

United States Environmental Protection Agency
Region IV
POLLUTION REPORT

Date: Tuesday, December 22, 2009

From: Carter Williamson

To: Matt Taylor, USEPA R4 ERRB
Jim Webster, USEPA R4 ERRB

Richard Ball, MS DEQ
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Subject: Southeastern Wood Preserving
Southeastern Wood Preserving
Covington Drive and Hargon Street, Canton, MS
Latitude: 32.6181000
Longitude: -90.0161000

POLREP No.:	8	Site #:	041L
Reporting Period:	12/4/2009-12/22/2009	D.O. #:	0042
Start Date:	8/31/2009	Response Authority:	CERCLA
Mob Date:	8/26/2009	Response Type:	Time-Critical
Demob Date:		NPL Status:	Non NPL
Completion Date:		Incident Category:	Removal Action
CERCLIS ID #:	MSD000828558	Contract #	EP-S4-07-03
RCRIS ID #:			

Site Description

The Southeastern Wood Preserving Site is an abandoned wood preservation plant facility which operated from 1928 until it filed for bankruptcy in early 1979. The Site covers approximately 20 acres and is located in a predominantly commercial/residential area just east of downtown Canton, Madison County, Mississippi. Batchelor Creek and Illinois Central Gulf Railroad border the Site to the north. The railroad is no longer operational. The City of Canton's drinking water well field lies just south of the Site. An abandoned industrial area lies to the east and a residential area borders the Site to the west.

The production process involved debarking of the Southern Yellow Pine timbers and placing them in retort cylinders for drying and pressure treatment using creosote and pentachlorophenol as preservatives. Prior to 1977 and the Clean Water Act, the facility reportedly discharged approximately 50,000 gallons of waste-water directly into Batchelor Creek. In May of 1977, the company was hooked into the City of Canton sewage system. The wastewaters were to be pre-treated prior to discharge into the City lagoons. On several occasions the City ordered the facility to cease discharge due to failure to adequately treat the wastewaters.

Batchelor Creek flows through a City park approximately 1 mile downstream from the Site, passes through a residential area and then continues through downtown Canton before leading into the Big Black River approximately 10-12 miles downstream. There is evidence of fishing and recreational usage in the Big Black River.

The Site has a long history of EPA involvement. The Emergency Response and Removal Branch (ERRB) of the EPA initiated an emergency response in early 1986 in order to stabilize three unlined surface impoundments that were overflowing on-site. Each impoundment contained creosote sludge and waters. The response action consisted of pumping 30,000 gallons of water from flooded areas of the Site, treating it, and discharging it into Bachelor Creek. Subsequent to this response, it was evident that the Site would be referred to ERRB for a removal action.

The initial Action Memo was signed in May 1986. It requested that site activities be addressed and funded in two phases. The scope of the first phase consisted of excavating and stockpiling hazardous waste on-site. The contaminated soils and sludges in the vicinity of the former lagoons were stabilized with lime kiln dust, placed in a stockpile and fenced. The second phase of the action was to consist of on-site treatment or off-site disposal of the material, but this action was delayed for several years.

In 1988 the Soil Conservation Service (SCS) contacted EPA after observing oily waste leaching into the Creek from the Southeastern Wood Preserving Site. SCS had designed a soil erosion prevention plan that called for excavating and widening Bachelor Creek. Through an Interagency Agreement, SCS

contributed \$190,000 towards the excavation work. The Creek was widened according to Plan and a geofabric liner was placed in the bed of the Creek. The bed and the banks were then covered with rip rap in order to prevent erosion.

An exemption from the twelve-month statutory limit and ceiling increase as approved in August of 1989 in order to address the second phase of the removal action. A composite sample from the waste pile indicated a PAH concentration of 5016 ppm and a phenol concentration of 62 ppm. The 8000 cubic yard on-site stockpile was to be treated through bioremediation landfarming techniques. A ceiling increase and \$2 million exemption was approved in 1990 once proposals were received. The RCRA Land Ban treatment standards and air emission standards required a slurry phase treatment due to the health based risk associated with the Site's surrounding residential/commercial areas. The removal action required the treatment of the contaminated soil to the K001 waste code Land Disposal Requirements (LDR) standards. The contractor proposed to utilize a batch bioremediation process consisting of screening, mixing with water, slurring in two parallel biological slurry reactors (BSRs), and final treatment and drying in a double lined land treatment unit (LTU).

In 1992 An Amendment to Removal Action Memoranda Requesting a Treatability Variance was approved. After several failed attempts to reach the K001 LDR Standards with the bioremediation technique, it became apparent that a treatability variance would be necessary. The clean-up levels for phenanthrene and pyrene were adjusted without compromising the goals of the Removal Action by maintaining concentration of total PAHs below 100 ppm.

On February 26, 2003, representatives from the EPA and the Mississippi Department of Environmental Quality (MDEQ) met at the Site for a reconnaissance. During the reconnaissance the non effective treated soil was observed. It was noted that the pile had sunken over the years and could possibly be leaking into Bachelor Creek.

On June 6, 2007 On-Scene Coordinator Hughes visited the Site to perform a Removal Site Evaluation after the Site was referred to the Branch from the MDEQ. The OSC met the State representative on-site in order to characterize the layout of the Site and address the needs to fully perform the Removal Site Evaluation. The temperature mobilized the creosote present in the bed of Bachelor Creek enabling observation of releases downstream. Please see the photos in the Images Section.

On September 18, 2007 OSCs Hughes and Negron met with representatives from EPA's Science and Ecosystem Support Division in order to perform several borings in the area between the stockpile, the former lagoon and the Creek. The stream invert adjacent to location A0 was surveyed and found to lay approximately 14 feet below ground surface at the borehole location. The stream has a mild gradient as it flows west and is estimated to drop less than 5 feet.

Starting on August 25, 2009, EPA and ERRS personnel mobilized to the Site. Excavation of Bachelor Creek began and continues at present. OSC Carter Williamson is directing all on-site activities with the assistance of the United States Coast Guard, Gulf Strike Team.

Current Activities

After a Thanksgiving break holiday, the EPA, ERRS and USCG returned to the site to continue excavation of Bachelor Creek. 400 feet of creekbed has been excavated to a depth of approximately 11 feet while an additional 600 feet has been removed at a 4 foot depth.

*The creekbed and western bank divided into 2 sections for focused tasking. Operations currently being conducted in the "downstream section" (approximately 500 feet in length). A 3 foot layer of backfill put down in that section of the creekbed. 250 feet of creekbed excavated and backfilled near to grade (within 1 foot). 250 feet of the western bank excavated and backfilled to within 5 feet of grade.

Confirmation sampling of the excavated/exposed creekbed was conducted by staff from TTEMI with results expected within the week. These results will determine the need to remove additional creekbed soils in the previously excavated areas. As well, sample results will also help determine potential for disposal and/or temporary/permanent placement of stockpiled soils staged on-site.

Adverse weather conditions continue to hamper site activities and cause delays in excavation and stockpiling activities. Significant rain events and waste water releases from the City of Canton's Utility Department continue to inundate the site and Bachelor Creek.

Additional clean backfill has been sampled and approved for use in the creekbed after review by EPA's

Technical Services Section. Clean backfill continues to be utilized on the Western wall of the creekbed to bolster the existing embankment to prevent cave-ins and safety issues.

*U.S. Coast Guard (Gulf Strike Team) are on-site to provide federal presence in the absence of the EPA FOSC. USCG personnel are being tasked to provide site safety, contractor cost summary review, photo-documentation and assistance with Canton community involvement.

Planned Removal Actions

*ERRS project manager decided to divide the site into 2 sections geographically for tasking. The dividing point being the stream that runs under the wooden train trestle that feeds into the creek. The first section is identified as from the train trestle feeder, downstream to the edge of site. The distance is approximately 500 feet. Both the creekbed and western bank will be excavated and brought to grade in preparation for naturalization IAW current direction from EPA. Once completed, ERRS will move to the section upstream of the train trestle feeder and conduct the same operation there.

ERRS will continue to excavate creekbed to the appropriate depth when creosote contaminated soils are noted and move Southward approximately 400 feet to remove additional soils. Total excavation should approximate 800 feet at 10-11 foot depth and an additional 600 feet at 4 foot depth.

Once the creekbed is removed, excavation equipment will be re-directed to remove Western bank of creek that is contaminated and replace with clean backfill and rip-rap. Upon completion of that task, ERRS will begin construction of a 3 foot by 22 foot (approximate) slurry wall containment structure to prevent further migration of contaminants off-site and into Batchelor Creek.

Next Steps

EPA and/or USCG personnel and ERRS will be on-site from November 30th through December 22, 2009 and will break for the Christmas Holidays December 23 through the 28th.

Confirmation sample results from creekbed will determine need to revisit previously graded areas for additional grading if necessary. Stockpiled soils in two separate impoundments will be sampled at a later date to determine possibilities for disposal by this time-critical action or during a potential remedial, long term response.

Continue excavation of Batchelor Creek, coordination with community and Canton city government and discussions with EPA Remedial Program regarding the long term remediation of the SE Wood Site.

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Key Issues

Inclement weather's impact on site work

Repetitive breakdown of heavy equipment on site.

Coordination with the City of Canton Utilities Department regarding unscheduled and scheduled releases of large volumes of waste water into Batchelor Creek which impacts site activities.

Removal of additional creekbed soils in Batchelor Creek to the clean Yazoo Clay layer.

Coordination with MDEQ, the City of Canton and the EPA Remedial Program on the successful completion of this time-critical removal action.

Sample results of excavated soils to determine constituents in soils for future transfer and disposal options and to confirm degree of removed contamination in Batchelor Creek..

Question as to transfer of contaminated soils off-site or stockpiled and capped at the present location.

Determination on how to address opposing (Eastern) creek bank that has evidence of creosote contaminated soils present.

Estimated Costs *

	Budgeted	Total To Date	Remaining	% Remaining

Extramural Costs				
ERRS - Cleanup Contractor	\$1,750,000.00	\$954,348.00	\$795,652.00	45.47%
IAGs - USCG	\$30,000.00	\$7,946.00	\$22,054.00	73.51%
RST/START	\$100,800.00	\$5,812.00	\$94,988.00	94.23%
Intramural Costs				
USEPA - Direct (Region, HQ)	\$100,000.00	\$5,200.00	\$94,800.00	94.80%
Total Site Costs	\$1,980,800.00	\$973,306.00	\$1,007,494.00	50.86%

* The above accounting of expenditures is an estimate based on figures known to the OSC at the time this report was written. The OSC does not necessarily receive specific figures on final payments made to any contractor(s). Other financial data which the OSC must rely upon may not be entirely up-to-date. The cost accounting provided in this report does not necessarily represent an exact monetary figure which the government may include in any claim for cost recovery.

response.epa.gov/SoutheasternWood

POLREP #8 Last Updated 1/22/2010