U.S. ENVIRONMENTAL PROTECTION AGENCY
POLLUTION/SITUATION REPORT
Hamburg Residential Lead Site - Removal Polrep

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
Region III

Subject: **POLREP #15**
Hamburg Residential Lead Site
A3XU
Hamburg, PA
Latitude: 40.5678350 Longitude: -75.9803390

To:
From: Todd Richardson, On Scene Coordinator
Date: 10/17/2014
Reporting Period: 09/13/2014 - 10/14/2014

1. Introduction

1.1 Background

Site Number:	A3XU	**Contract Number:**	
D.O. Number:		**Action Memo Date:**	8/28/2014
Response Authority:	CERCLA	**Response Type:**	Time-Critical
Response Lead:	EPA	**Incident Category:**	Removal Action
NPL Status:	Non NPL	**Operable Unit:**	
Mobilization Date:	4/15/2014	**Start Date:**	4/10/2014
Demob Date:		**Completion Date:**	
CERCLIS ID:		**RCRIS ID:**	
ERNS No.:		**State Notification:**	
FPN#:		**Reimbursable Account #:**	

1.1.1 Incident Category
Time Critical Removal Action

1.1.2 Site Description
This Site was originally brought to the attention of EPA Remedial Project Manager (RPM) for the Price Battery Remedial Site, by the property owner, in 2012. At that time the property owner was inquiring about how to handle and/or dispose of soil containing battery fragments, as he was planning a home renovation project. The RPM relayed the property owner's concern to EPA OSC Richardson, requesting assistance from the Removal Program in assessing areas of concern at the property.
In September, 2013, EPA, along with a START contractor, met with the homeowner at the Site property. At this time a removal assessment was conducted, confirming the reported battery fragments in the surface soil, in several locations around the property. During the removal assessment, approximately 25 randomly selected X-ray Fluorescence (XRF) screening locations on the property, were screened for lead. Fourteen of these locations revealed lead concentrations ranging from 648 to 31,600ppm (exceeding the established residential risk based screening/action level concentration of 572 ppm, used at the Price Battery, and Hamburg Lead Sites).

1.1.2.1 Location
The –Hamburg Residential Lead Site, located on 6th St, in Hamburg, Windsor Township, Berks County, PA, is owned by a residential property owner. The approximate 1.5 acre property consists of a roughly 2,000 square foot house, two car garage, gravel driveway, vegetable garden (40'x40'), children's play area, and a firewood shed, and dog and chicken pens. The Property is adjoined by other residential properties, and a partially wooded property owned by the Hamburg Gun Club.

1.1.2.2 Description of Threat
The Site is a residential property. Battery casings were observed in bare soil and sampling results indicate elevated lead concentrations.

Section 300.415 of the NCP lists factors to be considered in determining the appropriateness of a Removal Action. Paragraphs (b)(2)(i), (iv), (v), and (vii) of Section 300.415 directly apply as follows to the conditions as they exist at the Site.

A. *300.415 (b)(2)(i)* *Actual or potential exposure to nearby human populations, animals, or the food chain from hazardous substances or pollutants or contaminants;*

Lead-contaminated soil and soil containing lead-contaminated materials are located at the

Site. Battery casings are exposed at the surface. Contact with the soil or waste material and subsequent incidental ingestion of contaminated soil pose a significant threat to human health of nearby populations.

In the absence of cleanup activities, the Site poses a potential direct contact threat to human receptors (residents). Incidental ingestion of lead in the soil or sediment at the Site may result in increased blood lead levels. Lead is known to adversely affect the central nervous system.

B. *300.415 (b)(2)(iv) High levels of hazardous substances or pollutants or contaminants in soils largely at or near the surface, that may migrate;*

The hazardous substances located in the soils at the Site include lead contaminated, exposed surface soil on a residential property. While vegetation is generally heavy, bare soil can be observed in several areas. There is a potential for migration due to runoff and erosion from the slope.

C. *300.415 (b)(2)(v) Weather conditions that may cause hazardous substances or pollutants or contaminants to migrate or be released;*

The exposed surface soils are susceptible to erosion by wind and precipitation. Due to the steep slope, runoff during rain events may cause the migration of hazardous substances to the marshy area that is down gradient of contaminated areas.

D. *300.415 (b)(2)(vii) The availability of other appropriate Federal or State response mechanisms to respond to the release;*

The PADEP has requested EPA assistance with the Site due to inability to fund the action at this time. No other federal or state response mechanisms are currently available to perform the actions necessary to mitigate the threats to public health and the environment presented by the release or threatened release of hazardous substances at the Site.

1.1.2.3 Preliminary Removal Assessment/Removal Site Inspection Results

The removal site evaluation revealed battery casings and elevated concentrations of lead in the surface soils. Lead is a hazardous substance as defined in Section 101 (14) of the Comprehensive Environmental Response, Compensation and Liability Act of 1980, as amended (CERCLA), 42 U.S.C. § 9601 (14) and is listed as such in 40 C.F.R. § 302.4. As previously mentioned, XRF data revealed lead concentrations as high as 31,600 ppm in the exposed surface soils in several areas that were screened during the September 2013 removal assessment. There were also visible battery fragments observed in multiple areas that were not screened using an XRF. At similar Sites in the Berks County area, where fill material containing battery fragments have been identified, lead concentrations in soils have been as high as 300,000 ppm. As part of recent comprehensive extent of contamination survey, surface and subsurface soil samples are being analyzed to determine the full extent of lead contamination. The total quantity of lead-contaminated soil and waste at the Site is currently unknown.

2. Current Activities

2.1 Operations Section

2.1.1 Narrative

During this reporting period the last remaining sod was installed. Watering of the sod continues as remaining minor tasks are addressed. These tasks include installing erosion matting on the north side of Poplar Street, regrading the roads and dressing up the stone areas. The interior was cleaned based on the interior sample results collected in July. All contaminated carpet was removed, bare floors were leadlocked and the interior cleaned with TSP detergent. The soil load out commenced this period. Approximately 2800 tons of non-hazardous soil was shipped to a certified landfill. The remaining hazardous soil pile was separated into 200 ton piles and stabilized with a magnesium oxide product which binds with the lead and prevents it from leaching.

2.1.2 Response Actions to Date

Removal Assessment Screening
Extent of Contamination Investigation (Test Pitting)
Began excavation removal activities
Completed excavation activities
Completed backfilling and topsoilling
Completed yard restoration
Completed interior cleanup
Began soil loadout

2.1.3 Enforcement Activities, Identity of Potentially Responsible Parties (PRPs)

2.1.4 Progress Metrics

Waste Stream	*Medium*	*Quantity*	*Manifest #*	*Treatment*	*Disposal*

2.2 Planning Section

2.2.1 Anticipated Activities
Excavation of areas with lead concentrations exceeding 572 to an approximate depth opf 24".

2.2.1.1 Planned Response Activities
Begin excavaton activities.

2.2.1.2 Next Steps
Continue excavaton/backfill activities.

2.2.2 Issues

On 7/2/14 EPA recieved a 85% funding letter from WRS. This letter stated that 85% of the funding available in the existing Task Order (TO) had been expended. OSC Richardson therefore requeseted that the remainder of the Action Memo Project Ceiling, plus most of the contingency be added to the ERRS TO. On 7/10/14, the ERRS TO was modified, placing an additional $285,000 into the available ERRS budget.
Also, based on a larger volume of soil excavated (adjoining properties), and extremely high lead concentrations (as high as 160,000ppm - high probability for requiring hazardous waste disposal), the anticipated disposal and labor costs will likely be higher than the project ceiling. Therefore, OSC Richardson is drafting a request for additional funding to complete the necessary Site work.

2.3 Logistics Section
No information available at this time.

2.4 Finance Section
No information available at this time.

2.5 Other Command Staff
No information available at this time.

3. Participating Entities
3.1 Unified Command

3.2 Cooperating Agencies
US EPA Region III and PADEP

4. Personnel On Site
US EPA, Region III
START - Weston Solutions
ERRS - WRS

5. Definition of Terms
No information available at this time.

6. Additional sources of information
No information available at this time.

7. Situational Reference Materials
No information available at this time.