversight management at an estimated cost of \$10,000 to \$20,000. If structural concerns are not encountered, the estimated capital cost for the Additional Removal/Replacement alternative would be approximately \$375,000. If structural concerns are encountered, this cost could increase by up to an order of magnitude.

8.7 REMEDY SELECTION

Data developed during the SI / RAR indicate that post-IRM risk levels for both cancer- and non-cancer-related risks are within the traditionally accepted ranges prior to the implementation of any further remedial alternative. However, while a No Action remedial alternative would be acceptable at the Site based on risk alone, an alternative based on implementation of engineering / institutional controls was determined to provide for better protection of human health at the Site. Therefore, the Engineering / Institutional Controls remedial alternative was selected and recommended for implementation at the Site.

9.0 SUMMARY AND CONCLUSIONS

Data developed during the initial phase of field work, January to April 2002, and enhanced by the second phase of field, May to June 2002 (see Sections 4 and 5), indicated that elevated concentrations of arsenic, chromium, lead, mercury and several polynuclear aromatic hydrocarbon (PAH) compounds were present at various locations of the Site.

Data provided by InteGreyted from the initial phase of the SI/RAR was aggregated by type for input into a Baseline Risk Assessment. A list of sixteen (16) substances of potential concern was assembled, including each substance detected in any environmental medium at levels exceeding its regulatory benchmark value. Values of input parameters were selected conservatively. Reference individuals of potential concern included on-site construction workers and commercial employees, and off-site residents. Complete exposure pathways of potential concern included air and soil pathways, but not groundwater pathways, given that groundwater was not encountered during the initial phase of the SI/RAR or any additional on-site investigations.

Based upon the findings made, total potential incremental cancer and non-cancer risks were qualified. With respect to cancer risks, chromium and carcinogenic PAHs, mainly benzo(a)pyrene, constitute the contaminants of concern which needed to be addressed during Site remediation. With respect to non-cancer risks, lead constituted the main contaminate of concern.

An Addendum to the Baseline Risk Assessment incorporates and quantifies risks potentially posed under two remedial action scenarios consisting of the removal of two feet of soil and the replacement of the material with approved “clean” material. Scenario 1 assumed excavation of chromium, PAH and hazardous lead areas and Scenario 2 included all areas considered in Scenario 1 plus several areas of elevated metals, mainly lead. Scenario 2 is the option that was discussed in detail with the NYSDEC by InteGreyted and the Greater Lockport Development Corporation at two separate meetings. Results of the discussions in these two referenced meetings led to the

preparation of the “Addendum No. 3, SI/RAR Work Plan Addendum, Lockport, NY,” dated 27 September 2002 and implemented during the October 2002 IRM.

Based upon available data, remedial action objectives (RAOs) consisting of medium-specific goals for protecting human health were developed for the Site. Subsequently, medium-specific general response actions (GRAs) were developed to satisfy the RAOs. GRAs considered for the Site were developed to address near surface soils (0’ – 2’ below grade) and subsurface soils (greater than 2’ below grade) and included: No Action; Engineering / Institutional Controls; and Soil Removal and Replacement.

Data developed for the October 2002 IRM revealed potential worst-case residual risks to off-site residential and on-site commercial receptors that are within the range of traditionally accepted risks for both cancer and non-cancer risks prior to the implementation of any Engineering/Institutional controls. Based on the results of the ABLRA, the “No Action” alternative could be acceptable for this Site. However, to provide additional protection at limited additional cost, the Engineering/Institutional Controls alternative is recommended for the Richmond Avenue Site in Lockport, NY. This Alternative must also include institutional restrictions such as deed restrictions (commercial site with residential allowed on the second floors and above) and a soil management plan that will address any excavation into areas below the clean backfill that contain residual contamination.

Furthermore, it is recommended that all petroleum spill files related to this site be categorized as “closed – no further action needed”.

ATTACHMENT 1

**LOGS – TEST BORINGS, PITS AND
TEMPORARY MONITORING WELLS**

ATTACHMENT 2

**SUMMARY OF VALIDATED TEST RESULTS
And FORM 1s**

ATTACHMENT 3

ASBESTOS ABATEMENT SUMMARIES

ATTACHMENT 4

**WASTE PROFILES, MANIFESTS AND
DOCUMENTATION**

ATTACHMENT 5

BASELINE HEALTH RISK ASSESSMENT

AND

ADDENDUM TO BASELINE HEALTH RISK ASSESSMENT

JANUARY to APRIL 2002
INVESTIGATION

**MAY 2002
INVESTIGATION**

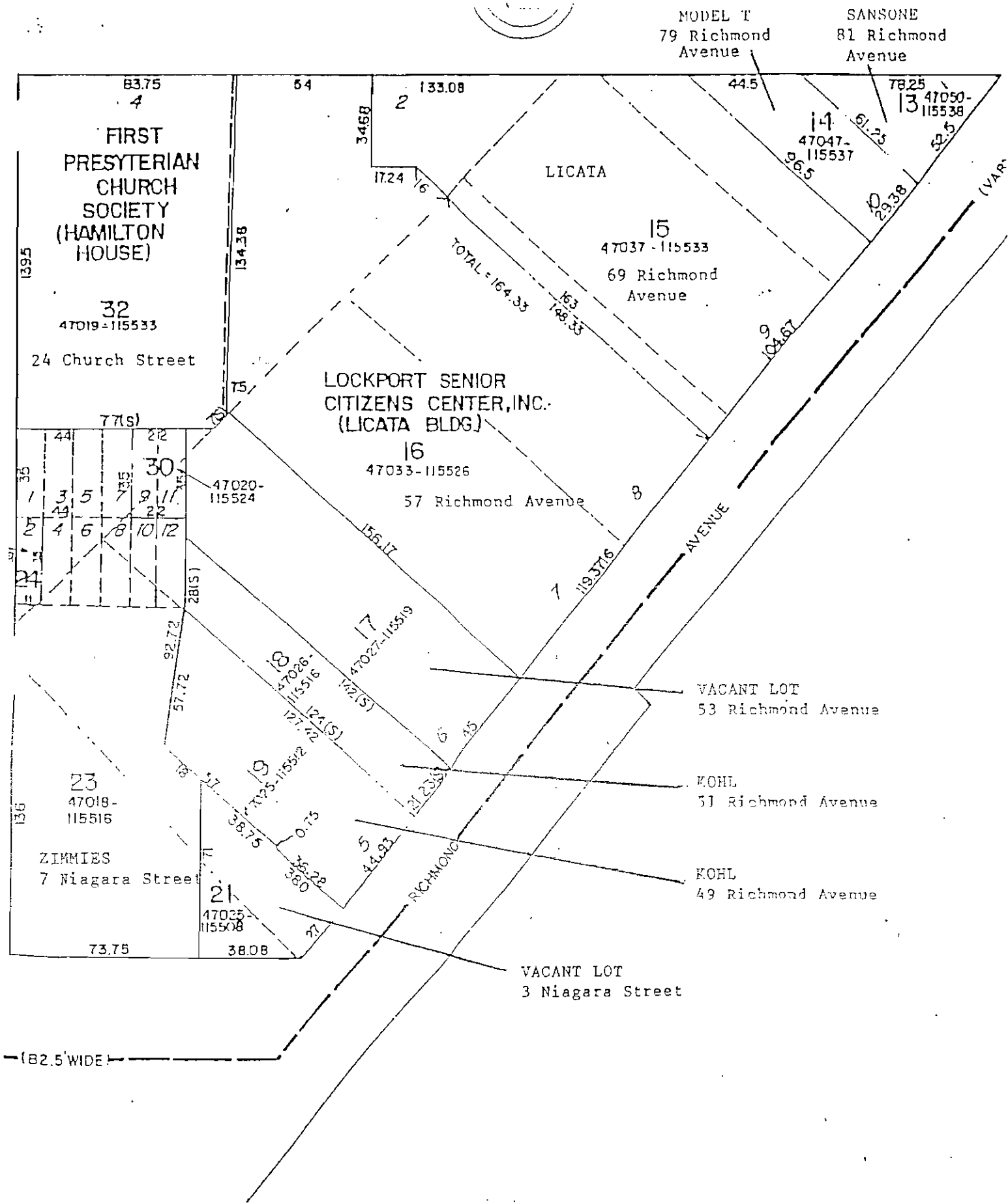
OCTOBER 2002
INTERIM REMEDIAL MEASURE

APPENDIX A

PART A – TAX MAP

PART B – STATE ASSISTANCE CONTRACT (SAC)*

***Original and Amended**



APPLICATION

T-311 P 02/06 F-625

NYSDEC-1996 CLEAN WATER / CLEAN AIR BOND ACT
ENVIRONMENTAL RESTORATION PROJECTS-TITLE 5#
00154-9

Part 1

NAME OF APPLICANT (Municipality): City of LockportTYPE OF ENVIRONMENTAL RESTORATION PROJECT: (Check one) Investigation ☒ Remediation ☐PROJECT NAME: Richmond Avenue ProjectPROJECT LOCATION: STREET ADDRESS: 49, 51, 53, 57, 69, 79 and 81 Richmond Avenue and
3 & 7 Niagara StreetCITY/TOWN: Lockport ZIP CODE: 14094 COUNTY: NiagaraPROPERTY SIZE (acres): 2± LATITUDE: 43° 10' N LONGITUDE: 78° 41' WAPPLICANT CURRENTLY OWNS PROPERTY: YES ☐ NO ☒ (If yes, include proof of ownership with application)PROPERTY IS LISTED ON NYS REGISTRY OF INACTIVE HAZARDOUS WASTE SITES: YES ☐ NO ☒
(If yes, fill in current registry classification)CLASSIFICATION TYPE OF KNOWN OR SUSPECTED CONTAMINATION: Petroleum ☒ Other Hazardous Substances ☒PROJECT DESCRIPTION: Please attach a description of the project which includes the following components:
(Refer to Environmental Restoration Projects Procedures Handbook for detailed instructions)

- Purpose and Scope of the Project;
- Environmental History of the Property;
- Proposed Future Use of the Property;
- Estimated Project Cost;
- Other Actual or Potential Funding Sources for the Project;
- How the Project Would Satisfy the Criteria of ECL 56-0505; and
- Site Maps (USGS quad map and a property tax map)

SCHEDULE: Field work will commence within 12 months of Department approval of the application.

* Applicant owns 57 and 81 Richmond Avenue only.

Part 2 (To be completed for Remediation applications only)

1. The DEC has issued a Record of Decision for the property? ☐ Yes ☐ No
2. Groundwater or a surface water body has been contaminated above standards. ☐ Yes ☐ No
If yes, answer a, b or c below:
 - ☐ a. The influent to a public or private water supply has been contaminated or threatened.
 - ☐ b. A class A or AA surface water body, primary or principal aquifer has been contaminated without affecting an existing water supply.
 - ☐ c. Groundwater has been contaminated above standards or a surface water has been impacted.
3. A health advisory has been issued by a New York state or local health agency due to releases from the site. ☐ Yes ☐ No
4. Endangered, threatened or rare species, State protected streams or State regulated wetlands have been impacted by releases from the site. ☐ Yes ☐ No
5. Site contaminants are present in soils/waste at levels that exceed DEC Division of Environmental Remediation guidance values (DHW TAGM 4046 or STARS Memo #1). ☐ Yes ☐ No
6. Property is located in a designated economic development zone or zone equivalent area. ☐ Yes ☐ No
7. All or part of the Property has been idle or abandoned for more than one year. ☐ Yes ☐ No

If yes, indicate the percent of the total property that applies %

8. Municipality has a signed agreement with a private party to reuse the property once it is restored. ☐ Yes ☐ No
If yes, attach a copy of the agreement.

[OVER]

Municipality has legally committed to a specific new public or recreational use of all or part of the property. (Public use includes, but is not limited to, public housing, daycare, education, gov't. offices, environmental centers, and museums. Recreational use includes, but is not limited to, parks, playgrounds, sports and cultural centers, and scenic vistas.) If yes, attach documentation of the legal commitment and indicate below the intended use and the % of the total property area that will be devoted for that use.

Intended Use: _____ (0-100%) _____

0. Municipality is aware of other funding sources for remediating the property. ☐ Yes ☐ No
If yes, provide source(s) and dollar amount(s) in the attached project description.
1. Municipality has complied with State Environmental Quality Review Act (SEQR) regarding this action. If yes, include the determination (negative declaration or findings statement) in the attached project description and identify all involved agencies in the coordinated review. ☐ Yes ☐ No

Part 3

INDIVIDUAL AUTHORIZED TO SIGN APPLICATION: (Please Print)

NAME Hon. Thomas C. Sullivan TITLE Mayor, City of Lockport
MAILING ADDRESS 23 East Avenue
Lockport, New York 14094-0379
PHONE NUMBER: 439-6665 FAX NUMBER: 439-6668

CERTIFICATION: The undersigned on behalf of the applicant municipality does hereby certify that:

The Applicant has not generated, transported or disposed of, arranged for, or caused the generation, transportation or disposal of hazardous substance on that Property, and has not undertaken, and will not undertake, any indemnification obligation respecting a party responsible under law for the remediation of the Property; and

the applicant leased such property to another party that generated, transported or disposed of, or that arranged for or caused the generation, transportation or disposal of hazardous substances on such property, the applicant did not know that such other party generated, transported or disposed of, arranged for or caused the generation, transportation or disposal of such hazardous substances or so knew and took action to remediate, or cause the remediation of such hazardous substances.

No other funding sources currently exist to undertake the project except the applicant's and those other sources identified in this application;

All statements made for the purpose of obtaining State assistance for the proposed project either are set out in full on this application, or are set out in full in exhibits attached to this application and incorporated by this reference;

The individual whose signature appears hereon is authorized to sign this application for the applicant.

A FALSE STATEMENT MADE HEREIN IS PUNISHABLE AS A CLASS "A" MISDEMEANOR PURSUANT TO SECTION 210.45 OF THE PENAL LAW

Thomas C. Sullivan 6/27/00
Signature of individual authorized to sign application Date

FOR STATE USE ONLY:

DATE RECEIVED _____

PROJECT NO. _____

DATE COMPLETE _____

DATE APPROVED _____

APPLICATION

NYSDEC-1996 CLEAN WATER / CLEAN AIR BOND ACT ENVIRONMENTAL RESTORATION PROJECTS-TITLE 5

PROJECT DESCRIPTION

Purpose and Scope of the Project

The property which is the subject of this Application is a triangular-shaped site consisting of nine separate tax parcels totaling 2± acres in the City of Lockport. It is bounded by Richmond Avenue, Church Street and Ontario Street and is immediately adjacent to the Erie Barge Canal (the "Property") (see *Attachment 1* for tax map and USGS quad map of the Property). Two of the nine tax parcels are municipally owned; 57 Richmond Avenue is owned by the Greater Lockport Development Corporation, a local public benefit corporation, and 81 Richmond Avenue is owned by the City of Lockport ("Municipality") (see *Attachment 2* for deeds).

The Municipality proposes to conduct a thorough environmental investigation of the Property, and to remediate the Property to prepare it for future redevelopment geared toward economic and tourism activity (the "Project"). The Municipality is authorized to undertake the Project and subsequent redevelopment of the Property. A certified copy of the Municipality's authorization to undertake the Project is included as *Attachment 3*.

The scope of the Project may include, but is not limited to: soil borings; characterization of any contaminated soils, media, sludges or liquids, including any petroleum waste, hazardous waste or hazardous substances; characterization, removal and disposal of any petroleum waste, hazardous waste or hazardous substances contained in any underground or aboveground storage tanks or any other containment vessels; cleaning, removal and disposal of any underground or aboveground storage tanks or any other containment vessels; removal and disposal of any solid waste (debris, used tires, old cabinets, etc.); sampling of any asbestos present in on-site buildings; and demolition of buildings and structures present on-site.

Environmental History of the Property

The Property is comprised of nine parcels, many of which contain either vacant or underutilized buildings. Previous uses and types of operations conducted at the Property included: automotive repair, gasoline service station, automotive sales, dry cleaner, machine shop, junkyard, leather manufacturing, and miscellaneous manufacturing operations. It is probable that petroleum products including gasoline, motor oils and other oils and lubricants were used by past owners or operators of the Property. Antifreeze, dry cleaning fluids, miscellaneous chemicals, including household cleaners, solvents, floor adhesives and paints, lead

car batteries and roofing compounds may have also been used by past owners or operators of the Property. Through the use of these products, by-products or wastes may have been generated, some of which may have been hazardous. Environmental permits or approvals obtained by previous operators, and any orders, decrees or legal documents in violation of federal, state or local laws, are unknown.

In 1999, the Municipality engaged InteGreyted Consultants (formerly Greystone Environmental) to conduct a limited subsurface investigation of the Property. The purpose of that limited investigation was to gain a better understanding of the environmental conditions of the Property and to define the scope of any future investigation/remediation that may be required to prepare the Property for future redevelopment. A copy of the draft summary report of that investigation is attached as *Attachment 4*. An appraisal of the Property is included as *Attachment 5*.

Proposed Future Use of the Property

The proposed future use of the Property may include some or all of the following: a restaurant, senior center, artisan shops, housing, a hotel, offices, a museum and bell tower with access to the Erie Canal locks, and public gathering space which can be used for a variety of civic activities. Some adaptive reuse of on-site buildings is also contemplated.

Estimated Project Cost

It is estimated that the total Project cost will be \$1,200,000. This work will include investigatory/remedial work (borings, waste characterization, excavation, disposal, etc.) at a cost of approximately \$400,000; asbestos work at a cost of approximately \$600,000; and demolition of site buildings and structures at a cost of approximately \$200,000.

Other Actual or Potential Funding Sources for the Project

Other actual funding sources may include in-kind labor and machinery provided by the Municipality. The Municipality is not aware of any other funding sources for the Project.

How the Proposed Project Would Satisfy the Criteria of ECL 56-0505

- a. Benefit to the environment realized by the expeditious remediation of the Property

The proposed Project will benefit the environment by expeditiously remediating any potentially hazardous conditions at the Property allowing its reuse.

b. Economic benefit to the state by the expeditious remediation of the Property

The expeditious remediation of the Property will act as a precursor to revitalization of a city block located adjacent to the historic Erie Barge Canal. The Project will stimulate future redevelopment which will generate additional tax revenue from the Property and potentially from additional neighboring redevelopment. The Project will also enhance the City of Lockport's canal area which will boost future canal revitalization and tourism efforts and create both temporary and permanent employment.

c. Potential opportunity of the Property to be used for public recreational opportunities

There is a tremendous opportunity for the Property to be used for recreational purposes. The Property is located along the historic Erie Barge Canal, directly across from Locks 34 and 35. Preliminary plans for the Property include: improved access to Locks 34 and 35; creation of a public gathering space, which may accommodate several uses including a farmer's market, community picnics, ethnic festivals or art shows; establishment of a museum catering to local and regional visitors; and construction of a bell tower which will provide a viewing area to allow visitors to view the canal and the entire City.

d. Opportunity for other funding sources to be available for remediation of the Property

The Municipality has limited resources available for remediation of the Property. However, in-kind labor and machinery provided by the City of Lockport may be used to assist with the Project. It is uncertain at this time what the dollar amount is of this in-kind labor and machinery. Beyond in-kind sources, no other funding sources exist for the Project.

Site Maps (USGS quad map and property tax map)

A USGS quad map and a property tax map for the Project site is included as *Attachment I* to this application.



Department of Community Development

WILLIAM J. EVERT
Director

LOCKPORT MUNICIPAL BUILDING
ONE LOCKS PLAZA
LOCKPORT, N.Y. 14094
(716) 439-6687

To: Dave Meyers
From: William J. Evert, Director *WJE*
Date: December 31, 2002
Re: **State Assistance Contract**

As per your request, enclosed please find a copy of the State Assistance Contract for the Richmond Avenue project. As soon as I receive a signed copy of the SAC Amendment, I will forward a copy on to you.

WJE/mdp

enclosure
cc (cover letter only)

John J. Ottaviano, Corporation Counsel
Frank Armento, Attorney-at-Law

RECEIVED
JAN 02 2003

BY:.....

OTTAVIANO & SANSONE, L.L.P.

ATTORNEYS AT LAW
P.O. Box 1230
172 EAST AVENUE
LOCKPORT, NEW YORK 14095
(716) 438-0488
FAX: (716) 438-0489
E-MAIL JJOESQ@AOL.COM

John J. Ottaviano *†
John S. Sansone

*Corporation Counsel for the City of Lockport
†Also Admitted in Washington D C

TELECOPIER/E-MAIL NOT FOR SERVICE OF PAPERS

HAND DELIVERED

May 14, 2002

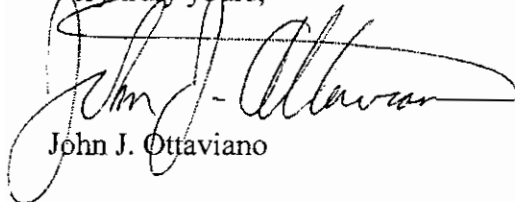
William J. Evert, Director
Greater Lockport Development Corporation
One Locks Plaza
Lockport, New York

RE: Richmond Avenue DEC Plan

Dear Bill:

Enclosed herewith please find original State Assistance Contract which was recorded in the Niagara County Clerk's Office on April 12, 2002, in Liber 3193 of Deeds at page 459.

Very truly yours,



John J. Ottaviano

JJO/dlm
Enclosure

5
NIAGARA COUNTY CLERK RECORDING PAGE

OFFICE OF THE CLERK COUNTY OF NIAGARA

WAYNE F. JAGOW, COUNTY CLERK

County Courthouse, 175 Hawley Street, P.O. Box 461, Lockport, NY 14095

Phone (716) 439-7027

Fax (716) 439-7066

INSTRUMENT DATE 2/19/02

DOCUMENT TYPE State Assistance Contract

Parties: (Print Names In Full)

1st Part New York State Department
of Environmental Conservation

2nd Part City of Lockport

Town/City City of Lockport

Return To:

JOHN J. OTTAVIANO

ATTORNEY AT LAW

P.O. BOX 1230

LOCKPORT, NEW YORK 14095

THIS SPACE RESERVED FOR COUNTY CLERK

MORTGAGE#

MORTGAGE AMOUNT

\$

() One/two family () Other

[] Check if to be apportioned

deed DOCUMENT # 1002891
BOOK 3193 PAGE 459
NUMBER OF PAGES 57
RECORDED 04/12/2002 02:05:20 P.M.
RECEIPT # 9801
PAID - COUNTY CLERK
WAYNE F. JAGOW

RECORDING TAX RECEIPT

BASIC \$

ADDITIONAL \$

SPECIAL \$

TOTAL \$

State of New York} ss

County of Niagara}

I do hereby certify that I have

Received on the within Mortgage, being

the amount of the Recording Tax

Imposed thereon & paid at recording.

Filed _____, 20

REAL ESTATE TRANSFER
TAX

\$

NIAGARA COUNTY

Mortgage Tax Clerk of Niagara County

STATE ASSISTANCE CONTRACT NO. 03017105

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
1996 CLEAN WATER / CLEAN AIR BOND ACT
ENVIRONMENTAL RESTORATION PROJECTS-TITLE 5
STATE ASSISTANCE CONTRACT

PROJECT NO.: B00154-9
PROJECT NAME: Richmond Avenue
MUNICIPALITY: City of Lockport
COUNTY: Niagara

This Contract, made between the New York State Department of Environmental Conservation (hereinafter "the Department"), acting for and on behalf of the State, and City of Lockport (hereinafter "the Municipality"), with offices located at One Locks Plaza, Lockport, New York 14094 .

WITNESSETH:

WHEREAS, the Department is authorized by Article 56 of the New York State Environmental Conservation Law (hereinafter the "ECL") to enter into contracts on behalf of the State to provide State Assistance, as defined in paragraph 1 of this Contract; and

WHEREAS, the Legislature has determined that the preservation, enhancement, restoration and improvement of the quality of the State's environment is one of government's most fundamental obligations; and

WHEREAS, the Legislature authorized the Department to enter into Contracts with municipalities to provide State Assistance to them to develop and implement environmental restoration projects approved by the Department for certain properties held in title by them; and

WHEREAS, the Municipality has applied for State Assistance to develop and implement an environmental restoration project, the purpose and scope of which is set forth in Schedule A, which is attached and made a part of this Contract; and

WHEREAS, the Municipality agrees to undertake all work and to comply with all terms and conditions of this Contract; and

WHEREAS, the Municipality has filed with the Department suitable documentation of its

decision to apply for State Assistance and to enter into this Contract, and of its authorization of the person signing the same to do so; and

WHEREAS, the Municipality agrees that it will fund its portion of the cost of said Project; and

WHEREAS, the Department's execution of this Contract is made in reliance upon the information provided by, and representations of, the Municipality in its application papers and in this Contract; and

WHEREAS, the Municipality has complied and commits to continue to comply with the requirements for State Assistance to municipalities established under Article 56 of the ECL.

NOW, THEREFORE, in consideration of the mutual covenants, promises, representations and conditions made herein, the parties agree as follows:

1. Definitions:

a. Except as expressly provided herein, terms used in this Contract have the same meanings as those set forth in ECL Article 56.

b. In addition, the following terms shall have the meanings set forth below:

(i) "Approved Activity" means any Investigation or Remediation activity which is part of the Project and has been approved in writing by the Department.

(ii) "Contractor" in Appendices A and B means the Municipality.

(iii) "Disposition of the Property" means the leasing of the Property or the transfer of the Property's title through sale or other means.

(iv) "Eligible Cost" shall have the meaning given to that term in the most recent version of the Department's "Procedures Handbook for Environmental Restoration Projects" available at the time of this Contract.

(v) "Investigation" means a project consisting of a Site Investigation and associated Remedial Alternatives Report and any assistance the Municipality must provide to the Department in the Department's selection of the Property's remedy. The term also includes any Department-approved interim remedial measures needed to undertake the Project or needed to eliminate any potential or actual releases of hazardous substances at, or from, the Property.

(vi) "Parties" means the Department and the Municipality.

(vii) "Project" means the Property's Investigation or Remediation as described in the Workplan.

(viii) "Property" means the real property which is the subject of the Project, the Tax Map identification number for which is as follows: 109.54-2-13, -14, -15, -16, -17, -18, -19, -21, and -30. The Property's legal description appears as Appendix "C" to this Contract.

(ix) "Remedial alternatives report" is a report that contains an evaluation of options for the remediation of any contamination in, on, or under, or emanating from, the Property that includes an analysis of data and other information concerning the nature and extent of the Property's contamination and is generally performed concurrently, and in an interactive fashion, with the site investigation.

(x) "Remediation" means a Project consisting of the design and implementation of the remedy selected in the Department's record of decision. While implementing the remedy may require continued operation, monitoring, and maintenance of the remedy, the cost of these activities would not be eligible for reimbursement under this contract.

(xi) "Site investigation" means a process undertaken to determine the nature and extent of contamination in, on, and under, and emanating from, the Property. The Site investigation includes the gathering of sufficient information to determine the necessity for, and the selection of the appropriate method of, remediation of contamination in, on, or under, or emanating from the Property.

(xii) "State Assistance" means State money provided under this Contract to the Municipality pursuant to Article 56, Title 5 of the ECL.

(xiii) "Workplan" means a document which describes the purpose, scope, estimated cost, and progress schedule of the Project. The Workplan must include a public participation plan that, at a minimum, satisfies the requirements of ECL 56-0503.2.

2. State Assistance:

a. The Commissioner agrees to reimburse the Municipality on a periodic basis for its Eligible Costs in conducting the Project in an amount not to exceed two hundred seventy thousand dollars (\$ 270,000), which amount has been determined by the Commissioner to be up to 75 percent of the estimated Eligible Cost of such Project; provided

that such reimbursements shall not constitute State Assistance and shall be refundable by the Municipality to the Department where:

(i) the work undertaken and performed by the Municipality is not an Approved Activity,

(ii) all work necessary to develop and implement the Project is not completed as approved by the Department.

b. Except as provided in this paragraph 2.b, the total sum of any State Assistance money that shall be disbursed under this Contract shall not exceed the amount set forth in paragraph 2.a of this Contract. However, the Municipality agrees that the "not to exceed" amount set forth in paragraph 2.a is an estimate.

(i) The "not to exceed" amount identified in paragraph 2.a may be increased if there are significant changes in the scope or complexity of an Approved Activity or additional Approved Activity or Activities by an amendment to this Contract. The "not to exceed" amount set forth in paragraph 2.a will not, in any event, be increased unless the Department first reviews the request for an increase and approves it as being necessary to the purpose of the Project, and unless moneys appropriated to provide State Assistance are available under this Contract. In this regard, the Municipality shall submit to the Department for prior approval all Project changes which may substantially alter the scope of, or increase the amount of State Assistance money needed to complete the Project. Requests for increases in the amount of State Assistance must be accompanied by all supporting documentation necessary to justify the increase.

(ii) If the actual Eligible Costs are lower than those used to calculate the above "not to exceed" amount, the parties agree to amend this State Assistance Contract to apply the same percentage shown above to the actual Eligible Costs in order to determine the revised "not to exceed" amount. Upon request by the Department, the Municipality agrees to execute and return the Contract amendment to the Department within 90 days of its receipt of the Contract amendment that will identify the revised "not to exceed" amount.

c. In return, the Municipality agrees to proceed expeditiously with and to complete the Project in accordance with the Workplan approved by the Department, and any revisions thereto, and to carry out its other obligations under this Contract.

d. State Assistance shall be provided to the Municipality in instalments in accordance with Schedule B - Payment Schedule, which is attached and made a part of this Contract. All claims for reimbursement shall be accompanied by a State of New York Standard Voucher and documentation which substantiates the eligibility of costs claimed to

date, as required by the Department and the Office of the State Comptroller. The voucher must be signed by the person authorized to sign the Contract for the Municipality, or other duly authorized person.

Five percent shall be retained from each payment so referenced in Schedule B. Payments bringing the total payment amount to 100 percent of the State share of Eligible Costs for the Project may be requested by the Municipality after Department issuance of its record of decision or after the final engineering certification report is acceptable to the Department.

If upon final audit of the Project by the Office of the State Comptroller, the Department determines that overpayment above the amount due has occurred, the Municipality hereby agrees to make full repayment to the State of New York, through the Department and for deposit into the Environmental Restoration Project Account of the Hazardous Waste Remedial Fund within 365 days of notification of the Municipality by the State of such overpayment.

e. (i) Except as provided in paragraph 2.e(ii), in the event that any:

(A) federal payments that pertain to the Project;

(B) responsible party payments and/or other consideration; and/or

(C) any other payments and/or other consideration received with respect to the Project by any other source,

become available which were not included in the calculation of State Assistance pursuant to paragraph 2.a of this Contract, the Municipality shall immediately notify the Department of such availability, the Department shall recalculate the amount of State Assistance accordingly, and the Municipality shall pay to the Department for deposit in the Environmental Restoration Project Account of the Hazardous Waste Remedial Fund the amount by which the State payment actually made exceeds the recalculated State Assistance. If the Municipality shall fail to make such repayment within 365 days of notification, the Municipality agrees that the Department may take measures provided for by the law of the State of New York relating to the recovery of unrepaid State assistance. The Municipality agrees that it will immediately notify the Department in writing of its receipt of reimbursement from other sources for any expenditure for which state assistance may be provided under this Contract.

(ii) In the event that there is a Disposition of the Property or any portion of such Property, in addition to any recalculation of State Assistance under paragraph 2.e(i), the amount of State Assistance shall be recalculated using the value of the Disposition of the Property and the Municipality shall pay to the State for deposit in the Environmental

Restoration Project Account of the Hazardous Waste Remedial Fund, in addition to any money that may be required to be paid under paragraph 2.e(i), an amount of money by which the State payment actually made exceeds the recalculated State Assistance. For purposes of this subparagraph, the "value of the Disposition of the Property", or that portion of the Property that is disposed, consists, if the Property is disposed by transfer of title, of the higher of the Property's sale price or the Property's fair market value at time of sale; or, if the Property is disposed by lease, the higher of the present worth of the stream of rent over a 30 year period beginning the effective date of this Contract or the present worth of the fair market value of the stream of rent over the same 30 year period. However, if the Property is located in an economic development zone or in a zone equivalent area, as those terms are defined in sections 957 and 959(bb), respectively, of the general municipal law; or if the Property is located in a project area that is the subject of a redevelopment plan approved by the Municipality's legislative body under Article 18-B of the general municipal law; or if the Property will be used to maintain or expand the supply of housing for persons of low income and families of low income as section 2 of the private housing finance law defines them, then if the Property is disposed by sale, the "value of the Disposition of the Property", or that portion of the Property that is disposed, consists of the Property's sale price, and if the Property is disposed by lease, the present worth of the stream of rent over a 30 year period beginning the effective date of this Contract.

f. If the Municipality disposes of the Property by sale to a responsible party, such party shall pay to the Municipality, in addition to such other consideration, an amount of money constituting the amount of State Assistance provided to the Municipality under this Contract plus accrued interest and transaction costs and the Municipality agrees to pay that money immediately to the Department for deposit into the Environmental Restoration Project Account of the Hazardous Waste Remedial Fund.

g. In the event that the moneys received from any federal payments and any moneys and/or other consideration received from responsible parties, from disposition of the Property, and/or any other source exceed the Municipality's cost of the Property (which, for purposes of ECL 56-0503.2.d, consists of the Municipality's basis of the Property, which is determined using generally accepted accounting principles, including those approved for municipal entities, and includes taxes owed to the Municipality upon acquisition of title, and the Municipality's costs to maintain the Property, to prepare the Property for disposition, and to dispose of the Property) and the cost of the Project, such excess shall be divided equally between the Municipality and the State of New York, the State share of which shall be deposited into the Environmental Restoration Project Account of the Hazardous Waste Remedial Fund. The Municipality agrees to make immediate payment of such excess moneys to the State upon receipt by the Municipality of such excess moneys.

h. If the Commissioner determines that the Municipality has failed to comply

with any of the requirements of applicable State or Federal laws and regulations, or with any of the requirements of this Contract; or if without good cause, as determined by the Department, the Municipality has:

(i) failed to proceed expeditiously with the Project by failing to initiate field work within twelve (12) months of the Department's written approval of its application (or such other time period as the Department may approve on a case-specific basis);

(ii) otherwise failed to proceed with the Project as scheduled;

(iii) failed to complete the Project as approved;

(iv) changed the Project or any portion thereof without the Department's prior written approval,

the Department shall notify the Municipality of such failure, setting forth in writing the reasons for such determination, and shall afford the Municipality a reasonable time within which to cure such failure. Payments under this Contract shall be suspended until the Municipality has cured the failure. If such failure is not eliminated within such period of time, the Department shall notify the Municipality that it is in breach of this Contract. In such case, the Department shall withhold all further State Assistance under this Contract and the Municipality agrees to make repayment of any State Assistance already paid, with interest thereon as provided by law, within 365 days of notification.

3. Recordation and Engineering/Institutional Controls:

a. No later than 45 days after receipt of the duly approved and filed version of this Contract, the Municipality shall record such version of this Contract in the Office of the Recording Officer of the County or Counties where the Property is located and it shall cause the same to be indexed in the Grantor Index under the name of the Municipality if it is the owner, or the owner from whom the Municipality is to acquire the Property, and in the Grantee Index under the name of the Municipality, if it is not the owner, and the State. After recording the Municipality shall provide the Department with evidence of such recording by delivering a certified copy of the recorded Contract to the Department within ten business days following recording.

b. In addition, the Municipality must bind itself and must not enter into a lease concerning, or transfer title to, the Property, or any portion of it, until the Municipality binds itself and its lessees and its successors in title, to the following conditions: that

(i) the Property is remediated under Department oversight in accordance

with the Department's record of decision and that the Property is not used for any purpose until it is so remediated (except that the Property may continue to be used for the purpose for which it is being used as of the start of the term of this Contract if the Department determines that the existing state of contamination is such as not to prohibit such use from continuing, giving due regard for human health and environmental protection);

(ii) if, before the Property's remediation is completed to the Department's satisfaction,

(A) the Municipality wishes to subdivide the Property into separate parcels, it may do so after having submitted a complete application for State assistance to remediate the Property. However, a contaminated parcel of the subdivided Property cannot be used until the Department-determined remedial objectives for that parcel are met to the Department's satisfaction within such time period as the Department may require; and the Municipality must undertake that remediation if State assistance to do so is provided under ECL Article 56, Title 5.

(B) the Municipality's successor in title that itself is not a municipality wishes to subdivide the Property into separate parcels, that successor in title must first agree to remediate all such parcels under Department oversight in accordance with the Department's record of decision and any such parcel cannot be used until such successor in title meets the parcel's Department-determined remedial objectives to the Department's satisfaction within such time period as the Department may require;

(iii) the Property will not be used for any purpose requiring a level of residual contamination lower than that serving as the basis for the remediation identified in the Department's record of decision pertaining to the Property;

(iv) in the event that the Department determines that engineering and/or institutional controls (including deed restrictions) are necessary to allow the Property's contemplated use to proceed or are components of the remedy selected in the Department's record of decision pertaining to the Property, the Municipality will cause the development of a plan and submission to the Department for its review and approval to ensure that such controls are continually maintained in the manner the Department may require. The Municipality and its lessees and successors in title are prohibited from challenging the imposition or continuance of such controls, and failure to implement the Department-approved plan or to maintain such controls constitute a violation of this Contract and for the duration of such failure, ECL 56-0509.1 shall have no force and effect;

(v) the Department will have access to the Property, at times appropriate to the circumstances and subject to the Property's health and safety plan, if any, for purposes

of ensuring that the Property is investigated and remediated in accordance with Department-approved plans, that any operation, maintenance, and monitoring plan for the Property's remediation identified in the record of decision is being implemented satisfactorily, that the engineering and/or institutional controls described in subparagraph 3.b.(iv) are continually maintained in the manner the Department may require, and that the Department may carry out any measures necessary to return the Property to a condition sufficiently protective of human health, in accordance with ECL 56-0509.4; and neither the Municipality nor any of its lessees or successors in title shall interfere with such access.

The Municipality must make this binding commitment by means of a restrictive covenant, a Declaration of Restrictions, or lease provisions which provide that the Department (in addition to the Municipality) may enforce the restrictive covenant, Declaration of Restrictions, or lease provisions, and that the Municipality shall record with the Recording Officer of the County or Counties in which the Property is located within 45 days of the receipt of notice from the Department that the State Comptroller approved this Contract. Such restrictive covenant, Declaration of Restrictions, or lease provisions shall contain: the name of the owner of the Property; a description of the Property and the tax map parcel number of the Property; reference to this Contract; a statement that the terms contained in this Contract and in the restrictive covenant, Declaration of Restrictions, or lease provisions affect the Property and shall run with the land and bind all successive grantees, lessees, sublessees, occupants, and lienors; a statement requiring that any future disposition of the Property or any interest therein, including a security interest, shall make reference to the Contract and to the restrictive covenant, or Declarations of Restrictions, or lease and that such subsequent disposition or security interest is subject to the terms contained in the Contract, restrictive covenant, Declaration of Restrictions, or lease.

c. Further, the Municipality must immediately revise any existing leases concerning the Property, or any portion of it, to ensure that the Property's use will be suspended upon a Department determination that such use cannot continue with sufficient protection of the public health until the conditions giving rise to such determination are addressed to the Department's satisfaction; and the Municipality must provide the Department with access to the Property, at times appropriate to the circumstances and subject to the Property's health and safety plan, if any, for purposes of ensuring that the Property is investigated and remediated in accordance with Department-approved plans, that the operation, maintenance, and monitoring plan for the remedial action selected in the Department's record of decision is being implemented satisfactorily, that the Department may carry out any measures necessary to return the Property to a condition sufficiently protective of human health, in accordance with ECL 56-0509.4, and that neither the Municipality nor any of its lessees or successors in title shall interfere with such access.

4. Recovery from Responsible Parties:

a. The State hereby reserves the right to make all reasonable efforts to recover the full amount of any State Assistance provided under this Contract through litigation brought under Article 56 of the ECL or other statute or under the common law, or through cooperative agreements, with responsible parties, other than the following:

(i) the Municipality; and

(ii) any successor in title to the Property, any lessee of the Property, and any person that provides financing to the Municipality, such successor in title, or such lessee relative to the remediation, restoration, or redevelopment of the Property, that did not generate, arrange for, transport, or dispose, and did not cause the generation, arrangement for, transportation, or disposal of any hazardous substance located at the Property and did not own the Property before the Municipality acquired title to the Property.

b. The Municipality hereby agrees to assist the Department and/or the State in compelling responsible parties to bear the cost of the Project by providing all information to the Department that identifies the Property's responsible parties as of the start of the term of this Contract and all other information acquired during the course of the Project's implementation.

c. The Municipality may make efforts to recover response costs from responsible parties. The Municipality hereby agrees to provide the Department with timely advance written notice of any negotiations, proposed agreements, proposed settlements or legal action by which recovery is sought. The Municipality further agrees not to commence such legal action nor enter into any such proposed agreement or settlement without the approval of the Department.

5. Public Participation:

The Municipality agrees to implement the public participation plan contained in the Workplan in accordance with its terms.

6. Permit Exemptions:

The Municipality and any successor in title to the Property as described in paragraph 4.a(ii) of this Contract is exempt from the requirement to obtain any State or local permit or other authorization for any activity needed to implement the Project that is conducted on the Property so long as the activity is conducted in a manner which satisfies all substantive technical requirements applicable to like activity conducted pursuant to a permit.

7. Project Insurance:

The Municipality shall, before the start of any Approved Activity, require each consultant, contractor, and subcontractor to secure and deliver to the Municipality a policy (or policies) of insurance issued by an insurance company licensed to do business in the State and acceptable to the State that shall name the Municipality and the State as additional insureds. *See* Division of Environmental Remediation TAGM 4005, as may be amended, for descriptions of types of insurance required and their minimum limits. The Municipality shall provide the Department with a copy of the applicable certificate(s) of insurance for its review prior to the commencement of the Project. The Municipality shall provide copies of the applicable insurance policies to the Department upon request.

8. Conflict of Interest:

The Municipality shall insert in its contract with its consultant for the Project the clause for conflict of interest found in Appendix B.

9. Project Management:

a. The Municipality shall complete the Project in accordance with Schedule A - Workplan and any amendments to same approved by the Department.

b. The Municipality hereby agrees to register all known petroleum storage tanks on the Property pursuant to 6 NYCRR 612.2, register all known chemical storage tanks on the Property pursuant to 6 NYCRR 596.2, and properly close all such known tanks, if out-of-service, pursuant to 6 NYCRR 613.9 (in the case of petroleum storage tanks) or 6 NYCRR 598.10 (in the case of chemical storage tanks) within the approved SI/RAR Workplan schedule.

c. The Municipality hereby agrees to remove and properly dispose of hazardous substance found to be stored on the Property in containment vessels other than known storage tanks (such as drums, transformers, sumps, and pits), or where petroleum storage tanks or chemical storage tanks are discovered on the Property during the course of the Property's SI/RAR and such tanks contain hazardous substance, in accordance with all applicable state and federal requirements within the approved SI/RAR Workplan schedule.

d. The Municipality hereby agrees to permit the Department to participate in its meetings and conferences with respect to the Project and to submit to the Department such reports, documents, data, contractual documents, administrative records and other information with respect to the Project as the Department may from time to time reasonably request.

e. The Municipality shall seek prior Department approval of any proposal to use the Municipality's employees to perform Project related activities. Municipal administrative costs associated with the Project are not eligible for reimbursement. The Department will not approve such proposals unless the Municipality can demonstrate that the Municipality's employees possess the necessary competence to perform the work in question and that the work can be more economically performed and done on a timely basis by the use of the Municipality's employees. The cost of any work performed by the Municipality's employees which has not received prior written Department approval shall be excluded from the Project's Eligible Cost used to calculate the State Assistance for the Project. If written Department approval is given to use the Municipality's employees for a specified task or activity, the Municipality shall maintain such records as the Department may require to document the costs of such use.

10. Contemplated Use:

The Municipality represents that the Property will be used for open public space and/ or commercial purposes (" the contemplated use "), and the Municipality agrees for itself and for its lessees and successors in title that any proposed change to the Contemplated Use shall be governed by the provisions of ECL 56-0511 and any regulation of the Department implementing such statute.

11. Inspection:

In addition to subparagraph 3.b(v), the Municipality shall provide the Department unrestricted access to field work during the preparation and progress thereof and shall allow the Department to periodically inspect the Project site to ensure that the use of the Property complies with the terms and conditions of this Contract. The Municipality shall require that provisions be included in all contracts and subcontracts relating to the Project for unrestricted access and inspection by the Department.

12. Compliance with Applicable Laws:

Except with respect to permits waived under paragraph 6 of this Contract, all work performed in relation to the Project by the Municipality or its agents, representatives, or contractors shall conform to all applicable Federal, State and local laws, ordinances, rules and regulations, and standards, including permit requirements. This Contract does not constitute a permit and does not confer upon the applicant the right to engage in the Contemplated Use or any other use of the Property for any particular purpose.

13. Signs:

In recognition of the State Assistance provided for the Project, the Municipality

shall ensure that any identifying signs will note that portions of the Project were assisted by the State under the Clean Water / Clean Air Bond Act of 1996.

14. No Waiver of Remedies:

The Municipality and, except as provided in paragraph 2.h of this Contract, the State shall not be required to make any demand upon, or pursue or exhaust any of its rights or remedies against the Municipality or the State. No delay or omission on the part of either party in exercising any right under this Contract shall operate as a waiver of such right or of any other right under this Contract. A waiver on any occasion shall not be construed as a bar to or a waiver of any right and/or remedy on any other occasion. No waiver or consent shall be binding unless it is in writing and executed by the Department and the Municipality.

15. Appendices and Schedules:

Appendix A, "Standard Clauses for All New York State Contracts"; Appendix B, "Standard Clauses for All New York State Department of Environmental Conservation Contracts"; Rider to Appendix B; Appendix C, "Legal Description of Property"; together with Schedules A and B, are attached to and hereby made a part of this Contract as if set forth fully herein.

16. Totality of Contract; Severability:

This Contract contains all of the provisions, conditions, and promises agreed to between the parties. If any section, paragraph, sentence, clause or word of this Contract shall, for any reason, be held to be invalid or unenforceable, the invalidity or unenforceability of such shall not affect the remainder of this Contract; and this Contract shall be construed and enforced consistent with this express purpose, as if such invalid or unenforceable section or paragraph, sentence, clause, or word had not been contained herein.

17. Term and Effective Date:

The term of this Contract shall start January 26, 2001. This Contract shall end on December 31, 2003. This Contract will be effective upon approval and filing by the State Comptroller in accordance with Section 112 of the State Finance Law.

18. Amendments:

This Contract including the Appendices and Schedules attached hereto, may be amended only by a written instrument signed by both parties and approved by the State Comptroller.

IN WITNESS WHEREOF, the parties have signed this Contract on the day and year indicated beneath their respective signatures. The signatory for the Department provides the following Agency Certification: "In addition to the acceptance of this contract, I also certify that original copies of this signature page will be attached to all other exact copies of this contract."

FOR MUNICIPALITY

By: Thomas C. SullivanState of NEW YORKCounty of Niagara

S.S.:

Title: MAYORDate: 1/25/02

On this 25 day of JANUARY, 2002 before me personally came Thomas C. Sullivan (name) to me known, who being duly sworn, did depose and say that he/she is the Mayor (title) of the City of Tonawanda (name of political subdivision or agency of political subdivision) the political subdivision or agency thereof described in and which executed the within instrument; by authority of the attached certified copy of order, resolution or the ordinance authorizing execution of this contract by said political subdivision, and that he/she signed his/her name by that authority.

By: John J. Ottaviano

Notary Public

Date: 1/25/02

JOHN J. OTTAVIANO, #4876211
Notary Public, State of New York
Qualified in Niagara County

My Commission Expires Oct. 20, 2002

Recommended:

FOR DEPARTMENT

By: Alastair ColeTitle: Assistant Director, DERDate: 2/6/02By: Richard R. RulerTitle: DirectorDate: 2/7/02

Approved as to Form:

APPROVED AS TO FORM
NYS ATTORNEY GENERAL

FEB 08 2002

By: _____

For Attorney General
PETER FAVRETTO
ASSOCIATE ATTORNEY

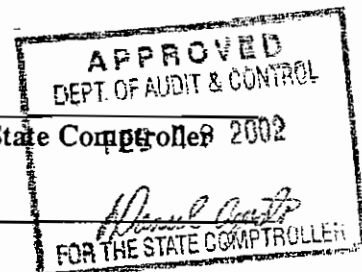
Date: _____

Approved:

By: _____

For State Comptroller 2002

Date: _____



This contract is not effective until it is approved by the State Comptroller and filed in his office (Section 112, State Finance Law).

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
1996 CLEAN WATER / CLEAN AIR BOND ACT
ENVIRONMENTAL RESTORATION PROJECTS-TITLE 5

SCHEDULE A: WORK PLAN (INVESTIGATION)

State Assistance Contract Project #: B00154-9

Project Name: Richmond Avenue

Municipality: City of Lockport

County: Niagara

General Purpose:

The general purpose of this project is to undertake all activities necessary to complete the Project required by this Contract signed between the State of New York and the City of Lockport.

General Scope:

The SI/RA will involve all tasks necessary to investigate the site conditions, determine the public health and environmental impacts of the site, and to utilize this information to develop and evaluate appropriate remedial actions. During the SI/RA, the Municipality will also remove and properly dispose of hazardous substances within all containment vessels, such as drums, tanks and transformers, located on the property.

Specific tasks include: work plan development, site characterization, investigation of off-site impacts, an exposure assessment, development of alternatives, screening of alternatives, post-screening field work, detailed analysis of alternatives, data validation, and citizen participation. Data collection and analysis will provide a sufficient basis for the NYSDEC to prepare a Proposed Remedial Action Plan and present it to the public.

Upon approval of a project-specific work plan by the NYSDEC, it will be attached to and made part of this contract.

General Eligible Cost estimates:

The Project's general estimated Eligible Cost is \$ 360,000. This figure is a reasonable estimate based upon existing knowledge of the Property and the cost estimate included as part of the approved Site Investigation work plan..

estimated total Eligible Cost:	\$ 360,000
estimated Grant Amount:	\$ 270,000

Estimated progress schedule: 35 months

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
1996 CLEAN WATER / CLEAN AIR BOND ACT
ENVIRONMENTAL RESTORATION PROJECTS-TITLE 5

SCHEDULE B: PAYMENT SCHEDULE

State Assistance Contract Project #: B00154-9

Project Name: Richmond Avenue

Municipality: City of Lockport

County: Niagara

Requests for payment will be submitted on a quarterly basis (every three months). An initial payment request may be made upon notification of approval and filing of this Contract by the Office of State Comptroller, to reimburse Eligible Costs accumulated between the date of approval of the Application and the date of execution of this Contract.

A five percent (5%) retainage will be withheld at the discretion of the Department from all payment requests until the completion of the Project. Retainages will be released when the Department issues its record of decision concerning the Property or after the final engineering certification report is acceptable to the Department.

**APPENDIX A
STANDARD CLAUSES FOR ALL
NEW YORK STATE CONTRACTS**

The parties to the attached contract, license, lease, amendment or other agreement of any kind (hereinafter, "the contract" or "this contract") agree to be bound by the following clauses which are hereby made a part of the contract (the word "Contractor" herein refers to any party other than the State, whether a contractor, licensor, licensee, lessor, lessee or any other party):

1. EXECUTORY CLAUSE. In accordance with Section 41 of the State Finance Law, the State shall have no liability under this contract to the Contractor or to anyone else beyond funds appropriated and available for this contract.

2. NON-ASSIGNMENT CLAUSE. In accordance with Section 138 of the State Finance Law, this contract may not be assigned by the Contractor or its right, title or interest therein assigned, transferred conveyed, sublet or otherwise disposed of without the previous consent, in writing, of the State and any attempts to assign the contract without the State's written consent are null and void. The Contractor may, however, assign its right to receive payment without the State's prior written consent unless this contract concerns Certificates of Participation pursuant to Article 5-A of the State Finance law.

3. COMPTROLLER'S APPROVAL. In accordance with Section 112 of the State Finance Law (or, if this contract is with the State University or City University of New York, Section 355 or Section 6218 of the Education Law), if this contract exceeds \$10,000 (or the minimum thresholds agreed to by the Office of the State Comptroller for certain S.U.N.Y. and C.U.N.Y. contracts), or if this is an amendment for any amount to a contract which, as so amended, exceeds said statutory amount, or if, by this contract, the State agrees to give something other than money when the value or reasonably estimated value of such consideration exceeds \$15,000, it shall not be valid, effective or binding upon the State until it has been approved by the State Comptroller and filed in his office.

4. WORKERS' COMPENSATION BENEFITS. In accordance with Section 142 of the State Finance Law, this contract shall be void and of no force and effect unless the Contractor shall provide and maintain coverage during the life of this contract for the benefit of such employees as are required to be covered by the

provisions of the Workers' Compensation Law.

5. NON-DISCRIMINATION REQUIREMENTS. In accordance with Article 15 of the Executive Law (also known as the Human Rights Law) and all other State and Federal statutory and constitutional non-discrimination provisions, the Contractor will not discriminate against any employee or applicant for employment because of race, creed, color, sex, national origin, age, disability or marital status. Furthermore, in accordance with Section 220-e of the Labor Law, if this is a contract for the construction, alteration or repair of any public building or public work or for the manufacture, sale or distribution of materials, equipment or supplies, and to the extent that this contract shall be performed within the State of New York, Contractor agrees that neither it nor its subcontractors shall, by reason of race, creed, color, disability, sex, or national origin: (a) discriminate in hiring against any New York State citizen who is qualified and available to perform the work; or (b) discriminate against or intimidate any employee hired for the performance of work under this contract. If this is a building service contract as defined in Section 230 of the Labor Law, then, in accordance with Section 239 thereof, Contractor agrees that neither it nor its subcontractors shall by reason of race, creed, color, national origin, age, sex, or disability: (a) discriminate in hiring against any New York State citizen who is qualified and available to perform the work; or (b) discriminate against or intimidate any employee hired for the performance of work under this contract. Contractor is subject to fines of \$50.00 per person per day for any violation of Section 220-e or Section 239 as well as possible termination of this contract and forfeiture of all moneys due hereunder for a second or subsequent violation.

6. WAGE AND HOURS PROVISIONS. If this is a public work contract covered by Article 8 of the Labor Law or a building service contract covered by Article 9 thereof, neither Contractor's employees nor the employees of its subcontractors may be required or permitted to work more than the number of hours or days stated in said statutes, except as otherwise provided in the Labor law and as set forth in prevailing wage and supplement schedules issued by the State Labor Department. Furthermore, Contractor and its subcontractors must pay at least the prevailing wage rate and pay or provide the prevailing supplements, including the premium rates for overtime pay, as determined by the State Labor Department in accordance with the Labor Law.

7. NON-COLLUSIVE BIDDING REQUIREMENT. In accordance with Section 139-d of the State Finance

Law, if this contract was awarded based upon the submission of bids, Contractor warrants, under penalty of perjury, that its bid was arrived at independently and without collusion aimed at restricting competition. Contractor further warrants that, at the time Contractor submitted its bid, an authorized and responsible person executed and delivered to the State a non-collusive bidding certification on Contractor's behalf.

8. INTERNATIONAL BOYCOTT PROHIBITION.

In accordance with Section 220-f of the Labor Law and Section 139-h of the State Finance Law, if this contract exceeds \$5,000, the Contractor agrees, as a material condition of the contract, that neither the Contractor nor any substantially owned or affiliated person, firm, partnership or corporation has participated, is participating, or shall participate in an international boycott in violation of the federal Export Administration Act of 1979 (50 USC App. Sections 2401 et seq.) or regulations thereunder. If such Contractor, or any of the aforesaid affiliates of Contractor, is convicted or is otherwise found to have violated said laws or regulations upon the final determination of the United States Commerce Department or any other appropriate agency of the United States subsequent to the contractors execution, such contract, amendment or modification thereto shall be rendered forfeit and void. The Contractor shall so notify the State Comptroller within five (5) business days of such conviction, determination or disposition of appeal (2NYCRR 105.4).

9. SET-OFF RIGHTS. The State shall have all of its common law, equitable and statutory rights of set-off. These rights shall include, but not be limited to, the State's option to withhold for the purposes of set-off any moneys due to the Contractor under this contract up to any amounts due and owing to the State with regard to this contract, any other contract with any State department or agency, including any contract for a term commencing prior to the term of this contract, plus any amounts due and owing to the State for any other reason including, without limitation, tax delinquencies, fee delinquencies or monetary penalties relative thereto. The State shall exercise its set-off rights in accordance with normal State practices including, in cases of set-off pursuant to an audit, the finalization of such audit by the State agency, its representatives, or the State Comptroller.

10. RECORDS. The Contractor shall establish and maintain complete and accurate books, records, documents, accounts and other evidence directly pertinent to performance under this contract (hereinafter, collectively, "the Records"). The Records must be kept for the balance of the calendar

year in which they were made and for six (6) additional years thereafter. The State Comptroller, the Attorney General and any other person or entity authorized to conduct an examination, as well as the agency or agencies involved in this contract, shall have access to the Records during normal business hours at an office of the Contractor within the State of New York or, if no such office is available, at a mutually agreeable and reasonable venue within the State, for the term specified above for the purposes of inspection, auditing and copying. The State shall take reasonable steps to protect from public disclosure any of the Records which are exempt from disclosure under Section 87 of the Public Officers Law (the "Statute") provided that: (i) the Contractor shall timely inform an appropriate State official, in writing, that said records should not be disclosed; and (ii) said records shall be sufficiently identified; and (iii) designation of said records as exempt under the Statute is reasonable. Nothing contained herein shall diminish, or in any way adversely affect, the State's right to discovery in any pending or future litigation.

11. IDENTIFYING INFORMATION AND PRIVACY NOTIFICATION.

(a) FEDERAL EMPLOYER IDENTIFICATION NUMBER and/or FEDERAL SOCIAL SECURITY NUMBER. All invoices or New York State standard vouchers submitted for payment for the sale of goods or services or the lease of real or personal property to a New York State agency must include the payee's identification number, i.e., the seller's or lessor's identification number. The number is either the payee's Federal employer identification number or Federal social security number, or both such numbers when the payee has both such numbers. Failure to include this number or numbers may delay payment. Where the payee does not have such number or numbers, the payee, on its invoice or New York State standard voucher, must give the reason or reasons why the payee does not have such number or numbers.

(B) PRIVACY NOTIFICATION. (1) The authority to request the above personal information from a seller of goods or services or a lessor of real or personal property, and the authority to maintain such information, is found in Section 5 of the State Tax Law. Disclosure of this information by the seller or lessor to the State is mandatory. The principal purpose for which the information is collected is to enable the State to identify individuals, businesses and others who have been delinquent in filing tax returns or may have understated their tax liabilities and to generally identify persons affected by the taxes administered by the Commissioner of Taxation and Finance. The information will be used for tax administration purpose and for any other purpose

authorized by law.

(2) The personal information is requested by the purchasing unit of the agency contracting to purchase the goods or services or lease "the real or personal property covered by this contract or lease. The information is maintained in New York State's Central Accounting System by the Director of Accounting Operations, Office of the State Comptroller, AESOB, Albany, New York 12236.

12. EQUAL EMPLOYMENT OPPORTUNITIES FOR MINORITIES AND WOMEN.

In accordance with Section 312 of the Executive law, if this contract is: (i) a written agreement or purchase order instrument, providing for a total expenditure in excess of \$25,000.00, whereby a contracting agency is committed to expend or does expend funds in return for labor, services, supplies, equipment, materials or any combination of the foregoing, to be performed for, or rendered or furnished to the contracting agency; or (ii) a written agreement in excess of \$100,000.00 whereby a contracting agency is committed to expend or does expend funds for the acquisition, construction, demolition, replacement, major repair or renovation of real property and improvements thereon; or (iii) a written agreement in excess of \$100,000.00 whereby the owner of a State assisted housing project is committed to expend or does expend funds for the acquisition, construction, demolition, replacement, major repair or renovation of real property and improvements thereon for such project, then: (a) The Contractor will not discriminate against employees or applicants for employment because of race, creed, color, national origin, sex, age, disability or marital status, and will undertake or continue existing programs of affirmative action to ensure that minority group members and women are afforded equal employment opportunities without discrimination. Affirmative action shall mean recruitment, employment, job assignment, promotion, upgradings, demotion, transfer, layoff, or termination and rates of pay or other forms of compensation;

(b) at the request of the contracting agency, the Contractor shall request each employment agency, labor union, or authorized representative of workers with which it has a collective bargaining or other agreement or understanding, to furnish a written statement that such employment agency, labor union or representative will not discriminate on the basis of race, creed, color, national origin, sex, age, disability or marital status and that such union or representative will affirmatively cooperate in the implementation of the contractor's obligations herein; and

(c) the Contractor shall state, in all solicitations or

advertisements for employees, that, in the performance of the State contract, all qualified applicants will be afforded equal employment opportunities without discrimination because of race, creed, color, national origin, sex, age, disability or marital status.

Contractor will include the provisions of "a", "b", and "c" above, in every subcontract over \$25,000.00 for the construction, demolition, replacement, major repair, renovation, planning or design of real property and improvements thereon (the Work) except where the Work is for the beneficial use of the Contractor. Section 312 does not apply to: (i) work, goods or services unrelated to this contract; or (ii) employment outside New York State; or (iii) banking services, insurance policies or the sale of securities. The State shall consider compliance by a contractor or subcontractor with the requirements of any federal law concerning equal employment opportunity which effectuates the purpose of this section. The contracting agency shall determine whether the imposition of the requirements of the provisions hereof duplicate or conflict with any such federal law and if such duplication or conflict exists, the contracting agency shall waive the applicability of Section 312 to the extent of such duplication or conflict. Contractor will comply with all duly promulgated and lawful rules and regulations of the Division of Minority and Women's Business Development pertaining hereto.

13. CONFLICTING TERMS. In the event of a conflict between the terms of the contract (including any and all attachments thereto and amendments thereof) and the terms of this Appendix A, the terms of this Appendix A shall control.

14. GOVERNING LAW. This contract shall be governed by the laws of the State of New York except where the Federal supremacy clause requires otherwise.

15. LATE PAYMENT. Timeliness of payment and any interest to be paid to Contractor for late payment shall be governed by Article XI-A of the State Finance Law to the extent required by law.

16. NO ARBITRATION. Disputes involving this contract, including the breach or alleged breach thereof, may not be submitted to binding arbitration (except where statutorily authorized), but must, instead, be heard in a court of competent jurisdiction of the State of New York.

17. SERVICE OF PROCESS. In addition to the methods of service allowed by the State Civil Practice

Law & Rules ("CPLR"), Contractor hereby consents to service of process upon it by registered or certified mail, return receipt requested. Service hereunder shall be complete upon Contractor's actual receipt of process or upon the State's receipt of the return thereof by the United States Postal Service as refused or undeliverable. Contractor must promptly notify the State, in writing, of each and every change of address to which service of process can be made. Service by the State to the last known address shall be sufficient. Contractor will have thirty (30) calendar days after service hereunder is complete in which to respond.

18. PROHIBITION ON PURCHASE OF TROPICAL HARDWOODS. The Contractor certifies and warrants that all wood products to be used under this contract award will be in accordance with, but not limited to, the specifications and provisions of State Finance Law §165. (Use of Tropical Hardwoods) which prohibits purchase and use of tropical hardwoods, unless specifically exempted, by the State or any governmental agency or political subdivision or public benefit corporation. Qualification for an exemption under this law will be the responsibility of the contractor to establish to meet with the approval of the State.

In addition, when any portion of this contract involving the use of woods, whether supply or installation, is to be performed by any subcontractor, the prime Contractor will indicate and certify in the submitted bid proposal that the subcontractor has been informed and is in compliance with specifications and provisions regarding use of tropical hardwoods as detailed in §165 State Finance Law. Any such use must meet with the approval of the State, otherwise, the bid may not be considered responsive. Under bidder certifications, proof of qualification for exemption will be the responsibility of the Contractor to meet with the approval of the State.

19. MACBRIDE FAIR EMPLOYMENT PRINCIPLES. In accordance with the MacBride Fair Employment Principles (Chapter 807 of the Laws of 1992), the Contractor hereby stipulates that the Contractor either (a) has no business operations in Northern Ireland, or (b) shall take lawful steps in good faith to conduct any business operations in Northern Ireland in accordance with the MacBride Fair Employment Principles (as described in Section 165 of the New York State Finance Law), and shall permit independent monitoring of compliance with such principles.

20. OMNIBUS PROCUREMENT ACT OF 1992. It is the policy of New York State to maximize opportunities for the participation of New York State

business enterprises, including minority and women-owned business enterprises as bidders, subcontractors and suppliers on its procurement contracts.

Information on the availability of New York State subcontractors and suppliers is available from:

Department of Economic Development
Division for Small Business
30 South Pearl Street
Albany, New York 12245
Tel. 518-292-5220

A directory of certified minority and women-owned business enterprises is available from:

Department of Economic Development
Minority and Women's Business
Development Division
30 South Pearl Street
Albany, New York 12245
<http://www.empire.state.ny.us>

The Omnibus Procurement Act of 1992 requires that by signing this bid proposal or contract, as applicable, Contractors certify that whenever the total bid amount is greater than \$1 million:

(a) The Contractor has made reasonable efforts to encourage the participation of New York State Business Enterprises as suppliers and subcontractors, including certified minority and women-owned business enterprises, on this project, and has retained the documentation of these efforts to be provided upon request to the State;

(b) The Contractor has complied with the Federal Equal Opportunity Act of 1972 (P.L. 92-261), as amended;

(c) The Contractor agrees to make reasonable efforts to provide notification to New York State residents of employment opportunities on this project through listing any such positions with the Job Service Division of the New York State Department of Labor, or providing such notification in such manner as is consistent with existing collective bargaining contracts or agreements. The Contractor agrees to document these efforts and to provide said documentation to the State upon request; and

(d) The Contractor acknowledges notice that the State may seek to obtain offset credits from foreign countries as a result of this contract and agrees to cooperate with the State in these efforts.

21. RECIPROCITY AND SANCTIONS

PROVISIONS. Bidders are hereby notified that if their principal place of business is located in a country, nation, province, state or political subdivision that penalizes New York State vendors, and if the goods or services they offer will be substantially produced or performed outside New York State, the Omnibus Procurement Act 1994 and 2000 amendments (Chapter 684 and Chapter 383, respectively) require that they be denied contracts which they would otherwise obtain. Contact the Department of Economic Development, Division for Small Business, 30 South Pearl Street; Albany New York 12245, for a current list of states subject to this provision.

Revised November 2000

APPENDIX B

Standard Clauses for All New York State Department
of Environmental Conservation Contracts

The parties to the attached contract, license, lease, grant, amendment or other agreement of any kind (hereinafter "the contract" or "this contract") agree to be bound by the following clauses which are hereby made a part of the contract. The word "Contractor" herein refers to any party to the contract, other than the New York State Department of Environmental Conservation (hereinafter "Department").

I. Postponement, suspension, abandonment or termination by the Department: The Department shall have the right to postpone, suspend, abandon or terminate this contract, and such actions shall in no event be deemed a breach of contract. In the event of any termination, postponement, delay, suspension or abandonment, the Contractor shall immediately stop work, take steps to incur no additional obligations, and to limit further expenditures. Within 15 days of receipt of notice, the Contractor shall deliver to the Department all data, reports, plans, or other documentation related to the performance of this contract, including but not limited to source codes and specifications, guarantees, warranties, as-built plans and shop drawings. In any of these events, the Department shall make settlement with the Contractor upon an equitable basis as determined by the Department which shall fix the value of the work which was performed by the Contractor prior to the postponement, suspension, abandonment or termination of this contract. This clause shall not apply to this contract if the contract contains other provisions applicable to postponement, suspension or termination of the contract.

II. Indemnification and Holdharmless The Contractor agrees that it will indemnify and save harmless the Department and the State of New York from and against all losses from claims, demands, payments, suits, actions, recoveries and judgments of every nature and description brought or recovered against it by reason of any omission or tortious act of the Contractor, its agents, employees, suppliers or subcontractors in the performance of this contract. The Department and the State of New York may retain such monies from the amount due Contractor as may be necessary to satisfy any claim for damages, costs and the like, which is asserted against the Department and/or the State of New York.

III. Conflict of Interest (a) Organizational Conflict of Interest. To the best of the Contractor's knowledge and belief, the Contractor warrants that there are no relevant facts or circumstances which could give rise to an organizational conflict of interest, as herein defined, or that the Contractor has disclosed all such relevant information to the Department.

(1) An organizational conflict of interest exists when the nature of the work to be performed under this contract may, without some restriction on future activities, impair or appear to impair the Contractor's objectivity in performing the work for the Department.

(2) The Contractor agrees that if an actual, or potential organizational conflict of interest is discovered at any time after award, whether before or during performance, the Contractor will immediately make a full disclosure in writing to the Department. This disclosure shall include a description of actions which the Contractor has taken or proposes to take, after consultation with the Department, to avoid, mitigate, or minimize the actual or potential conflict.

(3) To the extent that the work under this contract requires access to personal, proprietary or confidential business or financial data of persons or other companies, and as long as such data remains proprietary or confidential, the Contractor shall protect such data from unauthorized use and disclosure and agrees not to use it to compete with such companies.

(b) Personal Conflict of Interest: The following provisions with regard to management or professional level employee personnel performing under this contract shall apply until the earlier of the termination date of the affected employee(s) or the duration of the contract.

(1) A personal conflict of interest is defined as a relationship of an employee, subcontractor employee, or consultant with an entity that may impair or appear to impair the objectivity of the employee, subcontractor employee, or consultant in performing the contract work. The Contractor agrees to notify the Department immediately of any actual, or potential personal conflict of interest with regard to any such person working on or having access to information regarding this contract, as

soon as Contractor becomes aware of such conflict. The Department will notify the Contractor of the appropriate action to be taken.

(2) The Contractor agrees to advise all management or professional level employees involved in the work of this contract, that they must report any personal conflicts of interest to the Contractor. The Contractor must then advise the Department which will advise the Contractor of the appropriate action to be taken.

(3) Unless waived by the Department, the Contractor shall certify annually that, to the best of the Contractor's knowledge and belief, all actual, apparent or potential conflicts of interest, both personal and organizational, as defined herein, have been reported to the Department. Such certification must be signed by a senior executive of the Contractor and submitted in accordance with instructions provided by the Department. Along with the annual certification, the Contractor shall also submit an update of any changes in any conflict of interest plan submitted with its proposal for this contract. The initial certification shall cover the one-year period from the date of contract award, and all subsequent certifications shall cover successive annual periods thereafter. The certification is to be submitted no later than 45 days after the close of the previous certification period covered.

(4) In performing this contract, the Contractor recognizes that its employees may have access to data, either provided by the Department or first generated during contract performance, of a sensitive nature which should not be released without Department approval. If this situation occurs, the Contractor agrees to obtain confidentiality agreements from all affected employees working on requirements under this contract including subcontractors and consultants. Such agreements shall contain provisions which stipulate that each employee agrees not to disclose, either in whole or in part, to any entity external to the Department, Department of Health or the New York State Department of Law, any information or data provided by the Department or first generated by the Contractor under this contract, any site-specific cost information, or any enforcement strategy without first obtaining the written permission of the Department. If a Contractor, through an employee or otherwise, is subpoenaed to testify or produce documents, which could result in such disclosure, the Contractor must provide immediate advance notification to the Department so that the Department can authorize such disclosure or have the opportunity to take action to prevent such disclosure. Such agreements shall be effective for the life of the contract and for a period of five (5) years after completion of the contract.

(c) Remedies - The Department may terminate this contract in whole or in part, if it deems such termination necessary to avoid an organizational or personal conflict of interest, or an unauthorized disclosure of information. If the Contractor fails to make required disclosures or misrepresents relevant information to the Department, the Department may terminate the contract, or pursue such other remedies as may be permitted by the terms of Clause I of this Appendix or other applicable provisions of this contract regarding termination.

(d) The Contractor will be ineligible to make a proposal or bid on a contract for which the Contractor has developed the statement of work or the solicitation package

(e) The Contractor agrees to insert in each subcontract or consultant agreement placed hereunder (except for subcontracts or consultant agreements for well drilling, fence erecting, plumbing, utility hookups, security guard services, or electrical services) provisions which shall conform substantially to the language of this clause, including this paragraph (e), unless otherwise authorized by the Department.

If this is a contract for work related to action at an inactive hazardous waste site, the following paragraph shall apply to those Contractors whose work requires the application of professional judgment: It does not apply to construction contracts.

(f) Due to the scope and nature of this contract, the Contractor shall observe the following restrictions on future hazardous waste site contracting for the duration of the contract.

(1) The Contractor, during the life of the work assignment and for a period of three (3) years after the completion of the work assignment, agrees not to enter into a contract with or to represent any party with respect to any work relating to remedial activities or work pertaining to a site where the Contractor previously performed work for the Department under this contract without the prior written approval of the Department.

(2) The Contractor agrees in advance that if any bids/proposals are submitted for any work for a third party that would require written approval of the Department prior to entering into a contract because of the restrictions of this clause, then the bids/proposals are submitted at the Contractor's own risk, and no claim

shall be made against the Department to recover bid/proposal costs as a direct cost whether the request for authorization to enter into the contract is denied or approved.

IV. Requests for Payment All requests for payment by the Contractor must be submitted on forms supplied and approved by the Department. Each payment request must contain such items of information and supporting documentation as are required by the Department, and shall be all-inclusive for the period of time covered by the payment request.

V. Compliance with Federal requirements To the extent that federal funds are provided to the Contractor or used in paying the Contractor under this contract, the Contractor agrees that it will comply with all applicable federal laws and regulations, including but not limited to those laws and regulations under which the Federal funds were authorized. The Contractor further agrees to insert in any subcontract hereunder, provisions which shall conform substantially to the language of this clause.

VI. Independent Contractor The Contractor shall have the status of an independent contractor. Accordingly, the Contractor agrees that it will conduct itself in a manner consistent with such status, and that it will neither hold itself out as, nor claim to be, an officer or employee of the Department by reason of this contract. It further agrees that it will not make any claim, demand or application to the Department for any right or privilege applicable to an officer or employee of the Department, including but not limited to worker's compensation coverage, unemployment insurance benefits, social security coverage, or retirement membership or credit.

VII. Article 15-A Requirements The terms contained in this clause shall have the definitions as given in, and shall be construed according to the intent of Article 15-A of the Executive Law, 5 NYCRR Part 140, et. seq., Article 52 of the Environmental Conservation Law and 6 NYCRR Part 615, et. seq., as applicable, and any goals established by this clause are subject to the intent of such laws and regulations.

(a) If the maximum contract price herein equals or exceeds \$25,000, and this contract is for labor, services, supplies, equipment, or materials; or

(b) If the maximum contract price herein equals or exceeds \$100,000 and this contract is for the acquisition, construction, demolition, replacement, major repair or

renovation of real property and improvements thereon; then

(c) The affirmative action provisions and equal employment opportunity provisions contained in this paragraph and paragraphs (d) and (e) of this clause shall be applicable within the limitations established by Executive Law §§312 and 313 and the applicable regulations.

(1) The Contractor is required to make good faith efforts to subcontract at least 6 % of the dollar value of this contract to Minority Owned Business Enterprises (MBEs) and at least 6 % of such value to Women Owned Business Enterprises (WBEs).

(2) The Contractor is required to make good faith efforts to employ or contractually require any Subcontractor with whom it contracts to make good faith efforts to employ minority group members for at least 10 % of, and women for at least 10 % of, the workforce hours required to perform the work under this contract.

(3) The Contractor is required to make good faith efforts to solicit the meaningful participation by enterprises identified in the NYS Directory of Certified Businesses provided by:

Empire State Development Corp.
Div. Minority & Women's Business Development
30 South Pearl Street
Albany, New York 12245
Phone: (518) 292-5250
Fax: (518) 292-5803
and

Empire State Development Corp.
633 Third Avenue
New York, NY 10017
Phone: (212) 803-2414
Fax: (212) 803-3223

internet: www.empire.state.ny.us/esd.htm

(d) The Contractor agrees to include the provisions set forth in paragraphs (a), (b) and (c) above and paragraphs (a), (b), and (c) of clause 12 of Appendix A in every subcontract in such a manner that the provisions will be binding upon each Subcontractor as to work under such subcontract. For the purpose of this paragraph, a "subcontract" shall mean an agreement providing for a total expenditure in excess of \$25,000 for the construction, demolition, replacement, major repair, renovation, planning or

design of real property and improvements thereon in which a portion of the Contractor's obligation under a State contract is undertaken or assumed.

(e) The Contractor is required to make good faith efforts to utilize the MBE/WBEs identified in the utilization plan to the extent indicated in such plan, and otherwise to implement it according to its terms. The Contractor is requested to report on such implementation periodically as provided by the contract, or annually, whichever is more frequent.

VIII. Compliance with applicable laws

(a) Prior to the commencement of any work under this contract, the Contractor is required to meet all legal requirements necessary in the performance of the contract. This includes but is not limited to compliance with all applicable federal, state and local laws and regulations promulgated thereunder. It is the Contractor's responsibility to obtain any necessary permits, or other authorizations. By signing this contract, the Contractor affirmatively represents that it has complied with said laws, unless it advises the Department otherwise, in writing. The Department signs this contract in reliance upon this representation.

(b) During the term of this contract, and any extensions thereof, the Contractor must remain in compliance with said laws. A failure to notify the Department of noncompliance of which the Contractor was or should have been aware, may be considered a material breach of this contract.

IX. **Dispute Resolution** The parties agree to the following steps, or as many as are necessary to resolve disputes between the Department and the Contractor.

(a) The Contractor specifically agrees to submit, in the first instance, any dispute relating to this contract to the designated individual, who shall render a written decision and furnish a copy thereof to the Contractor.

(1) The Contractor must request such decision in writing no more than fifteen days after it knew or should have known of the facts which are the basis of the dispute.

(2) The decision of the designated individual shall be the final agency determination, unless the Contractor files a written appeal of that decision with the designated appeal individual ("DAI") within twenty days of receipt of that decision.

(b) Upon receipt of the written appeal, the DAI, will review the record and decision. Following divisional procedures in effect at that time, the DAI will take one of the following actions, with written notice to the Contractor.

(1) Remand the matter to the program staff for further negotiation or information if it is determined that the matter is not ripe for review; or

(2) Determine that there is no need for further action, and that the determination of the designated individual is confirmed; or

(3) Make a determination on the record as it exists.

(c) The decision of the DAI shall be the final agency decision unless the Contractor files a written appeal of that decision with the Chair of the Contract Review Committee ("CRC") within twenty days of receipt of that decision.

The designated individual to hear disputes is:

Edward Belmore
Bureau Director - Western Remedial Action
Division of Environmental Remediation
625 Broadway, 11th Floor
Albany, NY 12233-7017
(518) 402-9662

The designated appeal individual to review decisions is:

Salvatore Ervolina
Assistant Director
Division of Environmental Remediation
625 Broadway, 12th Floor
Albany, NY 12233-7010
(518) 402-9706

The Chair of the Contract Review Committee is:

Department of Environmental Conservation
Richard K. Randles, Chair
Contract Review Committee
625 Broadway, 10th Floor
Albany, NY 12233-5010
Telephone: (518) 402-9237

(d) Upon receipt of the written appeal, the Chair of the CRC, in consultation with the members of the CRC and the Office of General Counsel, will take one of the following actions, or a combination thereof, with written notice to the Contractor.

(1) Remand the matter to program staff for

additional fact finding, negotiation, or other appropriate action; or

(2) Adopt the decision of the DAI; or

(3) Consider the matter for review by the CRC in accordance with its procedures.

(e) Following a decision to proceed pursuant to (d) 3, above, the Chair of the CRC shall convene a proceeding in accordance with the CRC's established contract dispute resolution guidelines. The proceeding will provide the Contractor with an opportunity to be heard.

(f) Following a decision pursuant to (d) 2 or (d) 3, the CRC shall make a written recommendation to the Assistant Commissioner for Administration who shall render the final agency determination.

(g) At any time during the dispute resolution process, and upon mutual agreement of the parties, the Office of Hearings and Mediation Services (OHMS) may be requested to provide mediation services or other appropriate means to assist in resolving the dispute. Any findings or recommendations made by the OHMS will not be binding on either party.

(h) Final agency determinations shall be subject to review only pursuant to Article 78 of the Civil Practice Law and Rules.

(i) Pending final determination of a dispute hereunder, the Contractor shall proceed diligently with the performance of the Contract in accordance with the decision of the designated individual. Nothing in this Contract shall be construed as making final the decision of any administrative officer upon a question of law.

(j) (1) Notwithstanding the foregoing, at the option of the Contractor, the following shall be subject to review by the CRC: Disputes arising under Article 15-A of the Executive Law (Minority and Women Owned Business participation), the Department's determination with respect to the adequacy of the Contractor's Utilization Plan, or the Contractor's showing of good faith efforts to comply therewith. A request for a review before the CRC should be made, in writing, within twenty days of receipt of the Department's determination.

(2) The CRC will promptly convene a review in accordance with Article 15-A of the Executive Law

and the regulations promulgated thereunder.

X. Labor Law Provisions

(a) When applicable, the Contractor shall post, in a location designated by the Department, a copy of the New York State Department of Labor schedules of prevailing wages and supplements for this project, a copy of all re-determinations of such schedules for the project, the Workers' Compensation Law Section 51 notice, all other notices required by law to be posted at the site, the Department of Labor notice that this project is a public work project on which each worker is entitled to receive the prevailing wages and supplements for their occupation, and all other notices which the Department directs the Contractor to post. The Contractor shall provide a surface for such notices which is satisfactory to the Department. The Contractor shall maintain such notices in a legible manner and shall replace any notice or schedule which is damaged, defaced, illegible or removed for any reason. Contractor shall post such notices before commencing any work on the site and shall maintain such notices until all work on the site is complete.

(b) When appropriate, contractor shall distribute to each worker for this Contract a notice, in a form provided by the Department, that this project is a public work project on which each worker is entitled to receive the prevailing wage and supplements for the occupation at which he or she is working. Worker includes employees of Contractor and all Subcontractors and all employees of suppliers entering the site. Such notice shall be distributed to each worker before they start performing any work of this contract. At the time of distribution, Contractor shall have each worker sign a statement, in a form provided by the Department, certifying that the worker has received the notice required by this section, which signed statement shall be maintained with the payroll records required by the following paragraph (c).

(c) Contractor shall maintain on the site the original certified payrolls or certified transcripts thereof which Contractor and all of its Subcontractors are required to maintain pursuant to the New York Labor Law Section 220. Contractor shall maintain with the payrolls or transcripts thereof, the statements signed by each worker pursuant to paragraph (b).

(d) Within thirty days of issuance of the first payroll, and every thirty days thereafter, the Contractor and every subcontractor must submit a transcript of the original payroll to the Department, which transcript

must be subscribed and affirmed as true under penalty of perjury.

XI. Offset In accordance with State Law, the Department has the authority to administratively offset any monies due it from the Contractor, from payments due to the Contractor under this contract. The Department may also (a) assess interest or late payment charges, and collection fees, if applicable; (b) charge a fee for any dishonored check; (c) refuse to renew certain licenses and permits.

XII. Tax Exemption Pursuant to Tax Law Section 1116, the State is exempt from sales and use taxes. A standard state voucher is sufficient evidence thereof. For federal excise taxes, New York's registration Number 14740026K covers tax-free transactions under the Internal Revenue Code.

XIII. Litigation Support In the event that the Department becomes involved in litigation related to the subject matter of this contract, the Contractor agrees to provide background support and other litigation support, including but not limited to depositions, appearances, and testimony. Compensation will be negotiated and based on rates established in the contract, or as may otherwise be provided in the contract.

XIV. Equipment Any equipment purchased with funds provided under this contract, shall remain the property of the Department, unless otherwise provided in the contract. The Contractor shall be liable for all costs for maintaining the property in good, usable condition. It shall be returned to the Department upon completion of the contract, in such condition, unless the Department elects to sell the equipment to the Contractor, upon mutually agreeable terms.

XV. Inventions or Discoveries Any invention or discovery first made in performance of this Contract shall be the property of the Department, unless otherwise provided in the contract. The Contractor agrees to provide the Department with any and all materials related to this property. At the Department's option, the Contractor may be granted a non-exclusive license.

XVI. Patent and Copyright Protection If any patented or copyrighted material is involved in or results from the performance of this Contract, this Article shall apply.
(a) The Contractor shall, at its expense, defend any

suit instituted against the Department and indemnify the Department against any award of damages and costs made against the Department by a final judgment of a court of last resort based on the claim that any of the products, services or consumable supplies furnished by the Contractor under this Contract infringes any patent, copyright or other proprietary right; provided the Department gives the Contractor:

(1) prompt written notice of any action, claim or threat of infringement suit, or other suit, and

(2) the opportunity to take over, settle or defend such action at the Contractor's sole expense, and

(3) all available information, assistance and authority necessary to the action, at the Contractor's sole expense.

The Contractor shall control the defense of any such suit, including appeals, and all negotiations to effect settlement, but shall keep the Department fully informed concerning the progress of the litigation.

(b) If the use of any item(s) or parts thereof is held to infringe a patent or copyright and its use is enjoined, or Contractor believes it will be enjoined, the Contractor shall have the right, at its election and expense to take action in the following order of precedence:

(1) procure for the Department the right to continue using the same item or parts thereof;

(2) modify the same so that it becomes non-infringing and of at least the same quality and performance;

(3) replace the item(s) or parts thereof with noninfringing items of at least the same quality and performance;

(4) if none of the above remedies are available, discontinue its use and eliminate any future charges or royalties pertaining thereto. The Contractor will buy back the infringing product(s) at the State's book value, or in the event of a lease, the parties shall terminate the lease. If discontinuation or elimination results in the Contractor not being able to perform the Contract, the Contract shall be terminated.

(c) In the event that an action at law or in equity is commenced against the Department arising out of a claim that the Department's use of any item or material pursuant to or resulting from this Contract

infringes any patent, copyright or proprietary right, and such action is forwarded by the Department to the Contractor for defense and indemnification pursuant to this Article, the Department shall copy all pleadings and documents forwarded to the Contractor together with the forwarding correspondence and a copy of this Contract to the Office of the Attorney General of the State of New York. If upon receipt of such request for defense, or at any time thereafter, the Contractor is of the opinion that the allegations in such action, in whole or in part, are not covered by the indemnification set forth in this Article, the Contractor shall immediately notify the Department and the Office of the Attorney General of the State of New York in writing and shall specify to what extent the Contractor believes it is and is not obligated to defend and indemnify under the terms and conditions of this Contract. The Contractor shall in such event protect the interests of the Department and State of New York and secure a continuance to permit the State of New York to appear and defend its interests in cooperation with Contractor as is appropriate, including any jurisdictional defenses which the Department and State shall have.

(d) The Contractor shall, however, have no liability to the Department under this Article if any infringement is based upon or arises out of: (1) compliance with designs, plans, or specifications furnished by or on behalf of the Department as to the items; (2) alterations of the items by the Department; (3) failure of the Department to use updated items provided by the Contractor for avoiding infringement; (4) use of items in combination with apparatus or devices not delivered by the Contractor; (5) use of items in a manner for which the same were neither designed nor contemplated; or (6) a patent or copyright in which the Department or any affiliate or subsidiary of the Department has any direct or indirect interest by license or otherwise.

(e) The foregoing states the Contractor's entire liability for, or resulting from, patent or copyright infringement or claim thereof.

XVII. Force Majeure The term Force Majeure shall include acts of God, work stoppages due to labor disputes or strikes, fires, explosions, epidemics, riots, war rebellion, sabotage or the like. If a failure of or delay in performance by either party results from the occurrence of a Force Majeure event, the delay shall be excused and the time for performance extended by a period equivalent to the time lost because of the Force majeure event, if and to the extent that:

(a) The delay or failure was beyond the control of the party affected and not due to its fault or negligence; and

(b) The delay or failure was not extended because of the affected party's failure to use all reasonable diligence to overcome the obstacle or to resume performance immediately after such obstacle was overcome; and

(c) The affected party provides notice within (5) days of the onset of the event, that it is invoking the protection of this provision.

XVIII. Freedom of Information Requests

The Contractor agrees to provide the Department with any records which must be released in order to comply with a request pursuant to the Freedom of Information Law. The Department will provide the contractor with an opportunity to identify material which may be protected from release and to support its position.

XIX. Precedence In the event of a conflict between the terms of this Appendix B and the terms of the Contract (including any and all attachments thereto and amendments thereof, but not including Appendix A), the terms of this Appendix B shall control. In the event of a conflict between the terms of this Appendix B, and the terms of Appendix A, the terms of Appendix A shall control.

Rider to
Appendix B
Standard Clauses for All
New York State Department of
Environmental Conservation
Contracts

FOR ENVIRONMENTAL RESTORATION PROJECTS

The parties to this contract hereby agree that clause II of this appendix B is hereby revised to read as follows:

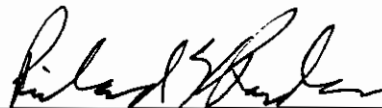
- II. The Contractor agrees that it will indemnify and save harmless the Department and the State of New York from and against all losses from claims, demands, payments, suits, actions, recoveries and judgments, of every nature and, description brought or recovered against it by reason of any acts or omissions of the Contractor, its agents, employees, or subcontractors in the performance of this contract which are shown to have been the result of negligence, gross negligence or reckless, wanton or intentional misconduct; except that the Contractor shall not be obligated to so indemnify and save harmless with respect to those matters described in ECL 56-0509.1 during those periods in which the protection afforded under ECL 56-0509.1 is in effect.

Department of Environmental Conservation

Dated:

2/7/02

By:



Director of Fiscal Management

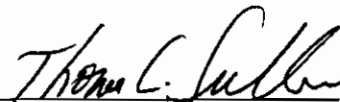
CITY OF LOCKPORT

(Municipality's Name)

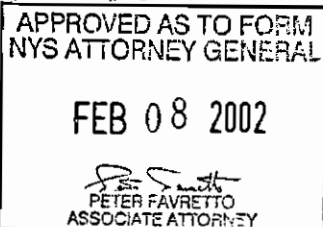
Dated:

1-25-02

By:



Municipal Representative



LIBER 3193 PAGE 489
OTTAVIANO & SANSONE, L.L.P.

ATTORNEYS AT LAW
P.O. Box 1230
172 EAST AVENUE
LOCKPORT, NEW YORK 14095
(716) 438-0488
FAX: (716) 438-0489
E-MAIL JJOESQ@AOL.COM

John J. Ottaviano *†
John S. Sansone

*Corporation Counsel for the City of Lockport
†Also Admitted in Washington D.C.

TELECOPIER/E-MAIL NOT FOR SERVICE OF PAPERS

January 16, 2002

Mr. Daniel K. King, P.E.
Regional Hazardous Waste Remediation Engineer
New York State Department of Environmental Conservation
270 Michigan Avenue
Buffalo, NY 14203-2999

RE: Richmond Avenue Brownfield Project
No. B00154-9

STATE OF NEW YORK)
COUNTY OF NIAGARA) SS.:

I, JOHN J. OTTAVIANO, being an attorney duly admitted to the practice of law in the State of New York, affirm under penalties of perjury the following:

1. That I am the attorney for the City of Lockport, New York, the Municipality which is the applicant for State Assistance pursuant to Title 5 of Article 56 of the Environmental Conservation Law to undertake an Environmental Restoration Project known as the Richmond Avenue Brownfield Project;

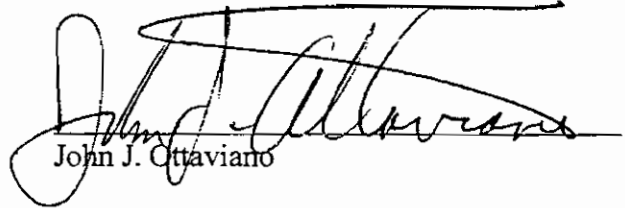
2. That the Properties located at 49, 51, 53, 57, 69, 79 and 81 Richmond Avenue, 18 Church Street, and 3 Niagara Street, which are the subject of the Project are more particularly described in Schedule A, annexed hereto;

3. That I hereby certify to the Commissioner of Environmental Conservation that I have examined or caused to be examined the title to the Property, and that I have approved the same, and that as of the date of this affirmation a good and marketable title hereto in fee is vested in and may be conveyed by the City of Lockport, New York.

4. That annexed hereto is a copy of the survey description of the Property which is owned by the City of Lockport, New York, and that I hereby certify to the Commissioner of

Environmental Conservation that the property title to which is described by said survey description is identical to the Property which is the subject of the Project; and,

5. That I make this affirmation to be attached as an exhibit and incorporated by reference into such application.



John J. Ottaviano

cc: Mayor Thomas C. Sullivan
William J. Evert
Daniel A. Spitzer, Esq.
Benton B. Kendig

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LIBER 3113 PAGE 182

NIAGARA COUNTY CLERK RECORDING PAGE

OFFICE OF THE CLERK COUNTY OF NIAGARA

WAYNE F. JAGOW, COUNTY CLERK

County Courthouse, 175 Hawley Street, P.O. Box 461, Lockport, NY 14095

Phone (716) 439-7027

Fax (716) 439-7066

INSTRUMENT DATE 4/26/01DOCUMENT TYPE Warranty Deed

Parties: (Print Names In Full)

1st Part Greater Lockport
Development Corporation2nd Part City of Lockport,
New YorkTown/City City of Lockport

Return To:

JOHN J. OTTAVIANOATTORNEY AT LAWP.O. BOX 1230LOCKPORT, NEW YORK 14095

DOCUMENT # 1003146

BOOK 3113 PAGE 182

NUMBER OF PAGES 4

RECORDED 04/30/2001

03:04:21 P.M.

RECEIPT # 9625

PAID - COUNTY CLERK

WAYNE F. JAGOW

THIS SPACE RESERVED FOR COUNTY CLERK

MORTGAGE# _____

MORTGAGE AMOUNT

\$ _____

☐ One/two family ☐ Other☐ Check if to be apportioned

RECORDING TAX RECEIPT

BASIC \$ _____

ADDITIONAL \$ _____

SPECIAL \$ _____

TOTAL \$ _____

State of New York} ss

County of Niagara}

I do hereby certify that I have

Received on the within Mortgage, being

the amount of the Recording Tax

Imposed thereon & paid at recording.

Dated _____, 20____

Mortgage Tax Clerk of Niagara County

4869
REAL ESTATE TRANSFER
TAX\$ 2X4/26/01

NIAGARA COUNTY

LIBER 3193 PAGE 482
LIBER 3113 PAGE 183
This Indenture

Made the 26th day of April, Two Thousand One

Between **GREATER LOCKPORT DEVELOPMENT CORPORATION**, a Not-for-Profit corporation organized under the laws of the State of New York, with offices located at One Locks Plaza, Lockport, New York 14094,

party of the first part, and

CITY OF LOCKPORT, NEW YORK, a municipal corporation organized under the laws of the State of New York, with offices located One Locks Plaza, Lockport, New York 14094,

party of the second part,

Witnesseth, that the party of the first part, in consideration of ONE AND NO MORE DOLLARS (\$1.00 and No More) lawful money of the United States, paid by the party of the second part, does hereby grant and release unto the party of the second part, its heirs and assigns forever,

PARCEL I

ALL THAT TRACT OR PARCEL OF LAND, situate in the City of Lockport, County of Niagara and State of New York, being part of Lot No. 12, Section 14, Township 14, Range 6 of the Holland Land Company's Survey and according to a map made by J. P. Haines filed November 21, 1866 under Cover No. 383, now in Book 25 of Microfilmed Maps at 2433, is known and distinguished as Lot No. 7 situate on the northwest line of Richmond Avenue and being 66 feet front and rear by 151 feet 10 inches on the northeast line and 156 feet 2 inches on the southwest line as shown on said map.

PARCEL II

ALL THAT TRACT OR PARCEL OF LAND, situate in the City of Lockport, County of Niagara and State of New York, being part of Lot No. 12, Section 14, Township 14, Range 6 of the Holland Land Company's Survey and according to a map made by J. P. Haines filed November 21, 1866 under Cover No. 383, now in Book 25 of Microfilmed Maps at 2433, is known and distinguished as Lot No. 8 situate on the northwest line of Richmond Avenue, bounded and described as follows:

BEGINNING at the southwest corner of Lot No. 8; thence northwesterly along the southwest line of Lot No. 8, 150 feet 10 inches to the southeast line of Lot No. 2 on the south line of Ontario Street; thence northeasterly along the southeast line of Lot No. 2, 33 feet; thence southeasterly 148 feet 8½ inches to the northwest line of Richmond Avenue; thence southwesterly along the northwest line of Richmond Avenue 33 feet ½ inch to the point of beginning.

PARCEL III

ALL THAT TRACT OR PARCEL OF LAND, situate in the City of Lockport, County of Niagara and State of New York, being part of Lot No. 12, Section 14, Township 14, Range 6 of the Holland Land Company's Survey and according to a map made by J. P. Haines filed November 21, 1866 under Cover No. 383, now in Book 25 of Microfilmed Maps at 2433, is known and distinguished as Lot No. 8 situate on the northwest line of Richmond Avenue, bounded and described as follows:

BEGINNING in the northwest line of Richmond Avenue 33 feet along the line northeast from the southwest corner of Lot No. 8; thence northeasterly along said line of Richmond Avenue 20 feet 4 inches; thence northwesterly parallel with the southwest line of said lot about 148 feet 4 inches to the northwest line of said lot; thence southwesterly along the last mentioned line 20 feet 4 inches; thence southeasterly parallel with the second described boundary line about 149 feet 8 inches to the point of beginning.

PARCEL IV

ALL THAT TRACT OR PARCEL OF LAND, situate in the City of Lockport, County of Niagara and State of New York, being part of Lot No. 12, Section 14, Township 14, Range 6 of the Holland Land Company's Survey and according to a map made by J. P. Haines filed November 21, 1866 under Cover No. 383, now in Book 25 of Microfilmed Maps at 2433, is known and distinguished as part of Lots Nos. 2 and 4 situate on the south line of Ontario Street, bounded and described as follows:

BEGINNING at the southeast corner of Lot No. 4; thence westerly along the south line of said Lot No. 4 a distance of 9 inches; thence northerly parallel with the east line of said Lot No. 4 and 9 inches west therefrom 66.7 feet; thence easterly 85 feet to a point in the south line of said Lot No. 2 which is 12 feet 8 inches southwesterly from the northeast corner of Lot No. 8 Richmond Avenue; thence southwesterly along the southeast line of Lot No. 2 (which is also the northwest line of Lots Nos. 7 and 8 Richmond Avenue) 119.6 feet to the point of beginning.

PARCEL V

ALL THAT TRACT OR PARCEL OF LAND, situate in the City of Lockport, County of Niagara and State of New York, being part of Lot No. 12, Section 14, Township 14, Range 6 of the Holland Land Company's Survey and according to a map made by J. P. Haines filed November 21, 1866 under Cover No. 383, now in Book 25 of Microfilmed Maps at 2433, is known and distinguished as part of Lots Nos. 2 and 4 situate on the south line of Ontario Street, bounded and described as follows:

BEGINNING at a point in the south line of Ontario Street 83 feet 9 inches east, measured along the south line of Ontario Street, from the east line of Church Street; thence easterly along the south line of Ontario Street 54 feet; thence southerly parallel with the west line of Lot No. 2 a distance of 34.68 feet; thence easterly parallel with the south line of Ontario Street 17.24 feet; thence southeasterly 16 feet to a point on the south line of Lot No. 2 distant 12 feet 8 inches southwesterly from the northeasterly corner of Lot No. 8 of Richmond Avenue; thence westerly along the northerly line of land conveyed to Licata Brothers, Inc. by deed recorded February 14, 1958, in Liber 1280 of Deeds at page 533 a distance of 85 feet to a point on a line drawn parallel with the west line of Lot No. 2 and distant 9 inches west therefrom; thence northerly parallel with the west line of Lot No. 2 and the east line of Lot No. 4 and 9 inches west therefrom a distance of 67.66 feet to the point of beginning.

This deed is made and given in acceptance and consideration of the development of the Richmond Avenue Project pursuant to the Canal Corridor Initiative and Section 108 Loan Guarantee Program under the Federal Small Cities Community Development Block Grant Program and the New York State Department of Environmental Conservation Clean Water/Clean Air grant. It is given and is intended to convey all the right, title and interest both legal and equitable of the Grantor to the Grantee and to be held for the aforesaid public use in accordance with New York Real Property Tax Law, Section 406 (1).

TOGETHER with the appurtenances and all the estate and rights of the party of the first part in and to said premises,

TO HAVE AND TO HOLD the premises herein granted unto the party of the second part, its heirs and assigns forever.

AND the party of the first part covenants as follows:

FIRST. -- That the party of the second part shall quietly enjoy the said premises.

SECOND. -- That the party of the first part will forever **WARRANT** the title to said premises.

THIRD. -- That, in Compliance with Sec. 13 of the Lien Law, the grantor will receive the consideration for this conveyance and will hold the right to receive such consideration as a trust fund to be applied first for the purpose of paying the cost of the improvement and will apply the same first to the payment of the cost of the improvement before using any part of the total of the same for any other purpose.

In Witness Whereof, the party of the first part has caused these presents to be signed by its duly authorized officer this 26 day of April, Two Thousand One.

IN PRESENCE OF

GREATER LOCKPORT DEVELOPMENT CORPORATION

By Thomas C. Sullivan
Thomas C. Sullivan, President

STATE OF NEW YORK)

) ss.:

COUNTY OF NIAGARA)

On the 26 day of April, in the year Two Thousand One, before me, the undersigned, a Notary Public in and for said State, personally appeared Thomas C. Sullivan, personally known to me or proved to me on the basis of satisfactory evidence to be the individual whose name is subscribed to the within instrument and acknowledged to me that he executed the same in his capacity, and that by his signature on the instrument, the individual, or the person upon behalf of which the individual acted, executed the instrument.

John J. Ottaviano
Notary Public

JOHN J. OTTAVIANO #4876211
NOTARY PUBLIC, STATE OF NEW YORK
QUALIFIED IN NIAGARA COUNTY
MY COMMISSION EXPIRES OCT. 20, 2002

**DO NOT DETACH - THIS IS PAGE 1 OF
RECORDED DOCUMENT**

**NIAGARA COUNTY CLERK RECORDING PAGE
OFFICE OF THE CLERK COUNTY OF NIAGARA
WAYNE F. JAGOW, COUNTY CLERK
County Courthouse, 175 Hawley Street, P.O. Box 461, Lockport, NY 14095
Phone (716) 439-7027 Fax (716) 439-7066**

LIBER 3193 PAGE 495

INSTRUMENT DATE 1/11/02

DOCUMENT TYPE Warranty Deed

ORIGINAL FILED

JAN 11 2002

WAYNE F. JAGOW
NIAGARA COUNTY CLERK
LOCKPORT, NEW YORK 14094

Parties: (Print Names in Full)

1st Part Licata Vending, Inc.
2nd Part City of Lockport
Town/City City of Lockport

RETURN TO:

**JOHN J. OTTAVIANO
ATTORNEY AT LAW
P.O. BOX 1230
LOCKPORT, NEW YORK 14095**

SPACE BELOW RESERVED FOR COUNTY CLERK

MORTGAGE # _____

MORTGAGE AMOUNT

_____) One/two family (_____) Other

☐ Check if to be apportioned

RECORDING TAX RECEIPT

BASIC \$ _____
ADDITIONAL \$ _____
SPECIAL \$ _____
TOTAL \$ _____

State of New York } ss
County of Niagara }
I do hereby certify that I have
Received on the within Mortgage, being
the amount of the Recording Tax
Imposed thereon & paid at recording.

DATED _____, 20____

Mortgage Tax Clerk of Niagara County

REAL ESTATE TRANSFER
TAX

\$ _____

Niagara County Clerk

This Indenture, Made the 14th day of January, Two Thousand Two.

Between

LICATA VENDING, INC., a corporation organized under the laws of the State of New York, with its principal place of business at 20 Lock Street, Lockport, New York 14094

party of the first part, and

CITY OF LOCKPORT, A MUNICIPAL CORPORATION OF THE STATE OF NEW YORK, with its principal place of business at One Lockport Plaza, Lockport, New York 14094

party of the second part,

Witnesseth that the party of the first part, in consideration of One and More Dollars (\$1.00 and more) lawful money of the United States, paid by the party of the second part, does hereby grant and release unto the party of the second part, its successors and assigns forever,

All that tract or parcel of land, situate in the City of Lockport, County of Niagara and State of New York being part of Lot Nos. 8, 9 and 10 on Canal Street, now Richmond Avenue, and part of Lot No. 2 on Ontario Street, according to a Map made by Jesse P. Haines of the Village (now City) of Lockport, dated 1845, now in Microfilmed Book of Maps 25 at page 2433 and filed in the office of the County Clerk of the County of Niagara, described as follows:

Beginning at a point in the northwest line of Richmond Avenue, as now laid out, and on the line of Lot No. 8, which said point of beginning is at the southeast corner of premises conveyed to John G. Fogle by deed recorded in Niagara County Clerk's Office March 11, 1868 in Liber 114 of Deeds at page 506; thence northwesterly, and along the line of said John G. Fogle's land, about 147 feet to the northwest line of Lot No. 8; thence southwesterly along the said northwest line of said Lot No. 8, about 42.28 feet to the southeast corner of lands conveyed to William F. Trowbridge by deed recorded in Niagara County Clerk's Office March 27, 1848 in Liber 40 of Deeds at page 359; thence northerly along said Trowbridge's east line, about 75.83 feet to the south line of Ontario Street; thence easterly and along the south line of Ontario Street, about 133.08 feet to the northwest corner of lands conveyed to Liveous Brown by deed recorded in Niagara County Clerk's Office March 3, 1838 in Liber 20 of Deeds at page 347; thence southeasterly along the line of lands so conveyed to said Liveous Brown, as aforesaid, about 96 feet to the northwest line of Richmond Avenue; thence southwesterly and along said northwest line of Richmond Avenue, about 104.66 feet to the beginning.

Excepting therefrom lands conveyed to Licata Brothers, Inc. by Deed recorded in Niagara County Clerk's Office September 9, 1976 in Liber 1588 page 1105.

This deed is made and given in acceptance and consideration of the development of the Richmond Avenue Project pursuant to the Canal Corridor Initiative and Section 108 Loan Guarantee Program under the Federal Small Cities Community Development Block Grant Program and the New York State Department of Environmental Conservation Clean Water/Clean Air grant. It is given and is intended to convey all the right, title and interest both legal and equitable of the Grantor to the Grantee and to be held for the aforesaid public use in accordance with New York Real Property Tax Law, Section 406(1).

Together with the appurtenances and all the estate and rights of the party of the first part in and to said premises.

To have and to hold the premises herein granted unto the party of the second part, its successor and assigns forever.

And said party of the first part covenants as follows:

First, That the party of the second part shall quietly enjoy the said premises;

Second, That said party of the first part will forever Warrant the title to said premises.

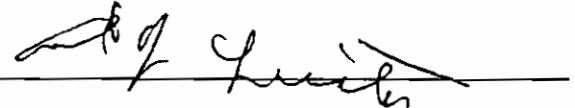
Third, That, in Compliance with Sec. 13 of the Lien Law, the grantor will receive the consideration for this conveyance and will hold the right to receive such consideration as a trust fund to be applied first for the purpose of paying the cost of the improvement and will apply the same first to the payment of the cost of the improvement before using any part of the total of the same for any other purpose.

In Presence of

In Witness Whereof, the party of the first part has caused its corporate seal to be hereunto affixed, and these presents to be signed by its duly authorized officer this 11th day January, 2002.

LICATA VENDING, INC.

By

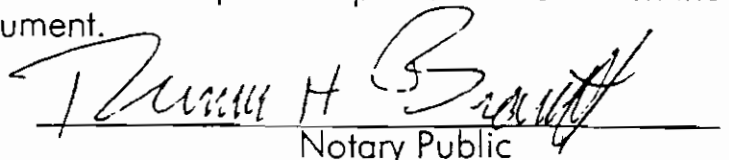


State of New York

:ss:

County of Niagara

On the 11th day of January in the year two thousand two before me, the undersigned, personally appeared Carl J. Licata, President of Licata Vending, Inc., personally known to me or proved to me on the basis of satisfactory evidence to be the individual whose name is subscribed to the within instrument and acknowledged to me that he executed the same in his capacity, and that by his signature on the instrument, the individual or the person upon behalf of which the individual acted, executed the instrument.



Notary Public

NIAGARA COUNTY CLERK RECORDING PAGE

OFFICE OF THE CLERK COUNTY OF NIAGARA

WAYNE F. JAGOW, COUNTY CLERK

County Courthouse, 175 Hawley Street, P.O. Box 461, Lockport, NY 14095

Phone (716) 439-7027

Fax (716) 439-7066

INSTRUMENT DATE 8/2/01DOCUMENT TYPE Quit Claim Deed

Parties: (Print Names In Full)

1st Part Joseph Royal Enterprises,
Inc. & Ethel J. Royal2nd Part City of Lockport, New YorkTown/City City of Lockport

Return To:

JOHN J. OTTAVIANOATTORNEY AT LAWP.O. BOX 1230LOCKPORT, NEW YORK 14095

deed DOCUMENT # 1006108
BOOK 3141 PAGE 56
NUMBER OF PAGES 3
RECORDED 08/03/2001
03:13:10 P.M.
RECEIPT # 17903
PAID - COUNTY CLERK
WAYNE F. JAGOW

THIS SPACE RESERVED FOR COUNTY CLERK

MORTGAGE# _____

MORTGAGE AMOUNT

\$ _____

() One/two family () Other

[] Check if to be apportioned

RECORDING TAX RECEIPT

BASIC \$ _____

State of New York) ss
County of Niagara)

ADDITIONAL \$ _____

I do hereby certify that I have
Received on the within Mortgage, being
the amount of the Recording Tax
Imposed thereon & paid at recording.

SPECIAL \$ _____

TOTAL \$ _____

Recorded _____, 20____

94
REAL ESTATE TRANSFER
TAX\$ 204.008301

NIAGARA COUNTY

Mortgage Tax Clerk of Niagara County

LIBER 3193 PAGE 499

This IndentureMade the 2nd day of August, Two Thousand One**Between**

JOSEPH ROYAL ENTERPRISES, INC., a corporation organized under the laws of the State of New York, with offices at 79 Richmond Avenue, Lockport, New York 14094, and **ETHEL J. ROYAL**, individually, residing at 14 Tudor Lane, Apartment 2, Lockport, New York 14094,

Grantors, and

CITY OF LOCKPORT, NEW YORK, Municipal Building, One Locks Plaza, Lockport, New York 14094,

Grantee.

Witnesseth, that the said Grantors, in consideration of ONE AND MORE DOLLARS (\$1.00 and More) lawful money of the United States, paid by the Grantee, do hereby remise, release and forever Quit-Claim unto the Grantee, its heirs and assigns, forever,

ALL THAT TRACT OR PARCEL OF LAND, situate in the City of Lockport, County of Niagara and State of New York, being part of Lot 12, Section 14, Township 14 and Range 6 of the Holland Land Company's Survey and according to a certain Map prepared by Jesse P. Haines in 1845 with additions in 1866 filed in Niagara County Clerk's Office on November 21, 1866, now in Book 25 of Microfilmed Maps at page 2433, is known as part of Lot No. 10 on the northwest side of Canal Street, now Richmond Avenue, bounded and described as follows:

BEGINNING at the point of intersection of the northwest line of Richmond Avenue with a line distant 26 feet northeasterly from the southwest line of said Lot No. 10; thence northeasterly along the northwest line of Richmond Avenue to a point in a line parallel with the southwest line of Lot No. 10 and distant 56 feet northeasterly therefrom; thence northwesterly parallel with the southwest line of Lot No. 10 to the south line of Ontario Street; thence westerly along the south line of Ontario Street to the point of intersection with a line drawn from the place of beginning and parallel with the southwest line of Lot No. 10; thence southeasterly along said parallel line to the point or place of beginning.

The above corporation has been dissolved and this deed is to finalize matters of said dissolved corporation.

This deed is made and given in acceptance and consideration of the development of the Richmond Avenue Project pursuant to the Canal Corridor Initiative and Section 108 Loan Guarantee Program under the Federal Small Cities Community Development Block Grant Program and the New York State Department of Environmental Conservation Clean Water/Clean Air grant. It is given and is intended to convey all the right, title and interest both legal and equitable of the Grantors to the Grantee and to be held for the aforesaid public use in accordance with New York Real Property Tax Law, Section 406(1).

TOGETHER with the appurtenances and all the estate and rights of the Grantors in and to said premises.

TO HAVE AND TO HOLD, the above granted premises unto the said Grantee, its heirs and assigns, forever.

In Witness Whereof, the Grantors have caused these presents to be signed this ____ day of August, Two Thousand One.

IN PRESENCE OF

JOSEPH ROYAL ENTERPRISES, INC.

By: Ethel J. Royal
Ethel J. Royal, President

Ethel J. Royal
Ethel J. Royal

STATE OF NEW YORK)
COUNTY OF NIAGARA) SS.:

On the 2nd day of August, in the year Two Thousand One, before me, the undersigned, a Notary Public in and for said State, personally appeared Ethel J. Royal, personally known to me or proved to me on the basis of satisfactory evidence to be the individual(s) whose name(s) is (are) subscribed to the within instrument and acknowledged to me that he/she/they executed the same in his/her/their capacity(ies), and that by his/her/their signature(s) on the instrument, the individual(s), or the person upon behalf of which the individual(s) acted, executed the instrument.

Andrea V. Harzewski
Notary Public

ANDREA V. HARZEWSKI
Notary Public, State of New York
Qualified in Niagara County
My Commission Expires Feb. 28, 2002

LIBER 3193 PAGE 501

LIBER 3169 PAGE 296

NIAGARA COUNTY CLERK RECORDING PAGE

OFFICE OF THE CLERK COUNTY OF NIAGARA

WAYNE F. JAGOW, COUNTY CLERK

County Courthouse, 175 Hawley Street, P.O. Box 461, Lockport, NY 14095

Phone (716) 439-7027

Fax (716) 439-7066

INSTRUMENT DATE November 6, 2001

DOCUMENT TYPE Deed

Parties: (Print Names In Full)

Walter A. Kohl and
Part Anna P. Kohl

Part City of Lockport

own/City City of Lockport

Return To:

JOHN J. OTTAVIANO, ESQ.

One Locks Plaza

Lockport, New York 14094

deed DOCUMENT # 1009281
BOOK 3169 PAGE 296
NUMBER OF PAGES 5
RECORDED 11/07/2001
11:56:03 A.M.
RECEIPT # 26652
PAID - COUNTY CLERK
WAYNE F. JAGOW

THIS SPACE RESERVED FOR COUNTY CLERK

MORTGAGE#

MORTGAGE AMOUNT

☐ One/two family ☐ Other

☐ Check if to be apportioned

RECORDING TAX RECEIPT

ASIC \$

DDITIONAL \$

PECIAL \$

TOTAL \$

Dated , 20

State of New York) ss
County of Niagara)

I do hereby certify that I have
Received on the within Mortgage, being
the amount of the Recording Tax
Imposed thereon & paid at recording.

Mortgage Tax Clerk of Niagara County

2076
REAL ESTATE TRANSFER TAX
\$ 620.00
11/7/01
NIAGARA COUNTY

Warranty Deed

THIS INDENTURE, made the 6th day of November, 2001,

BETWEEN

WALTER A. KOHL and ANNA P. KOHL, presently residing at 4022 Lake Avenue, Lockport, New York 14094,

AND

Parties of the first part,

CITY OF LOCKPORT, NEW YORK, Municipal Building, One Locks Plaza, Lockport, New York 14094,

Party of the second part,

WITNESSETH, that the parties of the first part, in consideration of ONE DOLLAR AND MORE (\$1.00 and more) paid by the party of the second part, do hereby grant and release unto the party of the second part, its heirs, successors and/or assigns forever, all that certain real property more particularly described on attached Schedule A.

TOGETHER with the appurtenances and all the estate and rights of the parties of the first part in and to said premises,

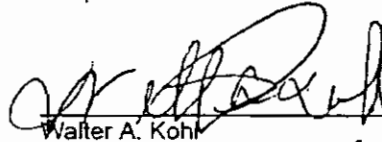
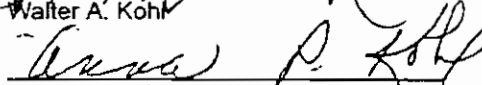
TO HAVE AND TO HOLD the premises herein granted unto the party of the second part, its heirs, successors and/or assigns forever. And said parties of the first part covenant as follows:

- First. The said parties of the first part are seized of said premises in fee simple and have good right to convey the same;
- Second. That the party of the second part shall quietly enjoy the said premises;
- Third. That said premises are free from encumbrances;
- Fourth. That the parties of the first part will execute or procure any further necessary assurance of the title to said premises;
- Fifth. That the parties of the first part will forever warrant the title to the said premises.

THIS DEED is subject to the trust provisions of Section 13 of the Lien Law.

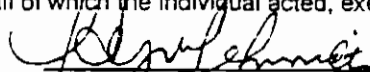
IN WITNESS WHEREOF, the parties of the first part have hereunto set their hands and seals the day and year first above written.

IN THE PRESENCE OF:


Walter A. Kohl

Anna P. Kohl

STATE OF NEW YORK
COUNTY OF NIAGARA ss.:

On the 6th day of November, 2001, before me, the undersigned, a Notary Public in and for said State, personally appeared Walter A. and Anna P. Kohl personally know to me or proved to me on the basis of satisfactory evidence to be the individuals whose names are subscribed to the within instrument and acknowledged to me that they executed the same in their capacity and that by their signatures on the instrument, the individual or the person upon behalf of which the individual acted, executed the instrument.


Notary Public

HENRY W. SCHMIDT, Reg. No. 4704

NOTARY PUBLIC STATE OF NEW YORK

QUALIFIED IN NIAGARA COUNTY

MY COMMISSION EXPIRES APRIL 30, 2002

SCHEDULE A

PARCEL I - ALL THAT TRACT OR PARCEL OF LAND, situate in the City of Lockport, County of Niagara and State of New York, and being part of Lot 6 Canal Street (now Richmond Avenue) and part of Lot 2 Church Street, according to the Map of the Village (now City) of Lockport, made by Jesse P. Haines, Surveyor, in 1845, and bounded and described as follows:

BEGINNING at a point in the northwesterly boundary of Canal Street (which is also the southeasterly line of said Lot 6), which is twenty-one (21) feet northeasterly along the said northwesterly boundary of Canal Street from the southwesterly corner of said Lot 6, and running thence northwesterly, parallel with the southwesterly line of said Lot 6, about one hundred forty-five (145) feet to the east line of land formerly owned by Michael Dumphrey (known as Church Stall Lot); thence north, along said Dumphrey's east line, ten (10) feet to a point which is thirty-five (35) feet south of the northeast corner thereof; thence west, parallel with said Dumphrey's north line, twenty-two (22) feet; thence north, parallel with said Dumphrey's easterly line, thirty-five (35) feet to the north line thereof; thence east, along said Dumphrey's north line and said north line extended east, thirty-eight (38) feet two (2) inches to the northwesterly line of said Lot 6, thence northeasterly, along the northwesterly line of said Lot 6, a distance of six (6) feet six (6) inches to the northeasterly corner of said Lot 6; thence southeasterly, along the northeasterly line of said Lot 6, a distance of one hundred sixty-five (165) feet to the southeast corner of said Lot 6; thence southwesterly, along the southeasterly line of said Lot 6 (which is also the northwesterly line of Canal Street, as originally laid out, forty-five (45) feet to the point of beginning, be the same more or less.

EXCEPTING however from the above-described property so much as was appropriated by the City of Lockport to relocate the northwesterly bounds of Canal Street (now Richmond Avenue).

ALSO, the right of an alley or passway nine (9) feet wide, along the southwest line of Lot Number Seven (7) of Canal Street, to the northwest line of said Lot Number Seven (7), to be used as a common alley or passway for the benefit of the owners of said Lots Nos. Six (6) and Seven (7), Canal Street.

PARCEL II - ALL THAT TRACT OR PARCEL OF LAND, situate in the City of Lockport, County of Niagara and State of New York, which is known and distinguished on a map or survey of the Village (now City) of Lockport, into lots, made by Jesse P. Haines, Surveyor, as the southwest part of Lot Number 6 on Canal Street, beginning at the southwest corner of said Lot NO. 6 and running thence northerly bounding on said Lot No. 5, eight (8) rods; thence northeasterly bounding on the northwesterly line of said Lot NO. 6, twenty-one (21) feet; thence southerly on a line parallel with the southwesterly line of said Lot No. 6, eight (8) rods to the old bounds of Canal Street and thence southwesterly along said old bounds of Canal Street twenty-one (21) feet to the place of beginning.

PARCEL III - ALL THAT TRACT OR PARCEL OF LAND, situate in the City of Lockport, County of Niagara and State of New York being part of Lot 5 on the northwesterly side of Canal Street (now Richmond Avenue) in the City of Lockport, as such Lot is known and distinguished on a map of said city (formerly Village) of Lockport, made by Jesse P. Haines in 1845 with additions thereto in 1866 and filed in the Niagara County Clerk's Office November 21, 1866 under Cover No. 383, bounded and described as follows:

BEGINNING at a point in the northwesterly line of Canal Street 27 feet northeasterly from the intersection of the northwesterly line of Canal Street and the north line of Niagara Street, and running thence north 43 degrees east along the northwesterly line of Canal Street 44 feet, 9 inches; thence northerly 47 degrees west at right angles with the northwesterly line of Canal Street 132 feet; thence south 3 degrees west 57 feet, 7 inches; thence south 47 degrees east on a line parallel to the east line of said Lot 5, 57 feet; thence southwesterly on a line parallel to the northwesterly line of Canal Street, 9 inches and thence south 47 degrees on a line parallel to the east line of Said Lot No. 5, 38 feet to the place of beginning containing all of said Lot No. 5 within the above boundaries.

PARCEL IV - ALL THAT TRACT OR PARCEL OF LAND, situate in the City of Lockport, County of Niagara and State of New York, being part of Lot No. 12, Section 14, Township 14, Range 6 of the Holland Land Company's Survey and according to a map made by J.P. Haines in 1845 with additions in 1866 and filed in Niagara County Clerk's Office in Book 25 of Microfilmed Maps at page 2433 is known and distinguished as part

of Lot NO. 1 on Niagara Street and part of Lot No. 5 on Richmond Avenue, formerly Canal Street, bounded and described as follows:

BEGINNING in the north line of Niagara Street at a point which is 73 feet 9 inches east, measured along the north line of said street from the point where the north line of Niagara Street intersects the east line of Church Street; thence northerly at right angles to the north line of Niagara Street and parallel with the east line of Church Street 71 feet to the northeasterly line of lands conveyed by the Thames Bank of Norwich, Connecticut to Timothy Murphy by deed recorded June 7, 1851 in Liber 45 of Deeds at page 542, being also the southwest line of lands conveyed to William B. Lusk by deed recorded in Niagara County Clerk's Office in Liber 43 of Deeds at page 555 on October 16, 1848; thence southeasterly along the northeast line of said Murphy's land and the southwest line of said Lusk's lands a distance of 38 feet 9 inches; thence southwesterly parallel with the northwest line of Richmond Avenue 9 inches to the center of a wall; thence southeasterly parallel with the southwest line of Lusk's lands and the northeast line of Murphy's land a distance of 38 feet to a point in the northwest line of Richmond Avenue which is 27 feet northeast measured along said northwest line of Richmond Avenue from the point of intersection of the northwest line of Richmond Avenue with the north line of Niagara Street; thence southwesterly along the northwest line of Richmond Avenue a distance of 27 feet to the point where said northwest line is intersected by the north line of Niagara Street; thence westerly along the north line of Niagara Street 38 feet 1 inch to the place of beginning.

Subject to all easements, rights-of-way or restrictions of record which may affect the above-described premises.

This deed is made and given in acceptance and consideration of the development of the Richmond Avenue Project pursuant to the Canal Corridor Initiative and Section 108 Loan Guarantee Program under the Federal Small Cities Community Development Block Grant Program and the New York State Department of Environmental Conservation Clean Water/Clean Air grant. It is given and is intended to convey all the right, title and interest both legal and equitable of the Grantors to the Grantee and to be held for the aforesaid public use in accordance with New York Real Property Tax Law, Section 406(1).

LIBER 3193 PAGE 506

LIBER 3169 PAGE 293

NIAGARA COUNTY CLERK RECORDING PAGE
OFFICE OF THE CLERK COUNTY OF NIAGARA
WAYNE F. JAGOW, COUNTY CLERK
County Courthouse, 175 Hawley Street, P.O. Box 461, Lockport, NY 14095
Phone (716) 439-7027 Fax (716) 439-7066

INSTRUMENT DATE November 6, 2001

DOCUMENT TYPE Deed

Parties: (Print Names In Full)

Walter A. Kohl

Part Anna P. Kohl

Part City of Lockport

own/City City of Lockport

Return To:

JOHN J. OTTAVIANO, ESQ.

One Locks Plaza

Lockport, New York 14094

deed DOCUMENT # 1009280
BOOK 3169 PAGE 293
NUMBER OF PAGES 3
RECORDED 11/07/2001
11:53:53 A.M.
RECEIPT # 26652
PAID - COUNTY CLERK
WAYNE F. JAGOW

THIS SPACE RESERVED FOR COUNTY CLERK

MORTGAGE# _____

MORTGAGE AMOUNT _____

☐ One/two family ☐ Other

☐ Check if to be apportioned

RECORDING TAX RECEIPT

SIC \$ _____

ADDITIONAL \$ _____

SPECIAL \$ _____

TOTAL \$ _____

dated _____, 20____

State of New York) ss
County of Niagara)
I do hereby certify that I have
Received on the within Mortgage, being
the amount of the Recording Tax
Imposed thereon & paid at recording.

Mortgage Tax Clerk of Niagara County

This sheet constitutes the Clerk's endorsement required by section 319 of the Real Property Law of the State of New York

DO NOT DETACH

<u>2075</u>
REAL ESTATE TRANSFER TAX
\$ <u>1171.01</u>
NIAGARA COUNTY

Warranty Deed

THIS INDENTURE, made the 6th day of November, 2001,

BETWEEN

WALTER A. KOHL and ANNA P. KOHL, presently residing at 4022 Lake Avenue, Lockport, New York 14094,

Parties of the first part,

AND

CITY OF LOCKPORT, NEW YORK, Municipal Building, One Locks Plaza, Lockport, New York 14094,

Party of the second part,

WITNESSETH, that the parties of the first part, in consideration of ONE DOLLAR AND MORE (\$1.00 and more) paid by the party of the second part, do hereby grant and release unto the party of the second part, its heirs, successors and/or assigns forever, all that certain real property more particularly described on attached Schedule A.

TOGETHER with the appurtenances and all the estate and rights of the parties of the first part in and to said premises,

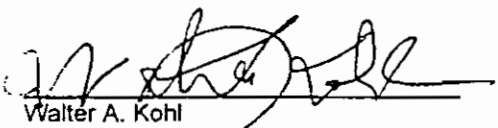
TO HAVE AND TO HOLD the premises herein granted unto the party of the second part, its heirs, successors and/or assigns forever. And said parties of the first part covenant as follows:

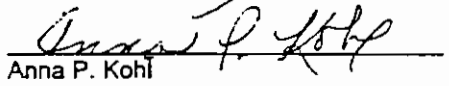
- First. The said parties of the first part are seized of said premises in fee simple and have good right to convey the same;
- Second. That the party of the second part shall quietly enjoy the said premises;
- Third. That said premises are free from encumbrances;
- Fourth. That the parties of the first part will execute or procure any further necessary assurance of the title to said premises;
- Fifth. That the parties of the first part will forever warrant the title to the said premises.

THIS DEED is subject to the trust provisions of Section 13 of the Lien Law.

IN WITNESS WHEREOF, the parties of the first part have hereunto set their hands and seals the day and year first above written.

IN THE PRESENCE OF:


Walter A. Kohl


Anna P. Kohl

STATE OF NEW YORK
COUNTY OF NIAGARA) ss.:

On the 6th day of November, 2001, before me, the undersigned, a Notary Public in and for said State, personally appeared Walter A. and Anna P. Kohl personally know to me or proved to me on the basis of satisfactory evidence to be the individuals whose names are subscribed to the within instrument and acknowledged to me that they executed the same in their capacity and that by their signatures on the instrument, the individual or the person upon behalf of which the individual acted, executed the instrument.


Notary Public

HENRY W. SCHMIDT, Reg. No. 4704

NOTARY PUBLIC STATE OF NEW YORK

QUALIFIED IN NIAGARA COUNTY

MY COMMISSION EXPIRES APRIL 30, 2002

SCHEDULE A

ALL THAT TRACT OR PARCEL OF LAND, situate in the City of Lockport, County of Niagara and State of New York, and being the one-twelfth part of the tract of land formerly owned by the First Free Congregational Church of the said City of Lockport and located on the east side of Church Street, in said City of Lockport, being Stall No. Two (2) of said tract, and the land adjacent thereto, reference being had to the Deed of the First Free Congregational Church of the said City of Lockport to Ezra P. Wentworth, and which is recorded in the Niagara County Clerk's Office in Book of Deeds "A" at page 501.

The west line of said tract hereby conveyed being the east line of Church Street and said tract being eleven (11) feet in width, east and west, and thirty-four (34) feet in length, north and south, (37.9 by measure).

Subject to all easements, rights-of-way or restrictions of record which may affect the above-described premises.

This deed is made and given in acceptance and consideration of the development of the Richmond Avenue Project pursuant to the Canal Corridor Initiative and Section 108 Loan Guarantee Program under the Federal Small Cities Community Development Block Grant Program and the New York State Department of Environmental Conservation Clean Water/Clean Air grant. It is given and is intended to convey all the right, title and interest both legal and equitable of the Grantors to the Grantee and to be held for the aforesaid public use in accordance with New York Real Property Tax Law, Section 406(1).

5364

DO NOT DETACH - THIS IS PAGE 1 OF RECORDED DOCUMENT

5179

OFFICE OF THE CLERK COUNTY OF NIAGARA
WAYNE F. JAGOW, COUNTY CLERK

INS. # 002654

County Courthouse, 175 Hawley Street, P.O. Box 461, Lockport, NY 14095
Phone (716) 439-7027 Fax (716) 439-7066

NIAGARA COUNTY CLERK RECORDING PAGE

INSTRUMENT DATE _____ TYPE Tax Deed NUMBER OF PAGES 4RETURN James W. Ashcraft, Jr., Treas.

Parties: (Print Names in Full)

TO: One Locks Plaza
Lockport, NY 14094

1st Part James W. Ashcraft, Jr., Lockport City Treas.2nd Part City Treasurer

Town/City _____

4521
REAL ESTATE TRANSFER TAX
\$ 368.00
NIAGARA COUNTY

SPACE BELOW RESERVED FOR
COUNTY CLERK'S USE ONLY.

RECORDED
00 MAR 28 PM 3:15
NIAGARA COUNTY
CLERK'S OFFICE
LOCKPORT, N.Y.

MORTGAGE AMOUNT

\$ _____

☐ One/two family ☐ Other

☐ Check if to be apportioned

MORTGAGE/ _____
RECORDING TAX RECEIPT

BASIC \$ _____
ADDITIONAL \$ _____
SPECIAL \$ _____
TOTAL \$ _____

State of New York } ss
County of Niagara }
I do hereby certify that I have
Received on the within Mortgage, being
the amount of the Recording Tax
Imposed thereon & paid at recording.

Dated _____, 199 _____

Mortgage Tax Clerk of Niagara County

Recorded on the 28 day of March
2000 at 3:15 o'clock P M
in Liber 3010 of Deeds
on page 150 and examined.

Wayne F. Jagow
Niagara County Clerk

TAX DEED TO CITY

THIS INDENTURE

MADE THIS 27th day of March, 2000.

BETWEEN, JAMES W. ASHCRAFT, JR. as City Treasurer of the City of Lockport, State of New York, part of the first part, and City of Lockport, State of New York, party of the second part,

WITNESSETH

WHEREAS, an action entitled "In the Matter of the Foreclosure of Tax Liens Pursuant to Article II, Title 3 of the Real Property Tax Law by the "CITY OF LOCKPORT", was duly brought in the County Court, County of Niagara of the State of New York, by the City of Lockport for the foreclosure of certain tax liens by the due filing of a list of delinquent taxes in the office of the County Clerk of the County of Niagara, New York, on the 9th day of September, 1999, and by the due publication and showing of a public notice of foreclosure in the the due form and dated the 9th day of September, 1999, and the due mailing thereof to owners of all property affected and to every person who held a legal or equitable interest in the property; and

WHEREAS, the above captioned action was duly heard at a Term of the said County Court held at the County Building, Lockport, New York, on the 21st day of March, 2000 and

WHEREAS, the County Court at a Term thereof and on the 21st day of March, 2000, granted a Judgment in favor of the City of Lockport, wherein it was, among other things ordered, adjudged and decreed that title and possession of certain lands and premises be awarded to the possession of the City of Lockport, and

WHEREAS, the City Treasurer was instructed by said Judgment to execute a Deed pursuant to Section 1136 of the Real Property Tax Law in favor of the City and

WHEREAS, the Judgment was duly filed in the Niagara County Clerk's office on the 21st day of March, 2000.

NOW THEREFORE, by virtue of said Judgment and the provisions of the Law of this State relating thereto, and pursuant to and in compliance with the directions and requirements therein contained.

The said James W. Ashcraft Jr., as City Treasurer aforesaid, does hereby Grant, Release and Convey to the City of Lockport;

5314

ALL THAT TRACT, PIECE OR PARCEL OF LAND, situated in the City of Lockport, County of Niagara, State of New York, described by parcel numbers in the above entitled action, as if further described according to tax map number, property number, lot numbers as contained in the "List of Delinquent Taxes" of the City of Lockport filed in the Niagara County Clerk's Office on the 9th day of September, 1999.

PARCEL #	SBL #	PROPERTY ADDRESS	ASSESSED VALUE	CLASS CODE	PROPERTY DIMENSIONS	
					FRONT.	DEPTH
97-6	108.16-2-55	436 PARK AVE 6-5265	33,000	220	15.33	233.00
97-7	108.20-2-19	39 SO NEW YORK ST 7-1622	4,000	311	50.00	106.00
97-10	108.52-1-13	28 PHELPS ST 6-5494	4,200	311	66.00	165.00
97-12	108.83-1-16	61 CROSBY AVE 2-1480	21,900	210	40.00	171.12
97-13	108.83-2-53.2	70 CROSBY AVE 2-1452	6,400	311	80.00	171.12
97-15	109.05-2-48	18 GLENWOOD AVE 3-2306	100	311	41.25	195.00
97-18	109.06-4-18	30 WATER ST 8-7809	1,400	311	92.91	101.66
97-37	109.40-1-26	8 VAN BUREN ST 7-7222	1,400	311	33.00	84.00
97-38	109.40-1-27	29 MILL ST 5-4339	1,600	311	84.00	33.00
97-40	109.40-1-35	1 VAN BUREN ST 7-7240	64,600	425	52.00	66.00
97-41	109.42-1-82	423 EAST UNION ST 2-7830	43,800	210	35.00	144.50
97-47	109.46-2-34	86 GOODING ST 3-2332	21,800	210	38.50	66.00
97-54	109.54-2-13	81 RICHMOND AVE 6-6158	18,300	482	52.50	78.25
97-58	109.63-2-43	218 WASHBURN ST 8-7638	50,100	411	66.00	165.00
97-59	109.64-1-4	163 SOUTH ST 7-6780	51,200	411	45.00	85.66
97-61	109.64-1-71	227 WASHBURN ST 8-7695	35,400	210	25.42	80.00
97-62	109.64-1-72	225 WASHBURN ST 8-7694	32,000	230	40.00	127.00
97-64	109.71-1-32	27 PARK AVE 8-5997	69,400	411	58.00	111.00
97-67	123.05-1-5	1 WILLOW ST 8-8285	100	311	214.43	201.46
97-68	123.05-1-5.1	1 WILLOW ST-UNIT #1 8-8285.010	900	330	0.05 ACRES	
97-69	123.05-1-5.2	1 WILLOW ST-UNIT #2 8-8285.020	900	330	0.05 ACRES	
97-70	123.05-1-5.3	1 WILLOW ST-UNIT #3 8-8285.030	900	330	0.05 ACRES	
97-71	123.05-1-5.4	1 WILLOW ST-UNIT #4 8-8285.040	900	330	0.05 ACRES	
97-72	123.05-1-5.11	1 WILLOW ST-UNIT #11 8-8285.110	900	330	0.05 ACRES	
97-73	123.05-1-5.12	1 WILLOW ST-UNIT #12 8-8285.120	900	330	0.05 ACRES	
97-74	123.05-1-5.13	1 WILLOW ST-UNIT #13 8-8285.130	900	330	0.05 ACRES	
97-75	123.05-1-5.14	1 WILLOW ST-UNIT #14 8-8285.140	900	330	0.05 ACRES	
97-76	123.05-1-41	2 WILLOW ST 8-8206.500	2,300	311	66.00	179.70
97-78	123.10-1-64	560 PINE ST 6-5585.500	100	311	33.00	100.83
97-80	123.11-2-17	39 ALANVIEW DR 1-0129.500	1,600	311	12.84	124.05

TMC ✓ DEED ✓
 TAX ROLL ✓ COMPUTER ✓
 PROP CARD ✓ WATER ✓
 SALES BOOK N/A DEED BOOK

1996 CLEAN WATER/CLEAN AIR BOND ACT PROJECT SIGN SPECIFICATIONS

Size: • Horizontal format - 96" wide by 48" high

Construction Materials: Aluminum or wood blank sign boards with vinyl sheeting.

Inserts: "Project Site Name," "Local Project Sponsor" and "Municipal Executive" indicate position, size and topography for specific project names and sponsor to be inserted.

Color Scheme:

Copy surrounding DEC logo - "NEW YORK STATE DEPARTMENT
OF ENVIRONMENTAL CONSERVATION" - PMS 355

DEC logo: PMS 301
PMS 355 Green

TEXT:

1996 Clean Water/Clean Air Bond Act	PMS 301
Project Site Name/Local Project Sponsor	PMS 355
Names of Governor, Commissioner, Municipal Executive	PMS 301

Type Specifications: All type is Caslon 540, with the exception of the logotype.

Format is: center each line of copy with small caps and
initial caps.

Production Notes: 96" wide x 48" high aluminum blanks will be covered with vinyl sheeting to achieve background color. Copy and logo will be silk screened on this surface.

Grant recipients must provide a project site name, the local project sponsor, and the name of the appropriate municipal executive to be inserted on the sign.



1996 Clean Water/Clean Air Bond Act

Project Name
Local Project Sponsor

George E. Pataki, *Governor*
Erin M. Crotty, *Commissioner*
Municipal Executive



LIBER 3193 PAGE 514
CITY OF LOCKPORT, NEW YORK

LOCKPORT MUNICIPAL BUILDING
ONE LOCKS PLAZA
LOCKPORT, N. Y. 14094

OFFICE OF CITY CLERK

Richard P. Mullaney, City Clerk/Budget Director
Patricia A. Sheehan, Dep. City Clerk/Registrar of Vital Statistics

(716) 439-667
FAX (716) 439-666

TO: Whom it may concern
FROM: Richard P. Mullaney, City Clerk
DATE: August 25, 2000

Please be advised, that at a regular meeting of the Common Council of the City of Lockport, NY held on June 7, 2000, the following resolution was adopted:

060700.16

By Alderman Elliott:

WHEREAS, the City of Lockport, herein called the "Municipality," after thorough consideration of the various aspects of the problem and study of available data relative to the Richmond Avenue Project has hereby determined that certain work, as described in its application and attachments, herein called the "Project," is desirable, is in the public interest, and is required in order to implement the Project; and

WHEREAS, Article 56 of the Environmental Conservation Law authorizes State assistance to municipalities for environmental restoration projects by means of a contract and the Municipality deems it to be in the public interest and benefit under this law to enter into a contract therewith;

NOW, THEREFORE, BE IT RESOLVED BY Common Council of the City of Lockport:

1. That the Mayor is the representative authorized to act in behalf of the Municipality's in all matters related to State assistance under ECL Article 56, Title 5. The representative is also authorized to make application, execute the State Assistance Contract, submit Project documentation, and otherwise act for the Municipality's governing body in all matters related to the Richmond Avenue Project and to State assistance;
2. That the Municipality agrees that it will fund its portion of the cost of the Project, through the use funds provided by HUD and/or other eligible Project Funding Sources for the Richmond Avenue Project, and that funds will be available to initiate the Project's field work within twelve (12) months of

written approval of its application by the Department of Environmental Conservation;

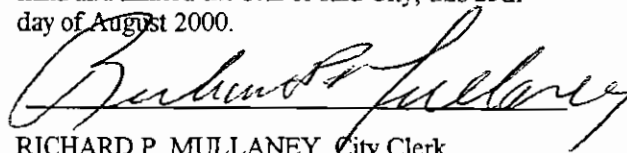
3. That one (1) certified copy of this Authorization be prepared and sent to the Albany office of the New York State Department of Environmental Conservation together with the Application for State Assistance; and
4. That this Authorization shall take effect immediately.

Seconded by Alderman Pitrello and adopted. Ayes 6.

State of New York
City of Lockport
Office of the City Clerk

I, Richard P. Mullaney, City Clerk of said City, do hereby certify that I have compared the foregoing copy with the original proceedings of the Common Council of said City of Lockport, New York, now remaining on file and of record in this office; and that the same is a correct transcript therefrom and of the whole of said original.

IN WITNESS WHEREOF, I have hereunto set my hand and affixed the seal of said City, this 25th day of August 2000.


RICHARD P. MULLANEY, City Clerk
City of Lockport



Department of Community Development

WILLIAM J. EVERT
Director

LOCKPORT MUNICIPAL BUILDING
ONE LOCKS PLAZA
LOCKPORT, N.Y. 14064
(716) 439-6687

September 27, 2002

Mr. Abul Barket, P.E.
Division of Env. Remediation
NYSDEC - Region 9
270 Michigan Avenue
Buffalo, New York 14203-2999

RECEIVED

SEP 8 0 2002

NYSDEC-REG. 9
FOIL
REL UNREL

Re: Richmond Avenue Project

Dear Mr. Barket:

The City of Lockport is preparing to sign an Amendment to its State Assistance Contract (SAC) with the New York State Department of Environmental Conservation (DEC) for Site Investigation and Interim Remedial Measures work regarding the Richmond Avenue Project.

As part of this process, the City will hold an Availability Session to answer any questions the public may have regarding this project. The purpose of this letter is to inform you of the following:

- 1) A Community Fact Sheet is enclosed for your review.
- 2) The Site Investigation and Interim Remedial Measures (Amendment) work will begin on or about October 28, 2002 on the Richmond Avenue project site. It will continue until the site is environmentally clean.
- 4) **There will be an Availability Session regarding this project as follows:**

Date: Thursday, October 10, 2002
Time: 4:00 p.m. – 5:30 p.m.
Place: Common Council Chambers
 Lookport Municipal Building
Agenda: Review of Richmond Avenue Project
 with Question and Answer Session

If you have any questions regarding this matter, please do not hesitate to call me at 439-6687.

Sincerely,

William J. Evert
Director

WJE:bte

09/26/02 THU 11:34 FAX 716 7228

NYS DEC--DER/SHM

0002

1996 Clean Water - Clean Air Bond Act Project Bulletin

RICHMOND AVENUE REDEVELOPMENT PROJECT

SITE INVESTIGATION RESULTS AND INTERIM REMEDIAL MEASURES

Introduction:

The New York State Department of Environmental Conservation (NYSDEC), in cooperation with the New York State Department of Health (NYSDOH) and the City of Lockport, would like to tell you about the upcoming activities at the Richmond Avenue Project "brownfield" site. This plan was developed using funding from the Clean Water/Clean Air Bond Act of 1996 passed by the citizens of New York State. The Bond Act allows for funding of a variety of programs including the "Brownfields" Environmental Restoration Program. This program makes \$200 million available to local governments to investigate and clean up municipally owned brownfields. A brownfield is an unused or under utilized parcel of property which may be contaminated because of its industrial past and is no longer contributing to the tax base of a municipality. The Brownfield application from the City of Lockport was approved January 2001. The State Assistance Contract provides State funds amounting to \$ 270,000 which is 75% of the total estimated cost of \$360,000 for the Site Investigation (SI) and Remedial Action Report (RAR).

Background

The 2+ acre site is located in the downtown business district of the City and consists of several vacant buildings and lots. It is adjacent to the Erie Barge Canal Locks, a significant historic asset and tourist attraction for the City. Past site uses have included automobile service and repair, gasoline service station, dry cleaner, machine shop, restaurant, commercial retail sales and miscellaneous manufacturing operations.

Investigation:

The SI field work started January 2002 in accordance with an approved work plan. This work included installation of 30 soil borings, excavation of 8 test pits, and removal and offsite disposal of six storage tanks, five hydraulic lifts, numerous drums, barrels and other wastes. About 220 tons of petroleum contaminated soil associated with the storage tank removals has been excavated and disposed off-site. In addition, to gain access to some of the storage tanks and lifts, asbestos removal and demolition of one of the site buildings was necessary. To date all the storage tanks, hydraulic lifts, demolition debris, asbestos, barrels, drums and miscellaneous wastes have been removed and disposed off-site.

To determine the nature and extent of the contamination at the site, the City conducted a site investigation in 2002. Analytical data from the investigation shows that about 2300 tons of contaminated soil from 0 to 2 feet in depth still remain at the site, including:

- 255 tons of petroleum contaminated soils,
- 175 tons of soils contaminated with lead at levels above hazardous waste thresholds;
- 1870 tons of non-hazardous (chromium, mercury, lead, arsenic) contaminated soils above guidance levels.

Contaminated soils are readily accessible for excavation and generally lie within two feet of ground surface although some petroleum impacted soils range to depths of four feet. In addition, no measurable quantities of groundwater is found in the four site monitoring wells.

00/20-02 THU 11:54 FAX 716 7226

NYS DEC--DER/SHM

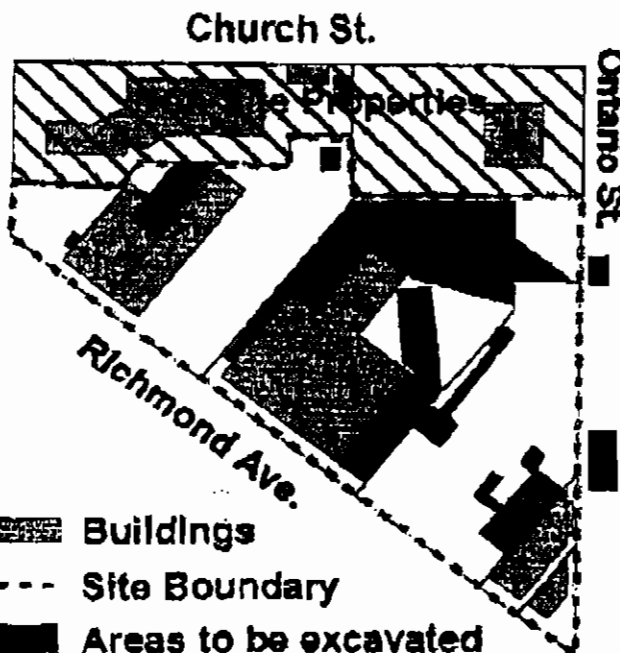
003

Interim Remedial Measures

The City proposes to move directly into the remedial phase of the project through implementation of an Interim Remedial Measure (IRM). An IRM is a type of remediation that can cover a variety of remedial activities, large and small, to remediate well-defined problems at a site. It can be undertaken without the extensive investigation and evaluation remedial alternatives. Sometimes, an IRM achieves the remedial goal for a site and no further action is required.

The IRM for the Richmond Avenue Project would consist of excavation and off site disposal of the 2300 tons of contaminated site soils. However, the IRM could be tailored as appropriate, should the Department find that some soils could be capped in place with appropriate institutional controls.

Given current site conditions and the nature and extent of contamination, it is anticipated that successful completion of the IRM as proposed can result in timely and cost-effective remediation of the site that will allow for planned commercial redevelopment and meet the goals of the State Brownfield Program.



Public Involvement and Information:

Public understanding and involvement are important to the success of New York's Brownfields program. To keep you informed the City of Lockport and NYSDEC have placed site documents for your review in local repositories. The public is urged to review all the environmental information about the site at these document repositories:

Lockport Public Library
23 East Avenue
Lockport, New York
Monday - Thursday 10:00 AM to 9:00 PM
Friday or Saturday 10:00 AM to 9:00 PM

NYSDEC Buffalo Office
270 Michigan Avenue,
Buffalo, N.Y. 14203-2999
By appointment only:
Contact: Mr. Abul Barkat at (716) 851-7220

If you have any questions regarding this program or would like more information, please contact:

For more information on the project	For more information on the project	For more information on the project
Mr. Abul Barkat NYSDEC 270 Michigan Avenue Buffalo, New York 14203 (716) 851-7220; or,	Mr. Matthew Forcucci NYSDOH 584 Delaware Avenue Buffalo, New York 14202 (716) 847-4365; or,	Mr. William Egan Community Development One Locks Plaza Lockport, New York 14094 (716) 439-5587

Richmond Avenue Brownfield Site Contaminants of Concern

SOIL 0 to 2 feet deep	Maximum Concentration (PPM)	Frequency of Exceeding SECs	Available Concentration (PPM)	PAHs HCB Elemental Carbon (PPM)
Lead	4,100	21 of 55	1,500	400
Mercury	11.0	41 of 55	2.5	0.1
Arsenic	46.0	20 of 55	9.0	7.5
Chromium	322	4 of 55	100	50
SOIL 2 to 4 feet deep				
Lead	1910	6 of 27	300	400
Mercury	3.0	16 of 27	1.0	0.1
Arsenic	10.0	6 of 27	6.0	7.5
Chromium	39.0	0 of 27	10.0	50.0

Richmond Avenue Brownfield Project Interim Remedial Measure(IRM)

Works to be implemented under the IRM:

- **Total removal of soils exceeding hazardous waste criteria.**
- **Removal of virtually all soils 0 to 2 feet depth exceeding clean up guidance values.**
- **Confirmatory Sampling.**
- **Backfill of all excavations with clean soil fill.**

Anticipated Results of the IRM:

- **Elimination of direct exposure threat from surface soil contamination.**
- **Reduce contaminant concentration in the upper two feet of soil below or near clean up guidance values.**
- **Limited residual contamination in soils below two feet.**
- **Elimination of all hazardous waste levels of contaminants.**
- **Establish site contaminant residual levels that are suitable for future planned use of the site.**

ONTARIO STREET

HAMILTON
HOUSE

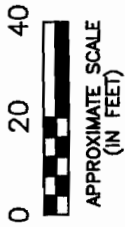
18 CHURCH STREET

SHED

CHURCH STREET

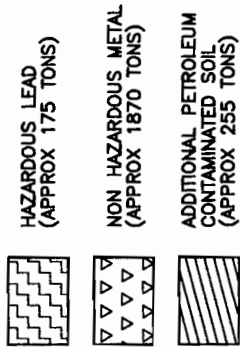
RICHMOND
AVENUE
PROJECT

RICHMOND AVENUE



--- = PROJECT SITE BOUNDARY

LEGEND



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DRAWN BY

MTG

PROJECT NO.

0107016P

DATE

12/13/02

APPROXIMATE
SCALE

1" = 40'

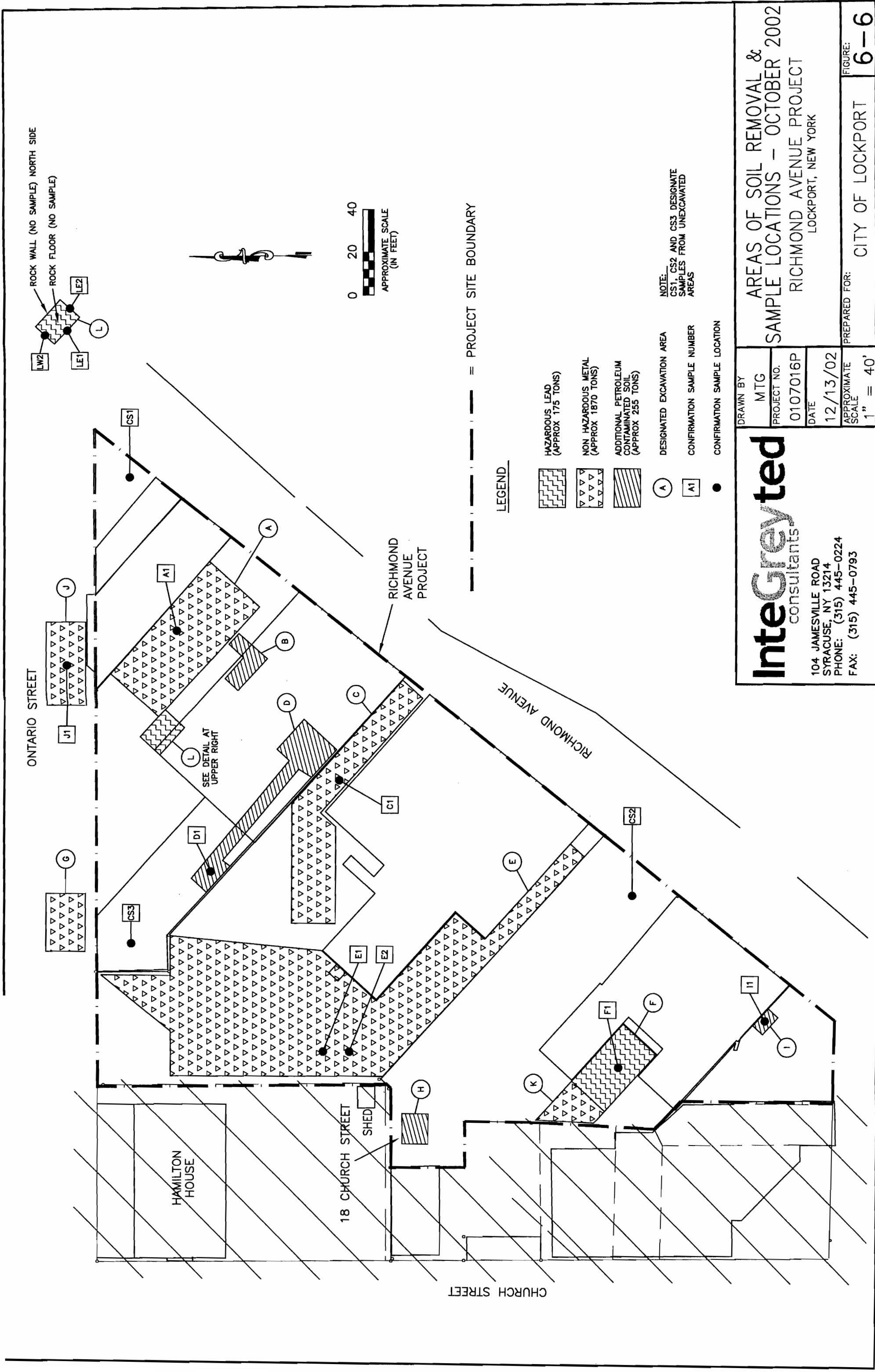
AREAS OF
SOIL REMOVAL
RICHMOND AVENUE PROJECT
LOCKPORT, NEW YORK

PREPARED FOR:

CITY OF LOCKPORT

FIGURE:

6-5



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DRAWN BY MTG	AREAS OF SOIL REMOVAL & SAMPLE LOCATIONS – OCTOBER 2002		
PROJECT NO. 0107016P	RICHMOND AVENUE PROJECT LOCKPORT, NEW YORK		
DATE 12/13/02	PREPARED FOR: CITY OF LOCKPORT	FIGURE: 6-6	
APPROXIMATE SCALE 1" = 40'			