SOIL DISPOSAL CHARACTERIZATION WORK PLAN

BROWNFIELDS CLEANUP PROGRAM For Pierce Arrow Business Center

Pierce Arrow Business Center 155-157 Chandler, Buffalo, New York 14207 BCP # C915312



Prepared For:

R & M Leasing LLC and Signature Development LLC

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Prepared By:

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April 19, 2017





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1.0 INTRODUCTION

This Soil Disposal Characterization Work Plan presents the proposed scope of work (Work Plan) for CBP #C915312 at the future Pierce Arrow Business Center at 155-157 Chandler Street located in the City of Buffalo, New York (site), as shown on Figure 1 and Figure 2. The Applicant, R & M Leasing LLC and Signature Development LLC, has entered into the Brownfield Cleanup Program (BCP) as a Volunteer.

The Soil Disposal Characterization Work Plan has been completed by Hazard Evaluations Inc. (HEI) and Schenne & Associates (S&A) on behalf of R & M Leasing LLC and Signature Development LLC. The work will be completed in general accordance with New York State Department of Environmental Conservation (NYSDEC) DER-10 guidelines. The work plan provides details on pre-characterization sampling for soil to be excavated and disposed off-site.

2.0 SOIL DISPOSAL CHARACTERIZATION SCOPE OF WORK

Based on initial sampling results, polychlorinated biphenyls (PCBs), semi-volatile organic compounds (SVOCs) and metals impacts were identified within the granular fill materials within the courtyard and vacant lot areas. As part of Interim Remedial Measures (IRM) activities, a portion of the IRM is expected to include the following work:

- General site cleanout of existing materials
- Asbestos containing materials (ACM) survey and abatement, if necessary
- Lead base paint (LBP) survey and abatement, if necessary
- Excavation and off-site disposal of impacted fill material within the courtyard and vacant lot areas of the site.

Due to the proposed future usage to include a brewery, food services, and a clean room manufacturing environment, the overall objective of the IRM is to remediate the site to Track 2 for restricted residential requirements.

2.1 ACM Soil Characterization

During site preparation work and removal of on-site equipment, asbestos containing materials (ACM) were identified, which caused the work to cease and ACM survey be completed. Based on survey results, the top 2-inches of soil and paver/brick stones throughout the courtyard area was deemed as ACM-containing requiring removal.

The top 2-inches of soil and paver/brick stones throughout the courtyard area will be scraped off and placed into a plastic lined roll-off bin. Once this soil and paver/brick stone material has been contained in the plastic lined roll-off bin, a composite sample will be collected and analyzed for the following parameters, as required by the landfill:





- Friable and non-friable ACM
- Total PCBs
- Total VOCs
- TCLP VOCs
- TCLP SVOCs
- TCLP Metals
- Reactive cyanide
- Sulfide

After receipt of the analytical data, the laboratory analysis report will be provided to Waste Management facility located in Model City for disposal approval. The soil and paver/brick stones will then be transported to Model City for disposal.

2.2 Courtyard – PBCs Delineation

Due to the detection of PCBs at SB1 (0.5-2') at a concentration of 171 ppm, additional delineation will be completed within the courtyard area. The PCBs sampling and analysis will be focused on the SB1 location to delineate the extent of impacts over 50 ppm. Twelve (12) soil borings or hand augers will be completed in a 10 foot grid pattern around SB1 to depth of 0 to 3 feet below grade to further delineate PCBs impacts over 50 ppm. Proposed sampling locations are included on Figure 3.

Soil samples will be collected in one to two foot intervals. Each interval will be initially screened in the field with a Dexsil Clor-N-Soil 50 ppm test kit to allow for real time screening and evaluation of soils with PCBs over 50 ppm. The PCBs test kits will be utilized to delineate the extent of impacts in the soil near SB1 over 50 ppm. If the extent of 50 ppm PCBs impact is not identified from the first 12 samples, additional samples will be collected on the 10-foot grid pattern until the limits are identified.

Confirmatory analytical test samples for PCBs will be collected for 10% of the field test kit sample locations. Additionally, once limits are realized, confirmation samples will be collected at the extent of the 50 ppm limits.

The area delineated near SB1 with PCBs greater than 50 ppm will be segregated and treated separately, as this soil will require specific disposal requirements, and may be subject to federal TSCA management requirements. The delineated area with PCBs concentrations greater than 50 ppm will be excavated and the soil staged on poly sheeting and covered. Once within the soil containing greater than 50 ppm of PCBs has been stockpiled, a composite sample will be collected and analyzed for the following parameters, as required by the landfill.

- Total PCBs
- Total VOCs
- TCLP VOCs
- TCLP SVOCs
- TCLP Metals
- Reactive cyanide
- Sulfide





The soil will be staged on site until landfill approval. The soils with greater than 50 ppm PCBs will be disposed at Waste Management facility in Emelle, Alabama.

Confirmatory samples will be selected from the sidewall and bottom of the focused PCBs excavation area. Based on DER-10 requirements, one sample will be collected every 30 linear feet of sidewall and one sample for every 900 square feet of excavation bottom. The size of the PCBs excavation has not been determined; however, based on a 40 foot by 40 foot area, eight sidewall and two bottom samples will be collected. The confirmatory samples will be analyzed for Total PCBs only.

2.3 Courtyard and Parking Lot Areas

Waste characterization samples will be collected via soil borings. Due to the volume of soil and limited storage space on the subject site, the collection and analysis of the waste characterization samples will allow for the excavated soil to be directly loaded for off-site transportation and disposal. Proposed areas of soil sample collection are included on Figure 4. The three to four soil boring locations will be composited and analyzed for specific landfill requirements as listed below:

- PCBs
- Total VOCs
- TCLP VOCs
- TCLP SVOCs
- TCLP Metals
- Reactive cyanide
- Sulfide

The soil generated from the courtyard and parking lot areas is expected to be disposed at Waste Management facility in Model City, New York.

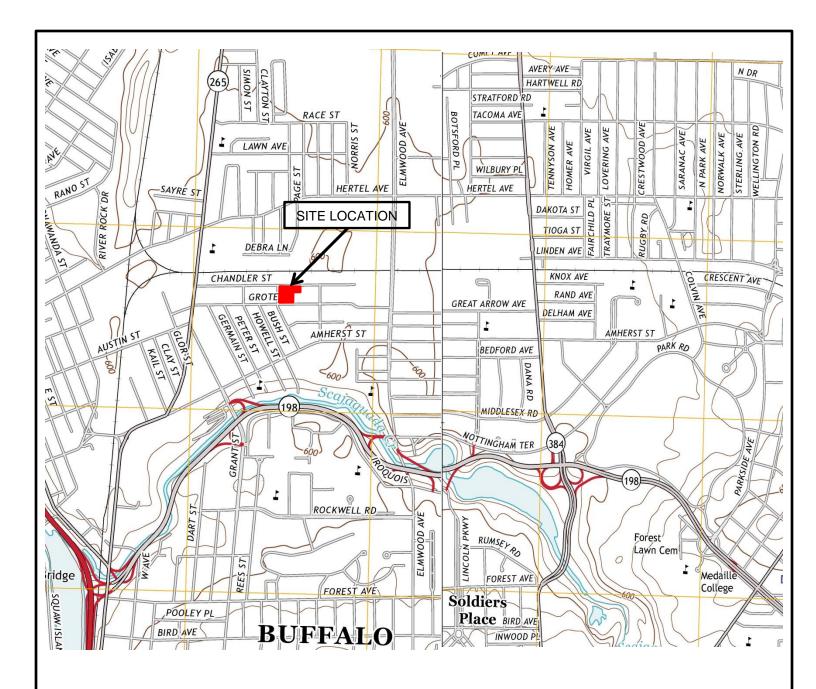
3.0 SCHEDULE

The 2 inches of soil and paver/brick stones within the courtyard will be scraped and stored in a plastic line roll-off bin before Monday, April 24, 2017, as this phase of work is limiting further ACM work to be completed. The PCBs soil delineation will occur on Tuesday, April 25 and 26, 2017, with courtyard and parking lot characterization sampling to be done on Thursday April 27 and 28, 2017. Analytical testing is anticipated to take 5 to 7 days, with landfill approvals within the following 5 to 10 business days. The soil will be removed from the site as soon as approvals are received.





FIGURES



THIS DRAWING IS FOR ILLUSTRATIVE AND INFORMATIONAL PURPOSES ONLY AND WAS ADAPTED FROM USGS, BUFFALO NE & NW, NEW YORK 2013 QUADRANGLE.



| HAZARD EVALUATIONS, INC. | | | | | |
|--|---------------------|----------------|--|--|--|
| Phase I/II Audits – Site Investigations – Facility Inspections | | | | | |
| SITE LOCATION | | | | | |
| 155 and 157 CHANDLER STREET | | | | | |
| BUFFALO, NEW YORK | | | | | |
| 2011/120,1121/1101111 | | | | | |
| R & M LEASING LLC | | | | | |
| BUFFALO, NEW YORK | | | | | |
| DRAWN BY: LSH | SCALE: NOT TO SCALE | PROJECT: e1601 | | | |
| CHECKED BY: EB | DATE: 04/2017 | FIGURE NO: 1 | | | |



BCP Boundary Limits

HAZARD EVALUATIONS, INC.

Phase I/II Audits - Site Investigations - Facility Inspections

SITE LIMITS

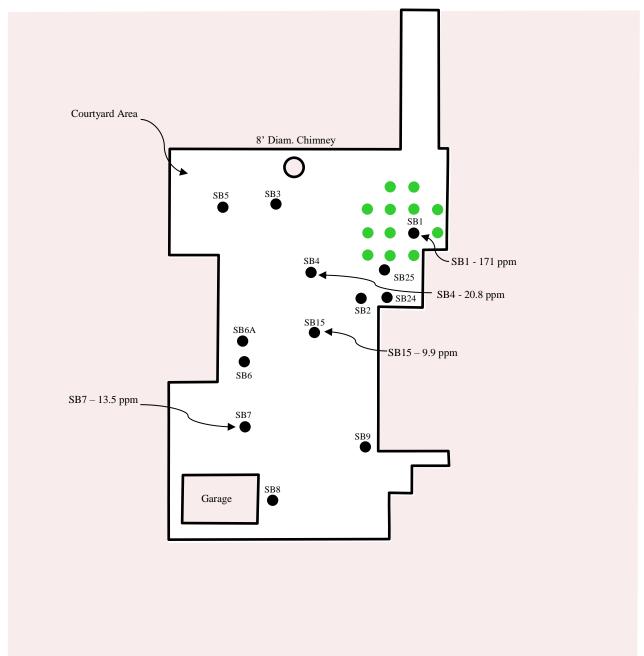
155 and 157 CHANDLER STREET BUFFALO, NEW YORK

> R & M LEASING LLC BUFFALO, NEW YORK

DRAWN BY: LSH SCALE: NOT TO SCALE PROJECT: e1601 CHECKED BY: EB DATE: 04/2017 FIGURE NO: 2



Chandler Street



Legend

= Proposed delineation sample location

HAZARD EVALUATIONS, INC.

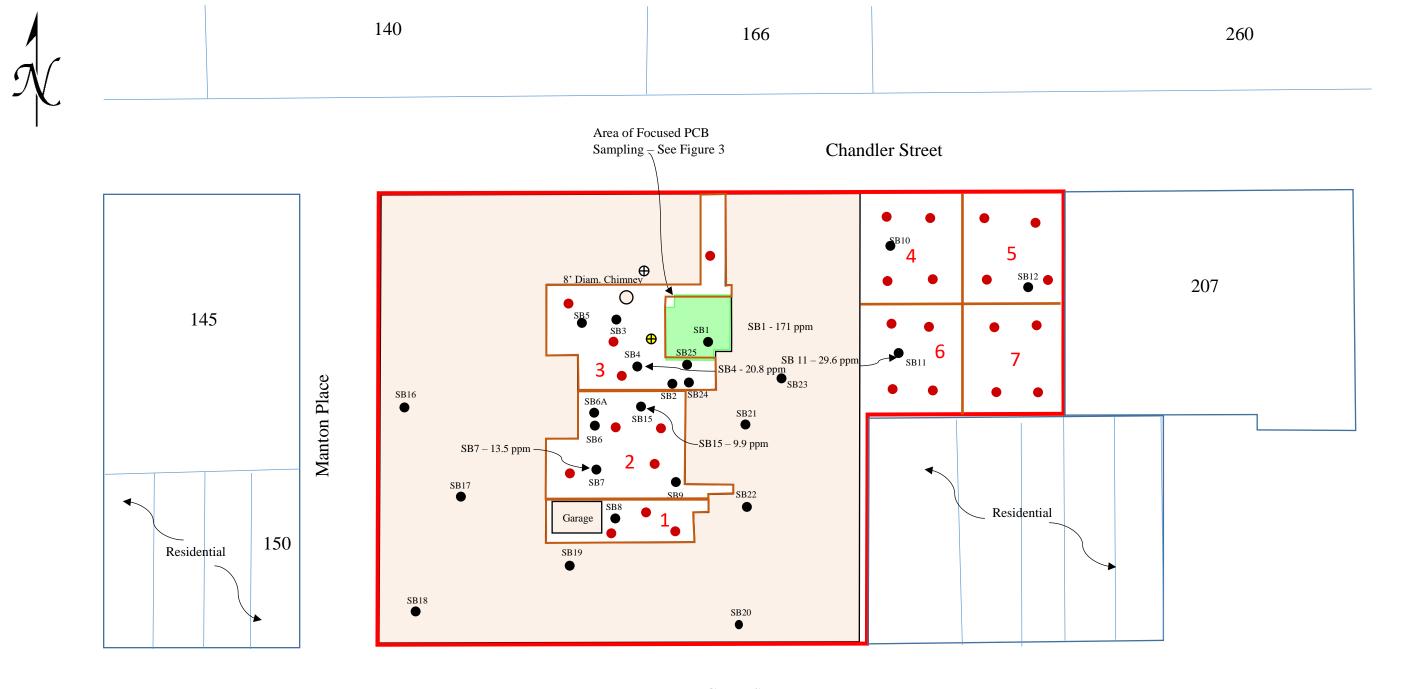
Phase I/II Audits - Site Investigations - Facility Inspections

FOCUSED PCB DELINEATION SAMPLING LOCATIONS

155 and 157 CHANDLER STREET BUFFALO, NEW YORK

| R & M LEASING | LLC |
|---------------|------|
| BUFFALO, NEW | YORK |

| DRAWN BY: MMW | SCALE: 1"=40' | PROJECT: e1601 |
|---------------|---------------|----------------|
| CHECKED BY: | DATE: 04/17 | FIGURE NO: 3 |



Legend

= Soil boring done 09/2016

= Proposed delineation sample location

3 = Area for characterization sample

= Proposed characterization sample location

Grote Street

| HAZARD EVALUATIONS, INC. | | | | | |
|--|-----------------|----------------|--|--|--|
| Phase I/II Audits – Site Investigations – Facility Inspections | | | | | |
| PROPOSED PRE-CHARCTERIZATION SAMPLING | | | | | |
| LOCATIONS | | | | | |
| 155 and 157 CHANDLER STREET | | | | | |
| BUFFALO, NEW YORK | | | | | |
| R & M LEASING LLC | | | | | |
| BUFFALO, NEW YORK | | | | | |
| DRAWN BY: MMW | SCALE: 1" = 60' | PROJECT: e1601 | | | |
| CHECKED BY: | DATE: 04/2017 | FIGURE NO: 4 | | | |