

U.S. ENVIRONMENTAL PROTECTION AGENCY
POLLUTION/SITUATION REPORT
OGE Transformer Oil Spill - Removal Polrep
Final Removal Polrep



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
Region VI

Subject: POLREP #4
Final
OGE Transformer Oil Spill

Fort Smith, AR
Latitude: 35.2995560 Longitude: -94.4295390

To:
From: Adam Adams, OSC
Date: 10/31/2013
Reporting Period: Aug-Oct 2013

1. Introduction

1.1 Background

Site Number:	V6PB	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:	6/2/2013	Start Date:	6/1/2013
Demob Date:	10/28/2013	Completion Date:	10/31/2013
CERCLIS ID:		RCRIS ID:	
ERNS No.:	1048996	State Notification:	
FPN#:	E13617	Reimbursable Account #:	

1.1.1 Incident Category

Emergency Response / OPA

1.1.2 Site Description

A 16,000 gallon capacity transformer (#3358) located at the Oklahoma Gas and Electric Company (OG&E) substation (#9130) faulted and discharged 15,000 to 16,000 gallons of non-PCB transformer oil into nearby drainage ditches along the west side of the property. The oil migrated via ditches, culverts, and across terrain into an unnamed creek, which flows into the Poteau River. The Poteau River merges with the Arkansas River just north of Fort Smith, Arkansas.

An RP representative indicated the cause of the "blow-out" of the transformer could be from internal malfunctions or some other cause yet to be determined. The connected piping on both the east and west sides of the transformer were broken and not in contact with the transformer.

1.1.2.1 Location

The substation is located at 701 Rutgers Street in Fort Smith, Sebastian County, Arkansas. Drainage from the substation is to the northwest into an unnamed creek to the west and into the Poteau River in Oklahoma, which flows to the north into the Arkansas River.

1.1.2.2 Description of Threat

Approximately 15,000 to 16,000 gallons of non-PCB transformer oil (Mineral Oil) was discharged from a transformer and impacted a creek, which flows into the Poteau River.

1.1.3 Preliminary Removal Assessment/Removal Site Inspection Results

The mineral oil from the faulted transformer was observed in multiple ditches and a creek which flows into the Poteau River.

2. Current Activities

2.1 Operations Section

2.1.1 Narrative

Following review of creek sample results found below Arkansas and Oklahoma water quality criteria standards and reports of no further sheen, EPA conducted a final Site walk on October 28, 2013 to confirm the oil spill response was complete. With concurrence prior to the Site walk from both ADEQ and ODEQ, EPA notified the RP that the oil spill response was complete.

2.1.2 Response Actions to Date

During follow up with the RP after initial notification, the PDO was notified by the RP representative that OG&E did not have the capability to respond to the incident effectively and requested EPA to take the lead on the response. The PDO activated the OSC, START, and ERRS personnel to respond to the incident.

Upon arrival and meeting with the RP representative, it was noted that the cause of the faulted transformer had not been determined, and approximately 15,000 to 16,000 gallons of non-PCB transformer had been discharged. The volume that had migrated off-site and impacted the drainage path had not been determined. RP contractors that were brought on-site by the RP to place booms and pads had not placed any booms or pads and departed the Site upon arrival of the EPA team. Through in-person discussion with the RP representative, the RP reiterated that OG&E was not able to respond to the incident because of on-going OG&E responses in Oklahoma City due to recent tornadoes. The response was federalized at that time.

Containment boom/recovery locations were established at four locations, with an additional containment boom placed further downstream as a precaution. Recovery locations were established at the outfall, elbow that flowed under the railroad tracks, Williams street bridge, and highway 112.

On the evening of 06/03/13, OG&E notified the OSC that resources had been acquired for OG&E to assume the role as lead for this incident beginning with the operational period for 06/04/13.

As of 06/17/13, response efforts downsized to boom and pad replacement with vacuum truck utilization as needed by the RP. Boom/pad replacement continued as needed. Containment booms remained in place.

On 07/17/13 the EPA team, along with ODEQ and ADEQ personnel, observed the OG&E contractors collecting surface water and sediment samples from six locations on the tributary. This work was performed in accordance with the approved Sampling & Analysis Plan prepared for the project by the RP. The samples collected were submitted to the laboratory and 7-day turnaround time was requested.

OG&E contractors conducted O&M along the tributary. Utilized a vacuum truck for half the day to remove oil/sheen from portions of the tributary. Most of the recovery efforts were concentrated in the vicinity of Highway 112. The RP removed and replaced spent absorbent boom and pads as necessary. Very low to no flow was observed in the tributary.

2.1.3 Enforcement Activities, Identity of Responsible Parties (PRPs)

The Responsible Party (RP) at this time is Oklahoma Gas and Electric Company, (OG&E). A Notice of Federal Interest and Notice of Federal Assumption have been issued.

2.1.4 Recovery information

At the close of operations on 09/30/13, the following was completed:

- 1) Approximately 11,975 gallons of oil had been recovered and stored in frac tanks,
- 2) 2,956 gallons estimate recovered by absorbent pads (based on 50% recovery of manufacturers specifications of recovery volume capacity),
- 3) 913 gallons estimate recovered by absorbent boom (based on 50% recovery of manufacturers specifications of recovery volume capacity),
- 4) 3, 670 feet of absorbent boom used, and
- 5) 25,089 absorbent pads used.

The RP estimates approximately 15,844 gallons of oil have been recovered. All wastes were disposed or recycled by the RP.

2.2 Planning Section

2.2.1 Anticipated Activities

No further field response actions will be conducted. Response was completed. In addition to this Final POLREP, EPA will complete an Emergency Response Report and close the project.

The RP notified EPA that an underflow dam was planned for installation up from the facility outfall in the near future, which would replace the earthen berm. RP plans to install an oil-water separator in early 2014, which would replace the underflow dam or work in conjunction with the underflow dam.

At this time, ADEQ continues to work with the RP regarding some on-site items.

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

In addition to the RP, RP contractors, EPA, and EPA contractors, both ADEQ and ODEQ have been involved in

this response throughout.

4. Personnel On Site

No further response personnel are on Site.

5. Definition of Terms

No information available at this time.

6. Additional sources of information

6.1 Internet location of additional information/report

Additional information can be obtained at www.epaosc.net/OGTransformeroilspill.

6.2 Reporting Schedule

No further POLREPs will be submitted.

7. Situational Reference Materials

No information available at this time.