



September 29, 2016

Confidential Client

Dear Client:

Rescon Alaska LLC (Rescon) has developed this Site Assessment Report on behalf of our client, to detail environmental assessment activities and sampling at the property located at 1407 East 30th Avenue in Fairbanks, Alaska. Please note that due to the very limited budget for this work, all ADEC sampling protocols were not followed in the sampling and reporting at this site. Instead, the monies available were used to collect as much data as possible to help determine the exposure pathway risks at the site.

Introduction

Rescon Alaska (Rescon) mobilized two personnel and an excavator to the property of interest located on 1407 East 30th Avenue in Fairbanks, Alaska on September 22, 2016. The objective of the visit was to perform a brief environmental assessment of the property. The planned scope of work was to dig test pits in areas of probable contamination (in oil/fuel stained areas and/or areas proximal to drums and containers of known and unknown contents), collect environmental samples (groundwater and soil), and record observations (visual and olfactory). A figure and photograph log documenting site conditions and field activities are attached to this report.

Field Activities

Rescon personnel identified possible environmental concerns during the assessment. A figure/aerial image of the site has been “marked up” to show the approximate locations of areas of interest, possible transformers, mercury ballasts, test pits, and environmental samples. A brief description of each is located below.

Areas of Interest

Eleven locations were identified as Areas of Interest during the site assessment, based on the perceived potential for these locations to possibly affect the surrounding environment and/or require unique material disposal procedures. The Areas of Interest are identified on the attached figure as pink shaded polygons. See the following for a description of each.

- 1) This area contains a combination of approximately 50, 55-gallon (gal) drums and 5-gal containers of unknown contents. Some of the containers appear to be unopened, while some appear to have been reused (spray painted “waste oil” and “gas”). There is an approximately 40 feet (ft) by 40ft area of black staining, which is possibly some sort of petroleum hydrocarbon product. There is a strong petroleum hydrocarbon odor in this location. A test pit (TP-25) was excavated to approximately 6.5ft below ground surface (bgs) in the stained area. An in-situ photo-

ionization detector (PID) reading of 10 parts per million (ppm) was indicated at 0.5 to 1ft bgs. Additionally, a slight petroleum hydrocarbon odor was observed in soil from 6.5ft bgs, at the depth of groundwater. Soil samples (SS-7A and SS-7C) were collected from 1ft and 6.5ft bgs, respectively, and were submitted to ALS Environmental Laboratory (ALS) for volatile organic compound (VOC), Resource Conservation and Recovery Act (RCRA) 8 metals, and polychlorinated biphenyl (PCB) analyses. Groundwater began to accumulate in the bottom of the test pit during excavation, and a slight sheen was observed. A groundwater sample (GW-7) was collected and submitted for VOC and RCRA 8 metals analyses. See photos 33 – 38 in photograph log.

- 2) An approximately 20ft long by 8ft wide by 8ft high rail car filled with tar is located in the northwestern portion of the site. Tar has leaked from the south side of the rail car and accumulated in an approximately 20ft by 20ft area. Tires have been stacked on top of the leaked tar. Two test pits (TP-5 and TP-6) were excavated to 2ft bgs to the north and south of the rail car. No elevated PID results were recorded. No petroleum hydrocarbon odors were observed, and no soil sample was collected in this area. See photos 2 - 6 in photograph log.
- 3) This area contains six drums with unknown contents lying on their sides. Some of the drums are crushed, while others are leaking their contents. A test pit (TP-26) was excavated to 2ft bgs in a stained area adjacent to these drums. A moderate petroleum hydrocarbon odor was observed in this area, and a PID reading of 12 ppm was recorded. A soil sample (SS-8) was collected in this area from 1ft bgs and was submitted to ALS for VOC and RCRA 8 metals analyses. See photos 39 and 40 in photograph log.
- 4) This area contains a shed with approximately 100 (or more) 73lb containers of zinc filler. No odors were observed. No test pit was excavated, and no soil sample was collected in this area. See photos 11 and 12 in photograph log.
- 5) This area contains 40-to-50, 50-gal drums used to store brake pads. This is an area of interest, as brake pads can contain asbestos and may require special disposal procedures. No odors were observed. No test pit was excavated, and no soil sample was collected in this area. See photos 8 and 9 in photograph log.
- 6) This area contains approximately 40 used compressed gas cylinders. This is an area of interest, as one of the cylinders reads "Ammonia", which may require special disposal procedures. No odors were observed. No test pit was excavated, and no soil sample was collected in this area. See photos 13 and 14 in photograph log.
- 7) This area contains approximately 20 partially buried drums that may have contained petroleum (or other) contents at the time of disposal. A test pit (TP-13) was excavated to 2ft bgs in this area. No elevated PID results were recorded. No odors were observed, and no soil sample was collected. See photos 15 and 16 in photograph log.
- 8) This area contains 10, 55-gal drums with unknown contents. A test pit (TP-20) was excavated to 2ft bgs. No elevated PID results were recorded. No staining or odors were observed, and no soil sample was collected. See photo 24 in photograph log.

- 9) This area contains a combination of approximately 60, 1-gal and 5-gal containers of industrial grease. The 5-gal containers are visibly leaking, with some accumulation on the ground surface. A test pit (TP-18) was excavated to 2ft bgs. No elevated PID results were recorded. No odors were observed, and no soil sample was collected. See photo 23 in photograph log.
- 10) This area contains 12, 55-gal drums of litholine onyx (lithium grease) stacked on their sides. Some of the drums are leaking onto the ground surface and staining the immediate area. One of the drums is open. A test pit (TP-19) was excavated to 1ft bgs in this area, and a PID reading of 10 ppm was recorded. A slight petroleum hydrocarbon odor was observed. No soil sample was collected. See photos 25 and 26 in photograph log.
- 11) This area contains approximately 70, 55-gal drums with unknown contents and six cases of bearing grease. Some of the containers appear to be unopened, while some appear to have been reused as storage containers (spray painted "waste oil" and "clean sol."). Multiple drums appear to be leaking. There is an area of black surface staining near a few of the leaking drums, which is likely some sort of petroleum hydrocarbon product. There is a slight petroleum hydrocarbon odor in this location. A test pit (TP-15) was excavated to approximately 1ft bgs in the stained area. A PID reading of 25 ppm was indicated at 0.5 ft bgs. A soil sample (SS-3) was collected from 0.5ft bgs and submitted to ALS for VOC and RCRA 8 metals analyses. See photos 17 - 21 in photograph log.

Transformers

Possible PCB oil-containing transformers and transformer parts were observed at four locations during the site assessment. Transformers oil can contain PCBs depending on the date of manufacture. The production of PCBs was banned in the USA in 1979. The possible transformer locations are identified on the figure as red circles.

T-1) Possible transformer parts were identified on the eastern portion of the site south of the Area of Interest #5. A soil sample was not collected from this location, as a transformer cylinder (which would possibly contain PCB oil) was not observed. See photo 10 in photograph log.

T-2) A small, cylinder-style transformer was observed on the western portion of the site north of the Area of Interest #11. A soil sample (SS-4) was collected from 0.5ft bgs at this location and submitted to ALS for PCB analysis. See photo 27 in photograph log.

T-3) A small, cylinder style transformer was also observed on the western portion of the site and east of the shop. A soil sample (SS-5) was collected from 0.5ft bgs at this location and submitted to ALS for PCB analysis.

T-4) A large L-shaped, pole-mounted device (possible transformer) was identified east of the shop and west of T-3. A soil sample was not collected from this location, as this possible transformer did not appear to contain oil.

Mercury Ballasts

Four mercury ballasts were observed near the onsite shop. These are mentioned in this report, as they will likely require special disposal procedures. The mercury ballasts are identified on the attached figure as blue circles.

M-1) One mercury ballast was identified near the west entrance of the onsite shop. See photo 28 in photograph log.

M-2) Three mercury ballasts were attached to the north wall of the onsite shop in the main bay, near the entrance. See photo 29 in photograph log.

Test Pits

Twenty-six test pits were excavated in locations with visible ground-surface staining and/or adjacent to areas of concern that potentially contained environmental contaminants. The test pits are identified on the attached figure as green squares. The test pits were generally excavated to 2ft bgs, except in areas where possible contamination persisted to greater depths. Possible contamination was identified based on visual and olfactory observations, as well as with elevated PID readings. Four of the test pits indicated signs of potential contamination, as follows.

TP-15) This test pit was excavated to 1ft bgs in a stained location in Area of Concern #11. The PID result was 25 ppm. A soil sample (SS-3) was collected from this location at 0.5ft bgs.

TP-19) This test pit was excavated to 2ft bgs in a stained location in area of concern #10. The PID result was 10 ppm.

TP-25) This test pit was excavated to 6.5ft bgs in a stained location in Area of Concern #1. The PID result was 10 ppm near the ground surface; however, a moderate to slight petroleum hydrocarbon odor persisted to the groundwater depth of 6.5ft bgs. Soil samples (SS-7A and SS-7C) were collected from this location at 1ft and 6.5ft bgs, respectively. A groundwater sample (GW-7) was also collected from this location at 6.5ft bgs. See photos 36 – 38 in photograph log.

TP-26) This test pit was excavated to 2ft bgs in a stained location in Area of Concern #3. The PID result was 12 ppm. A soil sample (SS-8) was collected from this location at 1ft bgs. See photo 40 in photograph log.

Soils and Groundwater Samples

Six soil samples and one groundwater sample were collected during the site assessment in areas of possible environmental contamination and submitted to ALS for VOC, RCRA 8 Metals, and/or PCB analyses, as follows.

SS-3) Soil sample collected from Area of Interest #11 (0.5ft bgs); submitted for VOC, RCRA 8 Metals, and PCB analyses.

SS-4) Soil sample collected at location of transformer T-2 (0.5ft bgs); submitted for PCB analysis.

SS-5) Soil sample collected at location of transformer T-3 (0.5ft bgs); submitted for PCB analysis.

SS-7A) Soil sample collected from Area of Interest #1 (1ft bgs); submitted for VOC, RCRA 8 Metals, and PCB analyses.

SS-7C) Soil sample collected from Area of Interest #1 (6.5ft bgs); submitted for VOC and RCRA 8 Metals analyses.

SS-8) Soil sample collected from Area of Interest #3 (1ft bgs); submitted for VOC and RCRA 8 Metals analyses.

GW-7) Groundwater sample collected from Area of Interest #1 (6.5ft bgs); submitted for VOC and RCRA 8 Metals analyses.

Laboratory analytical results will be delivered to Rescon in two to three weeks. Rescon will review the results and draft an explanation of the findings for the client.

Please let me know if there are any questions or concerns regarding this Site Assessment Report.

Respectfully,



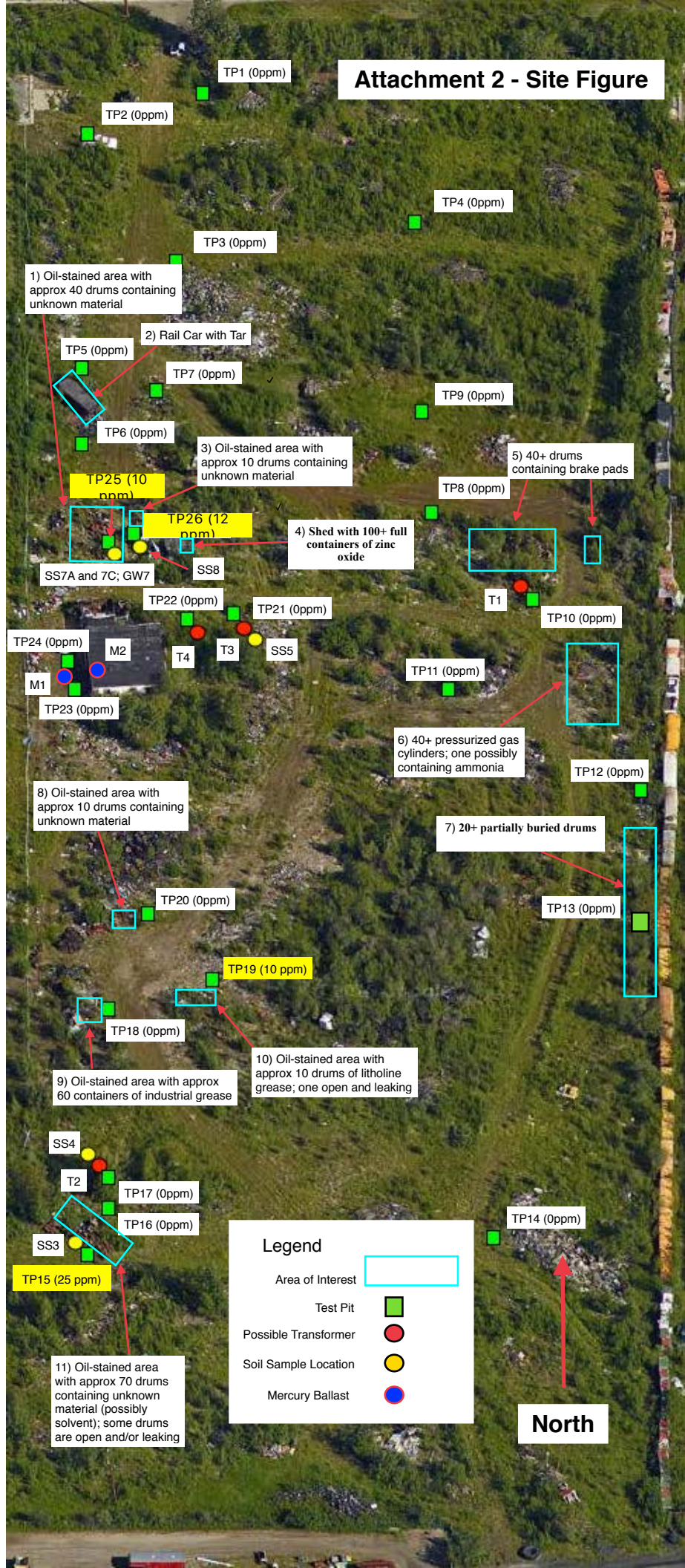
Nathan Oberlee
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Attachments

Attachment 1: Site Figure
Attachment 2: Photograph Log

ATTACHMENT 1
SITE FIGURE

Attachment 2 - Site Figure



1) Oil-stained area with approx 40 drums containing unknown material

2) Rail Car with Tar

3) Oil-stained area with approx 10 drums containing unknown material

5) 40+ drums containing brake pads

4) Shed with 100+ full containers of zinc oxide

6) 40+ pressurized gas cylinders; one possibly containing ammonia

8) Oil-stained area with approx 10 drums containing unknown material

7) 20+ partially buried drums

9) Oil-stained area with approx 60 containers of industrial grease

10) Oil-stained area with approx 10 drums of litholine grease; one open and leaking

11) Oil-stained area with approx 70 drums containing unknown material (possibly solvent); some drums are open and/or leaking

Legend

- Area of Interest
- Test Pit
- Possible Transformer
- Soil Sample Location
- Mercury Ballast

North

**ATTACHMENT 2
PHOTOGRAPH LOG**



PHOTOGRAPH 1: TEST PIT (TP-1) LOOKING SOUTHEAST. 9/22/2016.



PHOTOGRAPH 2: RAIL CAR WITH TAR ON NORTHWEST PORTION OF PROPERTY (SEE FIGURE - AREA OF INTEREST #2); LOOKING SOUTHEAST. 9/22/2016.



PHOTOGRAPH 3: TAR THAT HAS LEAKED AND POOLED ON SOUTH SIDE OF RAIL CAR (SEE FIGURE - AREA OF INTEREST #2); LOOKING EAST. 9/22/2016.



PHOTOGRAPH 4: RAIL CAR FILLED WITH TAR (SEE FIGURE - AREA OF INTEREST #2); LOOKING SOUTHEAST. 9/22/2016.



PHOTOGRAPH 5: LEAKED AND POOLED TAR ON SOUTH SIDE OF RAIL CAR; COVERED WITH TIRES (SEE FIGURE - AREA OF INTEREST #2); LOOKING NORTHWEST. 9/22/2016



PHOTOGRAPH 6: DIGGING TEST PIT (TP-6) NEAR POOLED TAR; LOOKING NORTHWEST. 9/22/2016.



PHOTOGRAPH 7: DIGGING TEST PIT (TP-8); LOOKING SOUTH. 9/22/2016.



PHOTOGRAPH 8: 55-GAL DRUMS CONTAINING USED BRAKE PADS (SEE FIGURE – AREA OF INTEREST #5); LOOKING NORTHWEST. 9/22/16.



PHOTOGRAPH 9: 55-GAL DRUMS CONTAINING USED BRAKE PADS (SEE FIGURE – AREA OF INTEREST #5); LOOKING WEST. 9/22/16.



PHOTOGRAPH 10: POSSIBLE TRANSFORMER PARTS AT LOCATION T-1 (SEE FIGURE). 9/22/16.



PHOTOGRAPH 11. SHED CONTAINING APPROXIMATELY 100, 73LB CONTAINERS OF CARBOLINE ZINC FILLER (SEE FIGURE – AREA OF INTEREST #4); LOOKING SOUTH. 9/22/16.



PHOTOGRAPH 12: SHED CONTAINING APPROXIMATELY 100, 73LB CONTAINERS OF CARBOLINE ZINC FILLER (SEE FIGURE – AREA OF INTEREST #4); LOOKING SOUTH. 9/22/16.



PHOTOGRAPH 13: PILE OF APPROX 40 USED COMPRESSED GAS CYLINDERS ON EAST SIDE OF SITE (SEE FIGURE – AREA OF INTEREST #6); LOOKING EAST. 9/22/16.



PHOTOGRAPH 14: ORANGE CANISTER IN FOREGROUND READS AMMONIA (SEE FIGURE – AREA OF INTEREST #6). 9/22/16.



PHOTOGRAPH 15: DRUM IN AREA ALONG EAST BORDER OF SITE CONTAINING APPROX 20 PARTIALLY BURIED DRUMS (SEE FIGURE – AREA OF INTEREST #7); LOOKING EAST. 9/22/16.



PHOTOGRAPH 16: DIGGING TEST PIT (TP-13) IN AREA ALONG EAST BORDER OF SITE CONTAINING APPROX 20 PARTIALLY BURIED DRUMS (SEE FIGURE – AREA OF INTEREST #7); LOOKING EAST. 9/22/16.



PHOTOGRAPH 17: OPEN DRUMS WITH OILY CONTENT ON WEST SIDE OF SITE IN AREA OF APPROX 70 DRUMS (SEE FIGURE – AREA OF INTEREST #11); LOOKING NORTH. 9/22/16.



PHOTOGRAPH 18: DRUM CONTAINING POSSIBLE CLEANING SOLVENT IN AREA OF APPROX 70 DRUMS (SEE FIGURE – AREA OF INTEREST #11); LOOKING EAST. 9/22/16.



PHOTOGRAPH 19: LEAKING DRUMS CONTAINING POSSIBLE WASTE OIL IN AREA OF APPROX 70 DRUMS (SEE FIGURE – AREA OF INTEREST #11); LOOKING EAST. 9/22/16.



PHOTOGRAPH 20: OIL-STAINED AREA NEAR LEAKING DRUMS; PID READING OF 25 PPM; SOIL SAMPLE (SS-3) COLLECTED FOR VOCs AND METALS ANALYSES (SEE FIGURE – AREA OF INTEREST #11). 9/22/16.



PHOTOGRAPH 21: 16 CASES OF BEARING GREASE IN AREA OF APPROX 70 DRUMS (SEE FIGURE – AREA OF INTEREST #11); LOOKING SOUTHEAST. 9/22/16.



PHOTOGRAPH 22: TRANSFORMER (T-2) LOCATED IN SOUTHWESTERN PORTION OF SITE; SOIL SAMPLE (SS-4) COLLECTED FOR PCB ANALYSIS. 9/22/16.



PHOTOGRAPH 23: PILE OF APPROX 60 CONTAINERS OF INDUSTRIAL GREASE LOCATED IN WESTERN PORTION OF SITE (SEE FIGURE – AREA OF INTEREST #9); LOOKING WEST. 9/22/16.



PHOTOGRAPH 24: APPROX 10 DRUMS WITH UNKNOWN CONTENTS LOCATED IN WESTERN PORTION OF SITE (SEE FIGURE – AREA OF INTEREST #8); LOOKING WEST. 9/22/16.



PHOTOGRAPH 25: PILE OF 12 DRUMS CONTAINING LITHIUM GREASE LOCATED IN WESTERN PORTION OF SITE (SEE FIGURE – AREA OF INTEREST #10); LOOKING SOUTH. 9/22/16.



PHOTOGRAPH 26: LEAKING DRUMS CONTAINING LITHIUM GREASE LOCATED IN WESTERN PORTION OF SITE PID READING OF 10 PPM; (SEE FIGURE – AREA OF INTEREST #10). 9/22/16.



PHOTOGRAPH 27: POSSIBLE TRANSFORMER (T-3) SOIL SAMPLE (SS-5) COLLECTED FOR PCB ANALYSIS. 9/22/16.



PHOTOGRAPH 28: MERCURY LIGHT BALLAST (M-1) LOCATED WEST OF THE ONSITE SHOP. 9/22/16.



**PHOTOGRAPH 29: THREE MERCURY LIGHT BALLASTS (M-2) LOCATED INSIDE ONSITE SHOP.
9/22/16.**



**PHOTOGRAPH 30: TWO BAY SHOP LOCATED IN WESTERN PORTION OF SITE; LOOKING
NORTHEAST. 9/22/16.**



**PHOTOGRAPH 31: INSIDE OF SHOP; FLOOR DRAIN LOCATED BENEATH CAR; LOOKING EAST.
9/22/16.**



**PHOTOGRAPH 32: NORTHERN HALF OF SHOP; DRUMS WITH UNKNOWN CONTENTS OBSERVED;
OIL STAINING ON FLOOR; LOOKING WEST. 9/22/16.**



PHOTOGRAPH 33: AREA WITH APPROX 40 DRUMS WITH UNKNOWN CONTENTS (POSSIBLY GAS AND/OR WASTE OIL); OIL STAINING OBSERVED ON GROUND (SEE FIGURE – AREA OF INTEREST #1); LOOKING SOUTHWEST. 9/22/16.



PHOTOGRAPH 33: AREA WITH APPROX 40 DRUMS WITH UNKNOWN CONTENTS (POSSIBLY GAS AND/OR WASTE OIL); OIL STAINING OBSERVED ON GROUND (SEE FIGURE – AREA OF INTEREST #1); LOOKING EAST. 9/22/16.



**PHOTOGRAPH 35: DIG PIT (TP-25) IN STAINED AREA OF INTEREST #1; PID READING OF 10 PPM;
COLLECT SOIL SAMPLES (SS-7A AND 7C) AT 1FT AND 6.5FT BGS FOR VOCS AND METALS
ANALYSES; LOOKING SOUTH. 9/22/16.**



**PHOTOGRAPH 36: DIG PIT (TP-25) IN STAINED AREA OF INTEREST #1; PID READING OF 10 PPM;
COLLECT SOIL SAMPLES (SS-7A AND 7C) AT 1FT AND 6.5FT BGS FOR VOCS AND METALS
ANALYSES; LOOKING EAST. 9/22/16.**



PHOTOGRAPH 37: TEST PIT (TP-25) IN AREA OF INTEREST #1 IS EXCAVATED TO GROUNDWATER DEPTH OF 6.5FT BGS; COLLECT GROUNDWATER SAMPLE (GW-7) FOR VOCS AND METALS ANALYSES. 9/22/16.



PHOTOGRAPH 38: TEST PIT (TP-25) IN AREA OF INTEREST #1 IS EXCAVATED TO GROUNDWATER DEPTH OF 6.5FT BGS; POSSIBLE SHEENING OBSERVED ON WATER SURFACE. 9/22/16.



PHOTOGRAPH 39: AREA OF CRUSHED/LEAKING DRUMS AND OIL STAINING ON GROUND SURFACE (SEE FIGURE – AREA OF INTEREST #3); LOOKING NORTHWEST. 9/22/16.



PHOTOGRAPH 40: DIG PIT (TP-26) IN STAINED AREA OF INTEREST #3; PID READING OF 12 PPM; COLLECT SOIL SAMPLE (SS-8) FOR VOC AND METALS ANALYSES; LOOKING NORTH. 9/22/16.