

U.S. ENVIRONMENTAL PROTECTION AGENCY
POLLUTION/SITUATION REPORT
Alcoa Oil Spill - Removal Polrep



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
Region V

Subject: POLREP #2
Progress POLREP
Alcoa Oil Spill

Lafayette, IN
Latitude: 40.4033776 Longitude: -86.8613812

To:
From: Shelly Lam, On-Scene Coordinator
Date: 1/16/2011
Reporting Period: January 16, 2011

1. Introduction

1.1 Background

Site Number:	Contract Number:
D.O. Number:	Action Memo Date:
Response Authority: OPA	Response Type: Emergency
Response Lead: PRP	Incident Category: Removal Action
NPL Status: Non NPL	Operable Unit:
Mobilization Date: 1/14/2011	Start Date: 1/14/2011
Demob Date:	Completion Date:
CERCLIS ID:	RCRIS ID:
ERNS No.:	State Notification:
FPN#: E11507	Reimbursable Account #:

1.1.1 Incident Category

Active production facility - oil spill

1.1.2 Site Description

1.1.2.1 Location

Alcoa is a producer of primary aluminum, fabricated aluminum, and alumina, located at 3131 Main Street in Lafayette, Tippecanoe County, Indiana. Site coordinates are 40.4033776 north latitude and 86.8613812 west longitude. The Site is a 172-acre facility located in an industrial and commercial area in Lafayette.

1.1.2.2 Description of Threat

On January 14, 2011, Alcoa reported to the National Response Center (NRC # 964751) a discharge of approximately 1,600 gallons of oily press water from their facility in Lafayette, Indiana. The discharge was due to a pipe failure and hose malfunction. Oil/water mixture discharged to the storm sewer and then flowed for approximately one mile to an outfall on Elliott Ditch. Elliott Ditch is a perennial stream that discharges into Wea Creek before flowing to the Wabash River.

1.1.3 Preliminary Removal Assessment/Removal Site Inspection Results

EPA On-Scene Coordinator (OSC) Shelly Lam and Indiana Department of Environmental Management (IDEM) OSC Greg Carter responded to the spill on January 14th. Both OSCs observed oil flowing from the outfall into Elliott Ditch. Oil flowed approximately one mile downstream to the 18th Street Bridge, where it has been contained and recovered.

Twenty-two residences on private drinking water wells were identified within 200 feet of the impacted section of the ditch. The residents have been notified of the spill and are being provided temporary drinking water by Alcoa. Additionally, samples are being collected from the wells.

Prior ecological assessments conducted by the U.S. Environmental Protection Agency (EPA) identified six endangered species in Elliott Ditch and Wea Creek. These species include the fanshell, ring pink, rough pigtoe, pyramid pigtoe, rabbitsfoot, and bluebreast darter. EPA has notified the State Trustee and Department of the Interior.

2. Current Activities

2.1 Operations Section

2.1.1 Narrative

The Alcoa facility reported a spill of approximately 1,600 gallons of oily press water on January 14, 2011. The discharge was due to a pipe failure and hose malfunction. Oil/water mixture discharged to the storm sewer and then flowed for approximately one mile to an outfall on Elliott Ditch. Elliott Ditch is a perennial stream that discharges into Wea Creek before flowing to the Wabash River. EPA and IDEM observed oil flowing from the outfall into Elliott Ditch. The oil was emulsified and appeared milky white in color.

2.1.2 Response Actions to Date

Alcoa continued recovery operations on at the outfall on Elliott Ditch and at the 18th Street Bridge containment area. At the 1100 hours meeting, Alcoa indicated that 52 vacuum trucks had been filled and off-loaded into on-site holding tanks.

At 1200 hours, Alcoa began residential well sampling at properties that have private drinking water wells which are located along Elliott Ditch. EPA's Superfund Technical Assessment and Response Team (START) contractor is conducting oversight of sampling operations. Fourteen residential wells were sampled. Of the 22 residences, one is on city water; one is vacant; one refused access; and one had the water shut off. Four residents were not home. Attempts will be made to sample those locations on January 17, 2011. The samples will be analyzed for volatile organic compounds (VOC), semivolatle organic compounds (SVOC), polychlorinated biphenyls (PCB) and Oil/Grease parameters and the data will be compared to the Maximum Contaminant Levels (MCL).

Alcoa continued to provide bottled drinking water to residents on private wells along Elliott Ditch.

At the 1400 hours meeting, Alcoa indicated that its wastewater treatment plant is operating but is not discharging. The treated water was diverted into a 1.8-million gallon catch basin on-site. Once the storm sewer pipe (which leads to Elliott Ditch) is cleaned out and clear water is observed at the outfall, Alcoa will begin discharging the treated water from the catch basin to Elliott Ditch.

At 1800 hours, Alcoa began discharging water from a fire hydrant into Manhole #001 in order to flush the storm sewer and to observe whether the discharge from the outflow pipe into Elliott Ditch contained oil. The distance from Manhole #001 to the outflow is approximately 1 mile away.

START conducted oversight of recovery operations and conducted monitoring at downstream locations. Oil was not observed past the 18th Street Bridge.

EPA requested a draft Confirmation Sampling Plan for Elliott Ditch from Alcoa.

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

On January 14, 2011, OSC Lam issued a Notice of Federal Interest to Alcoa representatives. Alcoa agreed to take voluntary action to contain the spill and conduct cleanup.

2.1.4 Progress Metrics

<i>Waste Stream</i>	<i>Medium</i>	<i>Quantity</i>	<i>Manifest #</i>	<i>Treatment</i>	<i>Disposal</i>
Oil/water mixture	Liquid	52 vacuum trucks (estimated 100,000 gallons)	Not applicable (NA)	Returned to on-site treatment system	NA

2.2 Planning Section

2.2.1 Anticipated Activities

2.2.1.1 Planned Response Activities

During the next operations period, the following activities will be conducted:

- Collect samples from the four remaining residences;
- Continue recovery at Elliott Ditch outfall;
- Maintain containment boom at 18th Street Bridge;
- Recover oil at 18th Street Bridge if oil is present there;
- Resume flushing of storm sewer; and
- Continue oversight and downstream monitoring.

2.2.1.2 Next Steps

When the emergency component to the project is complete, EPA will refer oversight of residential well sampling to IDEM.

2.2.2 Issues

Alcoa had previously entered into a Consent Decree with EPA regarding historical releases of PCBs to Elliott Ditch. Additionally, endangered species were previously identified in Elliott Ditch and the

downstream Wea Creek. The confirmation sampling plan will need to address these issues.

2.3 Logistics Section

NA

2.4 Finance Section

No information available at this time.

2.5 Other Command Staff

2.5.1 Safety Officer

OSC Lam is acting as overall safety officer for the response. In addition, environmental safety and health representatives from Alcoa are on-site at each recovery location.

2.6 Liaison Officer

NA

2.7 Information Officer

2.7.1 Public Information Officer

On January 15, 2011, OSC Thomas and the Tippecanoe Health Department conducted a media availability session. Links to related articles are posted at www.epaosc.org/alcoaoilspill.

2.7.2 Community Involvement Coordinator

EPA Community Involvement Coordinator (CIC) Don DeBlasio is on-site and assisting Alcoa obtain access for the residential water sampling.

3. Participating Entities

3.1 Unified Command

NA

3.2 Cooperating Agencies

Agency for Toxic Substances and Disease Registry
Department of Interior
IDEM
Indiana Department of Natural Resources
Tippecanoe County Emergency Management Agency
Tippecanoe County Health Department

4. Personnel On Site

1 EPA OSC
1 EPA CIC
1 IDEM OSC
5 START members
4 Alcoa personnel
10 Alcoa contractors

5. Definition of Terms

ATSDR	Agency for Toxic Substances and Disease Registry
CIC	Community Involvement Coordinator
EPA	Environmental Protection Agency
IDEM	Indiana Department of Environmental Management
MCL	Maximum Contaminant Level
NA	Not applicable
NRC	National Response Center
OSC	On-Scene Coordinator
PCB	Polychlorinated Biphenyls
PRP	Potentially Responsible Party
START	Superfund Technical Assessment and Response Team
SVOC	Semivolatile Organic Compounds
VOC	Volatile Organic Compounds

6. Additional sources of information

6.1 Internet location of additional information/report

For additional information, refer to www.epaosc.org/alcoaoilspill.

6.2 Reporting Schedule

The next POLREP will be submitted on or before January 19th.

7. Situational Reference Materials

NA