

U.S. ENVIRONMENTAL PROTECTION AGENCY
POLLUTION/SITUATION REPORT
Southeastern Wood Preserving - Removal Polrep



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
Region IV

Subject: POLREP #20
Residential Excavation Continues
Southeastern Wood Preserving
041L
Canton, MS
Latitude: 32.6181000 Longitude: -90.0161000

To: Matt Taylor, USEPA R4 ERRB
Richard Ball, MS DEQ
Shelby Johnston, EPA

From: Subash Patel, On-Scene Coordinator

Date: 2/3/2014

Reporting Period: 01/22/2014 to 02/03/2014

1. Introduction

1.1 Background

Site Number:	041L	Contract Number:	EP-S4-07-03
D.O. Number:	0042	Action Memo Date:	9/25/2013
Response Authority:	CERCLA	Response Type:	Time-Critical
Response Lead:		Incident Category:	Removal Action
NPL Status:	Non NPL	Operable Unit:	
Mobilization Date:	11/4/2013	Start Date:	8/31/2009
Demob Date:		Completion Date:	
CERCLIS ID:	MSD000828558	RCRIS ID:	
ERNS No.:		State Notification:	
FPN#:	C10G03	Reimbursable Account #:	

1.1.1 Incident Category

Fund-Lead Time Critical Removal Action

1.1.2 Site Description

The Southeastern Wood Preserving Site is an abandoned wood preservation plant which operated from 1928 until it filed for bankruptcy in early 1979. The Site covers approximately twenty acres and is located in a predominantly commercial/residential area just east of downtown Canton, Madison County, Mississippi.

Multiple investigations and actions have been taken by the State of Mississippi and the EPA throughout the years, including an EPA initiated an emergency response action in 1986 to stabilize three unlined surface impoundments that contained creosote sludge and water as well as an August 2009 emergency response action to remove contaminated soil and sediment and installed a slurry wall along the south bank of Batchelor Creek.

These multiple sampling events and response actions have found polycyclic aromatic hydrocarbons, pentachlorophenol, and dioxins contamination in surficial and in subsurficial soils both on and off-site.

The Preliminary Assessment and Site Inspecting (PA/SI) was completed on July 17, 2009. The Site was proposed to the NPL in March 2011. The Site was listed on the NPL on May 15, 2012. The RI/FS, including a Human Health Risk Assessment, is underway with phase 1 completed in May 2013. In order to evaluate if any of the private properties adjacent to the SWP Site are impacted by Site contaminants, surface and subsurface soil samples were collected during Phase 1 of the RI/FS. Of the 45 properties sampled, nineteen exceeded the Regional Removal Management Levels for dioxins and benzo(a)pyrene in residential and commercial soils. The contamination was found at a depth of 0 – 6 inch. These residential and commercial properties were referred to the Region 4 Emergency Response and Removal Branch to address under a Removal Action.

1.1.2.1 Location

There are twelve residential and seven commercial properties of concern. The properties are spread throughout a 17-acre area of Northeast Canton, Mississippi. The properties are located south of the SWP Site, across Covington Drive, between Miller Street to the West, Parker Street (Barfield Street) to the East

and North of Barfield Street. One property of concern is located near the intersection of Yandell Avenue and Miller Street. One additional property of concern is located near the intersection of Miller Street and Covington Drive.

The residential properties consist of small lots with houses and outbuildings. A number of the residential properties have vegetable gardens. A few lots are sparsely vegetated, and exposed surface soil is present; playground equipment is also present. Vacant lots are not fenced, and there is also evidence of exposed surface soil and children playing in these areas.

1.1.2.2 Description of Threat

The elevated benzo(a)pyrene and dioxin contamination presents a high probability of exposure to persons who live in the community. The contamination is found at ground surface. The Site consists of residential and commercial properties that are unsecured. There are children in this community who play in multiple yards. A number of the yards also have vegetable gardens. The hazardous substances in the soil pose a direct contact threat to the surrounding population. Benzo(a)pyrene and dioxins are classified as probable human carcinogens and have been shown to have mutagenic, reproductive and developmental health effects.

Benzo(a)pyrene and dioxins are hazardous substances as defined by CERCLA 101 (14) and listed in Title 40 of the Code of Federal Regulations (CFR), Section 302.4. The EPA's TSS has reviewed the EPA residential sampling results and the EPA Removal Site Evaluation and determined there is a threat to public health and the environment resulting from the elevated benzo(a)pyrene and dioxin contamination present at the Site. This contamination is persistent and has been released to the yards of at least nineteen properties of the Center Terrace Community of the City of Canton.

1.1.3 Preliminary Removal Assessment/Removal Site Inspection Results

The Region 4 Superfund Remedial program conducted the Phase 1 Remedial Investigation Feasibility Study between November 6, 2012 and September 30, 2013, which included sampling of surface and subsurface soils from residential and commercial properties adjacent to the SWP Site.

In order to evaluate if any of the private properties adjacent to the SWP Site are impacted by Site contaminants, surface and subsurface soil samples were collected from 45 locations. At each location, a five-point composite surface soil sample was collected for chemical analysis from zero to six inches and subsurface samples were to be collected from six to twelve inches below ground surface, in an approximate 50 × 50 foot grid.

Of the 45 properties sampled, twelve exceeded the Regional Removal Management Levels (RML) for dioxins and benzo(a)pyrene in residential soils, and seven commercial properties exceeded the Regional RMLs for dioxins and benzo(a)pyrene in industrial soils. The contamination was found at a depth of zero to six inches.

2. Current Activities

2.1 Operations Section

2.1.1 Narrative

Soil at residential properties along Barfield Street are being addressed. About one foot of soil is being excavated. Sampling results show there is dioxin and/or benzo(a)pyrene concentration above Remedial Management Levels (RML) within the first twelve inches of soil, but concentration is well below RML from at a depth of thirteen to twenty-four inches. Clay layer is found at a depth of about eight inches.

2.1.2 Response Actions to Date

The following is the list of properties that has been addressed as of February 3, 2014.

607 Barfield: Complete
605 Barfield: Complete
603 Barfield: Complete
561 Barfield: Complete
557 Barfield: Complete
553 Barfield: Complete
549 Barfield: Back yard complete. Front yard remains.
543 Barfield: Front yard receiving backfill and sod.

Residential and commercial properties exceeding 50 ppt for dioxin TEQ along Barfield Street and Covington Drive are being considered for removal activities. After discussions with Remedial Project Manager and Technical Support Services, removal activities targeting this concentration will meet the hazard index of one or below for non-carcinogen and removal activities will be consistent with the Remedial Program. Removal activities for additional residential properties and subsurface soil from 13 inches to 24 inches at specific properties may need to be considered.

Additional soil excavation may require EPA to stage some soil at the site due to funding. EPA's Remedial Program and MSDEQ are aware. If needed, the Remedial Program will address staged soil in their plan.

Back yard of 549 Barfield was excavated to two feet since clay was not reached. Therefore it is likely dioxin concentration will exceed 50 ppt in this area.

Additional soil sampling was taken for the following properties to determine if soil concentration exceed 50 ppt for dioxin TEQ:

464 Covington
525 Barfield
531 Barfield
535 Barfield
543 Barfield

A water line for 553 Barfield failed during excavation. EPA hired a plumber to repair water line. It appeared soil excavation may have exposed water line to abnormally cold temperatures overnight which caused the line to freeze and break.

EPA will send excavated soil to the Canton Landfill. The EPA's attorney for contractor officer sent OSC an opinion stating that EPA should abide by the city's Flow Control Ordinance. The ordinance requires approved waste generated within city's limits to be disposed in city's landfill. The landfill is CERCLA-approved.

With assistance from MSDEQ and EPA OSC representatives, the owner of commercial property at 543 Barfield Street completed a response from EPA's enforcement section.

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

The enforcement process is currently moving forward. The seven commercial properties are currently being vetted to determine liability.

2.2 Planning Section

2.2.1 Anticipated Activities

Residential property located at 340 Miller will be excavated next. Front and back yards will be excavated to one foot.

2.2.2 Issues

None

2.3 Logistics Section

Not applicable.

2.4 Finance Section

No information available at this time.

2.5 Other Command Staff

2.5.1 Safety Officer

The Safety Officer and Assistant Safety Officers for the site were assigned. A Site Specific Health and Safety Plan was created. EPA, START, ERRS and MS DEQ concurred on the plan. A copy of the plan is found online at www.epaosc.org/SoutheasternWood. A hard copy with appropriate signatures is maintain on-site in the Site Trailer.

3. Participating Entities

3.1 Cooperating Agencies

State of Mississippi Department of Environmental Quality

City of Canton Mayors Office

City of Canton Police Department

4. Personnel On Site

The following personnel were on-site at various times throughout the reporting period:

EPA: 1

START: 1

ERRS: 10

MSDEQ: 1

5. Definition of Terms

5.1 Commonly Used Abbreviations

OSC: On-Scene Coordinator

START: Superfund Technical Assistance Response Team Contractor

ERRS: Emergency Response Removal Services (ERRS) Contractor

MS DEQ: State of Mississippi Department of Environmental Quality

TEQ: Toxic Equilivent

6. Additional sources of information

6.1 Internet location of additional information/report

The site website and online repository for documents, pictures, figures, and reports are found at www.epaosc.org/SoutheasternWood.

6.2 Reporting Schedule

POLREP should be generated monthly unless an issue arises.

7. Situational Reference Materials

The site website and online repository for documents, pictures, figures, and reports are found at www.epaosc.org/SoutheasternWood.