# U.S. ENVIRONMENTAL PROTECTION AGENCY POLLUTION/SITUATION REPORT BNSF Galena Derailment - Removal Polrep Final Removal Polrep



# UNITED STATES ENVIRONMENTAL PROTECTION AGENCY Region V

Subject: POLREP #15

Final

**BNSF Galena Derailment** 

E15510 Galena, IL

Latitude: 42.3744730 Longitude: -90.4443060

To:

From: Jaime Brown, OSC

Date: 9/14/2015

**Reporting Period:** 7/25/2015 - 9/7/2015

#### 1. Introduction

#### 1.1 Background

Site Number: E15510 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:
 3/5/2015
 Start Date:
 3/5/2015

 Demob Date:
 6/22/2015
 Completion Date:
 8/20/2015

CERCLIS ID: RCRIS ID:

ERNS No.: State Notification: Illinois EPA
FPN#: E15510 Reimbursable Account #: Z5PL

# 1.1.1 Incident Category

**Emergency Response** 

#### 1.1.2 Site Description

See POLREP #5

#### 1.1.2.1 Location

See POLREP #5

#### 1.1.2.2 Description of Threat

See POLREP #5

#### 1.1.3 Preliminary Removal Assessment/Removal Site Inspection Results

See POLREP #5

# 2. Current Activities

# 2.1 Operations Section

#### 2.1.1 Narrative

Soil flushing operations continued to remove and recover minimal amounts crude oil from the track ballast, with contaminated water treated in the on-site WTP. BNSF submitted a comprehensive report on remedial actions to date, which included a 'mass balance' of crude oil product discharged during the incident. This report and next steps for the remediation were discussed at a meeting with U.S. EPA, Illinois EPA and BNSF on August 20.

#### 2.1.2 Response Actions to Date

During this reporting period, the following field activities took place:

- Crude oil continued to be flushed from track ballast and recovered in a collection trench;
- Contact water continued to be collected & treated; and
- WTP effluent continued to be sampled for laboratory analysis to ensure compliance with the state-issued NPDES permit.

A comprehensive report was provided by BNSF on August 7 which detailed all response actions to date and corresponding data. This report is posted in the 'documents' section of the website. A 'mass balance' calculation prepared by a contractor to BNSF concluded that of the approximately 110,543 gallons not

recovered directly from inside railcars involved in the derailment, 94,929 gallons were consumed by fire in the cars, atmosphere & ground. The report concluded that approximately 15,614 gallons were released to the ground surface and did not burn. The report stated that a total of 180,021 gallons were recovered directly from tank cars.

A meeting was held on August 20 with U.S. EPA, Illinois EPA and BNSF to discuss progress to date and next steps for the Site. It is anticipated that soil flushing operations will discontinue this summer and additional soil/groundwater sampling & monitoring will continue to monitor for impacts to the environment. It was agreed that this work will take place under oversight of Illinois EPA, which is entering into a Consent Order with BNSF.

There was never any visual or monitoring data evidence to indicate that any spilled product has impacted either the Galena or Mississippi Rivers during this incident and subsequent response. There were also no injuries at the Site or wildlife impacts reported during work at the Site.

# 2.1.3 Enforcement Activities, Identity of Potentially Responsible Parties (PRPs) See POLREP #5

2.1.4 Progress Metrics (totals reported by BNSF as of September 7)

Waste Stream	Medium	Quantity	Manifest #	Treatment	Disposal
Crude oil (from tankers)	liquid	221,421 gal	various	refining	Continental Refining Co. Somerset, KY
Crude oil/water mixture	liquid	26,354 gal*	various	refining	Continental Refining Co. Somerset, KY
Crude oil (from trench)	liquid	3,328 gal** (est)	various	refining	Continental Refining Co. Somerset, KY
Contact water	liquid	2,163,750 gal**	none	on-site WTP	discharge to Harris Slough per NPDES permit
Contaminated soil	solid	4,748.37 tons	various	disposal	Republic Waste Upper Rock Island Co LF East Moline, IL
Tanker cars	solid	12	NA	salvage	scrap

<sup>\*</sup> Final figure for crude oil/water mixture transferred to trucks for transport to refinery, which varies from the preliminary estimate of crude oil/water mixture recovered from the ground by vac truck reported in previous POLREPs (35,132 gal).

<sup>\*\*</sup> Contact water and residual crude oil continue to be collected in a trench adjacent to the track ballast. It is anticipated that contact water collection and treatment operations will discontinue in October 2015.

Regional Metrics					
This is an Integrated River Assessment. The numbers should overlap.	Miles of river systems cleaned and/or restored	0.5 mi			
	Cubic yards of contaminated sediments removed and/or capped	5000 cy (est)			
	Gallons of oil/water recovered	15,441 gal (est)			
	Acres of soil/sediment cleaned up in floodplains and riverbanks	3			
Stand Alone Assessment	Number of contaminated residential yards cleaned up	0			
	Number of workers on site	415 (initial reponse operations)			
Contaminant(s) of Concern	Crude Oil				
Oil response Tracking					
Estimated volume	Initial amount released	110,543 gal (est)			
	Final amount collected	15,441 gal (est)			

CANADO Info	EDN Oalling Assessed	050 000				
CANAPS Info	FPN Ceiling Amount	250,000				
	FPN Number	E15510				
	Body of Water affected	Mississippi River, Galena River				
Administrative and Logistical Factors (Check X where applicable)						
Precedent-Setting HQ Consultations (e.g., fracking, asbestos)	Community challenges or high involvement	Radiological				
More than one PRP	Endangered Species Act / Essential Fish Habitat issues	Explosives				
AOC	Historic preservation issues	Residential impacts				
UAO	NPL site	Relocation				
DOJ involved	Remote location	Drinking water impacted				
Criminal Investigation Division involved	Extreme weather or abnormal field season	Environmental justice				
Tribal consultation or coordination or other issues  X Congressional involvement		X High media interest				
Statutory Exemption for \$2 Million  Statutory Exemption for 1 Year		X Active fire present				
Hazmat Entry Conducted - Lev A, B or C	X Incident or Unified Command established	X Actual air release (not threatened)				

Green Metrics		
Metric	Amount	Units
Diesel Fuel Used	400	gallons
Unleaded Fuel Used	100	gallons
Alternative/E-85 Fuel Used	250	gallons
Electricity from electric company	NA	kWh
Electric Company Name and Account #	NA	
Electricity from sources other than the electric company	50	kWh
Solid waste reused	NA	enter
Solid waste recycled	25	pounds
Water Used	500	gallons

# 2.2 Planning Section

# 2.2.1 Anticipated Activities

- Illinois EPA will oversee remaining remediation and monitoring activities pursuant a state Consent Order;
- Illinois EPA will continue to oversee operation of the on-site WTP in accordance with a NPDES permit (issued July 1) until anticipated de-commissioning in October 2015; and
- USACE will oversee implementation of a wetlands restoration plan (approved June 23) on the impacted property.

# 2.2.1.1 Planned Response Activities

NA

# 2.2.1.2 Next Steps

A final OSC Report will be produced and posted to the website for this incident. All Site contacts will be notified when the report is posted.

#### 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

NA

#### 2.5.2 Liaison Officer

NA

#### 2.5.3 Information Officer

A public meeting, coordinated by Jo Daviess County, is scheduled for September 21 at which local, state and Federal emergency responders will present the status of cleanup activities and answer questions from the public. U.S. EPA will send a representative to participate in this meeting.

## 3. Participating Entities

# 3.1 Unified Command

NA

#### 3.2 Cooperating Agencies

See POLREP #5

#### 4. Personnel On Site

CONTRACTORS (ARCADIS, SunPro): 4

TOTAL (estimated): 4

## 5. Definition of Terms

BNSF Burlington Northern Santa Fe Railway

FPN Federal Project Number

gal gallons

HASP Health & Safety Plan ICP Incident Command Post

NPDES National Pollution Discharge Elimination System

NPL National Priorities List
OPA Oil Pollution Act
OSC On Scene Coordinator
POLREP Pollution Report

PRP Potentially Responsible Party

START Superfund Technical Assessment and Response Team

TDD Technical Direction Document
USACE United States Army Corps of Engineers

WTP Water Treatment Plant

#### 6. Additional sources of information

#### 6.1 Internet location of additional information/report

http://www.epaosc.org/bnsfgalenaspill.

http://www2.epa.gov/il/galena-train-derailment

# 6.2 Reporting Schedule

This is the final POLREP. No further POLREPs will be issued. A final OSC Report for the incident will be posted to the 'documents' section of the website within 30 days.

#### 7. Situational Reference Materials

No information available at this time.