CORRECTIVE ACTION PLAN

Crozier Abandoned Tank Site
Crozier, Goochland County, Virginia
PC # 2015-4105

Submitted To:

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Apex Job Number: 757004-001
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1.0 INTRODUCTION

Apex Companies, LLC (Apex) has completed this Corrective Action Plan (CAP) associated with a release of gasoline from the former underground storage tank (UST) systems at the Crozier Abandoned Tank Site located in Crozier, Goochland County, Virginia (site). The site location is depicted on Figure 1. A release of gasoline was suspected following the detection of petroleum constituents in the supply well serving the Monger residence, addressed as 1489 Old Oaks Lane. The source of the release has been determined to be from a currently unoccupied property addressed as 1537 River Road West, Crozier, Virginia. Underground storage tanks were previously operated at the property prior to 1984. The release (detected in the Monger residence supply well) was reported to the Commonwealth of Virginia Department of Environmental Quality (DEQ) Piedmont Regional Office (PRO) on September 19, 2014 and is being addressed under pollution complaint (PC) number 2015-4105.

To date, a total of eight residential water supply wells have been identified as impacted by petroleum constituents. The DEQ PRO has been providing carbon filtration systems for the water supply wells impacted by the release. This CAP has been prepared to address proposed corrective actions for those water supply wells that have been impacted and neighboring properties which are at risk of impact by the release.

2.0 BACKGROUND

In February 2014, Mr. Chris Monger detected a petroleum odor in his supply well. Under the guidance of a friend who works for an environmental agency in California, Mr. Monger conducted his own sampling event on September 10, 2014. The analytical results from the onsite supply well indicated the presence of several gasoline constituents in groundwater above laboratory method detection limits. The release was reported to the DEQ PRO on September 19, 2014. Following the sampling event conducted by Mr. Monger, DEQ contracted with Stoner Quality Water, Inc. (Stoner) to resample the Monger residence on September 22, 2014 to verify the analytical results. Subsequently, the initial analytical results were verified and a carbon filtration system was installed on the Monger residence water supply at the direction of DEQ.

Following confirmation of gasoline constituents in the Monger residence supply well, DEQ requested that Stoner sample 16 private water supplies located at the remaining residences in the Old Oaks Lane neighborhood. Six residences (1463, 1476, 1482, 1490, 1498, and 1529 Old Oaks Lane) in addition to the Monger residence were confirmed to have supply wells impacted by gasoline constituents. The supply wells were subsequently connected to carbon filtration systems.

One active gasoline station, Taylor Country Store (1535 River Road West), was identified in the area. DEQ requested that a site check be completed for the Taylor Country Store property to assess soil and groundwater conditions at the site. The investigation was completed by Advanced Environmental Solutions, LLC (Advanced) and included the installation of four soil borings (SB-1A through SB-4A) and the

conversion of the soil borings to groundwater monitoring wells (MW-1A through MW-4A). Additional information regarding work completed by Advanced is referenced under PC# 2015-4215.

According to available information, two additional properties were identified as potential sources of a petroleum release, the Keith property (1537 River Road West) and the former Briesmaster Motor Company (1543 River Road West). Based on historical records the former Briesmaster Motor Company and the Keith properties both operated with underground storage tanks (USTs) for an undetermined number of years since at least the 1930s. Additional information referencing the removal of a 1,000-gallon gasoline UST at the former Briesmaster Motor Company property is documented under PC# 2000-4557.

Aqua Virginia, Inc. operates a Class VI groundwater supply well that currently supplies potable water to 24 existing connections. The original supply well for Crozier waterworks was completed in 1947 but was permanently disconnected in 2004 due to inadequate supply. The current supply well was completed in 1950 to a depth of 79 feet below ground surface (BGS) and subsequently deepened to 465 feet in 1996. The waterworks consist of the well, a 5,000-gallon hydropneumatic tank, chlorination facilities, corrosion control facilities, and the distribution system, with related controls, piping, and appurtenances. The supply well is located approximately 1,500 feet west of the former Briesmaster Motor Company property on Issequenna Road. The Aqua Virginia well currently supplies potable water to residences and businesses located on Lee Road, Issequenna Road, and River Road West to include Taylor Country Store, the former Briesmaster Motor Company property, and the Keith property.

During site characterization activities from October through December 2014, Apex activities included bottled water delivery, supply well sampling, installation of 13 groundwater monitoring wells (MW-1 through MW-13), and the collection and analysis of soil and groundwater samples. Adsorbed-phase petroleum compounds were detected in six of the 13 soil samples collected during this investigation. Total petroleum hydrocarbon (TPH) gasoline range organics (GRO) was detected at a concentration of 499 parts per million (ppm) in soil sample SS-12-9 at a depth of 45 feet below ground surface. Free-phase petroleum was detected in MW-3 at a maximum thickness of 0.60 feet on January 21, 2015. Dissolved-phase petroleum compounds were detected in 11 of the 13 groundwater monitoring wells sampled. TPH GRO was detected at a maximum concentration of 137 milligrams per liter (mg/L) in MW-3. Methyl tertiary-butyl ether (MTBE) and benzene were detected at maximum concentrations of 28.6 micrograms per liter (µg/L) and 30,500 µg/L, in MW-4 and MW-12, respectively. Additionally, groundwater samples were collected from eight adjacent properties supply wells. Dissolved-phase petroleum compounds were not detected in any of the eight supply wells sampled. Trichlorofluoromethane was detected at a concentration of 49.5 µg/L at the Micken's residence, supply well sample (DW-1491 Oaken Croft). No other volatile organic compounds were detected in the supply well sample. Trichlorofluoromethane, also known as freon-11, CFC-11, or R-11, is a chlorofluorocarbon typically used as a refrigerant. The presence of trichlorofluoromethane is likely attributed to the multiple

refrigeration units located on the property which were located in the vicinity of the supply well and is not related to the petroleum release.

During SCRA activities from January through April 2015, Apex activities included a ground penetrating radar survey, the installation of three groundwater monitoring wells (MW-14 through MW-16), the collection and analysis of soil and groundwater samples, domestic supply well sampling, and an AF/VR event. Adsorbed-phase petroleum compounds were detected in one of the three soil samples collected during this investigation. TPH GRO was detected at a concentration of 771 ppm in soil sample SS-14-9 at a depth of 43 feet BGS. Free-phase petroleum was detected in MW-12 at a thickness of 0.55 feet on February 25, 2015. Dissolved-phase petroleum compounds were detected in 13 of the 16 groundwater monitoring wells sampled. TPH GRO was detected at a maximum concentration of 241 mg/L in MW-14. Benzene and MTBE were detected at maximum concentrations of 25,900 µg/L and 33.2 µg/L in monitoring wells MW-14 and MW-4, respectively. 1, 2-Dibromoethane (EDB) was detected at a maximum concentration of 837 µg/L in monitoring well MW-14.

Apex collected 19 supply well samples from adjacent properties during SCRA activities. Dissolved-phase petroleum compounds were not detected in any of the 19 supply wells sampled. Trichlorofluoromethane was detected at a concentration of 17.4 µg/L at the Mickens residence, supply well sample (DW-1491 Oaken Croft). Trichlorofluoromethane, also known as freon-11, CFC-11, or R-11, is a chlorofluorocarbon typically used as a refrigerant. The presence of trichlorofluoromethane is likely attributed to the multiple refrigeration units located on the property, in the vicinity of the supply well and is not related to the petroleum release.

During the AF/VR Event, a total of 189 gallons of gasoline/water mixture was recovered. The total recovery in the vapor stream for the AF/VR event is estimated to be between 2.6 and 5.0 gallons of gasoline. Approximately 0.01 gallons of free product were recovered via manual bailing during the SCRA investigation.

Additionally, a ground penetrating radar (GPR) survey was performed at the Taylor's Market, Keith, and former Briesmaster Motor Company properties during March 2015. The purpose of the survey was to evaluate the subsurface for potential historical water supply wells to determine if these structures may represent conduits for petroleum to impact the deep aquifer and to identify any potential abandoned USTs. Numerous linear features were observed at various depths across the study area, likely indicative of the septic drainfields associated with each property. Additionally, twelve isolated GPR anomalies were observed with the characteristics indicative of potential underground storage tanks, septic tanks, and/or a septic distribution boxes.

During SCRA II activities from November 2015 through January 2016, Apex activities included the collection and analysis of groundwater samples, domestic supply well sampling, free product recovery, and a five-day dual-phase extraction (DPE) event. Free-phase petroleum was detected in MW-14 at a maximum thickness of 1.95 feet on November 6, 2015. Dissolved-phase petroleum compounds were detected in seven of the

15 groundwater monitoring wells sampled. TPH-GRO was detected at a maximum concentration of 143 mg/L in MW-3. Benzene and MTBE were detected at maximum concentrations of 27,000 µg/L and 14.0 µg/L in monitoring wells MW-3 and MW-4, respectively. EDB was detected at a maximum concentration of 360 µg/L in monitoring well MW-3.

Apex collected 21 supply well samples from properties located in the Crozier area. Dissolved-phase petroleum compounds were detected in one of the 21 supply wells sampled. Benzene, di-isopropyl ether, and 1,2-dichloroethane were detected at concentrations of 46.7 µg/L, 24.1 µg/L, and 4.25 µg/L, respectively, in the Haddon residence supply well (DW-1537 Old Oaks Lane). Trichlorofluoromethane was detected at a concentration of 17.3 µg/L in the Mickens residence supply well sample (DW-1491 Oaken Croft). Trichlorofluoromethane, also known as freon-11, CFC-11, or R-11, is a chlorofluorocarbon typically used as a refrigerant. The presence of trichlorofluoromethane is likely attributed to the multiple refrigeration units located on the Mickens property in the vicinity of the supply well and is not related to the petroleum release. Chloroform was detected at a concentration of 0.90 µg/L in the Yarbrough residence supply well sample (DW-1267 Cardwell), 1.63 µg/L in the Martin residence supply well sample (DW-1241 Cardwell), and 0.57 µg/L in the Bechter residence supply well sample (DW-1510 Old Oaks). The presence of chloroform is likely attributed to the chlorination and disinfection of the supply wells and is not related to the petroleum release. No other volatile organic compounds were detected in the supply well samples.

During the DPE Event, a total of 905 gallons of gasoline/water mixture was recovered. The total recovery in the vapor stream for the DPE event is estimated to be between 10 and 35 gallons of gasoline. Approximately one gallon of free product was recovered via manual bailing during this investigation.

During SCRA III activities from February 2016 through October 2016, Apex activities included the collection and analysis of soil and groundwater samples, domestic supply well sampling, free product recovery, a subsurface investigation, and two AF/VR events. Free-phase petroleum was detected in MW-14 at a maximum thickness of 0.62 feet on July 25, 2016. Dissolved-phase petroleum compounds were detected in seven of the 16 groundwater monitoring wells sampled. Total petroleum hydrocarbon gasoline range organics was detected at a maximum concentration of 145 mg/L in MW-12. Benzene and methyl tertiary-butyl ether (MTBE) were detected at maximum concentrations of 19,000 µg/L and 14.8 µg/L in monitoring wells MW-14 and MW-4, respectively. EDB was detected at a maximum concentration of 388 µg/L in monitoring well MW-3.

Apex collected supply well samples from 21 properties located in the Crozier area. Dissolved-phase petroleum compounds were not detected in any of the 21 supply wells sampled. Trichlorofluoromethane was detected at a concentration of 10.9 µg/L in the Mickens residence supply well sample (DW-1491 Oaken Croft). Trichlorofluoromethane, also known as freon-11, CFC-11, or R-11, is a chlorofluorocarbon typically used as a refrigerant. The presence of

trichlorofluoromethane is likely attributed to the multiple refrigeration units formerly located on the property, in the vicinity of the supply well and is not related to the petroleum release. Chloroform was detected at a concentration of 0.73 µg/L at the Yarbrough residence supply well sample (DW-1267 Cardwell), 0.82 µg/L at the Martin residence supply well sample (DW-1241 Cardwell), 0.63 µg/L at the Alexander residence supply well sample (DW-1226 Cardwell), and 0.66 µg/L at the Bechter residence supply well sample (DW-1510 Old Oaks). The presence of chloroform is likely attributed to the chlorination and disinfection of the supply well and is not related to the petroleum release. No other volatile organic compounds were detected in the supply well samples.

Apex performed two eight-hour AF/VR events on August 17, 2016 and October 5, 2016, recovering a total of 256 gallons of free-phase petroleum/water from monitoring wells MW-3 and MW-14. The liquids were recovered via a vacuum truck and transported offsite for disposal at Atlantic Industrial Services, Inc. in Chester, Virginia.

As a supplement to SCRA III activities, Apex mobilized to the site on October 6, 2016 to perform a subsurface investigation to identify the location of a suspected underground storage tank (UST) on the Keith property, addressed as 1537 River Road West Crozier, Virginia. On October 11, 2016, Apex returned to the site to uncover the UST and collect a water sample from the interior of the UST and a soil sample adjacent to the UST exterior. Total petroleum hydrocarbon (TPH) diesel range organics (DRO) was detected at a concentration of 1.67 mg/L in the water sample. No other dissolved-phase petroleum compounds were detected in the water sample. TPH-DRO was detected at a concentration of 2,020 parts per million in the soil sample collected adjacent to the UST. Ethylbenzene and naphthalene were detected at concentrations of 632 parts per billion (ppb) and 2,510 ppb, respectively in the soil sample collected. Based on the data collected, petroleum impact to the surrounding soil and water contained within the UST did not appear related to the impacted supply wells in the Old Oaks Neighborhood. Mr. Jeff Keith, the property owner, was notified of the findings and a new PC number was issued in conjunction with a "No Further Action" letter.

From January 2017 through February 2018, Apex performed PSCMR activities including monitoring well gauging, the collection and analysis of groundwater samples, domestic supply well sampling and analyses, manual free product recovery, and two eight-hour AF/VR events. Measurable free-phase petroleum was detected in a total of three monitoring wells and at a maximum thickness of 0.21 feet (July 14, 2017) in monitoring well MW-12 during the monitoring period. Approximately 0.03 gallons of free product was recovered via hand bailing and placed in a 55-gallon drum staged onsite. A total of 259 gallons of gasoline/water mixture was collected during the AF/VR events. Historical monitoring well gauging data is presented Table 1.

VOCs were detected in seven of the 16 monitoring wells sampled. TPH GRO was detected at a maximum concentration of 145 mg/L in MW-12. Benzene and MTBE were detected at maximum concentrations of 24,700 µg/L and 8.5 µg/L in monitoring wells MW-14 and MW-4, respectively. EDB was detected at a maximum concentration of 543 µg/L in monitoring well MW-3. MTBE was detected at a concentration of 1.38

µg/L in the pre-treatment Williams residence supply well sample (DW-1490 Old Oaks). No petroleum constituents were detected in the post-treatment sample collected from the Williams residence supply well. Chloroform was detected at various concentrations in samples collected from the Yarbrough residence (DW-1267 Cardwell), Bechter residence (DW-1510 Old Oaks), and Martin residence (DW-1241 Cardwell) supply wells. The presence of chloroform is likely attributed to the chlorination and disinfection of the supply wells and is not related to the petroleum release. Historical groundwater analytical results are presented in Table 2.

Under the direction of DEQ, Apex continues to perform monitoring and free product recovery activities at the site until corrective action is implemented and/or completed.

3.0 SITE DESCRIPTION

The site is located in a rural and residential area of Crozier, Goochland County, Virginia with properties in the vicinity consisting of residential dwellings and wooded land. The specific areas of concern consist of a current service station (Taylor Country Store addressed as 1535 River Road West) and two former service stations [former Briesmaster Motor Company (addressed as 1543 River Road West) and the site (addressed as 1537 River Road West)]. All three properties (including 21 others in the area) are supplied potable water by Aqua Virginia from a public water supply well located approximately 1,500 feet west of the site. All other properties in the area, including the Old Oaks subdivision, are provided potable water via private supply wells. A site plan showing pertinent features of the site, including onsite monitoring well locations, is included as Figure 2. A site plan showing pertinent features of surrounding properties and offsite monitoring well locations is included as Figure 3.

4.0 RECOMMENDED CORRECTIVE ACTION

Based on discussions with the DEQ, Apex recommends an alternate water supply (AWS) connection for properties impacted and at risk of impact from the petroleum contaminant plume. To date, eight residential supply wells in the Old Oaks subdivision have been impacted by petroleum constituents and have had carbon filtration systems installed as a temporary measure until a permanent petroleum-free drinking water source can be established. Additionally, 17 properties, including four undeveloped parcels, have been identified as at risk of impact from the petroleum release. A site plan indicating the location of impacted and “at risk” supply wells is included as Figure 4.

In consideration of the ongoing cost to service and maintain the existing eight carbon filtration systems and the elevated petroleum concentrations detected in the impacted wells, DEQ has concluded that providing public water access via an upgrade and expansion of the existing Aqua Virginia Crozier Waterworks to all residences in the Old Oaks subdivision and other “at risk” properties is an appropriate action to ensure a reliable safe drinking water source for the community.

As a supplement to public water connection, ongoing efforts to recover free-phase petroleum from the abandoned tank site will continue in order to meet the remediation endpoints discussed in **Section 6.0**. Apex recommends recovery of free-phase petroleum via DPE and the deployment of sorbent "socks" in between extraction events. Following connection of all impacted and "at risk" properties to the Aqua Virginia Crozier Waterworks, the proper abandonment of all impacted supply wells, and the achievement of remediation endpoints, Apex recommends closure of PC #2015-4105.

5.0 ALTERNATE WATER SUPPLY CONNECTION

On June 13, 2017, a public meeting was held by DEQ, Goochland County, and Aqua Virginia to discuss the potential expansion of the Crozier Waterworks. Items of discussion included the existing waterworks, cost, and necessary upgrades to implement the expansion. The existing waterworks currently serves 24 properties and was constructed in 1950. The waterworks consists of one drilled supply well and a 5,000-gallon hydro pneumatic tank. Based on the age of the waterworks system, the system was constructed prior to current regulatory standards. Specifications such as piping size and type, fire protection, and pressure must all be upgraded to allow for additional connections beyond the existing 24 connections. Additionally, yield testing must also be performed on the existing well to confirm the maximum number of connections the system can serve will be a total of 49 or limited by the actual well yield. Based on the existing and expected usage of the expanded waterworks system, the Virginia Department of Health will require the waterworks to have a storage capacity of approximately 10,000 gallons and suitable booster pumps for peak demand. Based on yield testing of the existing waterworks system, should the well or pump not be cable of the required rates, an additional well and/or pump may be required.

Expansion of and connection to an existing waterworks system is DEQ's remedial solution to address impacted and at-risk drinking water wells in the area. DEQ will pay the service connection and availability fees for all properties listed in Table 3. A meter is being set at each property identified as having impacted or at-risk water supply wells. These properties are identified in Figure 4 and in Table 3. If the homeowner chooses to connect to the waterworks system, DEQ will pay all installation costs (service connection and availability fees and plumbing costs to run a waterline from the water meter to the house) and costs to abandon the existing supply well through a contract with Goochland County.

Connection to the waterworks system is not mandatory. If the homeowner is offered a connection and chooses not to connect, continued use of an impacted well with a carbon filtration system will be at the homeowner's expense. Also, if a homeowner chooses not to connect, regardless of contamination, DEQ recommends that the homeowner continue to sample their well water routinely for the presence of petroleum constituents to monitor the performance of the carbon filtration system or the potential for impact to an identified "at risk" water supply. Persons who decline service connections at this time may connect to the waterworks at a later date, however, they will

be responsible for hiring and paying a plumber to run a service line from the meter box to their house.

6.0 REMEDIATION ENDPOINTS

The groundwater remediation program will be considered complete when predetermined numerical endpoints are achieved. Such endpoints are derived from a risk-based analysis of the petroleum contaminants relative to site-specific geologic/hydrogeological and area land use considerations.

6.1 Free-Phase

In accordance with DEQ guidelines, the free-phase petroleum product endpoint is the reduction of measurable free product in all monitoring wells to less than 0.01 feet of measurable free product or to the maximum extent practicable. An electronic interface probe and HDPE bailers will be used to inspect monitoring well locations for the presence of free-phase product accumulation.

6.2 Dissolved-Phase

The 22 groundwater users identified as "at risk" or "impacted" during site characterization are in the process of being connected to the municipal water supply. No other at risk or impacted drinking water receptors were identified during previous investigations. Based on the recommended free-phase endpoint goal to protect downgradient residences from dissolved- and free-phase gasoline and the connection of at risk or impacted groundwater users to the municipal water supply, specific dissolved-phase endpoints are not recommended. The implementation of DPE at this site is expected to reduce dissolved-phase concentrations.

6.3 Vapor-Phase

No vapor-phase exposure pathways have been identified, therefore no endpoint is recommended.

6.4 Adsorbed-Phase

No adsorbed-phase endpoint is recommended; however, the implementation of vacuum extraction technology at the site will reduce residual-phase gasoline concentrations in the vadose zone that may be contributing to dissolved- and free-phase impacts to groundwater. Therefore, residual-phase gasoline concentrations will be reduced using DPE to the maximum extent practicable, as measured by vapor effluent sampling and analysis and mass recovery calculations.

6.5 Estimated Timeframe to Achieve Endpoints

The estimated timeframe to achieve endpoints is approximately one to two years. The timeframe to achieve endpoints will depend on the duration and frequency of episodic DPE events authorized by DEQ.

7.0 PROJECT COST ESTIMATE AND SCHEDULE

DEQ requested that Goochland County provide a cost estimate to perform all engineering design, surveying, permitting, project administration, and construction related services for the waterworks system expansion with Aqua Virginia being the sole owner, operator, and billing service for the system once completed. Goochland County's proposal was submitted to DEQ on June 22, 2017 and estimated a total cost of $1,771,800 to complete the scope of work. On August 1, 2017, the Goochland County Board of Supervisors authorized the County Administrator to execute a Memorandum of Understanding with Aqua Virginia and to sign a proposal with DEQ. Following the bidding of the engineering and construction work, it is anticipated that construction and connection of the waterworks system will be completed in December 2018.

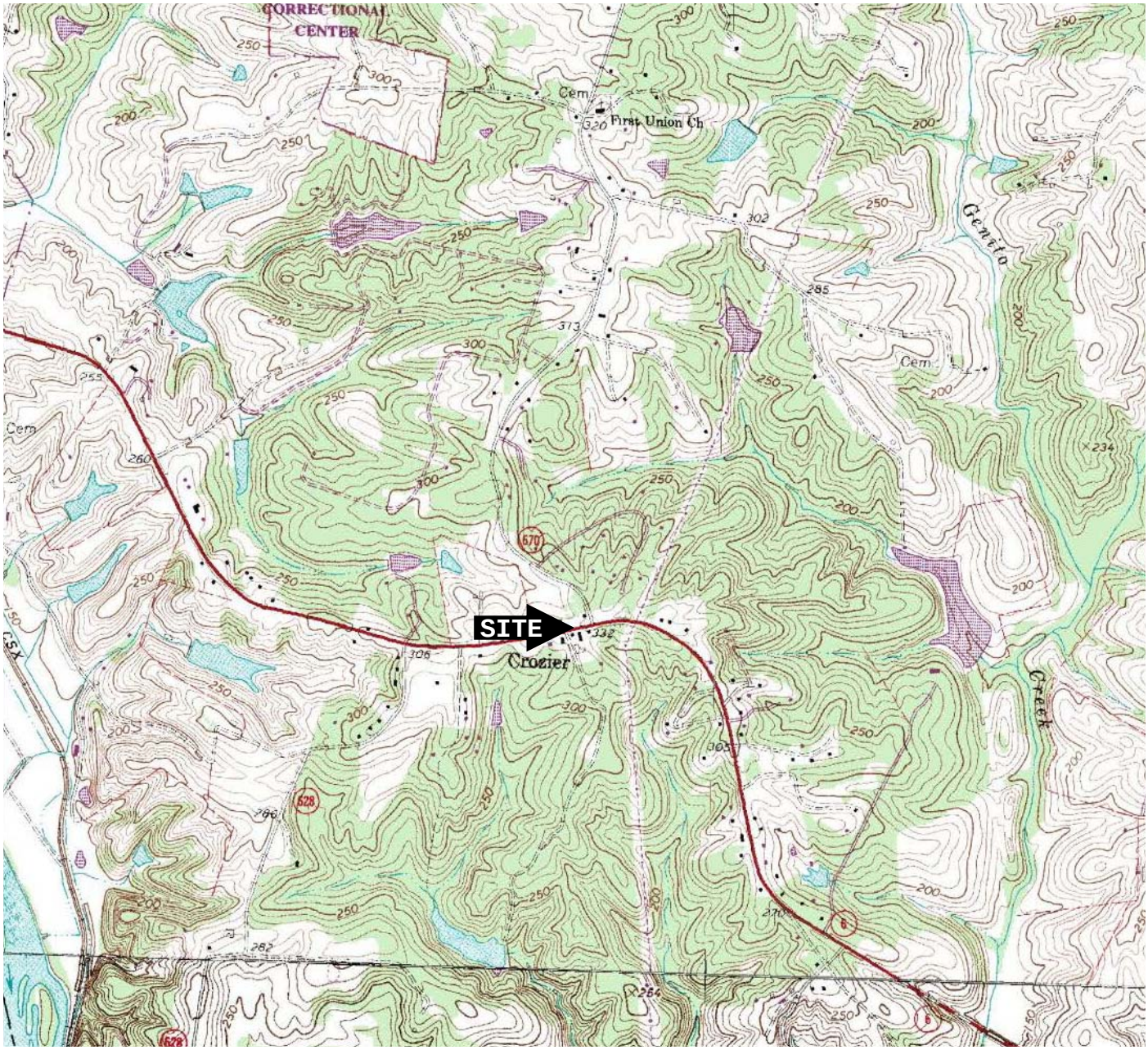
8.0 PUBLIC NOTIFICATION

Property owners whose water supply wells have been impacted by petroleum or are at risk of impact have been notified by Goochland County and DEQ of the connection to public water at no installation cost to the owner. Existing carbon filtration systems will remain active until the residence is connected to the public water system. In accordance with regulatory requirements, Apex will provide public notice for the CAP by publishing it in the Richmond Times-Dispatch, which covers the City of Richmond and surrounding counties (including Goochland County) for two consecutive weeks. A copy of the public notice is included as Appendix A.

Figures

Figure 1
Site Location Map

Crozier Abandoned Tank Site
Crozier, Goochland County, Virginia



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(Perkinsville, Virginia)

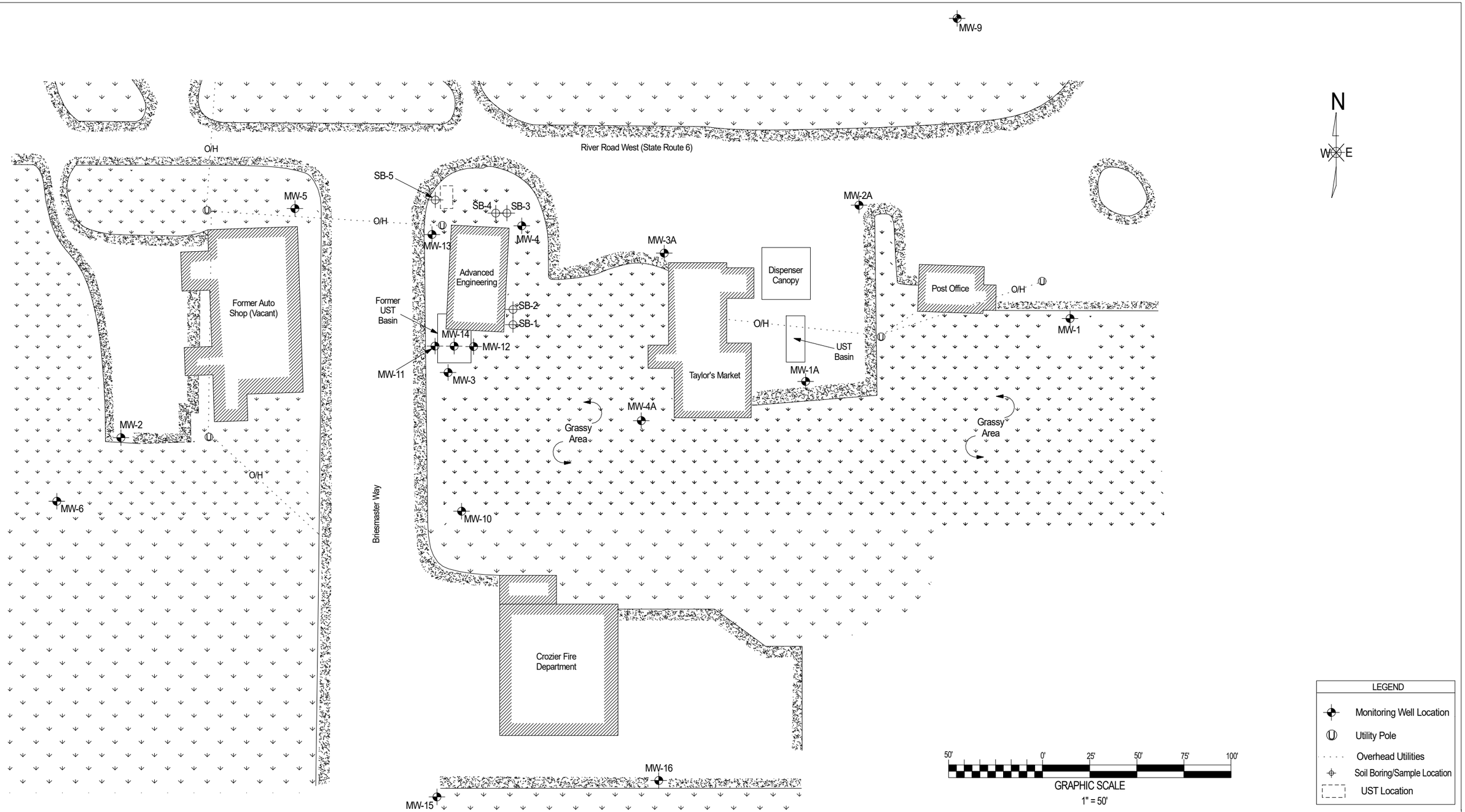
United States Department of the Interior
Geological Survey
7.5 Minute Series Topographic Map
Contour Interval: 10 feet
Scale: 1 inch = 2000 feet
Date: 1987

Project: Corrective Action Plan

Client: DEQ PRO

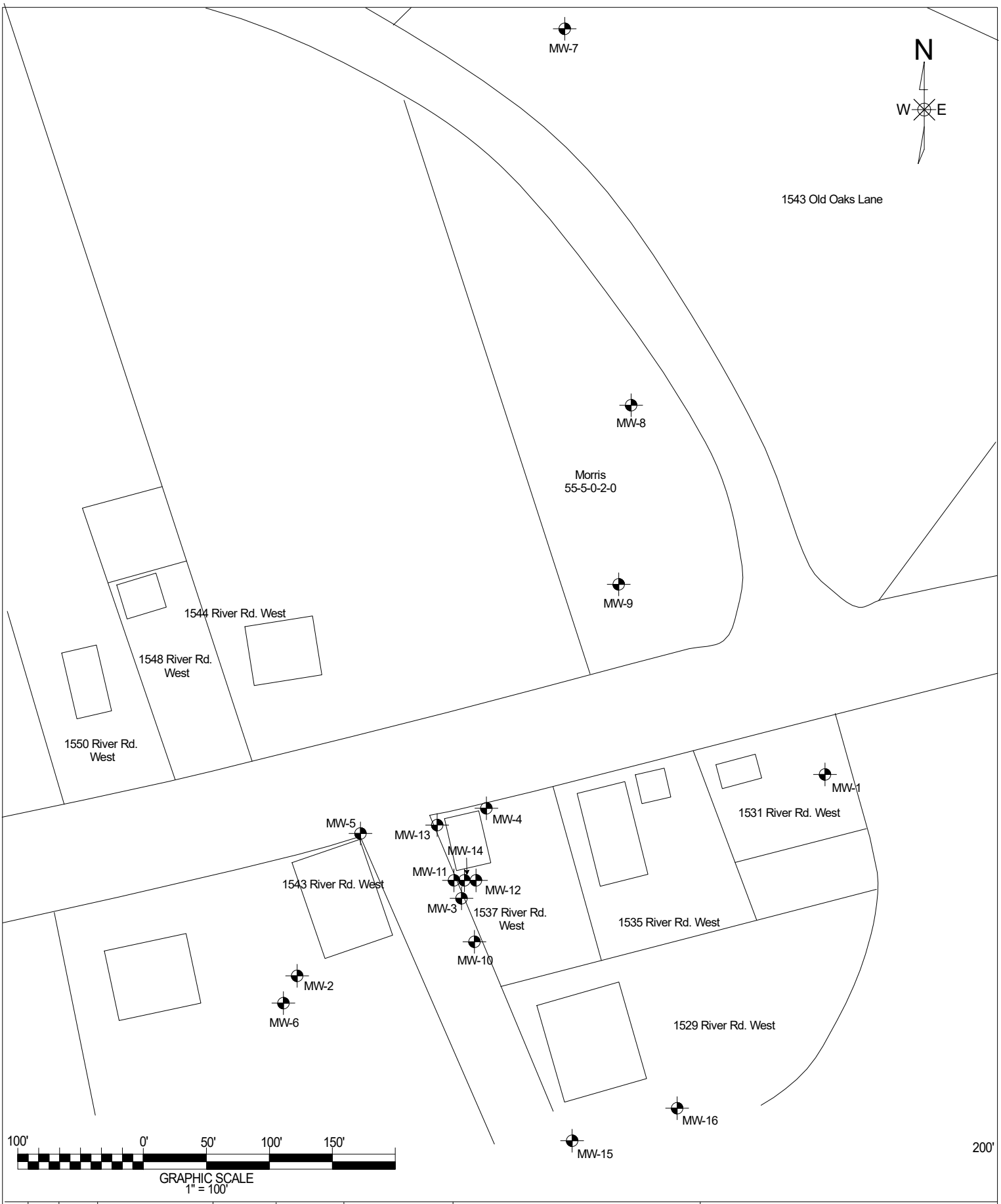
Apex Job #: 757004-001

Date: August 2018



LEGEND
Monitoring Well Location
Utility Pole
Overhead Utilities
Soil Boring/Sample Location
UST Location

DR.: SJT	DATE: Aug 2018	Corrective Action Plan	APEX COMPANIES, LLC. 203 WYLDEROSE COURT MIDLOTHIAN, VIRGINIA 23113 (804) 897-2718	DRAWING TITLE: Site Plan (Onsite Monitoring Well Locations) Crozier Abandoned Tank Site Crozier, Virginia
CK.:				
APP'D.:				
SCALE: 1" = 50'				
APEX PROJ. NO.: 757004.001				DRAWING NUMBER: FIGURE No. 2 — REV: 0
www.apexcos.com		PC# 2015-4105		



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DRAWING TITLE

Site Plan (Offsite Monitoring Well Locations)
Crozier Abandoned Tank Site
Crozier, Virginia

DRAWING NUMBER: FIGURE No. 3

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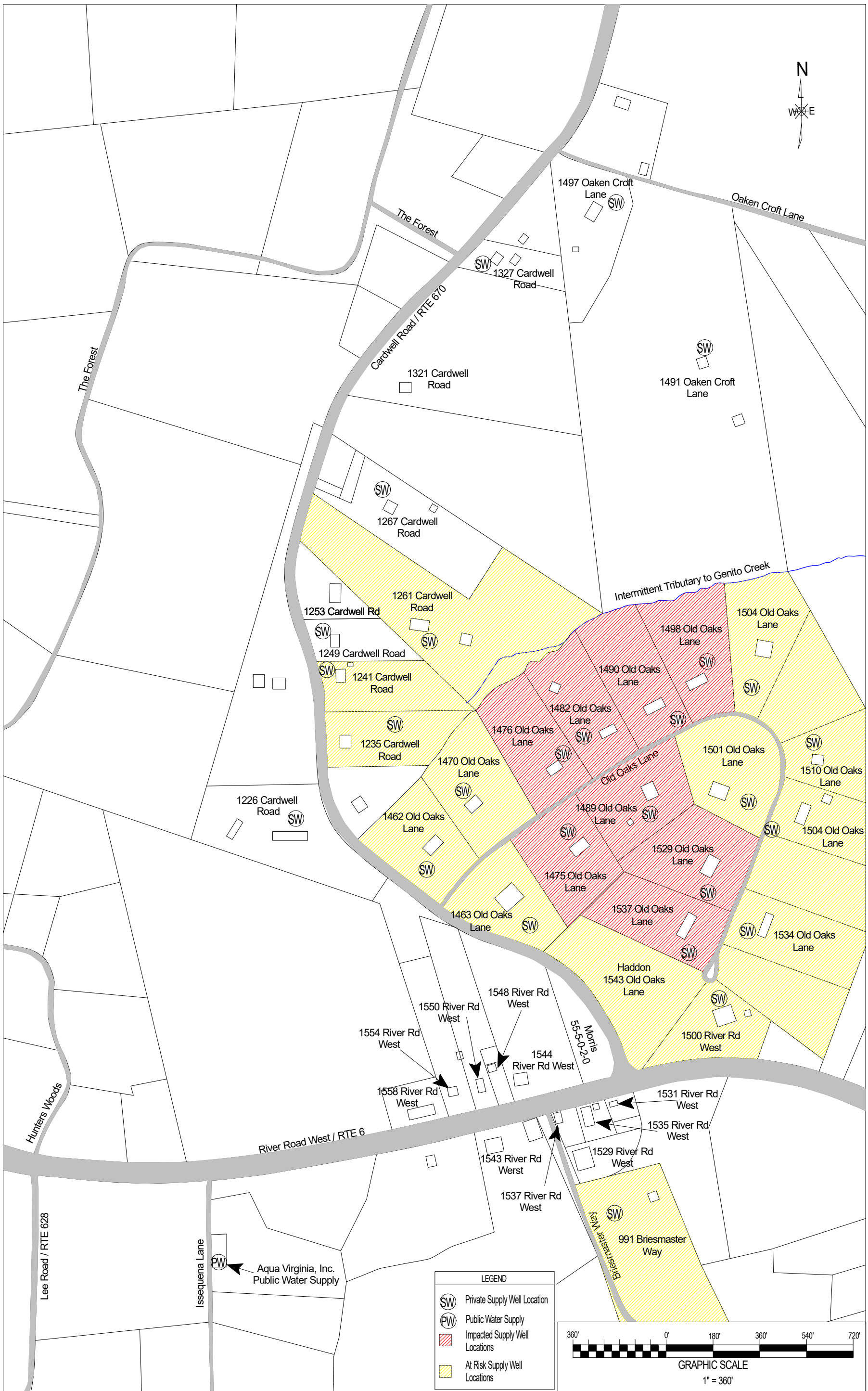

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				APEX PROJ. NO.: 757004.001	
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DRAWING TITLE

Impacted and At Risk Supply Well Location Map
Crozier Abandoned Tank Site
Crozier, Virginia

DRAWING NUMBER	REV
FIGURE No. 4	0

Tables

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-1	269.53	10/28/2014	53.91	ND[2]	ND	215.62
		1/21/2015	54.16	ND	ND	215.37
		3/10/2015	54.33	ND	ND	215.20
		4/17/2015	54.11	ND	ND	215.42
		11/6/2015	54.56	ND	ND	214.97
		11/30/2015	42.87	ND	ND	226.66
		12/1/2015	44.79	ND	ND	224.74
		12/2/2015	52.18	ND	ND	217.35
		12/3/2015	54.76	ND	ND	214.77
		1/20/2016	54.83	ND	ND	214.70
		7/25/2016	53.61	ND	ND	215.92
		8/17/2016	53.51	ND	ND	216.02
		10/5/2016	53.58	ND	ND	215.95
		10/12/2016	53.57	ND	ND	215.96
		2/2/2017	53.77	ND	ND	215.76
		2/14/2017	53.61	ND	ND	215.92
		3/13/2017	53.90	ND	ND	215.63
		7/14/2017	54.29	ND	ND	215.24
		8/3/2017	54.39	ND	ND	215.14
		8/18/2017	54.39	ND	ND	215.14
		9/7/2017	56.43	ND	ND	213.10
		9/15/2017	54.65	ND	ND	214.88
		10/13/2017	54.85	ND	ND	214.68
		11/17/2017	55.08	ND	ND	214.45
		12/4/2017	55.27	ND	ND	214.26
		1/3/2018	55.25	ND	ND	214.28
		2/7/2018	55.55	ND	ND	213.98

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-2	260.63	10/28/2014	38.81	ND	ND	221.82
		1/21/2015	39.80	ND	ND	220.83
		3/10/2015	40.25	ND	ND	220.38
		4/17/2015	40.21	ND	ND	220.42
		11/6/2015	39.99	ND	ND	220.64
		11/30/2015	42.03	ND	ND	218.60
		12/1/2015	40.23	ND	ND	220.40
		12/2/2015	40.34	ND	ND	220.29
		12/3/2015	40.31	ND	ND	220.32
		1/20/2016	40.44	ND	ND	220.19
		7/25/2016	38.06	ND	ND	222.57
		8/17/2016	37.98	ND	ND	222.65
		10/5/2016	38.31	ND	ND	222.32
		10/12/2016	38.34	ND	ND	222.29
		2/2/2017	39.23	ND	ND	221.40
		2/14/2017	39.20	ND	ND	221.43
		3/13/2017	39.48	ND	ND	221.15
		7/14/2017	39.77	ND	ND	220.86
		8/3/2017	39.89	ND	ND	220.74
		8/18/2017	39.89	ND	ND	220.74
		9/7/2017	40.10	ND	ND	220.53
		9/15/2017	40.09	ND	ND	220.24
		10/13/2017	40.39	ND	ND	220.24
		11/17/2017	40.70	ND	ND	219.93
		12/4/2017	40.96	ND	ND	219.67
		1/3/2018	41.10	ND	ND	219.53
		2/7/2018	41.39	ND	ND	219.24

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-3	267.30	10/28/2014	43.35	**43.14**	**0.21**	223.79
		12/17/2014	43.89	**43.63**	**0.26**	223.22
		1/21/2015	44.57	**43.97**	**0.60**	222.28
		2/25/2015 (Pre-AFVR)	44.60	**44.15**	**0.45**	222.36
		2/25/2015 (Post-AFVR)	46.80	ND	ND	220.50
		3/10/2015	44.56	**44.55**	**0.01**	222.73
		4/17/2015	44.36	**44.34**	**0.02**	222.96
		11/6/2015	44.33	**44.09**	**0.24**	223.15
		11/30/2015	44.51	**44.33**	**0.18**	222.93
		12/1/2015	44.82	**44.71**	**0.11**	222.56
		12/2/2015	44.72	**44.64**	**0.08**	222.64
		12/3/2015	Recovery Well Location			
		12/4/2015	46.55	**46.54**	**0.01**	220.76
		1/20/2016	44.31	ND	ND	222.99
		7/25/2016	42.84	**42.77**	**0.07**	224.51
		8/17/2016	42.75	**42.67**	**0.08**	224.61
		10/5/2016	42.88	**42.85**	**0.03**	224.44
		10/12/2016	42.84	**42.84**	**Sheen**	224.46
		2/2/2017	43.25	**43.23**	**0.02**	224.07
		2/14/2017	43.08	**43.06**	**0.02**	224.24
		3/13/2017	43.54	**43.51**	**0.03**	223.78
		7/14/2017	44.20	**44.04**	**0.16**	223.22
		8/3/2017	44.27	**44.19**	**0.08**	223.09
		8/18/2017	44.19	**44.12**	**0.07**	223.16
		9/7/2017	44.72	**44.70**	**0.02**	222.60
		9/15/2017	44.71	**44.71**	**Sheen**	222.59
		10/13/2017	45.14	**45.14**	**Sheen**	222.16
		11/17/2017	45.30	**45.30**	**Sheen**	222.00
		12/4/2017	45.59	**45.59**	**Sheen**	221.71
		1/3/2018	45.50	ND	ND	221.80
		1/12/2018 (Pre-AFVR)	45.08	**45.07**	**0.01**	222.23
		1/12/2018 (Post-AFVR)	44.90	**44.90**	**Sheen**	222.40
		2/7/2018	45.68	ND	ND	221.62
		2/13/2018	46.00	46.00	**Sheen**	221.30

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-4	267.31	10/28/2014	44.19	ND	ND	223.12
		1/21/2015	45.39	ND	ND	221.92
		3/10/2015	45.69	**45.69**	**Sheen**	221.62
		4/17/2015	45.30	ND	ND	222.01
		11/6/2015	45.19	ND	ND	222.12
		11/30/2015	45.24	ND	ND	222.07
		12/1/2015	45.13	ND	ND	222.18
		12/2/2015	45.04	ND	ND	222.27
		12/3/2015	45.39	ND	ND	221.92
		1/20/2016	45.08	ND	ND	222.23
		7/25/2016	43.23	ND	ND	224.08
		8/17/2016	43.30	ND	ND	224.01
		10/5/2016	43.71	ND	ND	223.60
		10/12/2016	43.72	ND	ND	223.59
		2/2/2017	44.13	ND	ND	223.18
		2/14/2017	44.08	ND	ND	223.23
		3/13/2017	44.37	ND	ND	222.94
		7/14/2017	44.93	ND	ND	222.38
		8/3/2017	45.09	ND	ND	222.22
		8/18/2017	45.06	ND	ND	222.25
		9/7/2017	45.33	ND	ND	221.98
		9/15/2017	45.42	ND	ND	221.89
		10/13/2017	45.80	ND	ND	221.51
		11/17/2017	46.07	ND	ND	221.24
		12/4/2017	46.33	ND	ND	220.98
		1/3/2018	46.27	ND	ND	221.04
		2/7/2018	46.73	ND	ND	220.58
		2/13/2018	44.58	ND	ND	222.73

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-5	266.01	10/28/2014	41.42	ND	ND	224.59
		1/21/2015	42.52	ND	ND	223.49
		3/10/2015	42.96	ND	ND	223.05
		4/17/2015	42.37	ND	ND	223.64
		11/6/2015	42.52	ND	ND	223.49
		11/30/2015	45.63	ND	ND	220.38
		12/1/2015	42.51	ND	ND	223.50
		12/2/2015	41.93	ND	ND	224.08
		12/3/2015	42.72	ND	ND	223.29
		1/20/2016	42.76	ND	ND	223.25
		7/25/2016	40.77	ND	ND	225.24
		8/17/2016	40.67	ND	ND	225.34
		10/5/2016	40.33	ND	ND	225.68
		10/12/2016	40.75	ND	ND	225.26
		2/2/2017	41.69	ND	ND	224.32
		2/14/2017	41.65	ND	ND	224.36
		3/13/2017	41.93	ND	ND	224.08
		7/14/2017	42.41	ND	ND	223.60
		8/3/2017	42.52	ND	ND	223.49
		8/18/2017	42.52	ND	ND	223.49
		9/7/2017	42.27	ND	ND	223.74
		9/15/2017	42.73	ND	ND	223.28
		10/13/2017	43.02	ND	ND	222.99
		11/17/2017	43.35	ND	ND	222.66
		12/4/2017	43.59	ND	ND	222.42
		1/3/2018	43.75	ND	ND	222.26
		2/7/2018	44.08	ND	ND	221.93

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-6	259.48	10/28/2014	38.55	ND	ND	220.93
		1/21/2015	39.58	ND	ND	219.90
		3/10/2015	39.99	ND	ND	219.49
		4/17/2015	39.82	ND	ND	219.66
		11/6/2015	39.79	ND	ND	219.69
		11/30/2015	41.29	ND	ND	218.19
		12/1/2015	39.93	ND	ND	219.55
		12/2/2015	39.89	ND	ND	219.59
		12/3/2015	40.07	ND	ND	219.41
		1/20/2016	40.21	ND	ND	219.27
		7/25/2016	37.62	ND	ND	221.86
		8/17/2016	37.59	ND	ND	221.89
		10/5/2016	38.04	ND	ND	221.44
		10/12/2016	38.09	ND	ND	221.39
		2/2/2017	38.99	ND	ND	220.49
		2/14/2017	38.97	ND	ND	220.51
		3/13/2017	39.22	ND	ND	220.26
		7/14/2017	39.41	ND	ND	220.07
		8/3/2017	39.55	ND	ND	219.93
		8/18/2017	39.58	ND	ND	219.90
		9/7/2017	39.82	ND	ND	219.66
		9/15/2017	39.84	ND	ND	219.32
		10/13/2017	40.16	ND	ND	219.32
		11/17/2017	40.52	ND	ND	218.96
		12/4/2017	41.96	ND	ND	217.52
		1/3/2018	40.91	ND	ND	218.57
		2/7/2018	41.24	ND	ND	218.24

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-7	259.99	12/16/2014	49.35	ND	ND	210.64
		1/21/2015	49.57	ND	ND	210.42
		3/10/2015	49.81	ND	ND	210.18
		4/17/2015	49.32	ND	ND	210.67
		11/6/2015	49.07	ND	ND	210.92
		1/20/2016	49.83	ND	ND	210.16
		7/25/2016	48.67	ND	ND	211.32
		8/17/2016	48.85	ND	ND	211.14
		10/5/2016	48.55	ND	ND	211.44
		10/12/2016	48.95	ND	ND	211.04
		2/2/2017	49.32	ND	ND	210.67
		2/14/2017	49.28	ND	ND	210.71
		3/13/2017	49.45	ND	ND	210.54
		7/14/2017	49.34	ND	ND	210.65
		8/3/2017	49.72	ND	ND	210.27
		8/18/2017	48.03	ND	ND	211.96
		9/7/2017	49.03	ND	ND	210.96
		9/15/2017	49.95	ND	ND	210.04
		10/13/2017	50.15	ND	ND	209.84
		11/17/2017	49.71	ND	ND	210.28
		12/4/2017	50.61	ND	ND	209.38
		1/3/2018	50.66	ND	ND	209.33
		2/7/2018	50.87	ND	ND	209.12

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-8	273.19	12/16/2014	59.35	ND	ND	213.84
		12/17/2014	59.42	ND	ND	213.77
		1/21/2015	59.28	ND	ND	213.91
		3/10/2015	59.84	ND	ND	213.35
		4/17/2015	59.67	ND	ND	213.52
		11/6/2015	Not located due to overgrown vegetation			
		1/20/2016	60.43	ND	ND	212.76
		7/25/2016	58.98	ND	ND	214.21
		8/17/2016	58.82	ND	ND	214.37
		10/5/2016	58.79	ND	ND	214.40
		10/12/2016	58.91	ND	ND	214.28
		2/2/2017	59.29	ND	ND	213.90
		2/14/2017	59.21	ND	ND	213.98
		3/13/2017	59.42	ND	ND	213.77
		7/14/2017	59.78	ND	ND	213.41
		8/3/2017	59.87	ND	ND	213.32
		8/18/2017	59.37	ND	ND	213.82
		9/7/2017	57.62	ND	ND	215.57
		9/15/2017	60.09	ND	ND	213.10
		10/13/2017	60.30	ND	ND	212.89
		11/17/2017	60.04	ND	ND	213.15
		12/4/2017	60.67	ND	ND	212.52
		1/3/2018	60.72	ND	ND	212.47
		2/7/2018	60.91	ND	ND	212.28

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-9	271.04	12/16/2014	55.24	ND	ND	215.80
		1/21/2015	55.46	ND	ND	215.58
		3/10/2015	55.55	ND	ND	215.49
		4/17/2015	55.34	ND	ND	215.70
		11/6/2015	Not located due to overgrown vegetation			
		1/20/2016	55.69	ND	ND	215.35
		7/25/2016	54.63	ND	ND	216.41
		8/17/2016	54.68	ND	ND	216.36
		10/5/2016	54.33	ND	ND	216.71
		10/12/2016	54.34	ND	ND	216.70
		2/2/2017	55.01	ND	ND	216.03
		2/14/2017	54.89	ND	ND	216.15
		3/13/2017	55.11	NN	ND	215.93
		7/14/2017	54.55	ND	ND	216.49
		8/3/2017	57.62	ND	ND	213.42
		8/18/2017	55.12	ND	ND	215.92
		9/7/2017	55.39	ND	ND	215.65
		9/15/2017	55.87	ND	ND	215.17
		10/13/2017	56.17	ND	ND	214.87
		11/17/2017	56.19	ND	ND	214.85
		12/4/2017	56.57	ND	ND	214.47
		1/3/2018	56.57	ND	ND	214.47
		2/7/2018	56.56	ND	ND	214.48

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-10	268.22	12/16/2014	44.95	**44.94**	**0.01**	223.26
		12/17/2014	45.03	**45.03**	**Sheen**	223.19
		1/21/2015	45.38	**45.38**	**Sheen**	222.84
		3/10/2015	45.79	ND	ND	222.43
		4/17/2015	45.80	ND	ND	222.42
		11/6/2015	45.63	ND	ND	222.59
		11/30/2015	45.74	ND	ND	222.48
		12/1/2015	45.87	ND	ND	222.35
		12/2/2015	45.70	ND	ND	222.52
		12/3/2015	45.93	ND	ND	222.29
		12/4/2015	46.26	ND	ND	221.96
		1/20/2016	45.91	ND	ND	222.31
		7/25/2016	44.24	ND	ND	223.98
		8/17/2016	44.12	ND	ND	224.10
		10/5/2016	44.21	ND	ND	224.01
		10/12/2016	44.22	ND	ND	224.00
		2/2/2017	44.56	ND	ND	223.66
		2/14/2017	44.46	ND	ND	223.76
		3/13/2017	44.85	ND	ND	223.37
		7/14/2017	45.39	ND	ND	222.83
		8/3/2017	45.48	ND	ND	222.74
		8/18/2017	45.41	ND	ND	222.81
		9/7/2017	45.67	ND	ND	222.55
		9/15/2017	45.74	ND	ND	222.48
		10/13/2017	46.09	ND	ND	222.13
		11/17/2017	46.24	ND	ND	221.98
		12/4/2017	46.83	ND	ND	221.39
		1/3/2018	46.53	ND	ND	221.69
		2/7/2018	46.91	ND	ND	221.31
		2/13/2018	47.25	ND	ND	220.97

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-11	266.83	12/16/2014	43.30	**43.30**	**Sheen**	223.53
		12/17/2014	43.10	**43.10**	**Sheen**	223.73
		1/21/2015	43.55	**43.55**	**Sheen**	223.28
		2/25/2015 (Pre-AFVR)	43.70	ND	ND	223.13
		2/25/2015 (Post-AFVR)	43.66	ND	ND	223.17
		3/10/2015	43.95	ND	ND	222.88
		4/17/2015	43.81	ND	ND	223.02
		11/6/2015	43.62	ND	ND	223.21
		11/30/2015	43.78	ND	ND	223.05
		12/1/2015	44.10	ND	ND	222.73
		12/2/2015	43.96	ND	ND	222.87
		12/3/2015	43.80	ND	ND	223.03
		12/4/2015	44.69	ND	ND	222.14
		1/20/2016	43.89	ND	ND	222.94
		7/25/2016	42.12	ND	ND	224.71
		8/17/2016	42.09	ND	ND	224.74
		10/5/2016	42.07	ND	ND	224.76
		10/12/2016	42.21	**42.21**	**Sheen**	224.62
		2/2/2017	42.64	**42.64**	**Sheen**	224.19
		2/14/2017	42.50	**42.50**	**Sheen**	224.33
		3/13/2017	42.94	**42.94**	**Sheen**	223.89
		7/14/2017	43.46	ND	ND	223.37
		8/3/2017	43.59	ND	ND	223.24
		8/18/2017	43.52	ND	ND	223.31
		9/7/2017	43.61	ND	ND	223.22
		9/15/2017	43.83	ND	ND	223.00
		10/13/2017	44.17	ND	ND	222.66
		11/17/2017	44.37	ND	ND	222.46
		12/4/2017	44.65	ND	ND	222.18
		1/3/2018	44.64	**44.64**	**Sheen**	222.19
		1/12/2018 (Post-AFVR)	44.55	ND	ND	-44.55
		2/7/2018	45.04	**45.04**	**Sheen**	221.79
		2/13/2018	45.35	ND	ND	-45.35

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-12	267.18	12/16/2014	43.32	**43.19**	**0.13**	223.76
		12/17/2014	43.30	**43.30**	**Sheen**	223.88
		1/21/2015	43.97	**43.68**	**0.29**	222.99
		2/25/2015 (Pre-AFVR)	43.80	**43.25**	**0.55**	222.97
		2/25/2015 (Post-AFVR)	46.96	ND	ND	220.22
		3/10/2015	44.20	**44.19**	**0.01**	222.97
		4/17/2015	43.90	**43.76**	**0.14**	223.39
		11/6/2015	44.18	**43.62**	**0.56**	223.42
		11/30/2015	44.14	**43.79**	**0.35**	223.30
		12/1/2015	Recovery Well Location			
		12/2/2015	Recovery Well Location			
		12/3/2015	Recovery Well Location			
		12/4/2015	45.68	**45.66**	**0.02**	221.52
		1/20/2016	43.97	**43.94**	**0.03**	223.23
		7/25/2016	42.21	**42.21**	**Sheen**	224.97
		8/17/2016	42.16	**42.16**	**Sheen**	225.02
		10/5/2016	42.37	**42.36**	**0.01**	224.82
		10/12/2016	42.39	**42.37**	**0.02**	224.81
		2/2/2017	42.84	**42.76**	**0.08**	224.40
		2/14/2017	42.74	**42.69**	**0.05**	224.48
		3/13/2017	43.17	**43.08**	**0.09**	224.08
		7/14/2017	43.83	43.61	0.21	223.51
		8/3/2017	43.94	43.75	0.19	223.38
		8/18/2017	43.81	43.70	0.11	223.45
		9/7/2017	44.12	44.11	0.01	223.07
		9/15/2017	44.13	44.13	Sheen	223.05
		10/13/2017	44.50	**44.50**	**Sheen**	222.68
		11/17/2017	44.70	**44.70**	**Sheen**	222.48
		12/4/2017	44.98	**44.98**	**Sheen**	222.20
		1/3/2018	44.98	ND	ND	222.20
		1/12/2018 (Pre-AFVR)	44.66	**44.65**	**0.01**	222.53
		1/12/2018 (Post-AFVR)	44.98	**44.98**	**Sheen**	222.20
		2/7/2018	45.30	ND	ND	221.88
		2/13/2018	45.60	45.60	**Sheen**	221.58

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-13	266.76	12/16/2014	42.41	ND	ND	224.35
		12/17/2014	42.50	ND	ND	224.26
		1/21/2015	43.02	ND	ND	223.74
		2/25/2015 (Pre-AFVR)	43.21	ND	ND	223.55
		2/25/2015 (Post-AFVR)	43.15	ND	ND	223.61
		3/10/2015	43.45	ND	ND	223.31
		4/17/2015	43.18	ND	ND	223.58
		11/6/2015	42.43	ND	ND	224.33
		11/30/2015	42.99	ND	ND	223.77
		12/1/2015	42.97	ND	ND	223.79
		12/2/2015	42.91	ND	ND	223.85
		12/3/2015	43.28	ND	ND	223.48
		1/20/2016	43.04	ND	ND	223.72
		7/25/2016	41.09	ND	ND	225.67
		8/17/2016	40.95	ND	ND	225.81
		10/5/2016	41.03	ND	ND	225.73
		10/12/2016	41.19	ND	ND	225.57
		2/2/2017	41.97	ND	ND	224.79
		2/14/2017	41.89	ND	ND	224.87
		3/13/2017	42.27	ND	ND	224.49
		7/14/2017	42.72	ND	ND	224.04
		8/3/2017	42.87	ND	ND	223.89
		8/18/2017	42.83	ND	ND	223.93
		9/7/2017	43.09	ND	ND	223.67
		9/15/2017	43.14	ND	ND	223.62
		10/13/2017	43.52	43.52	Sheen	223.24
		11/17/2017	43.73	ND	ND	223.03
		12/4/2017	43.98	ND	ND	222.78
		1/3/2018	44.00	ND	ND	222.76
		1/12/2018 (Post-AFVR)	43.76	ND	ND	223.00
		2/7/2018	44.39	ND	ND	222.37
		2/13/2018	44.69	ND	ND	222.07

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-14	267.22	3/10/2015	44.33	ND	ND	222.89
		4/17/2015	44.28	**44.02**	**0.26**	223.14
		11/6/2015	45.26	**43.31**	**1.95**	223.42
		11/30/2015	43.79	**43.46**	**0.33**	223.68
		12/1/2015	Recovery Well Location			
		12/2/2015	Recovery Well Location			
		12/3/2015	Recovery Well Location			
		12/4/2015	45.61	ND	ND	221.61
		1/20/2016	44.35	**44.13**	**0.22**	223.04
		7/25/2016	42.93	**42.31**	**0.62**	224.76
		8/17/2016	42.22	**42.08**	**0.14**	225.11
		10/5/2016	42.06	**42.00**	**0.06**	225.21
		10/12/2016	42.60	**42.58**	**0.02**	224.64
		2/2/2017	43.05	**43.00**	**0.05**	224.21
		2/14/2017	42.93	**42.88**	**0.05**	224.33
		3/13/2017	43.36	**43.32**	**0.04**	223.89
		7/14/2017	43.92	**43.81**	**0.11**	223.38
		8/3/2017	44.05	**43.99**	**0.06**	223.22
		8/18/2017	43.94	**43.91**	**0.03**	223.30
		9/7/2017	44.37	**44.35**	**0.02**	222.87
		9/15/2017	44.44	**44.44**	**Sheen**	222.78
		10/13/2017	44.83	**44.83**	**Sheen**	222.39
		11/17/2017	45.04	**45.04**	**Sheen**	222.18
		12/4/2017	45.30	**45.30**	**Sheen**	221.92
		1/3/2018	45.26	**45.26**	**Sheen**	221.96
		1/12/2018 (Pre-AFVR)	44.51	**44.50**	**0.01**	222.72
		1/12/2018 (Post-AFVR)	46.48	**46.48**	**Sheen**	220.74
		2/7/2018	45.44	**45.40**	**Sheen**	221.78
		2/13/2018	45.75	**45.75**	**Sheen**	221.47

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-15	268.68	3/10/2015	48.46	ND	ND	220.22
		4/17/2015	48.66	ND	ND	220.02
		11/6/2015	48.69	ND	ND	219.99
		11/30/2015	44.12	ND	ND	224.56
		12/1/2015	48.71	ND	ND	219.97
		12/2/2015	48.66	ND	ND	220.02
		12/3/2015	48.68	ND	ND	220.00
		1/20/2016	49.05	ND	ND	219.63
		7/25/2016	47.68	ND	ND	221.00
		8/17/2016	47.49	ND	ND	221.19
		10/5/2016	47.36	ND	ND	221.32
		10/12/2016	47.34	ND	ND	221.34
		2/2/2017	47.45	ND	ND	221.23
		2/14/2017	47.31	ND	ND	221.37
		3/13/2017	47.66	ND	ND	221.02
		7/14/2017	48.13	ND	ND	220.55
		8/3/2017	48.30	ND	ND	220.38
		8/18/2017	48.22	ND	ND	220.46
		9/7/2017	48.49	ND	ND	220.19
		9/15/2017	48.49	ND	ND	220.19
		10/13/2017	48.81	ND	ND	219.87
		11/17/2017	48.97	ND	ND	219.71
		12/4/2017	49.26	ND	ND	219.42
		1/3/2018	49.27	ND	ND	219.41
		2/7/2018	49.58	ND	ND	219.10

Table 1
Crozier Abandoned Tank Site
Current and Historical Groundwater Elevation Data

Well I.D.	Top of Casing Elevation (feet)[1]	Date	Depth to Water (feet)	Depth to Product (feet)	Product Thickness (feet)	Groundwater Elevation (feet)
MW-16	269.28	3/10/2015	49.53	ND	ND	219.75
		4/17/2015	49.59	ND	ND	219.69
		11/6/2015	49.97	ND	ND	219.31
		11/30/2015	44.37	ND	ND	224.91
		12/1/2015	49.23	ND	ND	220.05
		12/2/2015	49.87	ND	ND	219.41
		12/3/2015	49.94	ND	ND	219.34
		1/20/2016	50.14	ND	ND	219.14
		7/25/2016	48.67	ND	ND	220.61
		8/17/2016	48.47	ND	ND	220.81
		10/5/2016	48.47	ND	ND	220.81
		10/12/2016	48.53	ND	ND	220.75
		2/2/2017	48.54	ND	ND	220.74
		2/14/2017	48.53	ND	ND	220.75
		3/13/2017	48.73	ND	ND	220.55
		7/14/2017	49.32	ND	ND	219.96
		8/3/2017	49.46	ND	ND	219.82
		8/18/2017	49.47	ND	ND	219.81
		9/7/2017	49.66	ND	ND	219.62
		9/15/2017	49.70	ND	ND	219.58
		10/13/2017	50.03	ND	ND	219.25
		11/17/2017	50.20	ND	ND	219.08
		12/4/2017	50.47	ND	ND	218.81
		1/3/2018	50.47	ND	ND	218.81
		2/7/2018	50.76	ND	ND	218.52

[1] Elevations measured by Apex Companies, LLC relative to arbitrary site datum of 270 feet.
[2] ND = Free product not detected.

Table 2
Crozier Abandoned Tank Site
Current and Historical Groundwater Analytical Data

Sample ID	**102814001-4**	**31015001-10**	**12015001-7**	**101216001-6**	**101317001-6**	**102814001-6**	**31015001-9**	**12015001-4**	**101216001-3**	**101317001-3**
Sample Location	**MW-1**					**MW-2**				
Date	10/28/14	3/10/15	1/20/16	10/12/16	10/13/17	10/28/14	3/10/15	1/20/16	10/12/16	10/13/17
TPH GRO (mg/L)[1]	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10
1,1,2-Trichloroethane (ug/L)[2]	<1.00	<1.00	<1.00	<0.11	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2,4-Trimethylbenzene (ug/L)	<1.00	<1.00	<1.00	<0.12	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2-Dichloroethane (ug/L)	<1.00	<1.00	<1.00	<0.13	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,3,5-Trimethylbenzene	<1.00	<1.00	<1.00	<0.14	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
2-Butanone (MEK) (ug/L)	**15.8**	**30.5**	<5.00	<0.15	<10.0	**16.8**	<10.0	<5.00	<10.0	<10.0
2-Hexanone (MBK) (ug/L)	<10.0	<10.0	<5.00	<0.16	<5.00	<10.0	<10.0	<5.00	<5.00	<5.00
4-Isopropyltoluene (ug/L)	<1.00	<1.00	<1.00	<0.17	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
4-Methyl-2-pentanone (ug/L)	<10.0	<10.0	<5.00	<0.18	<5.00	<10.0	<10.0	<5.00	<5.00	<5.00
Acetone (ug/L)	**15.8**	**18.0**	<10.0	<0.19	<10.0	<10.0	<10.0	<10.0	<10.0	<10.0
Benzene (ug/L)	<1.00	<1.00	<1.00	<0.20	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Di-isopropyl ether (DIPE) (ug/L)	<5.00	<5.00	<5.00	<0.21	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Ethylbenzene (ug/L)	<1.00	<1.00	<1.00	<0.22	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Isopropylbenzene (ug/L)	<1.00	<1.00	<1.00	<0.23	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
MTBE (ug/L)	<1.00	<1.00	<1.00	<0.24	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Naphthalene (ug/L)	<1.00	<1.00	<1.00	<0.25	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
n-Butylbenzene (ug/L)	<5.00	<5.00	<1.00	<0.26	<1.00	<5.00	<5.00	<1.00	<1.00	<1.00
n-Propylbenzene (ug/L)	<1.00	<1.00	<1.00	<0.27	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
sec-Butylbenzene (ug/L)	<1.00	<1.00	<1.00	<0.28	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Styrene (ug/L)	<1.00	<1.00	<1.00	<0.29	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
tert-Butylbenzene (ug/L)	<1.00	<1.00	<1.00	<0.30	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Toluene (ug/L)	<1.00	<1.00	<1.00	<0.31	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Total BTEX (ug/L)	<6.00	<6.00	<6.00	<0.32	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00
Total Xylenes (ug/L)	<3.00	<3.00	<3.00	<0.33	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00
1,2-Dibromoethane (EDB) (ug/L)[3]	<0.01	<0.010	<0.010	<0.34	<0.010	<0.01	<0.010	<0.010	<0.010	<0.010

Table 2
Crozier Abandoned Tank Site
Current and Historical Groundwater Analytical Data

Sample ID	102814001-9	31015001-19	12015001-13	101216001-12	101317001-12	21318001-4	102814001-8	31015001-17	12015001-14	101216001-13	101317001-13	21318001-5
Sample Location	MW-3						MW-4					
Date	10/28/14	3/10/15	1/20/16	10/12/16	10/13/17	2/13/18	10/28/14	3/10/15	1/20/16	10/12/16	10/13/17	2/13/18
TPH GRO (mg/L)[1]	137	112	143	123	113	117	60.8	61.2	56.3	51.6	53.7	44.5
1,1,2-Trichloroethane (ug/L)[2]	<1.00	8	<5.00	<5.00	<5.00	<5.00	<1.00	<5.00	<5.00	<5.00	<5.00	<5.00
1,2,4-Trimethylbenzene (ug/L)	1,980	2,070	2,840	3,460	2,690	12,900	2,050	2,350	2,270	2,290	1,930	1,860
1,2-Dichloroethane (ug/L)	798	415	188	258	145	115	327	304	228	181	146	159
1,3,5-Trimethylbenzene	682	582	901	806	670	930	554	650	546	616	453	495
2-Butanone (MEK) (ug/L)	529	686	616	652	635	561	139	<50.0	<25.0	<50.0	<50.0	<50.0
2-Hexanone (MBK) (ug/L)	75.4	91.1	120.0	124	106	97.8	202	231	194	186	168	165
4-Isopropyltoluene (ug/L)	<5.00	<5.00	<5.00	<5.00	<5.00	5.4	6.23	6.24	5.83	6.72	6.67	7,75
4-Methyl-2-pentanone (ug/L)	<50.0	58.0	72.8	81.4	60.8	65.3	89.7	106.0	85	76.0	61.3	68.4
Acetone (ug/L)	<50.0	<50.0	<50.0	<50.0	<50.0	<50.0	<10.0	<50.0	<50.0	<50.0	<50.0	<50.0
Benzene (ug/L)	27,800	24,700	27,000	17,100	21,100	24,700	8,590	8,420	7,740	6,280	5,910	6,070
Di-isopropyl ether (DIPE) (ug/L)	7,100	5,240	2,210	2,860	2,560	2,850	1,100	1,260	778	723	480	488
Ethylbenzene (ug/L)	3,090	3,620	3,690	4,210	3,570	6,720	2,190	2,500	2,300	2,270	2,340	2,240
Isopropylbenzene (ug/L)	63	68	100.0	78.2	71.1	93.0	79.2	95.8	85.9	80.8	81.8	96.2
MTBE (ug/L)	<5.00	<5.00	<5.00	<5.00	<5.00	<5.0	28.6	33.2	14.0	14.8	6.86	8.5
Naphthalene (ug/L)	615	601	667	611	529	762	717	901	798	767	728	806
n-Butylbenzene (ug/L)	<5.00	15.2	27.5	24.1	21.1	28.2	<5.00	23.2	20.8	25.0	21.4	22
n-Propylbenzene (ug/L)	311	277	391	371	265	402	257	297	241	309	221	254
sec-Butylbenzene (ug/L)	10.5	<5.00	<5.00	13.8	11.5	17.6	11.1	<5.00	<5.00	12.0	10.4	14
Styrene (ug/L)	299	329	388	269	264	316	14.8	9.7	<5.00	8.98	<5.00	<5.00
tert-Butylbenzene (ug/L)	<5.00	<5.00	<5.00	<5.00	<5.00	<5.0	1.16	<5.00	<5.00	<5.00	<5.00	<5.00
Toluene (ug/L)	45,000	45,300	42,600	39,000	39,500	42,600	21,900	21,000	23,500	18,100	17,200	17,600
Total BTEX (ug/L)	93,690	94,920	97,490	85,110	87,670	120,620	44,680	46,420	47,040	39,850	38,550	38,510
Total Xylenes (ug/L)	17,800	21,300	24,200	24,800	23,500	46,600	12,000	14,500	13,500	13,200	13,100	12,600
1,2-Dibromoethane (EDB) (ug/L)[3]	562	605	360	388	448	543	264	290	90.2	198.0	182	188

Table 2
Crozier Abandoned Tank Site
Current and Historical Groundwater Analytical Data

Sample ID	**102814001-7**	**31015001-16**	**12015001-6**	**101216001-5**	**101317001/-5**	**102814001-5**	**31015001-11**	**12015001-5**	**101216001-4**	**101317001-4**
Sample Location	**MW-5**					**MW-6**				
Date	10/28/14	3/10/15	1/20/16	10/12/16	10/13/17	10/28/14	3/10/15	1/20/16	10/12/16	10/13/17
TPH GRO (mg/L)[1]	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10
1,1,2-Trichloroethane (ug/L)[2]	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2,4-Trimethylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2-Dichloroethane (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,3,5-Trimethylbenzene	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
2-Butanone (MEK) (ug/L)	**17.9**	<10.0	<5.00	<10.0	<10.0	**25.9**	<10.0	<5.00	<10.0	<10.0
2-Hexanone (MBK) (ug/L)	<10.0	<10.0	<5.00	<5.00	<5.00	<10.0	<10.0	<5.00	<5.00	<5.00
4-Isopropyltoluene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
4-Methyl-2-pentanone (ug/L)	<10.0	<10.0	<5.00	<5.00	<5.00	<10.0	<10.0	<5.00	<5.00	<5.00
Acetone (ug/L)	<10.0	<10.0	<10.0	<10.0	<10.0	**10.0**	<10.0	<10.0	<10.0	<10.0
Benzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Di-isopropyl ether (DIPE) (ug/L)	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Ethylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Isopropylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
MTBE (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Naphthalene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
n-Butylbenzene (ug/L)	<5.00	<5.00	<1.00	<1.00	<1.00	<5.00	<5.00	<1.00	<1.00	<1.00
n-Propylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
sec-Butylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Styrene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
tert-Butylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Toluene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Total BTEX (ug/L)	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00
Total Xylenes (ug/L)	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00
1,2-Dibromoethane (EDB) (ug/L)[3]	<0.01	<0.010	<0.010	<0.010	<0.010	<0.01	<0.010	<0.010	<0.010	<0.010

Table 2
Crozier Abandoned Tank Site
Current and Historical Groundwater Analytical Data

Sample ID	121714001-3	31015001-6	12015001-9	101216001-8	101317001-8	121714001-4	31015001-7	12015001-8	101216001-7	101317001-7
Sample Location	MW-7					MW-8				
Date	12/16/14	3/10/15	1/20/16	10/12/16	10/13/17	12/17/14	3/10/15	1/20/16	10/12/16	10/13/17
TPH GRO (mg/L)[1]	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10
1,1,2-Trichloroethane (ug/L)[2]	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2,4-Trimethylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2-Dichloroethane (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,3,5-Trimethylbenzene	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
2-Butanone (MEK) (ug/L)	<10.0	**16**	<5.00	<10.0	<10.0	<10.0	**30.7**	<5.00	<10.0	<10.0
2-Hexanone (MBK) (ug/L)	<10.0	<10.0	<5.00	<5.00	<5.00	<10.0	<10.0	<5.00	<5.00	<5.00
4-Isopropyltoluene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
4-Methyl-2-pentanone (ug/L)	<10.0	<10.0	<5.00	<5.00	<5.00	<10.0	<10.0	<5.00	<5.00	<5.00
Acetone (ug/L)	<10.0	**25.3**	<10.0	<10.0	<10.0	<10.0	**24.7**	<10.0	<10.0	<10.0
Benzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Di-isopropyl ether (DIPE) (ug/L)	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Ethylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Isopropylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
MTBE (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Naphthalene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
n-Butylbenzene (ug/L)	<5.00	<5.00	<1.00	<1.00	<1.00	<5.00	<5.00	<1.00	<1.00	<1.00
n-Propylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
sec-Butylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Styrene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
tert-Butylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Toluene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Total BTEX (ug/L)	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00
Total Xylenes (ug/L)	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00
1,2-Dibromoethane (EDB) (ug/L)[3]	<0.01	<0.010	<0.010	<0.010	<0.010	<0.01	<0.010	<0.010	<0.010	<0.010

Table 2
Crozier Abandoned Tank Site
Current and Historical Groundwater Analytical Data

Sample ID	121714001-5	31015001-8	12015001-12	101216001-11	101317001-11	121714001-6	31015001-14	12015001-16	101216001-15	101317001-15	21318001-7
Sample Location	MW-9					MW-10					
Date	12/16/14	3/10/15	1/20/16	10/12/16	10/13/17	12/16/14	3/10/15	1/20/16	10/12/16	10/13/17	2/13/18
TPH GRO (mg/L)[1]	<0.10	<0.10	<0.10	<0.10	<0.10	**17.5**	**51.9**	**53.1**	**39.5**	**43.4**	**41.5**
1,1,2-Trichloroethane (ug/L)[2]	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<5.00	<5.00	<5.00	<5.00	<5.0
1,2,4-Trimethylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	**638**	**1940**	**1970**	**1,750**	**1,570**	**1,380**
1,2-Dichloroethane (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	**16.5**	**18.6**	**15.9**	**19.0**	**15.4**	**14.0**
1,3,5-Trimethylbenzene	<1.00	<1.00	<1.00	<1.00	<1.00	**167**	**610**	**621**	**653**	**508**	**439**
2-Butanone (MEK) (ug/L)	<10.0	**23.8**	<5.00	<10.0	<10.0	**277**	**719**	**645**	**657**	**640**	**730**
2-Hexanone (MBK) (ug/L)	<10.0	<10.0	<5.00	<5.00	<5.00	**63.4**	**99.2**	**93**	**96.8**	**95.4**	**133.0**
4-Isopropyltoluene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.0
4-Methyl-2-pentanone (ug/L)	<10.0	<10.0	<5.00	<5.00	<5.00	**68.1**	**98.5**	**87.5**	**82.2**	**82.5**	**106.0**
Acetone (ug/L)	<10.0	**39.1**	<10.0	<10.0	<10.0	<50.0	<50.0	<50.0	<50.0	<50.0	**1,240**
Benzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	**2,580**	**4,740**	**3,540**	**3,230**	**3,180**	**3,990**
Di-isopropyl ether (DIPE) (ug/L)	<5.00	<5.00	<5.00	<5.00	<5.00	**166**	**230**	**163**	**195**	**141**	**148**
Ethylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	**842**	**2460**	**2370**	**2,000**	**2,310**	**1,770**
Isopropylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	**21**	**62.1**	**53.9**	**51.3**	**52.5**	**45.8**
MTBE (ug/L)	**2.37**	**1.89**	**1.58**	<1.00	<1.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.0
Naphthalene (ug/L)	<1.00	**9.22**	<1.00	<1.00	<1.00	**129**	**468**	**354**	**317**	**318**	**332**
n-Butylbenzene (ug/L)	<5.00	<5.00	<1.00	<1.00	<1.00	<5.00	16.7	10.4	**16.8**	**13.4**	**10.0**
n-Propylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	**83.1**	**263**	**195**	**249**	**204**	**200**
sec-Butylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<5.00	<5.00	<5.00	<5.00	**7.63**	**8.40**
Styrene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	**17.2**	**85.7**	**80**	**57.7**	**60.5**	**52.6**
tert-Butylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.0
Toluene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	**7,530**	**19,300**	**19,100**	**14,600**	**13,800**	**15,300**
Total BTEX (ug/L)	<6.00	<6.00	<6.00	<6.00	<6.00	**16,372**	**41,700**	**41,310**	**31,630**	**33,590**	**32,560**
Total Xylenes (ug/L)	<3.00	<3.00	<3.00	<3.00	<3.00	**5,420**	**15,200**	**16,300**	**11,800**	**14,300**	**11,500**
1,2-Dibromoethane (EDB) (ug/L)[3]	<0.01	<0.010	<0.010	<0.010	<0.010	**20**	**46.6**	**16.1**	**17.3**	**29.9**	**33.7**

Table 2
Crozier Abandoned Tank Site
Current and Historical Groundwater Analytical Data

Sample ID	121714001-7	31015001-15	12015001-15	101216001-14	101317001-14	21318001-6	121714001-8	31015001-18	12015001-18	101216001-17	101317001-17	21318001-9
Sample Location	MW-11						MW-12					
Date	12/16/14	3/10/15	1/20/16	10/12/16	10/13/17	2/13/18	12/16/14	3/10/15	1/20/16	10/12/16	10/13/17	2/13/18
TPH GRO (mg/L)[1]	39.8	53.3	56.1	37.9	49.5	39.4	118	107	117	145	145	106
1,1,2-Trichloroethane (ug/L)[2]	<1.00	<5.00	<5.00	<5.00	<5.00	<5.0	<1.00	<5.00	<5.00	<5.00	<5.00	<5.0
1,2,4-Trimethylbenzene (ug/L)	1,340	1,870	1,510	1,700	1,510	1,220	2,310	2,800	3,550	3,330	4,510	3,060
1,2-Dichloroethane (ug/L)	702	543	425	340	530	394	275	8.92	<5.00	7.50	7.68	9.25
1,3,5-Trimethylbenzene	439	689	602	682	542	476	808	787	1,010	1,010	1,280	790
2-Butanone (MEK) (ug/L)	158	135	<25.0	179	<50.0	<50.0	283	216	<25.0	<50.0	195	61.8
2-Hexanone (MBK) (ug/L)	<50.0	<50.0	<25.0	29.7	28.3	30.6	119	<50.0	30.9	44.0	47.5	40.8
4-Isopropyltoluene (ug/L)	<5.00	<5.00	<5.00	<5.00	7.16	<5.0	<5.00	<5.00	<5.00	<5.00	11.4	<5.0
4-Methyl-2-pentanone (ug/L)	<50.0	<50.0	<25.0	26.0	<25.0	31.4	<50.0	<50.0	<25.0	<25.0	<25.0	25.4
Acetone (ug/L)	392	<50.0	<50.0	<50.0	<50.0	<50.0	<50.0	<50.0	<50.0	<50.0	<50.0	<50.0
Benzene (ug/L)	7,210	7,080	5,190	3,600	6,240	5,690	30,500	17,200	11,300	4,080	6,210	13,900
Di-isopropyl ether (DIPE) (ug/L)	5,680	5,100	3,590	3,270	4,720	4,540	2,800	103	56.4	86.6	69.9	103
Ethylbenzene (ug/L)	1,330	1,750	1,870	1,670	1,510	1,190	4,030	4,040	4,620	3,100	4,440	3,490
Isopropylbenzene (ug/L)	31.5	45.3	42.3	44.8	37.7	29.9	86.1	86.8	110	88.9	130	88.9
MTBE (ug/L)	<5.00	<5.00	<5.00	<5.00	<5.00	<5.0	<5.00	<5.00	<5.00	<5.00	<5.00	<5.0
Naphthalene (ug/L)	205	418	398	396	356	330	623	793	885	722	798	669
n-Butylbenzene (ug/L)	<5.00	13.4	11.1	17.2	9.34	7.10	<5.00	<5.00	50.0	33.1	89.1	23.4
n-Propylbenzene (ug/L)	117	162	148	214	123	105	386	376	438	450	532	379
sec-Butylbenzene (ug/L)	5.93	<5.00	<5.00	9.81	6.97	6.45	12.6	<5.00	<5.00	<5.00	33.6	6,580
Styrene (ug/L)	13.6	25.2	32.8	32.8	28	19.8	498	425	482	214	401	398
tert-Butylbenzene (ug/L)	<5.00	<5.00	<5.00	<5.00	<5.00	<5.0	<5.00	<5.00	<5.00	<5.00	<5.00	<5.0
Toluene (ug/L)	13,700	17,000	15,800	13,000	15,900	14,100	46,800	41,500	43,000	20,200	35,600	50,800
Total BTEX (ug/L)	30,410	37,730	32,820	30,370	35,950	29,720	105,030	86,140	89,920	46,780	73,950	89,790
Total Xylenes (ug/L)	8,170	11,900	9,960	12,100	12,300	8,740	23,700	23,400	31,000	19,400	27,700	21,600
1,2-Dibromoethane (EDB) (ug/L)[3]	52.2	72.4	28.5	36.7	30.5	36.2	356	150	30.2	9.33	31.6	77.5

Table 2
Crozier Abandoned Tank Site
Current and Historical Groundwater Analytical Data

Sample ID	121714001-9	31015001-12	12015001-17	101216001-16	101317001-16	21318001-8	31015001-13	12015001-19	101216001-18	101317001-18	21318001-10
Sample Location	MW-13						MW-14				
Date	12/16/14	3/10/15	1/20/16	10/12/16	10/13/17	2/13/18	3/10/15	1/20/16	10/12/16	10/13/17	2/13/18
TPH GRO (mg/L)[1]	7.5	18.6	14.9	6.55	14.3	12.2	241	Not sampled due to presence of free product	115	121	119
1,1,2-Trichloroethane (ug/L)[2]	<1.00	<5.00	<1.00	<1.00	<1.00	<5.00	<5.00		<5.00	<5.00	<5.00
1,2,4-Trimethylbenzene (ug/L)	807	1480	1,270	391	1,170	833	2,550		2,270	2,670	2,520
1,2-Dichloroethane (ug/L)	72.8	96	51.0	21.0	17.1	12.6	382		156	54.1	77.3
1,3,5-Trimethylbenzene	310	509	460	197	353	287	735		765	632	1,030
2-Butanone (MEK) (ug/L)	<50.0	<50.0	<5.00	<10.0	<10.0	<50.0	<50.0		492	530	<50.0
2-Hexanone (MBK) (ug/L)	78.8	69.1	48.4	19.2	36.5	<25.0	111		118	123	148
4-Isopropyltoluene (ug/L)	<5.00	<5.00	2.42	2.02	2.05	<5.0	<5.00		<5.00	<5.00	8.55
4-Methyl-2-pentanone (ug/L)	69	60.1	58.4	34	54.6	51.9	63.7		77.8	77.7	90.9
Acetone (ug/L)	<50.0	<50.0	<10.0	<10.0	<10.0	<50.0	<50.0		<50.0	<50.0	<50.0
Benzene (ug/L)	286	588	306	117	255	276	25,900		19,000	21,500	19,400
Di-isopropyl ether (DIPE) (ug/L)	870	1250	703	325	283	209	4,550		1,580	942	1,170
Ethylbenzene (ug/L)	342	906	419	128	554	540	3,810		3,660	3,800	3,420
Isopropylbenzene (ug/L)	22.1	46	36.3	10.9	28.9	27.1	81.6		79.5	73.4	113.0
MTBE (ug/L)	<5.00	<5.00	<1.00	<1.00	<1.00	<5.0	<5.00		<5.00	<5.00	<5.0
Naphthalene (ug/L)	44.1	135	75.8	12.1	72.9	114.0	600		652	519	719
n-Butylbenzene (ug/L)	<5.00	16.7	15.0	13.2	11.1	8.2	27.5		21.4	19.4	56.2
n-Propylbenzene (ug/L)	113	205	154	68.6	124	128	346		349	272	495
sec-Butylbenzene (ug/L)	7.11	9.39	<1.00	<1.00	5.61	<5.0	<5.00		<5.00	10.7	26.2
Styrene (ug/L)	<5.00	5.24	4.68	<1.00	6.35	9.10	341		307	303	345
tert-Butylbenzene (ug/L)	<5.00	<5.00	<1.00	<1.00	<1.00	<5.0	<5.00		<5.00	<5.00	<5.0
Toluene (ug/L)	980	2820	1,200	312	1,550	1,720	47,600		45,000	47,000	50,200
Total BTEX (ug/L)	3,918	9,874	4,705	1,374	5,989	5,766	99,810		88,660	95,000	93,520
Total Xylenes (ug/L)	2,310	5,560	2,780	817	3,630	3,230	22,500		21,000	22,700	20,500
1,2-Dibromoethane (EDB) (ug/L)[3]	3.38	9.64	1.41	2.41	2.11	2.50	837		327	383	199

Table 2
Crozier Abandoned Tank Site
Current and Historical Groundwater Analytical Data

Sample ID	31015001-4	12015001-11	101216001-10	101317001-10	31015001-5	12015001-10	101216001-9	101317001-9
Sample Location	MW-15				MW-16			
Date	3/10/15	1/20/16	10/12/16	10/13/17	3/10/15	1/20/16	10/12/16	10/13/17
TPH GRO (mg/L)[1]	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10	<0.10
1,1,2-Trichloroethane (ug/L)[2]	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2,4-Trimethylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2-Dichloroethane (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,3,5-Trimethylbenzene	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
2-Butanone (MEK) (ug/L)	**37.3**	<5.00	<10.0	<10.0	**18.5**	<5.00	<10.0	<10.0
2-Hexanone (MBK) (ug/L)	<10.0	<5.00	<5.00	<5.00	<10.0	<5.00	<5.00	<5.00
4-Isopropyltoluene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
4-Methyl-2-pentanone (ug/L)	<10.0	<5.00	<5.00	<5.00	<10.0	<5.00	<5.00	<5.00
Acetone (ug/L)	**19.6**	<10.0	<10.0	<10.0	**33.5**	<10.0	<10.0	<10.0
Benzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Di-isopropyl ether (DIPE) (ug/L)	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Ethylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Isopropylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
MTBE (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Naphthalene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
n-Butylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
n-Propylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
sec-Butylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Styrene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
tert-Butylbenzene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Toluene (ug/L)	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Total BTEX (ug/L)	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00	<6.00
Total Xylenes (ug/L)	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00	<3.00
1,2-Dibromoethane (EDB) (ug/L)[3]	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010

[1] Total petroleum hydrocarbons (TPH) gasoline range organics (GRO) analyzed via method 8015C and reported in milligrams per liter (mg/L).

[2] Volatile organic compounds (VOCs) analyzed via method 8260B and reported in micrograms per liter (ug/L).

[3] 1,2-Dibromoethane (EDB) analyzed via method 8011 and reported in micrograms per liter (ug/L).

Table 3
Crozier Abandoned Tank Site
Properties Identified for Connection to Municipal Water System

Property Owner	Address	Tax Map Number	Supply Well Status
Ginger P. Garrison	1462 Old Oaks Lane	55-15-0-21-0	At Risk
William P. Hill III	1463 Old Oaks Lane	55-15-0-1-0	At Risk
Robert C. and Jacqueline W. Morsink	1470 Old Oaks Lane	55-15-0-20-0	At Risk
Christopher E. and Charlotte J. Flynn	1475 Old Oaks Lane	55-15-0-2-0	Impacted (CFU installed)
David N. and Robin A. Branch	1476 Old Oaks Lane	55-15-0-19-0	Impacted (CFU installed)
Benjamin F. and Deborah O. Fahrner	1482 Old Oaks Lane	55-15-0-18-0	Impacted (CFU installed)
Christopher J. and Carrie M. Monger	1489 Old Oaks Lane	55-15-0-3-0	Impacted (CFU installed)
David P. and Lorie A. Williams	1490 Old Oaks Lane	55-15-0-17-0	Impacted (CFU installed)
Donald E. and Carolyn W. Sharpe	1498 Old Oaks Lane	55-15-0-16-0	Impacted (CFU installed)
Gregory W. and Helen G. George	1501 Old Oaks Lane	55-15-0-4-0	At Risk
Robert S. and Pamela R. Steelman	1504 Old Oaks Lane	55-15-0-15-0	At Risk
Susan K. Bechter Trustee	1510 Old Oaks Lane	55-15-0-13-0	At Risk
Carol G. King	1518 Old Oaks Lane	55-15-0-12-0	At Risk
Roland W. and Norma B. Phillips	1529 Old Oaks Lane	55-15-0-5-0	Impacted (CFU installed)
Jacob S. Carter	1534 Old Oaks Lane	55-15-0-10-0	At Risk
Thomas M. Haddon	1537 Old Oaks Lane	55-15-0-6-0	Impacted (CFU installed)
Edgar F. Simmons	1543 Old Oaks Lane	55-15-0-7-0	At Risk
Martin F. and Sara A. Porter	1500 River Road West	55-15-0-8-0	At Risk
Dustin Plummer and Jordan Liesfeld	1235 Cardwell Road	55-1-0-36-D	At Risk
Christopher and Pamela Grubb	1241 Cardwell Road	55-1-0-36-C	At Risk
Rose M. Marmarou	1261 Cardwell Road	55-1-0-37-0	At Risk
Lester R. and Jean S. Bryant	991 Briesmaster Way	55-1-0-93-B	At Risk

Appendix A

Public Notice

PUBLIC NOTICE

PROPOSAL TO CLEANUP
AN UNDERGROUND STORAGE TANK SITE

There has been a confirmed release of petroleum from an underground storage tank system located at the site listed below:

Crozier Abandoned Tank Site
1537 River Road West
Crozier, Goochland County, Virginia 23039

The Commonwealth of Virginia Department of Environmental Quality (DEQ) is requiring the development of a Corrective Action Plan (CAP) to address the cleanup of petroleum at the site. Should you have any questions regarding the cleanup, please contact:

Mr. Mark Ryland
Apex Companies, LLC
203 Wylderose Court
Midlothian, Virginia 23113
(804) 897-2718

The CAP was submitted to the **Piedmont Regional Office** of the DEQ by **August 16, 2018**. If you would like to review or discuss the proposed CAP with the staff of the DEQ, please feel free to contact **Mr. John Spangler** at **(804) 527-5004** after the date of the CAP submittal. The DEQ Piedmont Regional Office will consider written comments regarding the proposed CAP for 30 days from the date of this public notice and may decide to hold a public meeting if there is significant public interest. Written comments should be submitted to the DEQ at the address listed below. The DEQ requests that all written comments reference the tracking number for this case: **PC# 2015-4105**.

Commonwealth of Virginia
Department of Environmental Quality
Storage Tank Program
Piedmont Regional Office
4949-A Cox Road
Glen Allen, Virginia 23060