TRANSMITTAL LETTER

ARCADIS Design & Consultancy for natural and built assets

To:
Brandon Alger
Michigan Department of
Environmental Quality
27700 Donald Court
Warren, MI 48092

From:
Kris Hinskey

Arcadis U.S., Inc.
28550 Cabot Drive
Suite 500
Novi
Michigan 48377
Tel 248 994 2240
Fax 248 994 2241

Copies:

Date:
October 31, 2018

Subject:
Livonia Transmission Plant
Q3 2018 Progress Report

Arcadis Project No.:
MI001454.0007

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FORD MOTOR COMPANY

QUARTERLY PROGRESS REPORT - 3Q 2018

Livonia Transmission Plant

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October 31, 2018

QUARTERLY PROGRESS REPORT - 3Q 2018

Livonia Transmission Plant

Angela DeGrandis
Task Manager

Gustan Taylor
Associate Project Manager

Kris Hinskey
Certified Project Manager

Prepared for:

Ford Motor Company
Environmental Quality Office
Fairlane Plaza North
290 Town Center Drive, Suite 800
Dearborn, Michigan 48126

Prepared by:

Arcadis of Michigan, LLC
28550 Cabot Drive
Suite 500
Novi
Michigan 48377
Tel 248 994 2240
Fax 248 994 2241

Our Ref.:

MI001454.0007

Date:

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3Q 2018: Activities

On-Site

1. Groundwater Sampling
2. Hydraulic Control System
   - ✓ Operating as Designed Since March 15, 2017
   - ✓ Discharge Compliance
3. Sub-Slab Depressurization System
   - ✓ Operating as Designed Since August 13, 2018
   - ✓ Discharge Compliance
4. Response Activities
   - Vapor Intrusion Investigation
   - Source Area Investigation

Off-Site

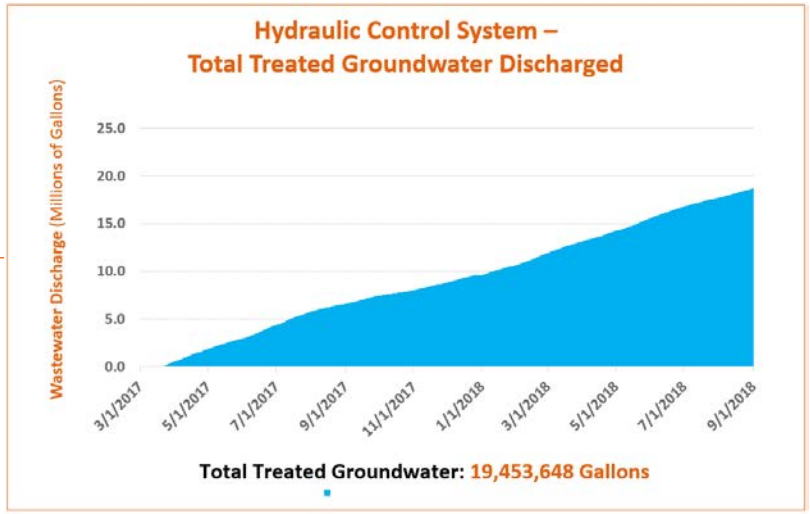
1. Groundwater Sampling
2. Soil Gas Sampling
3. Response Activities
   - Vapor Intrusion Investigation

Total On-Site Routine Samples

Period	Groundwater / Water	Soil/ Sediment	Soil Gas
3Q 2018	68	0	0
Total since Oct. 2015	743	328	152

Total Off-Site Routine Samples

Period	Groundwater	Soil Gas
3Q 2018	20	31
Total since Oct. 2015	391	184



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Key Dates

Document Submittal

Document	Date Submitted	Status
GW Work Plan	4/20/2017	Received
Off-Site VI Work Plan	4/21/2017	Received
Site Specific VIAC	8/9/2017	Approved
CSM	8/25/2017	Approved
QAPPs	8/25/2017	Received
HASP	8/25/2017	Received
Target Detection Limit Request RespAP	11/1717	Approved
3Q 2017 Progress Report	11/22/17	Received
Response to MDEQ Comments for the Conceptual Site Model	12/12/17	Received
Remedial Investigation RespAP	12/13/17	MDEQ Disapproved on March 9, 2018
4Q 2017 Progress Report	1/30/18	Received
RespAP Response to Comments Letter	4/13/18	Received
VI RespAP 6.6(b)(i) Revised	4/13/18	Approved with Modifications
RI RespAP 6.7 Revised	4/13/18	Approved with Modifications
1Q 2018 Progress Report	4/30/18	Received
Response to MDEQ Request for CSM	July 20, 2018	Received
2Q 2018 Progress Report	July 31, 2018	Received
Public Outreach Plan	August 7, 2018	Received

Upcoming Dates

2018

October 22 On and Off-Site 4Q 2018 Groundwater Sampling

November 5 Off-Site 4Q 2018 Soil Gas Sampling

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APPENDICES

Appendix A - On-Site Groundwater Field Sampling Logs

Appendix B - Off-Site Groundwater Field Sampling Logs

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ACRONYMS AND ABBREVIATIONS

1,1-DCE	1,1-dichloroethene
1,4-d	1,4-dioxane
1Q 2018	first quarter of 2018
2Q 2018	second quarter of 2018
3Q 2018	third quarter of 2018
4Q 2017	fourth quarter of 2017
AOC	Area of Concern
ATNPC	Automatic Transmission New Product Center
CD	Consent Decree
Cis-1,2-DCE	cis-1,2-dichloroethene
COC	constituent of concern
CSM	conceptual site model
DO	dissolved oxygen
GLWA	Great Lakes Water Authority
gpd	gallons per day
gpm	gallons per minute
GWIC	groundwater in contact
HCS	hydraulic control system
LTP	Livonia Transmission Plant
µg/L	microgram per liter
MDEQ	Michigan Department of Environmental Quality
mg/L	milligram per liter
mL	milliliter
mL/min	milliliter per minute
ORP	oxidation-reduction potential
PCE	tetrachloroethene
PLC	programmable logic controller
RespAP	Remedial Investigation Response Activity
RI	Remedial Investigation
RIASL	Residential Interim Action Screening Level
RRD	Remediation and Redevelopment Division
SSDS	sub-slab depressurization system
SVMP	soil vapor monitoring point
SVOC	semi-volatile organic compound
TCE	trichloroethene
TDL	Target Detection Limit

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trans-1,2-DCE	trans-1,2-dichloroethene
TWM	Total Waste Manager
USEPA	United States Environmental Protection Agency
VC	vinyl chloride
VI	vapor intrusion
VOC	volatile organic compound
WWTP	Wastewater Pre-Treatment Plant

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1 INTRODUCTION

Purpose of This Report

Arcadis of Michigan LLC (Arcadis), on behalf of Ford Motor Company (Ford) has prepared this Progress Report (report) for the Livonia Transmission Plant (LTP) property (the site). This document was produced in compliance with a Consent Decree (CD) filed by the Michigan Department of Environmental Quality (MDEQ) on July 27, 2017 (No: 2:1712372-GAD-RSW). The purpose of this progress report is to summarize continued response activities completed voluntarily by Ford, both at the site and the area east of the site, since submittal of the conceptual site model (CSM) to the MDEQ on August 25, 2017, the initial Remedial Investigation Response Activity Plan (RespAP), submitted on December 13, 2017, and the revised RespAPs submitted to the MDEQ on April 13, 2018. This progress report includes activities completed from July 1 through September 30, 2018 (3Q 2018). Activities described in this 3Q 2018 report include:

- On- and off-site groundwater sampling
- Off-site soil gas sampling
- Hydraulic control system operation, evaluation, and optimization
- Sub-slab depressurization system

This quarterly report primarily focuses on the seven constituents of concern (COCs) for the site including: 1,1-dichloroethene (1,1-DCE), cis-1,2-dichloroethene (cis-1,2-DCE), trans-1,2-dichloroethene, (trans-1,2-DCE), tetrachloroethene (PCE), trichloroethene (TCE), vinyl chloride (VC), and 1,4-dioxane.

Groundwater analytical results continue to be stable for both on-site and off-site samples, and soil gas samples collected from the soil vapor monitoring points (SVMPs) in the residential neighborhood continue to show no exceedances of the Recommended Interim Action Screening Levels (RIASLs).

Background

The LTP has been active in manufacturing in some capacity since the 1950s. The site is located at 36200 Plymouth Road, Livonia, Michigan (**Figure 1**) and occupies 178 acres of land. The LTP building covers approximately 3 million square feet. The area surrounding the site includes light industrial, commercial, and residential properties. For the purposes of this report, data are presented based on their location as either on-site or off-site (**Figure 2**). On-site area of concern (AOC) locations include all areas within the site boundary including the LTP, Test Track, Waste Water Pre-Treatment Plant (WWTP), Automatic Transmission Plant New Product Center (ATNPC), associated outbuildings, and the Plymouth Road right-of-way. Off-site AOC locations include commercial and residential properties located east of the site, from Belden Court west to Stark Road, and from Plymouth Road north to the railroad right-of-way (**Figure 2**).

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2 SUMMARY OF RESPONSE ACTIVITIES

The following table summarizes all response activities at the AOC completed during 3Q 2018. Refer to the subsequent sections for further detail on each respective event and associated tables and figures.

Date	Activity	Tables	Figures
August 2018	On-Site Groundwater Sampling	1, 2	3, 4, 5, 6, 7, 8
August 2018	Off-Site Groundwater Sampling	3, 4	3, 9, 10, 11
August 2018	Off-Site Residential Soil Gas Sampling	5, 6, 7	12, 13, 14, 15
July through September 2018	Hydraulic Control System Monitoring	8	2
August through September 2018	Sub-Slab Depressurization System Monitoring	NA	2

Additional response activities completed in 3rd quarter 2018 include on-site vapor intrusion investigation activities, on-site source area investigation activities and the off-site vapor intrusion investigation as outlined in the *Response Activity Plan - Vapor Intrusion Evaluation* and *Response Activity Plan – Remedial Investigation* both dated Aprils 13, 2018. These activities will be summarized as part of future submittals to the MDEQ.

On-Site Groundwater Sampling

Arcadis completed on-site gauging on August 16, 2018, which included 79 monitoring wells (**Figure 2**). Out of the 79 total monitoring wells on-site, 78 were successfully gauged. The remaining monitoring well (MW-27) could not be located at the time of the gauging. Each monitoring well was gauged from the top of casing using an electronic water level meter to within 0.01 foot. A summary of the on-site 3Q 2018 groundwater elevations is included on the on-site quarterly groundwater elevation summary table (**Table 1)**. Groundwater elevation contours and apparent groundwater flow for the 3Q 2018 are provided on **Figure 3**.

On-site groundwater sampling was completed from August 6 through 14, 2018. Groundwater was purged from the well at a low flow rate (100 to 300 milliliters per minute [mL/min]) until field parameters (conductivity, pH, turbidity, temperature, dissolved oxygen [DO], and oxygen reduction potential [ORP]) stabilized. Once field parameters stabilized, groundwater samples were collected into laboratory supplied bottles. On-site groundwater field sampling logs are provided for reference in **Appendix A**.

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A total of 78 groundwater samples were collected and submitted on ice under chain-of-custody seal to TestAmerica Laboratories in Canton, Ohio (TestAmerica), including four duplicate samples and six trip blanks. All groundwater samples were submitted for analysis of volatile organic compounds (VOCs) via United States Environmental Protection Agency (USEPA) Method 8260B and 1,4-dioxane via USEPA Method 8260B-SIM on a standard turnaround time of 10 business days. One groundwater sample was also submitted for the analysis of dissolved methane via United States Environmental Protection Agency (USEPA) Method RSK-175. The groundwater analytical results are discussed below.

Off-Site Groundwater Sampling

Arcadis completed off-site gauging on August 16, 2018, which included 20 monitoring wells (MW-72 through MW-87, illustrated on **Figure 2**). Each monitoring well was gauged from the top of casing using an electronic water level meter accurate to within 0.01 foot. A summary of the 3Q 2018 groundwater elevations is included on the off-site quarterly groundwater elevation summary table (**Table 3)**. Groundwater elevation contours and apparent groundwater flow are provided on **Figure 3**.

Off-site groundwater sampling was completed from August 6 through 10, 2018. Groundwater was purged from the well at a low flow rate (100 to 300 mL/min) until field parameters (conductivity, pH, turbidity, temperature, DO, and ORP) had stabilized. Once field parameters were stable, groundwater samples were collected into laboratory supplied bottles. Off-site groundwater field sampling logs are provided for reference in **Appendix B**.

A total of 22 groundwater samples were collected and submitted on ice under chain-of-custody seal to TestAmerica, including one duplicate sample and one trip blank. All groundwater samples were submitted for analysis of the specific list of VOCs via USEPA Method 8260B and 1,4-dioxane via USEPA Method 8260B-SIM based on a standard turnaround time of 10 business days. The groundwater analytical results are discussed below.

Off-Site Soil Gas Sampling

Arcadis completed off-site soil gas sampling between August 21 and 24, 2018. Of the 43 total soil gas monitoring points installed east of the site within the City of Livonia right of way, 31 soil gas samples were collected during the 3Q 2018 sampling event (**Figure 2**). SVMP-29 through SVMP-37 are located on residential properties and were not sampled in 3Q 2018, and SVMP-11 (installed in the City right-of-way) was abandoned at the request of the adjacent property owner. The next quarterly sampling event is scheduled for November 2018, and sampling will be attempted at all SVMPs except for SVMP-11 which was abandoned and SVMP-29 through SVMP-37 which are located on private property.

The 31 SVMPs along with two duplicate samples collected in August 2018 were collected using 1-liter summa canisters and 20-minute flow controllers. Each location was purged of approximately 120 milliliters (mL) of air before sampling.

Several technical quality controls were implemented to ensure that representative soil gas samples were collected from each sample point as described below.

- Tracer gas testing has been conducted during six rounds of soil gas sampling using a helium tracer at each location before sampling. Methods for tracer testing were the same as those presented in MDEQ VI Guidance Appendix F and in line with industry-accepted standards. As discussed in the

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MDEQ VI Guidance, a tracer gas can be used to verify that soil gas samples are from the installed point and not from leaks in the sampling train. No unacceptable helium leak test results were noted during the six rounds of soil gas sample collection through August 2018. Samples were deemed acceptable, as all exhibited concentrations of helium in purged soil gas less than 10% of the initial shroud concentration of helium, as presented in the MDEQ vapor intrusion (VI) guidance. Tracer gas testing results are presented in **Table 5**.

- Very small screened intervals (1-inch screen within a 3-inch sand pack) were installed to allow for a thicker bentonite seal to the ground surface at each location.
- Soil gas sampling has been conducted very slowly (i.e., 20-minute sample using a 1-liter canister) to avoid short-circuiting. This flow rate is four times slower than the maximum 200 mL/min included in the 2013 MDEQ VI Guidance. MDEQ suggests that samples be collected at a flow rate at or below 200 mL/min "to minimize the potential for vacuum extraction of contaminants from the soil phase."
- Carbon dioxide and oxygen have been measured from each sample point directly after each round of sample collection. Concentrations of oxygen are slightly depressed from atmospheric conditions (i.e., 1 to 2% below atmospheric), while concentrations of carbon dioxide are slightly elevated (i.e., 3 to 6%). This is as expected due to the influence of microbial respiration in the vadose zone, which consumes oxygen and produces carbon dioxide (USEPA 2015[1]). Carbon dioxide and oxygen concentrations from the SVMPs are presented in **Table 6**.

Ambient air temperature, percent humidity, and barometric pressure were recorded during the field event and are presented on **Appendix C**.

A total of 33 soil gas samples, including two duplicate samples, were submitted under chain-of-custody protocols to Eurofins AirToxics Laboratory located in Folsom, California (Eurofins) for analysis of the specific list of VOCs (1,1-DCE, cis-1,2-DCE, trans-1,2-DCE, PCE, TCE, VC, and 1,4-dioxane) via USEPA Method TO-15 based on a standard turnaround time of 10 business days. Soil gas analytical results are summarized in **Table 7,** and field sampling logs are provided for reference in **Appendix C**. The off-site soil gas results are discussed below.

Hydraulic Control System

System Overview

The hydraulic control system (HCS) was installed to intercept groundwater and mitigate the potential for impacted groundwater to continue migrating east of the HCS. HCS performance is monitored and evaluated in general accordance with the USEPA guidance – A Systematic Approach for Evaluation of Capture Zone at Pump and Treat Systems (USEPA 2008). Ford began operation of the HCS on March 15, 2017.

The system is designed to extract groundwater via four horizontal wells (ESD-1, ESD-2, ESD-3, and ESD-4; see **Figure 2**), each equipped with a groundwater extraction pump. The extraction well screens are 400 to 600 feet long; the combined length of the four wells extends across approximately 2,000 linear

[1] United States Environmental Protection Agency (USEPA). 2015. Technical Guide for Addressing Petroleum Vapor Intrusion at Leaking Underground Storage Tank Sites. June.

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feet on a line approximately perpendicular to groundwater flow. Extracted groundwater is pumped to an above-grade treatment system, where it is treated by bag filters, an air stripper, and granular-activated carbon filters, before being discharged to the sanitary sewer under a permit with the Great Lakes Water Authority (GLWA). Details regarding design and operation of the system are provided in the Remedial System Operation and Maintenance Manual dated June 29, 2017, and in the CSM dated August 25, 2017.

HCS equipment is operated by a programmable logic controller (PLC) unit that allows the system to function without operator supervision. The HCS operates each horizontal well by extracting groundwater to achieve the maximum drawdown available within each pumping well without dewatering the horizontal screen. Pumping in each well ceases when target drawdown is achieved and resumes when the water level begins to rebound.

In September 2018, Arcadis contracted Directed Technologies Drilling (DTD) to complete maintenance activities on the HCS, which included jetting three of the four horizontal wells to clear sediment and biofouling that may have accumulated since start up. To minimize system down time ESD wells were shut down two at a time and brought back into operation before moving onto the next set of wells. No more than two pumps were down at one time due to jetting at any given time during the maintenance procedure. A summary of the maintenance activities will be included as part of the Fourth Quarter 2018 Progress Report.

Interim Sub-Slab Depressurization System

In response to the presence of VOCs beneath the LTP building, Ford has designed, installed and begun operation of an interim sub-slab depressurization system (SSDS). The goal of the interim mitigation system is to reduce the potential for sub-slab soil vapor to intrude into the indoor air. Construction of the SSDS began in September 2017 and the system started extracting and treating soil vapor on August 14, 2018.

The system is designed to extract soil vapor via nine suction pits located in the LTP building (**Figure 2**). The suction pits are installed just beneath the building slab to induce a sub-slab vacuum and reduce the potential for sub-slab soil vapor migrate into the indoor air. Each suction pit is connected to the conveyance piping network to transmit extracted soil vapor to the system building where it is treated via a catalytic oxidizer before being discharged to the atmosphere pursuant to the Rule 290 air permitting exemption of the Michigan Air Pollution Control Rules.

3 SUMMARY OF RESPONSE ACTIVITY RESULTS

On-Site Groundwater Sampling

The results of the on-site monitoring well gauging indicate an apparent groundwater flow direction from west to east, locally influenced by the HCS. On-site groundwater elevation contours are presented on **Figure 3**. Additional monitoring wells are recommended to enable a better resolution of the hydraulic gradient. Details regarding HCS performance are provided below.

The on-site monitoring well groundwater results are compared to Michigan Part 201 Non-residential Generic Cleanup Criteria (December 2013). Comprehensive analytical results are summarized in **Table 2**.

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Compound concentrations of COCs exceeding Part 201 Residential Criteria from the 3Q 2018 sampling event include cis-1,2-DCE, trans-1,2-DCE, TCE, VC, and 1,4-D. Figures summarizing the exceedances of cis-1,2-DCE, trans-1,2-DCE, TCE, VC, and 1,4-D from the four most recent quarters of data (November 2017, February 2018, May 2018, and August 2018) are provided on **Figures 4 through 8**, respectively. All other site-specific compounds (1,1-DCE and PCE) were either not detected at concentrations above the reporting limits or were detected at concentrations below Part 201 Residential Criteria.

Off-Site Groundwater Sampling

The results of the off-site monitoring well gauging indicate an apparent groundwater flow direction from west to east. Off-site groundwater elevation contours are included on **Figure 3.**

The off-site monitoring well groundwater results are compared to the Part 201 Residential Generic Cleanup Criteria (December 2013) and the site-specific groundwater VI screening levels included as part of the CD, which became effective on July 27, 2017. However, the site-specific screening levels provided for TCE and VC where groundwater may be in contact (GWIC) with a structure are below typical target detection limits (TDLs) for these compounds. Therefore, Ford requested the use of the MDEQ Remediation and Redevelopment Division (RRD) TDLs for TCE and VC of 1.0 microgram per liter (µg/L) as the groundwater screening level protective of VI at residential structures where there is potential for GWIC on November 17, 2017. The MDEQ approved the use of the TDLs for TCE and VC on December 20, 2017.

Comprehensive off-site groundwater analytical results are summarized in **Table 4**. Only VC was detected in off-site monitoring wells at concentrations above the 1.0 µg/L TDL from the 3Q 2018 sampling event. The results for 1,4-D, TCE and VC from the four most recent quarters of data (November 2017, February 2018, May 2018, and August 2018) are provided on **Figures 9, 10, and 11**, respectively. All other site-specific compounds (1,1-DCE, cis-DCE, trans-DCE, and PCE) were either not detected at concentrations above the reporting limits or were detected at concentrations below respective Part 201 Residential Criterion.

Off-Site Soil Gas Monitoring

The soil gas analytical results from 3Q 2018 sampling are compared to site-specific RIASLs for residential properties provided by the MDEQ. Comprehensive analytical results are summarized in **Table 7.** There were no off-site exceedances of the RIASLs for any of the site COCs from the 3Q 2018 sampling event. Compound-specific results for detections of cis-DCE, PCE, TCE, and VC from the four most recent quarters of data (November 2017, February 2018, May 2018, and August 2018) are provided on **Figures 12, 13, 14** and **15,** respectively. All other site-specific compounds (1,1-DCE, trans-DCE, and 1,4-dioxane) were not detected at concentrations above laboratory reporting limits; therefore, no figures were produced for these COCs.

Through 3Q 2018, six rounds of soil gas sampling (June 2017, September 2017, November 2017, February 2018, May 2018, and August 2018) have been completed from the SVMP locations since the inception of the sampling program in June 2016, totaling 184 soil gas samples. Although sporadic low-level VOC detections have been noted, there have been no exceedances of the residential RIASLs provided by MDEQ for the site in any off-site soil gas sample collected from any depth interval. These

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soil gas sample results, coupled with the groundwater monitoring results for the site, continue to demonstrate that there is not a widespread soil gas impact at the off-site area.

To enable the collection of building-specific information at select off-site locations, a VI RespAP was developed to evaluate the volatilization to indoor air pathway consistent with MDEQ VI guidance (2013). This VI RespAP was submitted under separate cover on April 13, 2018 and is specifically designed to follow the process laid out in section 6.6(b)(i) of the CD, which requires a RespAP to "assess VI risks to identify any unacceptable human health risks from volatilization to indoor air." The RespAP was approved with modifications on August 30, 2018 and sampling was initiated on September 13, 2018. Data analysis and analytical results will be included in a remedial investigation report at a later date.

Hydraulic Control System Operation and Performance Monitoring

The HCS performance is continually being evaluated and monitored. Treated water discharge volumes are documented daily and tabulated monthly (see **Table 8**). System shutdowns are documented and resolved as detailed below. Samples are collected each month to document permit compliance for sanitary discharge and air emissions.

As part of routine field activities, Arcadis periodically collects groundwater elevations from monitoring wells across the site, as well as pressure transducers installed at key monitoring wells and system well locations. Groundwater elevation trends, groundwater horizontal gradient, along with long-term groundwater analytical trends, will be the primary lines of evidence used to demonstrate effectiveness of the HCS.

Hydraulic Control System Operation

The HCS operated with minimal maintenance downtime. **Exhibit 1** below describes the system shutdowns, approximate durations, and dates.

Exhibit 1: HCS Shutdown Summary

Date of Shutdown	Duration of Shutdowns	Summary of Shutdown
14- July-18	Less than 24 hours	Field staff manually turned off the pumps (ESD-1, 2, 3, and 4) to change bag filters. Normal operation resumed the same day. Total shutdown time was approximately 0.5 hour.
3- Aug- 18	Less than 24 hours	System shutdown to complete cleaning activities on Air Stripper sump, trays and floats. Normal Operation resumed the same day. Total shutdown time was approximately 6 hours.
24- Aug- 18	Less than 24 hours	Field staff manually turned off the pumps (ESD-1, 2, 3, and 4) for manifold maintenance. System restarted, and operation resumed on the same day as the shutdown. Total shutdown time was approximately 2.5 hours.
30- Aug- 18	Less than 24 hours	Fouled bag filters were replaced by field staff. System restarted, and operation resumed the same day. Total shutdown time was approximately 0.5 hour.
8- Sept- 18	Less than 24 hours	System shut down for manifold maintenance. System restarted, and operation resumed on the same day as the shutdown. Total shutdown time was approximately 1 hour.

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14- Sept- 18	Less than 24 hours	Fouled discharge pump and bag filters led to a high scrubber sump alarm the night before, shutting the system down. Field staff checked transfer pump and replaced bag filters. System remained offline after bag filter change out while contractor installed lexicon cover on 480V panel disconnect. Normal operation resumed the same day. Total shutdown time was approximately 3.5 hours.
21- Sept- 18	Less than 24 hours	Fouled bag filters led to a high inlet pressure alarm, shutting the system down. Field staff replaced the bag filters. System restarted, and operation resumed the same day. Total shutdown time was approximately 1.5 hours.
26- Sept- 18 27- Sept- 18 28- Sept- 18	Less than 3 days	System shut down for carbon vessel maintenance. System remained offline throughout the evening to allow water to drain from vessel. Total shutdown time was approximately 48.5 hours total for the 3 days.

During the reporting period, groundwater was extracted from the horizontal wells in a manner to maintain continuous and consistent drawdown in each horizontal well. Discharge volumes and flowrates tabulated monthly during the reporting period are summarized in **Exhibit 2** below. Daily HCS discharge volumes and monthly discharge totals are provided in **Table 8** for the 3Q 2018 reporting period. The total volume of water collected and treated from March 15, 2017 through the 3Q 2018 is 29,082,648 gallons. Discharge has generally remained consistent through the most recent 3 months of operation (July through September).

Exhibit 2: HCS Treated Discharge Water Volume and Flowrate Summary – 3Q 2018

Month	Volume Treated (Gallons)	Average Flowrate (GPM)
July	928,429	21
August	979,129	22
September	787,834	18

GPM = gallons per minute

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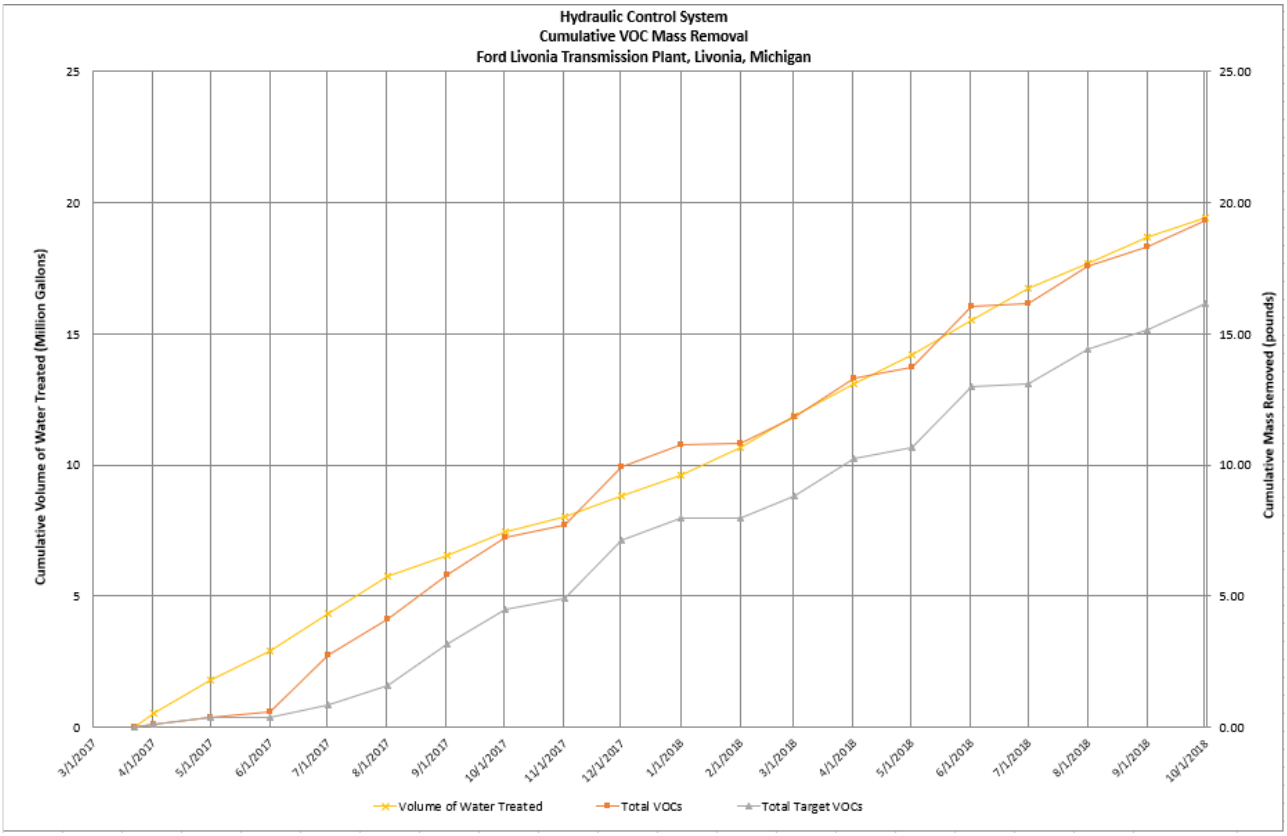
Exhibit 3 below depicts the cumulative constituent-specific mass removal of the VOCs through the 3Q 2018 reporting period. Groundwater mass removal calculations have been based on air stripper effluent vapor sample since June 2017.

Exhibit 3: HCS Mass Removal – 3Q 2018



Hydraulic Control System Performance Monitoring

The performance of the HCS is evaluated in general accordance with USEPA guidance – A Systematic Approach for Evaluation of Capture Zone at Pump and Treat Systems (USEPA 2008) to demonstrate the system is capturing groundwater as designed and mitigating additional migration of impacted groundwater to the east of the HCS. Three lines of evidence are used to evaluate system performance: groundwater elevation, hydraulic response to pumping and groundwater analytical trends.

Groundwater Elevation

A groundwater elevation contour map, including the area around the HCS system, is provided as **Figure 3**. The August 2018 contour map includes a calculated pumping water level at each HCS well (ESD-1 through ESD-4) to help determine gradient around the well. The pumping water level is calculated using a pressure transducer reading collected at the southern end of each ESD relative to the groundwater elevation measured at each well prior to system startup. The HCS wells are a horizontal groundwater sink perpendicular to groundwater flow that captures groundwater flux across the approximate 2,000-foot cross-sectional area. Due to seasonal fluctuations, the elevation of groundwater and the HCS total flow

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rate varies. The average monthly pumping rates (~10 to 30 gpm) are consistent with the ambient groundwater flux rate calculated for the site.

Aquifer response to pumping is subtle and additional performance monitoring wells will be installed adjacent to the HCS in November 2018 to better demonstrate the inward gradient. As shown on **Figure 3**, there is a relatively steep groundwater gradient observed west of the HCS as groundwater moves into the zone of HCS influence. East of the HCS, the gradient is generally flat up to the eastern property boundary before resuming a more consistent flow off-site. This deflection of the horizontal gradient is consistent with the removal of groundwater flux along the HCS system and consistent with the expectations of pumping.

Hydraulic Response

To monitor pumping response within the HCS wells and surrounding monitoring wells, pressure transducers have been installed in MW-18, MW-45, MW-46, MW-48, MW-50, MW-71, as well as at the pumping end of each HCS well (southern limit near the treatment system), and within the well vault located at the northern end of each HCS well. An initial summary of transducer response was provided as part of the Second Quarter 2018 Progress Report. However, during the third quarter several issues were encountered with direct read cables, as well as programing issues associated with the data recording and retrieval. As a result, the third quarter data is discontinuous and will not be evaluated as part of this summary. Included as part of recent modifications to the HCS system, new transducers were installed in October 2018. The data provided by those transducers will be included as part of the quarterly progress report beginning fourth quarter 2018.

Groundwater Analytical Trends

To date, seven rounds of groundwater samples have been collected from monitoring wells beginning in 2016 prior to HCS startup (May 2016, April 2017, July 2017, November 2017, February 2018, May 2018, and August 2018). Analytical results from the four most recent quarters of data are included on **Figures 4 through 8**. A key result of the performance monitoring is at monitoring well MW-71 located east of the HCS well (ESD-4) and opposite the core of southern chlorinated VOC impacts. Since it has been installed (April 2017), MW-71 has been stable with only estimated detections of vinyl chloride at concentrations less than 1.0 µg/L.

Concentrations of TCE, total DCE, and VC over time, between May 2016 and August 2018, were reviewed at representative wells located along the axis of impacted areas (on-site and off-site) and at wells located downgradient of the HCS system. Trend analysis from wells upgradient of the HCS system can provide insights regarding source maturity – stable concentrations (i.e. no trend with low variability in concentrations over time) and decreasing trends indicate that the source is mature or depleted. Increasing trends at individual source area wells can indicate an expanding plume, but also can reflect the wide range of concentrations and temporal variability common at source areas. Trends at wells along the axis of the flow should be considered to verify if the plume is expanding.

Trend analysis downgradient of the HCS provide the best measure of hydraulic capture performance – no trend and decreasing trends verify that the HCS is working, whereas increasing trends would indicate a lack of capture.

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Mann-Kendall trend tests were conducted at selected wells for constituents present at concentrations greater than applicable screening criteria, and coefficient of variation values were calculated. The methodology, preliminary results summary, figures and trend graphs are included as part of **Appendix D**. Key findings of the Mann-Kendall trend test include the following:

- Upgradient of HCS (south): At monitoring wells in the southern impacted area, concentrations of TCE, total DCE and VC (where present above applicable screening levels) are statistically significantly decreasing or show no trend. The two exceptions are MW-02 where total DCE shows a statistically significant increasing trend, and MW-10 where VC shows a statistically significant increasing trend.
- Upgradient of HCS (north): VC concentration trends at monitoring wells upgradient of the HCS in the northern impacted area are statistically significantly decreasing.
- Downgradient of the HCS (on-site): Concentrations of VC at each monitoring well located downgradient of the HCS system exhibit no trend, with the exception of MW-43, which shows a statistically significant decreasing trend.
- Downgradient of the HCS (off-site): Concentrations of VC at each monitoring well located off-site show no trend, with the exceptions of MW-72, MW-73S, and MW-75D, which show statistically significant decreasing trends.

With the exception of a limited number of on-site upgradient monitoring well and constituent combinations that show statistically significant increasing trends (total DCE at MW-2 and VC at MW-10), or variable to increasing concentrations over time (MW-22 and MW-23) the observations and measurements to date indicate the groundwater impacts are stable, potentially decreasing, and statistically significantly decreasing. Results of this evaluation provide a line of evidence that indicates that HCS system prevents further migration of groundwater impacts to the east of the HCS.

Summary of Hydraulic Control System Compliance Actions

Monthly compliance sampling for the HCS GLWA discharge permit was completed each month. Samples were collected after treatment before groundwater discharge. Samples were analyzed for constituents required by the discharge permit. **Exhibit 4** below depicts the sampling parameters, methods, and discharge limits monitored for compliance with the GLWA discharge permit. All monthly compliance samples were within discharge limits during the reporting period. Self-Monitoring Reports (SMRs) are submitted to the GLWA every six months to document discharge compliance.

Exhibit 4: GLWA Discharge Limitations for HCS

Parameter	Analytical Method	Discharge Limit
Cadmium (Cd)	USEPA 200.7 – Metals	1.0 milligrams per liter (mg/L)
Chromium (Cr)	USEPA 200.7 – Metals	25 mg/L
Copper (Cu)	USEPA 200.7 – Metals	2.5 mg/L
Lead (Pb)	USEPA 200.7 – Metals	1.0 mg/L
Nickel (Ni)	USEPA 200.7 – Metals	5.0 mg/L

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Parameter	Analytical Method	Discharge Limit
Mercury (Hg)	USEPA 245.1 - Mercury	Non-Detect
Silver (Ag)	USEPA 200.7	1.0 mg/L
Zinc (Zn)	USEPA 200.7	7.3 mg/L
Total PCB	USEPA 608.3	Non-Detect
Total Toxic Organics	USEPA 624.1 - VOCs USEPA 625.1 – Semi-Volatile Organic Compounds (SVOCs) USEPA 625.1 Dioxin Screen USEPA 1613B – Dioxins and Furans	20 µg/L

In addition, the GLWA discharge permit limits discharge to 100,800 gallons per day (gpd) and/or 70 gpm. Discharge volumes are documented daily and tabulated monthly. Discharge volumes were within discharge limits during 3Q 2018. Tabulated discharge volumes for the 3Q 2018 reporting period are presented in **Table 8**.

During the reporting period, vapor samples were collected and analyzed for VOCs using the USEPA Air Method TO-15 for documenting compliance with the Rule 290 air permitting exemption of the Michigan Air Pollution Control Rules. All vapor emissions have been within discharge limits since system start-up, and Rule 290 emissions calculations are documentation monthly.

Interim Sub-Slab Depressurization System Operation and Compliance Actions

The SSDS performance is continually being evaluated and monitored. System shutdowns are documented and resolved as detailed below. Vapor analytical samples have been collected since system start-up to verify destruction efficiency of the catalytic oxidizer and document emissions compliance with the Rule 290 air permitting exemption of the Michigan Air Pollution Control Rules.

As part of routine field activities, Arcadis will collect vacuum readings from sub-slab monitoring points (SSMPs) within the area of influence of the SSDS to document, optimize, and evaluate system performance. Sub-slab vacuum propagation will be the primary line of evidence used to demonstrate effectiveness of the SSDS. Additionally, VOC and methane field screening and analytical sampling will be conducted at select SSMPs to monitor potential changes in sub-slab vapor concentrations as a result of the SSDS. Initial performance monitoring results will be included as part of the Fourth Quarter 2018 Progress Report.

The SSDS operated with minimal maintenance downtime during the reporting period. **Exhibit 5** below describes the system shutdowns, approximate durations, and dates.

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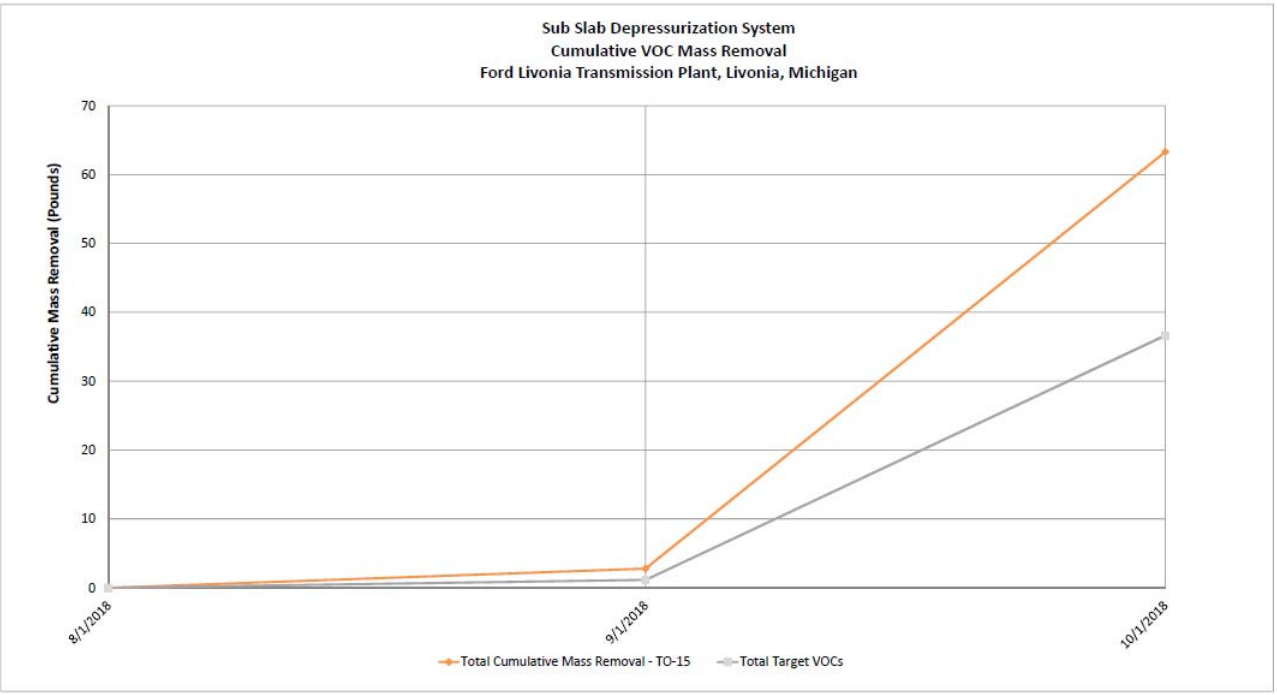
Exhibit 5: SSDS Shutdown Summary

Date of Shutdown	Duration of Shutdowns	Summary of Shutdown
14-August- 18 through 23-August- 18	Less than 24 hours each day	System was operated only with operator supervision for start-up and shakedown activities. System was on/off as crew worked to balance system parameters and test all process equipment. Total down time was approximately 94 hours over 9 days.
4-September- 18	Less than 24 hours	Automatic system shut down due to high methane detection in process air. Total shutdown time was approximately 2.25 hours.
7-September- 18	Less than 24 hours	Automatic system shut down due to high methane detection in process air Total shutdown time was approximately 0.25 hours.

Exhibit 6 below depicts the cumulative constituent-specific mass removal of VOCs from sub-slab soil-vapor, through the 3Q 2018 reporting period.

Exhibit 6: SSDS Mass Removal – 3Q 2018



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Ongoing Response Activities

On-Site Vapor Intrusion Investigation

Arcadis completed the installation and sampling of 29 SSMPs within LTP and 28 SSMPs within ATNPC and associated out buildings between July 31st and August 24, 2018. SSMP samples were submitted under chain-of-custody protocols to Eurofins AirToxics Laboratory located in Folsom, California (Eurofins) for analysis of the specific list of VOCs (1,1-DCE, cis-1,2-DCE, trans-1,2-DCE, PCE, TCE, VC, and 1,4-dioxane) via USEPA Method TO-17 based on a standard turnaround time of 10 business days. Soil gas analytical results will be included in a remedial investigation report at a later date.

On-Site Source Area Investigation

The On-site Source Area investigation began in September 2018. During 3Q 2018, Arcadis has completed 32 out of the 129 possible primary locations, and 9 out of the 119 possible adaptive locations. Adaptive locations are determined based on an evaluation of the real-time data being collected, therefore it is unlikely that all possible locations will be completed. Data analysis and analytical results will be included in a remedial investigation report at a later date.

Off-Site Vapor Intrusion Investigation

The Off-site VI investigation began in September 2018. Access agreements were sent out to 69 residential properties and 43 commercial properties on August 30, 2018. Currently, signed access agreements have been received from 53 residential properties and 10 commercial properties. During 3Q 2018, indoor air, ambient air, sub-slab monitoring point, and/or sump samples have been collected at 28 residential properties and 4 commercial properties. Data analysis and analytical results will be included in a remedial investigation report at a later date.

4 ACCESS AGREEMENTS

Ford has obtained and is actively negotiating access agreements with off-site commercial and residential property owners east of the site to further evaluate vapor intrusion and/or groundwater delineation activities.

5 OTHER RELEVANT INFORMATION

Due Care Obligations

Response activities are ongoing and maintaining the due care obligation.

Public Outreach

Ford currently has an active website that allows the general public access to project updates. The website link is: http://www.fordlivoniabostonbeaconproject.com. A Public Outreach Plan was submitted to the MDEQ on August 7, 2018.

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List of Reporting Documents

A list of all reporting documents submitted during the 3Q 2018 reporting period is included in **Exhibit 7** below.

Exhibit 7: Submitted Reporting Documents – 3Q 2018

Report Title	Submission Date
Response to MDEQ Request for CSM	July 20, 2018
2Q 2018 Progress Report	July 31, 2018
Public Outreach Plan	August 7, 2018

6 WASTE MANAGEMENT

All investigation-derived waste, construction debris, or other waste is properly stored in labelled containers (e.g., 55-gallon drum, frac tank) pending off-site disposal. All waste is managed by Ford and Clean Harbors (formerly Veolia Environmental Services). Clean Harbors is the Total Waste Manager (TWM) for the site. All purge water generated during the groundwater sampling event is containerized in buckets and passed through the groundwater treatment system on-site.

7 PROPOSED SCHEDULE

Future response activities are scheduled as follows:

Exhibit 8: Response Activity Schedule

Response Activity	Proposed Schedule	Anticipated Completion
4Q 2018 On-site groundwater sampling	Week of October 22, 2018	November 2, 2018
4Q 2018 Off-site groundwater sampling	Week of October 22, 2018	November 2, 2018
4Q 2018 Off-site soil gas sampling	Week of November 5, 2018	November 9, 2018
HCS performance monitoring	Monthly intervals	Ongoing
SSDS performance monitoring	Monthly Intervals	Ongoing
On-Site Vapor Intrusion Investigation	Week of October 15, 2018	November 2018
On-Site Source Area Investigation	Weekly Intervals	December 2018
Off-Site Vapor Intrusion Investigation	Weekly Intervals	Ongoing

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TABLES

Table 1
On-Site Groundwater Elevations
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Well ID	TOC Elevation [1] (ft. amsl)	Screen Interval (ft. bgs)	Gauging Date	Depth to LNAPL (ft. btoc)	Depth to Water (ft. btoc)	Total Depth (ft.)	LNAPL Thickness (ft.)	Corrected Groundwater Elevation (ft. amsl)
LMW-15-01	673.98	7-12	11/16/15	8.42	11.36	12.00	2.94	664.97
			11/25/15	8.44	11.35	12.00	2.91	664.96
			11/30/15	8.38	11.36	12.00	2.98	665.01
			12/08/15	8.35	11.35	12.00	3.00	665.03
			11/06/17	Could Not Open				
			02/05/18					
			05/07/18	8.34	10.44	NM	2.10	665.22
			08/16/18	8.48	10.82	NM	2.34	665.03
LMW-15-02	673.90	7-12	11/16/15	7.70	10.10	12.00	2.40	665.72
			11/25/15	7.68	9.83	12.00	2.15	665.79
			11/30/15	7.66	9.84	12.00	2.18	665.80
			12/09/15	7.60	9.76	12.00	2.16	665.86
			11/06/17	8.39	11.13	NM	2.74	664.96
			02/05/18	8.54	11.02	NM	2.48	664.86
			05/07/18	8.31	9.91	NM	1.60	665.27
			08/16/18	8.34	9.56	NM	1.22	665.31
LMW-15-03	670.18	7-12	11/16/15	6.01	7.46	12.00	1.45	663.88
			11/25/15	5.92	7.04	12.00	1.12	664.04
			11/30/15	5.81	6.94	12.00	1.13	664.14
			12/11/15	5.83	7.26	12.00	1.43	664.06
			11/06/17	6.36	7.49	NM	1.13	663.59
			02/05/18	6.62	8.41	NM	1.79	663.20
			05/07/18	6.03	7.06	NM	1.03	663.94
			08/16/18	6.19	6.41	NM	0.22	663.95
LMW-15-04	673.92	6-11	11/16/15	7.10	8.79	11.00	1.69	666.48
			11/25/15	7.10	8.79	11.00	1.69	666.48
			11/30/15	7.06	8.79	11.00	1.73	666.52
			12/09/15	7.00	8.86	11.00	1.86	666.55
			11/06/17	Could Not Open				
			02/05/18					
			05/07/18	7.68	9.20	NM	1.52	665.94
			08/16/18	7.60	9.28	NM	1.68	665.99
LMW-15-05	673.93	7-12	11/16/15	8.50	10.20	12.00	1.70	665.09
			11/25/15	8.50	9.99	12.00	1.49	665.14
			11/30/15	8.47	9.98	12.00	1.51	665.16
			12/08/15	8.42	9.92	12.00	1.50	665.21
			11/06/17	Could Not Locate				
			02/05/18					
			05/07/18					
			08/16/18	8.98	10.53	NM	1.55	664.64
LMW-15-06	673.93	7-12	11/16/15	6.92	8.82	12.00	1.90	666.63
			11/25/15	6.89	8.52	12.00	1.63	666.72
			11/30/15	6.74	8.39	12.00	1.65	666.86
			12/09/15	6.62	8.40	12.00	1.78	666.96
			11/06/17	Could Not Open				
			02/05/18					
			05/07/18	6.57	8.16	NM	1.59	667.05
			08/16/18	6.93	8.64	NM	1.71	666.66
LMW-15-07	673.52	7-12	11/16/15	NP	7.70	12.00	NM	665.82
			11/25/15	NP	7.32	12.00	NM	666.20
			11/30/15	7.14	7.15	12.00	0.01	666.38
			12/11/15	7.08	7.09	12.00	0.01	666.44
			11/06/17	7.43	7.53	NM	0.10	666.07
			02/05/18	Could Not Locate				
			05/07/18					
			08/16/18	7.22	7.34	NM	0.12	666.28

See Notes on Last Page.

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Livonia, Michigan

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LMW-15-08	673.88	7.5-12.5	11/16/15	NP	6.30	12.50	NM	667.58
			11/25/15	6.25	6.26	12.50	0.01	667.63
			11/30/15	6.12	6.13	12.50	0.01	667.76
			12/11/15	6.09	6.10	12.50	0.01	667.79
			11/06/17	Could Not Open				
			02/05/18					
			05/07/18	5.72	7.35	NM	1.63	667.84
			08/16/18	6.04	7.72	NM	1.68	667.51
LMW-15-09	673.93	7-12	11/16/15	7.82	10.62	12.00	2.80	665.55
			11/25/15	7.76	10.51	12.00	2.75	665.62
			11/30/15	7.72	10.32	12.00	2.60	665.69
			12/10/15	7.73	10.38	12.00	2.65	665.67
			11/06/17	8.29	NA	11.75	3.71	NA**
			02/05/18	8.58	10.50	NM	1.92	664.96
			05/07/18	7.95	9.39	NM	1.44	665.69
			08/16/18	8.12	10.45	NM	2.33	665.34
LMW-15-10	673.89	7-12	11/16/15	8.40	9.26	12.00	0.86	665.32
			11/25/15	8.32	9.13	12.00	0.81	665.41
			11/30/15	8.24	8.96	12.00	0.72	665.51
			12/10/15	8.18	8.79	12.00	0.61	665.59
			11/06/17	8.69	9.50	NM	0.81	665.04
			02/05/18	8.50	8.58	NM	0.08	665.38
			05/07/18	8.15	8.28	NM	0.13	665.72
			08/16/18	8.47	9.16	NM	0.69	665.29
MW-15-59D	675.17	94-99	01/07/16	NP	21.83	99.00	NM	653.34
			01/19/16	NP	21.91	99.00	NM	653.26
			04/19/17	NP	21.37	99.37	NM	653.80
			07/24/17	NP	28.71	100.80	NM	646.46
			11/06/17	NP	24.48	100.65	NM	650.69
			02/05/18	NP	21.44	100.01	NM	653.73
			05/07/18	NP	23.48	NM	NM	651.69
			08/16/18	NP	30.45	NM	NM	644.72
MW-15-60D	675.75	93-98	01/07/16	NP	19.47	100.00	NM	656.28
			01/19/16	NP	19.71	100.00	NM	656.04
			04/19/17	NP	18.65	99.50	NM	657.10
			07/24/17	NP	24.09	99.92	NM	651.66
			11/06/17	NP	20.63	99.92	NM	655.12
			02/05/18	NP	19.61	99.42	NM	656.14
			05/07/18	NP	19.31	NM	NM	656.44
			08/16/18	NP	23.85	NM	NM	651.90
MW-15-61D	670.03	88-93	01/07/16	NP	76.49	93.00	NM	593.54
			01/08/16	NP	88.02	93.00	NM	582.01
			01/19/16	NP	73.23	93.00	NM	596.80
			01/20/16	NP	89.31	93.00	NM	580.72
			01/26/16	NP	84.09	93.00	NM	585.94
			01/27/16	NP	82.42	93.00	NM	587.61
			01/28/16	NP	80.71	93.00	NM	589.32
			04/19/17	NP	24.71	93.87	NM	645.32
			07/24/17	NP	24.74	94.09	NM	645.29
			11/06/17	NP	26.58	94.72	NM	643.45
			02/06/18	NP	25.79	94.71	NM	644.24
			05/07/18	NP	25.63	94.24	NM	644.40
			08/16/18	NP	56.16	NM	NM	613.87

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36200 Plymouth Road
Livonia, Michigan

Well ID	TOC Elevation [1] (ft. amsl)	Screen Interval (ft. bgs)	Gauging Date	Depth to LNAPL (ft. btoc)	Depth to Water (ft. btoc)	Total Depth (ft.)	LNAPL Thickness (ft.)	Corrected Groundwater Elevation (ft. amsl)
MW-1	670.77	14-19	04/17/17	NP	3.82	18.61	NM	666.95
			07/24/17	NP	3.57	18.44	NM	667.20
			11/06/17	NP	3.93	18.78	NM	666.84
			02/05/18	NP	NM[2]	NM[2]	NM[2]	NM[2]
			05/07/18	NP	3.88	18.60	NM	666.89
			08/16/18	NP	3.73	NM	NM	667.04
MW-2	673.80	15.5-20.5	05/12/16	NP	6.35	19.52	NM	667.45
			04/17/17	NP	6.91	19.45	NM	666.89
			07/24/17	NP	6.99	19.44	NM	666.81
			11/06/17	NP	7.24	19.50	NM	666.56
			02/05/18	NP	7.42	19.55	NM	666.38
			05/07/18	NP	6.92	19.47	NM	666.88
			08/16/18	NP	7.03	NM	NM	666.77
MW-3	673.61	14-19	05/12/16	NP	5.82	18.79	NM	667.79
			04/17/17	NP	7.09	18.72	NM	666.52
			07/24/17	NP	7.29	18.43	NM	666.32
			11/06/17	NP	7.61	18.80	NM	666.00
			02/05/18	NP	7.70	18.87	NM	665.91
			05/07/18	NP	7.23	18.74	NM	666.38
			08/16/18	NP	7.48	NM	NM	666.13
MW-4	673.85	15.5-20.5	05/13/16	NP	7.15	20.20	NM	666.70
			04/17/17	NP	7.57	20.09	NM	666.28
			07/24/17	NP	7.61	19.93	NM	666.24
			11/06/17	NP	7.94	20.05	NM	665.91
			02/05/18	NP	8.50	20.16	NM	665.35
			05/07/18	NP	7.60	20.12	NM	666.25
			08/16/18	NP	7.73	NM	NM	666.12
MW-5*	674.40	15.5-20.5	05/13/16	NP	6.49	21.73	NM	667.91
			07/24/17	NP	NM	NM	NM	NM
			11/06/17	NP	7.51	19.71	NM	666.89
			02/05/18	NP	7.70	19.54	NM	666.70
			05/07/18	NP	7.26	19.63	NM	667.14
			08/16/18	NP	7.36	NM	NM	667.04
MW-7	670.89	18-23	07/24/17	NP	4.79	22.39	NM	666.10
			11/06/17	NP	5.24	22.56	NM	665.65
			02/06/18	NP	4.48	22.50	NM	666.41
			05/07/18	NP	4.54	22.35	NM	666.35
			08/16/18	NP	4.81	NM	NM	666.08
MW-9	671.18	19.5-24.5	05/09/16	NP	5.82	24.34	NM	665.36
			04/17/17	NP	6.79	24.34	NM	664.39
			07/24/17	NP	5.88	24.29	NM	665.30
			11/06/17	NP	6.38	24.53	NM	664.80
			02/05/18	NP	6.40	24.35	NM	664.78
			05/07/18	NP	5.65	24.20	NM	665.53
			08/16/18	NP	5.94	NM	NM	665.24
MW-10	673.78	16.5-21.5	05/13/16	NP	8.16	20.81	NM	665.62
			04/17/17	NP	8.15	20.81	NM	665.63
			07/24/17	NP	8.58	20.76	NM	665.20
			11/06/17	NP	6.00	20.84	NM	667.78
			02/05/18	NP	9.01	15.89	NM	664.77
			05/07/18	NP	8.68	20.24	NM	665.10
			08/16/18	NP	8.68	NM	NM	665.10
MW-14	671.24	15-20	07/24/17	NP	6.63	19.53	NM	664.61
			11/06/17	NP	7.01	19.61	NM	664.23
			02/05/18	NP	7.29	19.80	NM	663.95
			05/07/18	NP	6.14	19.65	NM	665.10
			08/16/18	NP	6.52	NM	NM	664.72

See Notes on Last Page.

Table 1
On-Site Groundwater Elevations
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Well ID	TOC Elevation [1] (ft. amsl)	Screen Interval (ft. bgs)	Gauging Date	Depth to LNAPL (ft. btoc)	Depth to Water (ft. btoc)	Total Depth (ft.)	LNAPL Thickness (ft.)	Corrected Groundwater Elevation (ft. amsl)
MW-18	670.41	13-18	05/09/16	NP	6.29	17.89	NM	664.12
			04/17/17	NP	6.67	17.90	NM	663.74
			07/24/17	NP	6.92	17.70	NM	663.49
			11/06/17	NP	7.31	17.80	NM	663.10
			02/06/18	NP	7.45	17.85	NM	662.96
			05/04/18	NP	6.53	18.01	NM	663.88
			08/16/18	NP	6.82	NM	NM	663.59
MW-19	669.65	15-20	05/13/16	LNAPL				
			04/17/17					
			07/24/17					
			11/06/17	NP	5.91	19.85	NM	663.74
			02/05/18	NP	6.23	19.84	NM	663.42
			05/07/18	NP	5.51	19.98	NM	664.14
			08/16/18	NP	5.67	NM	NM	663.98
MW-20	669.33	13.5-18.5	07/24/17	NP	6.29	16.98	NM	663.04
			11/06/17	NP	6.52	16.84	NM	662.81
			02/05/18	NP	6.68	16.62	NM	662.65
			05/11/18	NP	5.95	16.48	NM	663.38
			08/16/18	NP	5.70	NM	NM	663.63
MW-21*	670.76	13.5-18.5	05/13/16	Could Not Open				
			04/17/17					
			07/24/17					
			11/06/17					
			02/06/18	NP	7.95	17.74	NM	662.81
			05/07/18	NP	7.15	17.60	NM	663.61
			08/16/18	NP	6.65	NM	NM	664.11
MW-22	670.18	16.5-21.5	05/10/16	NP	6.18	20.83	NM	664.00
			04/17/17	NP	7.13	21.41	NM	663.05
			07/24/17	NP	7.53	20.42	NM	662.65
			11/06/17	NP	7.51	20.51	NM	662.67
			02/05/18	NP	7.61	20.48	NM	662.57
			05/07/18	NP	6.66	20.50	NM	663.52
			08/16/18	NP	6.71	NM	NM	663.47
MW-23	669.24	15-20	05/09/16	NP	6.23	19.82	NM	663.01
			04/17/17	NP	6.67	19.79	NM	662.57
			07/24/17	NP	6.69	19.72	NM	662.55
			11/06/17	NP	6.60	19.72	NM	662.64
			02/06/18	NP	6.93	NM	NM	662.31
			05/07/18	NP	5.67	19.70	NM	663.57
			08/16/18	NP	5.80	NM	NM	663.44
MW-24	675.48	19-24	04/17/17	NP	9.32	23.85	NM	666.16
			07/24/17	NP	10.01	23.90	NM	665.47
			11/06/17	NP	10.40	23.76	NM	665.08
			02/05/18	NP	10.37	23.99	NM	665.11
			05/07/18	NP	9.38	23.70	NM	666.10
			08/16/18	NP	10.01	NM	NM	665.47
MW-25	675.04	16-21	04/17/17	NP	5.35	20.54	NM	669.69
			07/24/17	NP	6.34	20.52	NM	668.70
			11/06/17	NP	6.51	20.38	NM	668.53
			02/05/18	NP	6.55	20.52	NM	668.49
			05/07/18	NP	4.98	20.25	NM	670.06
			08/16/18	NP	6.19	NM	NM	668.85
MW-26	673.39	4.5-14.5	07/24/17	NP	5.96	14.09	NM	667.43
			11/06/17	NP	6.09	14.10	NM	667.30
			02/05/18	NP	6.08	14.05	NM	667.31
			05/07/18	NP	5.24	13.90	NM	668.15
			08/16/18	NP	5.98	NM	NM	667.41

See Notes on Last Page.

Table 1
On-Site Groundwater Elevations
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Well ID	TOC Elevation [1] (ft. amsl)	Screen Interval (ft. bgs)	Gauging Date	Depth to LNAPL (ft. btoc)	Depth to Water (ft. btoc)	Total Depth (ft.)	LNAPL Thickness (ft.)	Corrected Groundwater Elevation (ft. amsl)
MW-27*	671.66	4-14	07/24/17	Could Not Locate				
			11/06/17					
			02/05/18					
			05/07/18					
			08/16/18					
MW-28	668.15	2-12	05/09/16	NP	3.21	11.81	NM	664.94
			04/17/17	NP	3.78	11.69	NM	664.37
			07/24/17	NP	4.61	11.73	NM	663.54
			11/06/17	NP	4.81	11.68	NM	663.34
			02/05/18	NP	4.63	11.65	NM	663.52
			05/07/18	NP	3.67	11.67	NM	664.48
			08/16/18	NP	4.64	NM	NM	663.51
MW-29	669.45	5-15	05/13/16	NP	4.10	14.85	NM	665.35
			04/17/17	NP	4.53	14.84	NM	664.92
			07/24/17	NP	5.41	14.90	NM	664.04
			11/06/17	NP	6.65	15.81	NM	662.80
			02/05/18	NP	5.52	14.84	NM	663.93
			05/07/18	NP	4.64	14.80	NM	664.81
			08/16/18	NP	5.44	NM	NM	664.01
MW-30	670.70	19-24	05/09/16	NP	9.37	24.82	NM	661.33
			04/17/17	NP	9.86	24.78	NM	660.84
			07/24/17	NP	9.93	24.73	NM	660.77
			11/06/17	NP	10.47	24.84	NM	660.23
			02/05/18	NP	10.31	24.69	NM	660.39
			05/07/18	NP	9.03	24.70	NM	661.67
			08/16/18	NP	9.51	NM	NM	661.19
MW-31	670.82	17-22	05/09/16	NP	9.96	21.75	NM	660.86
			04/17/17	NP	10.13	21.78	NM	660.69
			07/24/17	NP	10.19	21.69	NM	660.63
			11/06/17	NP	10.65	21.92	NM	660.17
			02/05/18	NP	10.70	21.48	NM	660.12
			05/07/18	NP	9.23	21.67	NM	661.59
			08/16/18	NP	9.58	NM	NM	661.24
MW-32	670.43	18-23	05/09/16	NP	9.64	22.92	NM	660.79
			04/17/17	NP	9.52	22.91	NM	660.91
			07/24/17	NP	9.71	22.71	NM	660.72
			11/06/17	NP	10.18	23.03	NM	660.25
			02/05/18	NP	10.17	22.78	NM	660.26
			05/07/18	NP	8.73	22.83	NM	661.70
			08/16/18	NP	9.07	NM	NM	661.36
MW-33	669.94	14-19	05/09/16	NP	8.68	18.76	NM	661.26
			04/17/17	NP	8.76	18.75	NM	661.18
			07/24/17	NP	8.84	19.72	NM	661.10
			11/06/17	NP	8.58	19.08	NM	661.36
			02/05/18	NP	8.63	18.74	NM	661.31
			05/07/18	NP	7.34	18.66	NM	662.60
			08/16/18	NP	7.59	NM	NM	662.35
MW-34	670.49	16.5-21.5	05/09/16	NP	7.98	21.21	NM	662.51
			04/17/17	NP	8.83	21.30	NM	661.66
			07/24/17	NP	9.45	21.23	NM	661.04
			11/06/17	NP	10.02	21.65	NM	660.47
			02/05/18	NP	9.73	21.35	NM	660.76
			05/07/18	NP	8.34	21.26	NM	662.15
			08/16/18	NP	9.18	NM	NM	661.31

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Table 1
On-Site Groundwater Elevations
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Well ID	TOC Elevation [1] (ft. amsl)	Screen Interval (ft. bgs)	Gauging Date	Depth to LNAPL (ft. btoc)	Depth to Water (ft. btoc)	Total Depth (ft.)	LNAPL Thickness (ft.)	Corrected Groundwater Elevation (ft. amsl)
MW-35	669.44	19.5-24.5	05/09/16	NP	6.62	24.48	NM	662.82
			04/17/17	NP	7.16	24.63	NM	662.28
			07/24/17	NP	8.55	24.44	NM	660.89
			11/06/17	NP	9.11	24.45	NM	660.33
			02/05/18	NP	8.63	24.50	NM	660.81
			05/07/18	NP	7.03	24.40	NM	662.41
			08/16/18	NP	8.30	NM	NM	661.14
MW-36	676.39	20-25	07/24/17	NP	9.49	24.75	NM	666.90
			11/06/17	NP	10.98	24.88	NM	665.41
			02/05/18	NP	10.15	24.91	NM	666.24
			05/07/18	NP	9.28	24.72	NM	667.11
			08/16/18	NP	9.55	NM	NM	666.84
MW-37	671.24	18-23	07/24/17	NP	8.14	24.75	NM	663.10
			11/06/17	NP	8.26	23.18	NM	662.98
			02/05/18	NP	8.33	22.80	NM	662.91
			05/07/18	NP	7.01	22.76	NM	664.23
			08/16/18	NP	7.49	NM	NM	663.75
MW-38	671.79	15-20	04/17/17	NP	8.23	19.55	NM	663.56
			07/24/17	NP	8.69	23.69	NM	663.10
			11/06/17	NP	8.53	19.75	NM	663.26
			02/05/18	NP	8.67	19.65	NM	663.12
			05/07/18	NP	7.28	19.50	NM	664.51
			08/16/18	NP	7.61	NM	NM	664.18
MW-39	672.19	19.5-24.5	04/19/17	NP	11.08	24.14	NM	661.11
			07/24/17	NP	11.41	23.92	NM	660.78
			11/06/17	NP	11.64	24.36	NM	660.55
			02/05/18	NP	11.63	24.30	NM	660.56
			05/07/18	NP	10.25	24.16	NM	661.94
			08/16/18	NP	10.55	NM	NM	661.64
MW-40	670.65	15-20	05/09/16	NP	9.94	19.72	NM	660.71
			04/19/17	NP	9.98	19.72	NM	660.67
			07/24/17	NP	10.10	19.66	NM	660.55
			11/06/17	NP	10.58	19.75	NM	660.07
			02/05/18	NP	10.62	19.43	NM	660.03
			05/07/18	NP	9.15	19.64	NM	661.50
			08/16/18	NP	9.46	NM	NM	661.19
MW-41	670.34	16-21	05/09/16	NP	8.20	20.97	NM	662.14
			04/19/17	NP	8.97	20.99	NM	661.37
			07/24/17	NP	9.39	20.78	NM	660.95
			11/06/17	NP	9.96	21.25	NM	660.38
			02/05/18	NP	9.75	20.85	NM	660.59
			05/07/18	NP	8.35	20.94	NM	661.99
			08/16/18	NP	9.06	NM	NM	661.28
MW-42	670.10	16-21	05/09/16	NP	7.29	11.52	NM	662.81
			04/19/17	NP	8.01	20.48	NM	662.09
			07/24/17	NP	9.13	20.43	NM	660.97
			11/06/17	NP	9.76	20.77	NM	660.34
			02/05/18	NP	9.32	20.55	NM	660.78
			05/07/18	NP	7.81	20.43	NM	662.29
			08/16/18	NP	8.94	NM	NM	661.16
MW-43	669.24	17-22	05/09/16	NP	6.34	21.85	NM	662.90
			04/19/17	NP	6.80	26.82	NM	662.44
			07/24/17	NP	8.34	21.79	NM	660.90
			11/06/17	NP	8.92	21.98	NM	660.32
			02/05/18	NP	8.42	21.80	NM	660.82
			05/07/18	NP	6.78	21.76	NM	662.46
			08/16/18	NP	8.17	NM	NM	661.07

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Table 1
On-Site Groundwater Elevations
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Well ID	TOC Elevation [1] (ft. amsl)	Screen Interval (ft. bgs)	Gauging Date	Depth to LNAPL (ft. btoc)	Depth to Water (ft. btoc)	Total Depth (ft.)	LNAPL Thickness (ft.)	Corrected Groundwater Elevation (ft. amsl)
MW-44	671.48	16-21	05/09/16	NP	6.59	17.42	NM	664.89
			04/19/17	NP	7.48	19.95	NM	664.00
			07/24/17	NP	8.38	20.93	NM	663.10
			11/06/17	NP	8.55	20.74	NM	662.93
			02/05/18	NP	8.51	20.90	NM	662.97
			05/07/18	NP	7.40	20.75	NM	664.08
			08/16/18	NP	8.01	NM	NM	663.47
MW-45	670.83	15-20	05/09/16	NP	14.22	19.81	NM	656.61
			04/19/17	NP	11.45	19.67	NM	659.38
			07/24/17	NP	11.07	19.76	NM	659.76
			11/06/17	NP	9.82	19.75	NM	661.01
			02/05/18	NP	10.30	19.72	NM	660.53
			05/07/18	NP	9.43	19.99	NM	661.40
			08/16/18	NP	9.02	NM	NM	661.81
MW-46	670.84	16-21	05/09/16	NP	8.42	20.45	NM	662.42
			04/19/17	NP	10.61	20.30	NM	660.23
			07/24/17	NP	10.33	19.78	NM	660.51
			11/06/17	NP	9.76	19.81	NM	661.08
			02/05/18	NP	10.20	19.81	NM	660.64
			05/07/18	NP	9.84	19.94	NM	661.00
			08/16/18	NP	9.47	NM	NM	661.37
MW-47	671.33	16-21	05/09/16	NP	7.53	11.92	NM	663.80
			04/19/17	NP	9.88	20.76	NM	661.45
			07/24/17	NP	10.11	19.96	NM	661.22
			11/06/17	NP	9.87	19.98	NM	661.46
			02/05/18	NP	10.11	19.98	NM	661.22
			05/07/18	NP	9.49	19.94	NM	661.84
			08/16/18	NP	9.65	NM	NM	661.68
MW-48	670.98	17-22	05/09/16	NP	6.33	21.76	NM	664.65
			04/19/17	NP	8.93	21.62	NM	662.05
			07/24/17	NP	9.70	20.42	NM	661.28
			11/06/17	NP	9.33	20.34	NM	661.65
			02/05/18	NP	10.08	20.35	NM	660.90
			05/07/18	NP	8.84	20.60	NM	662.14
			08/16/18	NP	9.34	NM	NM	661.64
MW-49	669.07	12.5-17.5	05/12/16	NP	6.57	17.31	NM	662.50
			04/19/17	NP	7.03	17.31	NM	662.04
			07/24/17	NP	6.94	17.37	NM	662.13
			11/06/17	NM	NM	NM	NM	NM
			02/05/18	NP	7.32	17.44	NM	661.75
			05/07/18	NP	6.88	17.28	NM	662.19
			08/16/18	NP	6.39	NM	NM	662.68
MW-50	670.16	16-21	05/09/16	NP	5.42	20.34	NM	664.74
			04/19/17	NP	6.77	20.23	NM	663.39
			07/24/17	NP	8.16	18.42	NM	662.00
			11/06/17	NP	8.15	18.81	NM	662.01
			02/05/18	NP	8.47	18.44	NM	661.69
			05/07/18	NP	6.81	19.00	NM	663.35
			08/16/18	NP	7.55	NM	NM	662.61
MW-51	671.07	15-20	04/19/17	NP	6.12	19.04	NM	664.95
			07/24/17	NP	7.82	18.92	NM	663.25
			11/06/17	NP	7.58	18.91	NM	663.49
			02/05/18	NP	7.89	18.95	NM	663.18
			05/07/18	NP	6.24	18.85	NM	664.83
			08/16/18	NP	7.33	NM	NM	663.74

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Table 1
On-Site Groundwater Elevations
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Well ID	TOC Elevation [1] (ft. amsl)	Screen Interval (ft. bgs)	Gauging Date	Depth to LNAPL (ft. btoc)	Depth to Water (ft. btoc)	Total Depth (ft.)	LNAPL Thickness (ft.)	Corrected Groundwater Elevation (ft. amsl)
MW-52	669.16	15-20	05/09/16	NP	6.39	19.81	NM	662.77
			04/19/17	NP	6.59	19.76	NM	662.57
			07/24/17	NP	8.33	19.75	NM	660.83
			11/06/17	NP	8.87	19.83	NM	660.29
			02/05/18	NP	8.43	19.57	NM	660.73
			05/07/18	NP	6.57	19.76	NM	662.59
			08/16/18	NP	8.30	NM	NM	660.86
MW-53	668.59	16-21	05/09/16	NP	6.05	20.85	NM	662.54
			04/18/17	NP	6.03	20.83	NM	662.56
			07/24/17	NP	7.92	20.63	NM	660.67
			11/06/17	NP	8.35	21.08	NM	660.24
			02/05/18	NP	7.98	20.68	NM	660.61
			05/07/18	NP	6.08	20.81	NM	662.51
			08/16/18	NP	7.87	NM	NM	660.72
MW-54	668.49	16-21	04/19/17	NP	6.01	20.86	NM	662.48
			07/24/17	NP	8.08	20.52	NM	660.41
			11/06/17	NP	8.17	20.71	NM	660.32
			02/05/18	NP	7.96	20.56	NM	660.53
			05/07/18	NP	6.09	20.82	NM	662.40
			08/16/18	NP	8.01	NM	NM	660.48
MW-55	670.04	15-20	04/19/17	NP	6.84	19.82	NM	663.20
			07/24/17	NP	8.95	19.56	NM	661.09
			11/06/17	NP	8.98	20.03	NM	661.06
			02/05/18	NP	8.78	19.64	NM	661.26
			05/07/18	NP	6.91	19.74	NM	663.13
			08/16/18	NP	8.66	NM	NM	661.38
MW-56	670.26	16-21	04/19/17	NP	6.67	20.69	NM	663.59
			07/24/17	NP	8.18	20.58	NM	662.08
			11/06/17	NP	8.37	20.76	NM	661.89
			02/05/18	NP	8.08	20.59	NM	662.18
			05/07/18	NP	6.62	26.44	NM	663.64
			08/16/18	NP	7.95	NM	NM	662.31
MW-57	668.93	17-22	04/19/17	NP	5.89	21.72	NM	663.04
			07/24/17	NP	7.83	21.63	NM	661.10
			11/06/17	NP	8.12	21.83	NM	660.81
			02/06/18	NP	7.86	21.80	NM	661.07
			05/07/18	NP	5.79	21.73	NM	663.14
			08/16/18	NP	7.59	NM	NM	661.34
MW-58	668.73	15-20	05/09/16	NP	3.51	19.74	NM	665.22
			04/19/17	NP	4.28	19.72	NM	664.45
			07/24/17	NP	5.68	18.70	NM	663.05
			11/06/17	NP	5.78	19.69	NM	662.95
			02/05/18	NP	5.63	19.40	NM	663.10
			05/07/18	NP	4.01	19.68	NM	664.72
			08/16/18	NP	5.43	NM	NM	663.30
MW-62	671.06	16.3-21.3	04/20/17	NP	7.89	21.13	NM	663.17
			07/24/17	NP	10.11	21.01	NM	660.95
			11/06/17	NP	9.43	21.14	NM	661.63
			02/05/18	NP	9.46	21.15	NM	661.60
			05/07/18	NP	7.72	21.15	NM	663.34
			08/16/18	NP	8.75	NM	NM	662.31
MW-63	669.96	7-12	04/20/17	NP	7.32	11.75	NM	662.64
			07/24/17	NP	8.45	11.78	NM	661.51
			11/06/17	NP	8.18	11.80	NM	661.78
			02/05/18	NP	8.77	11.80	NM	661.19
			05/07/18	NP	7.24	11.80	NM	662.72
			08/16/18	NP	7.82	NM	NM	662.14

See Notes on Last Page.

Table 1
On-Site Groundwater Elevations
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Well ID	TOC Elevation [1] (ft. amsl)	Screen Interval (ft. bgs)	Gauging Date	Depth to LNAPL (ft. btoc)	Depth to Water (ft. btoc)	Total Depth (ft.)	LNAPL Thickness (ft.)	Corrected Groundwater Elevation (ft. amsl)
MW-64	671.09	15-20	04/20/17	NP	8.55	21.10	NM	662.54
			07/24/17	NP	9.83	20.05	NM	661.26
			11/06/17	NP	10.20	20.36	NM	660.89
			02/06/18	NP	10.14	20.19	NM	660.95
			05/07/18	NP	8.44	20.05	NM	662.65
			08/16/18	NP	9.42	NM	NM	661.67
MW-65	671.98	16-21	04/20/17	NP	8.26	21.18	NM	663.72
			07/24/17	NP	9.87	21.11	NM	662.11
			11/06/17	NP	9.68	21.11	NM	662.30
			02/05/18	NP	10.05	21.16	NM	661.93
			05/07/18	NP	8.37	21.04	NM	663.61
			08/16/18	NP	9.13	NM	NM	662.85
MW-66	669.83	15-20	04/20/17	NP	6.55	19.49	NM	663.28
			07/24/17	NP	7.81	19.35	NM	662.02
			11/06/17	NP	7.51	19.23	NM	662.32
			02/05/18	NP	8.03	19.06	NM	661.80
			05/07/18	NP	6.79	19.02	NM	663.04
			08/16/18	NP	7.33	NM	NM	662.50
MW-67	671.32	9-14	04/20/17	NP	9.44	13.97	NM	661.88
			07/24/17	NP	9.84	13.84	NM	661.48
			11/06/17	NP	9.76	14.01	NM	661.56
			02/05/18	NP	10.00	14.02	NM	661.32
			05/07/18	NP	9.14	14.01	NM	662.18
			08/16/18	NP	9.48	NM	NM	661.84
MW-68	670.71	15-20	04/20/17	NP	9.39	21.85	NM	661.32
			07/24/17	NP	9.55	19.86	NM	661.16
			11/06/17	NP	9.51	19.85	NM	661.20
			02/05/18	NP	9.68	19.85	NM	661.03
			05/15/18	NP	8.68	19.82	NM	662.03
			08/16/18	NP	9.04	NM	NM	661.67
MW-69	670.27	15-20	04/20/17	NP	9.71	19.91	NM	660.56
			07/24/17	NP	NM	NM	NM	NM
			11/06/17	NP	9.91	19.98	NM	660.36
			02/05/18	NP	9.78	20.01	NM	660.49
			05/07/18	NP	14.78	19.91	NM	655.49
			08/16/18	NP	8.90	NM	NM	661.37
MW-70	671.36	15-20	04/20/17	NP	11.46	20.14	NM	659.90
			07/24/17	NP	11.02	20.18	NM	660.34
			11/06/17	NP	10.23	20.15	NM	661.13
			02/05/18	NP	10.74	20.12	NM	660.62
			05/07/18	NP	9.72	20.13	NM	661.64
			08/16/18	NP	9.67	NM	NM	661.69
MW-71	671.04	15-20	04/20/17	NP	12.45	20.16	NM	658.59
			07/24/17	NP	11.84	20.22	NM	659.20
			11/06/17	NP	10.74	20.21	NM	660.30
			02/05/18	NP	11.13	20.18	NM	659.91
			05/07/18	NP	10.23	20.35	NM	660.81
			08/16/18	NP	9.79	NM	NM	661.25
PW-16-01	670.23	9.7-19.7	07/24/17	NP	9.04	21.58	NM	661.19
			11/06/17	NP	8.45	21.58	NM	661.78
			02/05/18	NP	8.70	21.62	NM	661.53
			05/07/18	NP	7.24	21.44	NM	662.99
			08/16/18	NP	7.56	NM	NM	662.67
PW-16-02	669.97	6-21	07/24/17	NP	6.77	8.36	NM	663.20
			11/06/17	NP	6.54	23.79	NM	663.43
			02/05/18	NP	6.65	24.55	NM	663.32
			05/07/18	NP	4.85	23.65	NM	665.12
			08/16/18	NP	6.40	NM	NM	663.57

See Notes on Last Page.

Table 1
On-Site Groundwater Elevations
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Well ID	TOC Elevation [1] (ft. amsl)	Screen Interval (ft. bgs)	Gauging Date	Depth to LNAPL (ft. btoc)	Depth to Water (ft. btoc)	Total Depth (ft.)	LNAPL Thickness (ft.)	Corrected Groundwater Elevation (ft. amsl)
TW-16-01	669.53	12-17	07/24/17	NP	8.36	16.80	NM	661.17
			11/06/17	NP	7.68	16.64	NM	661.85
			02/05/18	NP	7.91	16.87	NM	661.62
			05/07/18	NP	6.87	16.64	NM	662.66
			08/16/18	NP	6.78	NM	NM	662.75
TW-16-02	669.43	12-17	04/20/17	NP	4.48	18.85	NM	664.95
			07/24/17	NP	8.00	17.14	NM	661.43
			11/06/17	NP	7.48	17.17	NM	661.95
			02/05/18	NP	7.71	17.15	NM	661.72
			05/07/18	NP	6.85	16.91	NM	662.58
			08/16/18	NP	6.62	NM	NM	662.81
TW-16-03	669.34	9-19	07/24/17	NP	6.10	18.65	NM	663.24
			11/06/17	NP	6.00	18.65	NM	663.34
			02/05/18	NP	6.05	18.75	NM	663.29
			05/07/18	NP	4.29	18.72	NM	665.05
			08/16/18	NP	5.79	NM	NM	663.55
TW-16-04	669.80	9-19	04/20/17	NP	4.90	19.02	NM	664.90
			07/24/17	NP	6.46	18.93	NM	663.34
			11/06/17	NP	6.36	18.93	NM	663.44
			02/05/18	NP	6.43	18.73	NM	663.37
			05/07/18	NP	4.65	18.90	NM	665.15
			08/16/18	NP	6.17	NM	NM	663.63

Notes:
Water level measurements collected from top of well casing.
[1] TOC elevation re-surveyed on October 12-13, and/or November 20, 2017 by Geodetic Designs Inc.
[2] MW-1 submerged under water during the 1Q 2018 sampling event.
* Monitoring well TOC could not be re-surveyed due to access.
** Unable to calculate a corrected groundwater elevation due LNAPL thickness throughout well screen.

Abbreviations:

ft.	Feet
ft. amsl	Feet above mean sea level
ft. bgs	Feet below ground surface
ft. btoc	Feet below top of casing
LNAPL	Light non-aqueous phase liquid
NM	Not measured
NP	No product detected
TOC	Top of casing

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-1					MW-2						MW-3					
Screen Interval (ft. bgs):			14-19					15.5-20.5						14-19					
Date:	Unit		4/26/2017	7/28/2017	11/10/2017	5/11/2018	8/14/2018	4/27/2017	8/3/2017	11/9/2017	2/13/2018	5/10/2018	8/10/2018	4/27/2017	8/3/2017	11/9/2017	2/13/2018	5/10/2018	8/7/2018
Semi-volatile Organic Compounds (SVOC's)																			
1,4-Dioxane	µg/l	350	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	1.5 J	1.8 J	4.5	4.4	5.7	5.1	0.67 J	0.79 J	0.57 J	< 2.0	0.50 J	1.4 J
Volatile Organic Compounds (VOC's)																			
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 130	< 250	< 330	< 330	< 130	< 710	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	1.0 J	< 10	< 10	< 10	< 250	< 500	< 670	< 670	< 250	< 1,400	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 250	< 500	< 670	< 670	< 250	< 1,400	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	4.0 J	< 10	2.8 J	< 10	< 250	< 500	< 670	< 670	< 250	< 1,400	< 10	< 10	< 10	< 10	< 10	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 130	< 250	< 330	< 330	< 130	< 710	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	**630**	**1,200**	**1,000**	**1,400**	**1,700 J**	**2,300**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 130	< 250	< 330	< 330	< 130	< 710	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 50	< 100	< 130	< 130	< 50	< 290	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 250	< 500	< 670	< 670	< 250	< 1,400	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 250	< 500	< 670	< 670	< 250	< 1,400	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-1					MW-2						MW-3					
Screen Interval (ft. bgs):			14-19					15.5-20.5						14-19					
Date:	Unit		4/26/2017	7/28/2017	11/10/2017	5/11/2018	8/14/2018	4/27/2017	8/3/2017	11/9/2017	2/13/2018	5/10/2018	8/10/2018	4/27/2017	8/3/2017	11/9/2017	2/13/2018	5/10/2018	8/7/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 50	< 100	< 130	< 130	< 50	< 290	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	**200**	**270**	**260**	**390**	**510**	**510**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 25	< 50	< 67	< 67	< 25	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	**200**	**160**	**140**	**210**	**190**	**170**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Gases																			
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																			
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																			
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-4						MW-5					MW-7				
Screen Interval (ft. bgs):			15.5-20.5						15.5-20.5					18-23				
Date:	Unit		4/27/2017	8/3/2017	11/9/2017	2/13/2018	5/10/2018	8/7/2018	8/3/2017	11/9/2017	2/13/2018	5/10/2018	8/7/2018	7/31/2017	11/10/2017	2/12/2018	5/11/2018	8/14/2018
Semi-volatile Organic Compounds (SVOC's)																		
1,4-Dioxane	µg/l	350	1.1 J	0.78 J	< 20	0.38 J	0.76 J	< 200	0.35 J	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)																		
1,1,1-Trichloroethane	µg/l	200	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5,000	< 5,000	< 5,000	< 8,300	< 5,000 J	< 5,000	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10,000	< 10,000	< 10,000	< 17,000	< 10,000 J	< 10,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10,000	< 10,000	< 10,000	< 17,000	< 10,000 J	< 10,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10,000	< 10,000	< 10,000	< 17,000	< 10,000 J	< 10,000	< 10	< 10	< 10	1.9 J	< 10	< 10	< 10	< 10	< 10	< 10
Benzene	µg/l	5.0	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5,000	< 5,000	< 5,000	< 8,300	< 5,000 J	< 5,000	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	**32,000**	**27,000**	**21,000**	**26,000**	**21,000 J**	**22,000**	< 1.0	< 1.0	< 1.0	0.58 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,3-Dichloropropene	µg/l	NS	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5,000	< 5,000	< 5,000	< 8,300	< 5,000 J	< 5,000	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2,000	< 2,000	< 2,000	< 3,300	< 2,000 J	< 2,000	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10,000	< 10,000	< 10,000	< 17,000	< 10,000 J	< 10,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10,000	< 10,000	< 10,000	< 17,000	< 10,000 J	< 10,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-4						MW-5					MW-7				
Screen Interval (ft. bgs):			15.5-20.5						15.5-20.5					18-23				
Date:	Unit		4/27/2017	8/3/2017	11/9/2017	2/13/2018	5/10/2018	8/7/2018	8/3/2017	11/9/2017	2/13/2018	5/10/2018	8/7/2018	7/31/2017	11/10/2017	2/12/2018	5/11/2018	8/14/2018
Methyl-tert-butylether	µg/l	40	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2,000	< 2,000	< 2,000	< 3,300	< 2,000 J	< 2,000	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	**1,200**	**1,100**	**850 J**	**1,100 J**	**860 J**	**1,000**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 1,000	< 1,000	< 1,000	< 1,700	< 1,000 J	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	**21,000**	**18,000**	**19,000**	**23,000**	**23,000 J**	**31,000**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	**570 J**	**640 J**	**470 J**	< 1,700	**610 J**	< 1,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Gases																		
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																		
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																		
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-9					MW-10						MW-14				
Screen Interval (ft. bgs):			19.5-24.5					16.5-21.5						15-20				
Date:	Unit		7/28/2017	11/10/2017	2/12/2018	5/11/2018	8/14/2018	4/27/2017	8/4/2017	11/9/2017	2/13/2018	5/10/2018	8/9/2018	7/28/2017	11/10/2017	2/12/2018	5/11/2018	8/14/2018
Semi-volatile Organic Compounds (SVOC's)																		
1,4-Dioxane	µg/l	350	8.6	11	12	3.6	4.3	5.9	4.5	5.6	4.4	4.4	4.8	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)																		
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 250	< 330	< 500	< 1,000	< 500	< 710	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	< 10	< 500	< 670	< 1,000	< 2,000	< 1,000	< 1,400	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 500	< 670	< 1,000	< 2,000	< 1,000	< 1,400	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	< 10	< 500	< 670	< 1,000	< 2,000	< 1,000	< 1,400	< 10	< 10	< 10	3.0 J	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 250	< 330	< 500	< 1,000	< 500	< 710	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	0.29 J	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	0.31 J
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 250	< 330	< 500	< 1,000	< 500	< 710	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 100	< 130	< 200	< 400	< 200	< 290	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 500	< 670	< 1,000	< 2,000	< 1,000	< 1,400	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 500	< 670	< 1,000	< 2,000	< 1,000	< 1,400	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-9					MW-10						MW-14				
Screen Interval (ft. bgs):			19.5-24.5					16.5-21.5						15-20				
Date:	Unit		7/28/2017	11/10/2017	2/12/2018	5/11/2018	8/14/2018	4/27/2017	8/4/2017	11/9/2017	2/13/2018	5/10/2018	8/9/2018	7/28/2017	11/10/2017	2/12/2018	5/11/2018	8/14/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 100	< 130	< 200	< 400	< 200	< 290	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 50	< 67	< 100	< 200	< 100	< 140	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	**5.5**	**7.1**	**4.6**	**2.2**	1.7	**1,200**	**2,100**	**2,000**	**1,900**	**3,100**	**2,300**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Gases																		
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																		
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																		
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-15-59D						MW-15-60D						MW-15-61D					
Screen Interval (ft. bgs):			94-99						93-98						88-93					
Date:	Unit		4/26/2017	8/1/2017	11/15/2017	2/6/2018	5/15/2018	8/9/2018	4/26/2017	8/1/2017	11/15/2017	2/6/2018	5/11/2018	8/7/2018	4/26/2017	8/1/2017	11/15/2017	2/6/2018	5/15/2018	8/7/2018
Semi-volatile Organic Compounds (SVOC's)																				
1,4-Dioxane	µg/l	350	NA	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	NA	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	NA	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)																				
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	3.3 J	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	12	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.57 J	< 1.0	< 1.0	< 1.0	< 1.0	0.25 J
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	1.6 J	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	0.51 J	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	0.91 J	0.58 J	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	0.86 J	0.58 J	0.62 J	0.76 J	0.69 J	0.43 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.48 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.50 J	< 1.0	< 1.0	< 1.0	0.12 J
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	0.62 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.47 J	< 1.0

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-15-59D						MW-15-60D						MW-15-61D					
Screen Interval (ft. bgs):			94-99						93-98						88-93					
Date:	Unit		4/26/2017	8/1/2017	11/15/2017	2/6/2018	5/15/2018	8/9/2018	4/26/2017	8/1/2017	11/15/2017	2/6/2018	5/11/2018	8/7/2018	4/26/2017	8/1/2017	11/15/2017	2/6/2018	5/15/2018	8/7/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.27 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	0.35 J	0.46 J	0.30 J	0.31 J	< 1.0	0.17 J	< 1.0	0.33 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.28 J	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	0.25 J	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Gases																				
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																				
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																				
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-18						MW-19				MW-20					MW-21		
Screen Interval (ft. bgs):			13-18						15-20				13.5-18.5					13.5-18.5		
Date:	Unit		4/21/2017	7/28/2017	11/10/2017	2/14/2018	5/8/2018	8/7/2018	11/14/2017	2/14/2018	5/14/2018	8/10/2018	7/31/2017	11/10/2017	2/12/2018	5/11/2018	8/9/2018	2/13/2018	5/15/2018	8/14/2018
Semi-volatile Organic Compounds (SVOC's)																				
1,4-Dioxane	µg/l	350	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	120	130	140	130	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	25	5.3	6.5
Volatile Organic Compounds (VOC's)																				
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	6.3	4.8	3.6	4.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	NA*	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5,000	< 5,000	< 5,000
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.26 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.49 J	0.52 J	0.36 J	0.48 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	1.3 J	< 10	< 10	< 10	1.4 J	< 10	< 10,000	< 10,000	1,500 J
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	0.87 J	< 10	< 10	0.81 J	2.0 J	0.63 J	< 10,000	< 10,000	830 J
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	3.2 J	5.6 J	< 10	< 10	2.2 J	3.8 J	6.9 J	< 10,000	2,100 J	< 10,000
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5,000	< 5,000	< 5,000
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	8.9	6.5	1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
cis-1,2-Dichloroethene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	1.1	0.94 J	0.71 J	1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	**20,000**	**18,000**	**26,000**
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5,000	**560 J**	< 5,000
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2,000	< 2,000	< 2,000
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10,000	< 10,000	< 10,000
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	1.1 J	< 10	< 10	< 10	< 10	< 10	< 10,000	< 10,000	910 J
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-18						MW-19				MW-20					MW-21		
Screen Interval (ft. bgs):			13-18						15-20				13.5-18.5					13.5-18.5		
Date:	Unit		4/21/2017	7/28/2017	11/10/2017	2/14/2018	5/8/2018	8/7/2018	11/14/2017	2/14/2018	5/14/2018	8/10/2018	7/31/2017	11/10/2017	2/12/2018	5/11/2018	8/9/2018	2/13/2018	5/15/2018	8/14/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000 J	< 1,000
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2,000	< 2,000	< 2,000
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	**190 J**
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 1,000
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	1.1	1.0	0.91 J	1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	**460 J**	< 1,000	< 1,000
Vinyl chloride	µg/l	2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	1.8	1.5	1.3	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	**5,400**	**3,700**	**3,400**
Gases																				
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																				
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																				
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-22						MW-23					MW-24					
Screen Interval (ft. bgs):			16.5-21.5						15-20					19-24					
Date:	Unit		4/25/2017	8/2/2017	11/7/2017	2/6/2018	5/10/2018	8/6/2018	8/3/2017	11/7/2017	2/6/2018	5/7/2018	8/6/2018	4/26/2017	8/2/2017	11/10/2017	2/14/2018	5/14/2018	8/14/2018
Semi-volatile Organic Compounds (SVOC's)																			
1,4-Dioxane	µg/l	350	32	26	49	22	34	19	0.50 J	< 20	< 20	< 2.0	< 200	< 2.0	0.26 J	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)																			
1,1,1-Trichloroethane	µg/l	200	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 310	< 500	< 250	< 710	< 330	< 250	< 5,000	< 10,000	< 5,000	< 500	< 13,000	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 630	< 1,000	< 500	< 1,400	< 670	< 500	< 10,000	< 20,000	< 10,000	< 1,000	< 25,000	< 10	< 10	< 10	< 10	< 10	1.7 J
-4Methyl-2-Pentanone	µg/l	5,200	< 630	< 1,000	< 500	< 1,400	< 670	< 500	< 10,000	< 20,000	< 10,000	< 1,000	< 25,000	< 10	< 10	< 10	< 10	< 10	0.77 J
Acetone	µg/l	2,100	< 630	< 1,000	< 500	< 1,400	< 670	< 500	< 10,000	< 20,000	< 10,000	< 1,000	< 25,000	< 10	< 10	< 10	< 10	< 10	< 10
Benzene	µg/l	5.0	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 310	< 500	< 250	< 710	< 330	< 250	< 5,000	< 10,000	< 5,000	< 500	< 13,000	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	**130**	**210**	25 J	**200**	**180**	**310**	**21,000**	**78,000**	**33,000**	**2,400**	**43,000**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,3-Dichloropropene	µg/l	NS	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	**140 J**	< 500	< 250	**120 J**	< 330	< 250	< 5,000	< 10,000	**750 J**	< 500	< 13,000	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 130	< 200	< 100	< 290	< 130	< 100	< 2,000	< 4,000	< 2,000	< 200	< 5,000	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 630	< 1,000	< 500	< 1,400	< 670	< 500	< 10,000	< 20,000	< 10,000	< 1,000	< 25,000	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 630	< 1,000	< 500	< 1,400	< 670	< 500	< 10,000	< 20,000	< 10,000	< 1,000	< 25,000	< 10	< 10	< 10	< 10	< 10	0.88 J
Methylcyclohexane	µg/l	NS	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-22						MW-23					MW-24					
Screen Interval (ft. bgs):			16.5-21.5						15-20					19-24					
Date:	Unit		4/25/2017	8/2/2017	11/7/2017	2/6/2018	5/10/2018	8/6/2018	8/3/2017	11/7/2017	2/6/2018	5/7/2018	8/6/2018	4/26/2017	8/2/2017	11/10/2017	2/14/2018	5/14/2018	8/14/2018
Methyl-tert-butylether	µg/l	40	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 130	< 200	< 100	< 290	< 130	< 100	< 2,000	< 4,000	< 2,000	< 200	< 5,000	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 63	< 100	< 50	< 140	< 67	< 50	**1,200**	**4,100**	**1,800**	**180**	**2,300 J**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 63	< 100	< 50	< 140	< 67	< 50	< 1,000	< 2,000	< 1,000	< 100	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 63	< 100	< 50	< 140	< 67	< 50	**5,300**	**25,000**	**11,000**	**1,000**	**12,000**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	**2,300**	**2,100**	**1,600**	**1,500**	**2,400**	**1,300**	**1,100**	**2,400**	**820 J**	**77 J**	< 2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Gases																			
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																			
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																			
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-25						MW-26				MW-28				
Screen Interval (ft. bgs):			16-21						4.5-14.5				2-12				
Date:	Unit		4/21/2017	8/2/2017	11/14/2017	2/13/2018	5/9/2018	8/13/2018	8/4/2017	11/14/2017	5/15/2018	8/9/2018	8/3/2017	11/8/2017	2/7/2018	5/15/2018	8/13/2018
Semi-volatile Organic Compounds (SVOC's)																	
1,4-Dioxane	µg/l	350	0.75 J	1.1 J	0.86 J	0.68 J	0.99 J	1.9 J	0.25 J	< 2.0	< 2.0	< 2.0	0.44 J	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)																	
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	28	26	25	24	37
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	14	12	10	13	15
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.71 J	1.6	0.90 J	0.57 J	0.33 J
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	1.1	0.91 J	0.50 J	0.43 J	0.86 J
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-25						MW-26				MW-28				
Screen Interval (ft. bgs):			16-21						4.5-14.5				2-12				
Date:	Unit		4/21/2017	8/2/2017	11/14/2017	2/13/2018	5/9/2018	8/13/2018	8/4/2017	11/14/2017	5/15/2018	8/9/2018	8/3/2017	11/8/2017	2/7/2018	5/15/2018	8/13/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.22 J
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.68 J	0.59 J	0.45 J	0.51 J	0.66 J
Vinyl chloride	µg/l	2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Gases																	
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																	
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																	
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-29						MW-30						MW-31					
Screen Interval (ft. bgs):			5-15						19-24						17-22					
Date:	Unit		4/26/2017	8/4/2017	11/14/2017	2/14/2018	5/14/2018	8/9/2018	4/25/2017	7/27/2017	11/9/2017	2/13/2018	5/8/2018	8/10/2018	4/21/2017	7/28/2017	11/10/2017	2/14/2018	5/8/2018	8/10/2018
Semi-volatile Organic Compounds (SVOC's)																				
1,4-Dioxane	µg/l	350	1.4 J	3.8	9.0	0.90 J	0.47 J	< 2.0	10	11	13	12	14	15	< 2.0	0.47 J	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)																				
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	NA*	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	1.1	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	4.4 J	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:			MW-29						MW-30						MW-31					
Screen Interval (ft. bgs):			5-15						19-24						17-22					
Date:	Unit	MDEQ Nonresidential Drinking Water Criteria	4/26/2017	8/4/2017	11/14/2017	2/14/2018	5/14/2018	8/9/2018	4/25/2017	7/27/2017	11/9/2017	2/13/2018	5/8/2018	8/10/2018	4/21/2017	7/28/2017	11/10/2017	2/14/2018	5/8/2018	8/10/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.68 J	0.84 J	< 1.0	< 1.0	< 1.0
Gases																				
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	< 0.50	NA	0.31 J	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	< 0.50	NA	< 1.0	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	65	NA	360	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																				
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	2.6	NA	2.5	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	< 1.0	NA	< 0.10	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	52	NA	53	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	2.1	NA	2.4	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																				
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	< 100	NA	**3,700**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	**630**	NA	**3,700**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	**77**	NA	**150**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	**70**	NA	**150**	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-32					MW-33					MW-34					
Screen Interval (ft. bgs):			18-23					14-19					16.5-21.5					
Date:	Unit		7/28/2017	11/7/2017	2/12/2018	5/8/2018	8/7/2018	7/28/2017	11/8/2017	2/14/2018	5/8/2018	8/9/2018	4/24/2017	7/27/2017	11/9/2017	2/13/2018	5/8/2018	8/10/2018
Semi-volatile Organic Compounds (SVOC's)																		
1,4-Dioxane	µg/l	350	0.28 J	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	8.3	6.1	6.6	7.4	4.9	7.6
Volatile Organic Compounds (VOC's)																		
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	2.7 J	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	< 1.0	0.31 J	0.37 J	0.50 J	0.32 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.37 J	0.35 J	< 1.0	< 1.0	0.33 J
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-32					MW-33					MW-34					
Screen Interval (ft. bgs):			18-23					14-19					16.5-21.5					
Date:	Unit		7/28/2017	11/7/2017	2/12/2018	5/8/2018	8/7/2018	7/28/2017	11/8/2017	2/14/2018	5/8/2018	8/9/2018	4/24/2017	7/27/2017	11/9/2017	2/13/2018	5/8/2018	8/10/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	< 1.0	0.67 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.52 J	1.5	2.0	0.97 J	0.87 J	1.1
Gases																		
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																		
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																		
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-35					MW-36					MW-37				
Screen Interval (ft. bgs):			19.5-24.5					20-25					18-23				
Date:	Unit		7/27/2017	11/7/2017	2/14/2018	5/9/2018	8/10/2018	7/28/2017	11/10/2017	2/15/2018	5/14/2018	8/14/2018	8/1/2017	11/10/2017	2/12/2018	5/10/2018	8/9/2018
Semi-volatile Organic Compounds (SVOC's)																	
1,4-Dioxane	µg/l	350	4.9	4.6	4.3	4.7	4.3	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	0.37 J	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)																	
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	1.7 J	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	0.89 J	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	1.1 J	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-35					MW-36					MW-37				
Screen Interval (ft. bgs):			19.5-24.5					20-25					18-23				
Date:	Unit		7/27/2017	11/7/2017	2/14/2018	5/9/2018	8/10/2018	7/28/2017	11/10/2017	2/15/2018	5/14/2018	8/14/2018	8/1/2017	11/10/2017	2/12/2018	5/10/2018	8/9/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	**3.5**	**2.4**	**4.5**	**7.2**	**3.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Gases																	
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																	
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																	
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-38						MW-39						MW-40			
Screen Interval (ft. bgs):			15-20						20-25						20-25			
Date:	Unit		4/26/2017	7/28/2017	11/8/2017	2/15/2018	5/8/2018	8/9/2018	4/26/2017	7/28/2017	11/7/2017	2/15/2018	5/8/2018	8/7/2018	7/28/2017	11/15/2017	5/8/2018	8/10/2018
Semi-volatile Organic Compounds (SVOC's)																		
1,4-Dioxane	µg/l	350	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)																		
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	2.7	3.2	2.3 J	2.4
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-38						MW-39						MW-40			
Screen Interval (ft. bgs):			15-20						20-25						20-25			
Date:	Unit		4/26/2017	7/28/2017	11/8/2017	2/15/2018	5/8/2018	8/9/2018	4/26/2017	7/28/2017	11/7/2017	2/15/2018	5/8/2018	8/7/2018	7/28/2017	11/15/2017	5/8/2018	8/10/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.41 J	0.48 J	0.34 J	0.37 J
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.77 J	1.8	1.3 J	0.54 J
Gases																		
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																		
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																		
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-41						MW-42						MW-43					
Screen Interval (ft. bgs):			16-21						16-21						17-22					
Date:	Unit		4/24/2017	7/27/2017	11/9/2017	2/13/2018	5/8/2018	8/10/2018	4/24/2017	7/27/2017	11/9/2017	2/13/2018	5/9/2018	8/10/2018	4/27/2017	7/27/2017	11/9/2017	2/13/2018	5/9/2018	8/10/2018
Semi-volatile Organic Compounds (SVOC's)																				
1,4-Dioxane	µg/l	350	1.9 J	1.4 J	2.2	0.77 J	0.75 J	1.6 J	1.3 J	1.8 J	2.4	1.8 J	2.2	2.3	3.6	3.5	3.5	2.2	2.8	3.3
Volatile Organic Compounds (VOC's)																				
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.21 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	1.9	1.8	2.3	2.1	2.6	2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:			MW-41						MW-42						MW-43					
Screen Interval (ft. bgs):		MDEQ Nonresidential Drinking Water Criteria	16-21						16-21						17-22					
Date:	Unit		4/24/2017	7/27/2017	11/9/2017	2/13/2018	5/8/2018	8/10/2018	4/24/2017	7/27/2017	11/9/2017	2/13/2018	5/9/2018	8/10/2018	4/27/2017	7/27/2017	11/9/2017	2/13/2018	5/9/2018	8/10/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.34 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	**3.2**	1.9	**2.4**	**2.1**	**5.3**	**3.0**	0.81 J	0.99 J	1.0	0.81 J	0.99 J	0.60 J	**8.4**	**3.0**	**2.2**	**8.0**	**6.4 J**	1.0
Gases																				
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	0.48 J	NA	0.74 J	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	< 0.50	NA	0.27 J	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	190	NA	210	NA	NA	NA
Other																				
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	4.4	NA	4.3	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	< 0.50	NA	< 0.20	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	220	NA	**260**	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	4	NA	4.3	NA	NA	NA
Metals																				
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	**1,700**	NA	**2,800**	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	**2,500**	NA	**3,900**	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	**210**	NA	**190**	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	**210**	NA	**200**	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-44						MW-45						MW-46					
Screen Interval (ft. bgs):			16-21						15-20						16-21					
Date:	Unit		4/25/2017	8/2/2017	11/7/2017	2/6/2018	5/14/2018	8/13/2018	4/24/2017	8/1/2017	11/13/2017	2/12/2018	5/8/2018	8/9/2018	4/24/2017	7/31/2017	11/13/2017	2/12/2018	5/14/2018	8/9/2018
Semi-volatile Organic Compounds (SVOC's)																				
1,4-Dioxane	µg/l	350	12	7.1	12	9.0	11	9.5	4.1	2.5	< 2.0	< 2.0	0.40 J	1.0 J	21	0.83 J	3.7	11	13	8.5
Volatile Organic Compounds (VOC's)																				
1,1,1-Trichloroethane	µg/l	200	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	1.9 J	2.8	3.6	2.4	1.0 J	1.3
1,1-Dichloroethene	µg/l	7.0	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	0.78 J	0.90 J	0.46 J	< 1.7	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 31	< 50	< 100	< 33	< 67	< 100	< 2,500	< 2,500	< 330	< 500	< 330	< 170	< 25	< 5.0	< 13	< 5.0	< 8.4	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	0.55 J	< 1.7	0.57 J
1,2-Dichloropropane	µg/l	5.0	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 63	< 100	< 200	< 67	< 130	< 200	< 5,000	< 5,000	< 670	< 1,000	< 670	< 330	< 50	< 10	< 25	< 10	< 17	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 63	< 100	< 200	< 67	< 130	< 200	< 5,000	< 5,000	< 670	< 1,000	< 670	< 330	< 50	< 10	< 25	< 10	< 17	< 10
Acetone	µg/l	2,100	< 63	< 100	< 200	< 67	< 130	< 200	< 5,000	< 5,000	< 670	< 1,000	< 670	< 330	< 50	< 10	< 25	< 10	< 17	< 10
Benzene	µg/l	5.0	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Bromodichloromethane	µg/l	80	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Bromoform	µg/l	80	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Bromomethane	µg/l	29	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Carbon Disulfide	µg/l	2,300	< 31	< 50	< 100	< 33	< 67	< 100	< 2,500	< 2,500	< 330	< 500	< 330	< 170	< 25	< 5.0	< 13	< 5.0	< 8.4	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
CFC-11	µg/l	7,300	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
CFC-12	µg/l	4,800	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Chlorobenzene	µg/l	100	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Chlorodibromomethane	µg/l	80	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Chloroethane	µg/l	1,700	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Chloroform	µg/l	80	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Chloromethane	µg/l	1,100	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
cis-1,2-Dichloroethene	µg/l	70	< 6.3	< 10	< 20	< 6.7	< 13	< 20	**10,000**	**8,100**	**2,100**	**1,800**	**1,200**	**1,000**	21	15	22	14	6.0	11
cis-1,3-Dichloropropene	µg/l	NS	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Cyclohexane	µg/l	NS	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Dichloromethane	µg/l	5.0	**8.3 J**	< 50	**18 J**	4.1 J	**9.7 J**	< 100	**330 J**	< 2,500	< 330	< 500	< 330	< 170	4.1 J	< 5.0	< 13	< 5.0	< 8.4	< 5.0
Diethyl ether	µg/l	10	< 13	< 20	< 40	< 13	< 27	< 40	< 1,000	< 1,000	< 130	< 200	< 130	< 67	< 10	< 2.0	< 5.0	< 2.0	< 3.3	< 2.0
Ethylbenzene	µg/l	74	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Isopropylbenzene	µg/l	2,300	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Methyl Acetate	µg/l	NS	< 63	< 100	< 200	< 67	< 130	< 200	< 5,000	< 5,000	< 670	< 1,000	< 670	< 330	< 50	< 10	< 25	< 10	< 17	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 63	< 100	< 200	< 67	< 130	< 200	< 5,000	< 5,000	< 670	< 1,000	< 670	< 330	< 50	< 10	< 25	< 10	< 17	< 10
Methylcyclohexane	µg/l	NS	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-44						MW-45						MW-46					
Screen Interval (ft. bgs):			16-21						15-20						16-21					
Date:	Unit		4/25/2017	8/2/2017	11/7/2017	2/6/2018	5/14/2018	8/13/2018	4/24/2017	8/1/2017	11/13/2017	2/12/2018	5/8/2018	8/9/2018	4/24/2017	7/31/2017	11/13/2017	2/12/2018	5/14/2018	8/9/2018
Methyl-tert-butylether	µg/l	40	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Styrene (Monomer)	µg/l	100	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	7.9	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Tetrachloroethene	µg/l	5.0	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Toluene	µg/l	790	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Total Xylenes	µg/l	280	< 13	< 20	< 40	< 13	< 27	< 40	< 1,000	< 1,000	< 130	< 200	< 130	< 67	< 10	< 2.0	< 5.0	< 2.0	< 3.3	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	1.6 J	2.6	2.7	1.7	0.86 J	1.2
trans-1,3-Dichloropropene	µg/l	NS	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Trichloroethene	µg/l	5.0	< 6.3	< 10	< 20	< 6.7	< 13	< 20	< 500	< 500	< 67	< 100	< 67	< 33	< 5.0	< 1.0	< 2.5	< 1.0	< 1.7	< 1.0
Vinyl chloride	µg/l	2.0	**230**	**380**	**520**	**210**	**270**	**240**	**7,600**	**5,400**	**1,500**	**1,200**	**1,400**	**800**	**150**	**13**	**57**	**38**	**30**	**66**
Gases																				
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																				
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																				
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-47					MW-48						MW-49				
Screen Interval (ft. bgs):			16-21					17-22						12.5-17.5				
Date:	Unit		4/24/2017	7/31/2017	11/10/2017	5/10/2018	8/9/2018	4/21/2017	8/1/2017	11/14/2017	2/12/2018	5/15/2018	8/6/2018	4/21/2017	7/28/2017	2/13/2018	5/11/2018	8/14/2018
Semi-volatile Organic Compounds (SVOC's)																		
1,4-Dioxane	µg/l	350	0.72 J	0.62 J	0.52 J	< 2.0	< 2.0	< 2.0	9.5	2.1	7.7	12	6.2	12	9.4	7.0	5.5	5.0
Volatile Organic Compounds (VOC's)																		
1,1,1-Trichloroethane	µg/l	200	< 5.0	2.2 J	< 10	1.9 J	2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,1,2,2-Tetrachloroethane	µg/l	35	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,1,2-Trichloroethane	µg/l	5.0	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,1-Dichloroethane	µg/l	2,500	3.7 J	3.5 J	4.6 J	2.9 J	4.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,1-Dichloroethene	µg/l	7.0	< 5.0	< 4.0	< 10	< 5.0 J	0.43 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,2,3-Trimethylbenzene	µg/l	NS	< 25	< 20	< 50	< 25 J	< 8.4	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 10,000	< 5,000	< 8,300	< 8,300	< 2,500
1,2,4-Trichlorobenzene	µg/l	70	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,2,4-Trimethylbenzene	µg/l	63	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,2-Dibromoethane	µg/l	0.05	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,2-Dichlorobenzene	µg/l	600	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,2-Dichloroethane	µg/l	5.0	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,2-Dichloropropane	µg/l	5.0	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,3,5-Trimethylbenzene	µg/l	72	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,3-Dichlorobenzene	µg/l	19	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
1,4-Dichlorobenzene	µg/l	75	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
-2Butanone (MEK)	µg/l	38,000	< 50	< 40	< 100	< 50 J	< 17	< 10	< 10	< 10	< 10	< 10	< 10	< 20,000	< 10,000	< 17,000	< 17,000	< 5,000
-4Methyl-2-Pentanone	µg/l	5,200	< 50	< 40	< 100	< 50 J	< 17	< 10	< 10	< 10	< 10	< 10	< 10	< 20,000	< 10,000	< 17,000	< 17,000	< 5,000
Acetone	µg/l	2,100	< 50	< 40	< 100	< 50 J	< 17	< 10	< 10	5.1 J	< 10	3.8 J	< 10	< 20,000	< 10,000	< 17,000	**3,900 J**	< 5,000
Benzene	µg/l	5.0	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Bromodichloromethane	µg/l	80	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Bromoform	µg/l	80	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Bromomethane	µg/l	29	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Carbon Disulfide	µg/l	2,300	< 25	< 20	< 50	< 25 J	< 8.4	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 10,000	< 5,000	< 8,300	< 8,300	< 2,500
Carbon Tetrachloride	µg/l	5.0	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
CFC-11	µg/l	7,300	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
CFC-12	µg/l	4,800	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Chlorobenzene	µg/l	100	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Chlorodibromomethane	µg/l	80	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Chloroethane	µg/l	1,700	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Chloroform	µg/l	80	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Chloromethane	µg/l	1,100	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
cis-1,2-Dichloroethene	µg/l	70	69	69	**79**	49 J	55	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	**43,000**	**29,000**	**20,000**	**17,000**	**15,000**
cis-1,3-Dichloropropene	µg/l	NS	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Cyclohexane	µg/l	NS	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Dichloromethane	µg/l	5.0	3.4 J	< 20	< 50	< 25 J	< 8.4	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	**1,100 J**	< 5,000	< 8,300	**940 J**	< 2,500
Diethyl ether	µg/l	10	< 10	< 8.0	< 20	< 10 J	< 3.3	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 4,000	< 2,000	< 3,300	< 3,300	< 1,000
Ethylbenzene	µg/l	74	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Isopropylbenzene	µg/l	2,300	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Methyl Acetate	µg/l	NS	< 50	< 40	< 100	< 50 J	< 17	< 10	< 10	< 10	< 10	< 10	< 10	< 20,000	< 10,000	< 17,000	< 17,000	< 5,000
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 50	< 40	< 100	< 50 J	< 17	< 10	< 10	< 10	< 10	< 10	< 10	< 20,000	< 10,000	< 17,000	< 17,000	< 5,000
Methylcyclohexane	µg/l	NS	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-47					MW-48						MW-49				
Screen Interval (ft. bgs):			16-21					17-22						12.5-17.5				
Date:	Unit		4/24/2017	7/31/2017	11/10/2017	5/10/2018	8/9/2018	4/21/2017	8/1/2017	11/14/2017	2/12/2018	5/15/2018	8/6/2018	4/21/2017	7/28/2017	2/13/2018	5/11/2018	8/14/2018
Methyl-tert-butylether	µg/l	40	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Styrene (Monomer)	µg/l	100	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Tetrachloroethene	µg/l	5.0	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Toluene	µg/l	790	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Total Xylenes	µg/l	280	< 10	< 8.0	< 20	< 10 J	< 3.3	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 4,000	< 2,000	< 3,300	< 3,300	< 1,000
trans-1,2-Dichloroethene	µg/l	100	7.1	8.6	9.3 J	6.5 J	7.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	**110 J**
trans-1,3-Dichloropropene	µg/l	NS	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Trichloroethene	µg/l	5.0	< 5.0	< 4.0	< 10	< 5.0 J	< 1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2,000	< 1,000	< 1,700	< 1,700	< 500
Vinyl chloride	µg/l	2.0	**120**	**110**	**220**	**88 J**	**59**	0.85 J	**11**	**5.2**	**3.8**	**7.4**	**5.3**	**10,000**	**9,800**	**8,400**	**8,100**	**4,900**
Gases																		
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	6,000	NA	NA	NA	NA	NA
Other																		
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																		
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-50						MW-51						MW-52				
Screen Interval (ft. bgs):			16-21						15-20						15-20				
Date:	Unit		4/21/2017	7/31/2017	11/13/2017	2/12/2018	5/9/2018	8/6/2018	4/25/2017	8/3/2017	11/9/2017	2/8/2018	5/14/2018	8/6/2018	7/27/2017	11/10/2017	2/13/2018	5/9/2018	8/10/2018
Semi-volatile Organic Compounds (SVOC's)																			
1,4-Dioxane	µg/l	350	1.5 J	2.2	0.68 J	0.78 J	2.8	1.7 J	0.75 J	1.2 J	1.1 J	1.1 J	0.49 J	1.6 J	1.3 J	0.68 J	1.2 J	0.30 J	1.8 J
Volatile Organic Compounds (VOC's)																			
1,1,1-Trichloroethane	µg/l	200	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	0.48 J	0.41 J	0.72 J	0.70 J	0.84 J	0.45 J	0.77 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	0.26 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 25	< 20	< 25	< 25	< 25	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	NA*	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.28 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 50	< 40	< 50	< 50	< 50	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 50	< 40	< 50	< 50	< 50	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 50	< 40	< 50	< 50	< 50	< 10	< 10	< 10	< 10	< 10	3.9 J	< 10	2.2 J	< 10	< 10	2.7 J	< 10
Benzene	µg/l	5.0	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 25	< 20	< 25	< 25	< 25	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	13	15	23	22	12	17	< 1.0	< 1.0	< 1.0	0.31 J	< 1.0	0.37 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,3-Dichloropropene	µg/l	NS	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 25	< 20	< 25	3.5 J	< 25	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 10	< 8.0	< 10	< 10	< 10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 50	< 40	< 50	< 50	< 50	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 50	< 40	< 50	< 50	< 50	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-50						MW-51						MW-52				
Screen Interval (ft. bgs):			16-21						15-20						15-20				
Date:	Unit		4/21/2017	7/31/2017	11/13/2017	2/12/2018	5/9/2018	8/6/2018	4/25/2017	8/3/2017	11/9/2017	2/8/2018	5/14/2018	8/6/2018	7/27/2017	11/10/2017	2/13/2018	5/9/2018	8/10/2018
Methyl-tert-butylether	µg/l	40	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 10	< 8.0	< 10	< 10	< 10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	0.31 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 5.0	< 4.0	< 5.0	< 5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	**48**	**140**	**150**	**76**	**150**	**97**	0.57 J	0.97 J	0.47 J	< 1.0	0.70 J	0.40 J	**7.0**	**9.1**	**4.0**	**4.3**	**4.5**
Gases																			
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																			
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																			
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-53						MW-54					MW-55				
Screen Interval (ft. bgs):			16-21						16-21					15-20				
Date:	Unit		4/24/2017	7/27/2017	11/8/2017	2/7/2018	5/9/2018	8/13/2018	7/27/2017	11/8/2017	2/7/2018	5/9/2018	8/13/2018	7/27/2017	11/8/2017	2/7/2018	5/10/2018	8/13/2018
Semi-volatile Organic Compounds (SVOC's)																		
1,4-Dioxane	µg/l	350	1.1 J	2.0	0.61 J	1.1 J	1.4 J	1.6 J	1.5 J	2.0	2.7	1.7 J	1.4 J	1.2 J	1.4 J	0.96 J	1.2 J	1.1 J
Volatile Organic Compounds (VOC's)																		
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0 J	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	< 10	< 10 J	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 10 J	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	< 10	< 10 J	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	2.7 J	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0 J	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0 J	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0 J	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 10 J	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 10 J	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location: / Screen Interval (ft. bgs): / Date:	Unit	MDEQ Nonresidential Drinking Water Criteria	MW-53 16-21						MW-54 16-21					MW-55 15-20				
			4/24/2017	7/27/2017	11/8/2017	2/7/2018	5/9/2018	8/13/2018	7/27/2017	11/8/2017	2/7/2018	5/9/2018	8/13/2018	7/27/2017	11/8/2017	2/7/2018	5/10/2018	8/13/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0 J	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	< 1.0	0.63 J	< 1.0	< 1.0	< 1.0	0.45 J	0.88 J	1.5	1.2	0.98 J	0.34 J	0.84 J	0.65 J	< 1.0	0.48 J	0.39 J
Gases																		
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																		
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																		
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-56						MW-57					MW-58				
Screen Interval (ft. bgs):			16-21						17-22					15-20				
Date:	Unit		4/24/2017	7/28/2017	11/8/2017	2/14/2018	5/9/2018	8/13/2018	7/27/2017	11/7/2017	2/9/2018	5/9/2018	8/6/2018	7/28/2017	11/8/2017	2/7/2018	5/14/2018	8/13/2018
Semi-volatile Organic Compounds (SVOC's)																		
1,4-Dioxane	µg/l	350	3.8	2.7	2.2	1.6 J	2.7	2.3	4.6	4.9	4.9	3.9	4.5	10	8.0	9.6	3.6	2.2
Volatile Organic Compounds (VOC's)																		
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	NA*	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	< 10	< 10	1.8 J	< 10	< 10	< 10	< 10	< 10	< 10	< 10	4.4 J	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.24 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-56						MW-57					MW-58				
Screen Interval (ft. bgs):			16-21						17-22					15-20				
Date:	Unit		4/24/2017	7/28/2017	11/8/2017	2/14/2018	5/9/2018	8/13/2018	7/27/2017	11/7/2017	2/9/2018	5/9/2018	8/6/2018	7/28/2017	11/8/2017	2/7/2018	5/14/2018	8/13/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.59 J	0.56 J	0.39 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Gases																		
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																		
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																		
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-62						MW-63						
Screen Interval (ft. bgs):			16.3-21.3						7-12						
Date:	Unit		4/21/2017	7/31/2017	11/13/2017	2/6/2018	5/9/2018	8/6/2018	4/21/2017	5/25/2017	7/31/2017	11/13/2017	2/7/2018	5/9/2018	8/6/2018
Semi-volatile Organic Compounds (SVOC's)															
1,4-Dioxane	µg/l	350	2.8	3.7	3.7	2.1	1.5 J	3.1	19	NA	0.36 J	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)															
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	0.21 J
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5,000	< 5,000	< 500	< 50	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	< 10	< 10	< 10,000	< 10,000	< 1,000	< 100	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 10	< 10,000	< 10,000	< 1,000	< 100	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	< 10	< 10	< 10,000	< 10,000	< 1,000	< 100	< 10	< 10	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5,000	< 5,000	< 500	< 50	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	1.6	< 1.0	0.30 J	0.30 J	0.83 J	< 1.0	< 1,000	< 1,000	< 100	< 10	1.7	2.5	3.3
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5,000	< 5,000	< 500	< 50	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2,000	< 2,000	< 200	< 20	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	5.6 J	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 10	< 10,000	< 10,000	< 1,000	< 100	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 10	< 10,000	< 10,000	< 1,000	< 100	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-62						MW-63						
Screen Interval (ft. bgs):			16.3-21.3						7-12						
Date:	Unit		4/21/2017	7/31/2017	11/13/2017	2/6/2018	5/9/2018	8/6/2018	4/21/2017	5/25/2017	7/31/2017	11/13/2017	2/7/2018	5/9/2018	8/6/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	**13,000**	**13,000**	**3,900**	**320**	0.23 J	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2,000	< 2,000	< 200	< 20	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	0.30 J
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	1.3	< 1.0	1.0	1.3	1.2	0.66 J	< 1,000	< 1,000	< 100	< 10	< 1.0	< 1.0	< 1.0
Gases															
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other															
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals															
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:			MW-64						MW-65						MW-66					
Screen Interval (ft. bgs):		MDEQ Nonresidential Drinking Water Criteria	15-20						16-21						15-20					
Date:	Unit		4/24/2017	7/27/2017	11/7/2017	2/9/2018	5/10/2018	8/13/2018	4/25/2017	8/2/2017	11/8/2017	2/6/2018	5/10/2018	8/8/2018	4/25/2017	8/2/2017	11/13/2017	2/12/2018	5/10/2018	8/8/2018
Semi-volatile Organic Compounds (SVOC's)																				
1,4-Dioxane	µg/l	350	< 2.0	0.32 J	< 2.0	< 2.0	< 2.0	< 2.0	3.8	3.1	3.8	3.4	2.1	1.8 J	0.76 J	0.99 J	0.49 J	1.3 J	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)																				
1,1,1-Trichloroethane	µg/l	200	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	0.35 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 10	< 20	< 10	< 10	< 10	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 10	< 10	< 10	< 10	< 10	< 10	< 20	< 40	< 20	< 20	< 20	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 10	< 10	< 10	< 10	< 10	< 10	< 20	< 40	< 20	< 20	< 20	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 10	< 10	< 10	< 10	< 10	< 10	< 20	< 40	< 20	< 20	< 20	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Benzene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 10	< 20	< 10	< 10	< 10	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	< 1.0	0.37 J	0.31 J	0.30 J	< 1.0	0.29 J	3.3	4.1	3.9	4.1	6.0	6.2	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 10	< 20	< 10	1.5 J	< 10	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 4.0	< 8.0	< 4.0	< 4.0	< 4.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 10	< 10	< 10	< 10	< 10	< 10	< 20	< 40	< 20	< 20	< 20	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 10	< 10	< 10	< 10	< 10	< 10	< 20	< 40	< 20	< 20	< 20	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:			MW-64						MW-65						MW-66					
Screen Interval (ft. bgs):		MDEQ Nonresidential Drinking Water Criteria	15-20						16-21						15-20					
Date:	Unit		4/24/2017	7/27/2017	11/7/2017	2/9/2018	5/10/2018	8/13/2018	4/25/2017	8/2/2017	11/8/2017	2/6/2018	5/10/2018	8/8/2018	4/25/2017	8/2/2017	11/13/2017	2/12/2018	5/10/2018	8/8/2018
Methyl-tert-butylether	µg/l	40	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 4.0	< 8.0	< 4.0	< 4.0	< 4.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 2.0	< 4.0	< 2.0	< 2.0	< 2.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	**2.4**	**4.8**	**7.0**	**6.7**	1.3	**5.9**	**61**	**49**	**48**	**36**	**41**	**35**	**5.6**	**5.4**	**3.0**	**2.7**	**2.4**	**3.2**
Gases																				
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																				
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																				
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-67						MW-68						MW-69				
Screen Interval (ft. bgs):			9-14						15-20						15-20				
Date:	Unit		4/21/2017	7/31/2017	11/14/2017	2/12/2018	5/14/2018	8/13/2018	4/24/2017	8/1/2017	11/10/2017	2/12/2018	5/15/2018	8/9/2018	4/25/2017	11/10/2017	2/14/2018	5/10/2018	8/13/2018
Semi-volatile Organic Compounds (SVOC's)																			
1,4-Dioxane	µg/l	350	1.8 J	0.33 J	< 2.0	< 2.0	< 2.0	< 2.0	0.40 J	0.69 J	0.73 J	0.54 J	< 2.0	< 2.0	12	35	23	7.3	7.1
Volatile Organic Compounds (VOC's)																			
1,1,1-Trichloroethane	µg/l	200	2.3 J	2.0 J	2.1 J	< 3.3	0.94 J	0.80 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 10	1.0 J	< 5.0	< 3.3	0.25 J	< 2.5	1.6	1.7	3.7	2.0	1.4	1.9	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,1-Dichloroethene	µg/l	7.0	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	0.39 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 50	< 20	< 25	< 17	NA*	< 13	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 100	< 40	< 50	< 33	< 10	< 25	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 100	< 40	< 50	< 33	< 10	< 25	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Acetone	µg/l	2,100	< 100	< 40	< 50	< 33	3.5 J	< 25	< 10	< 10	< 10	< 10	< 10	< 10	4.4 J	< 10	< 10	< 10	< 10
Benzene	µg/l	5.0	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromodichloromethane	µg/l	80	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromoform	µg/l	80	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Bromomethane	µg/l	29	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Carbon Disulfide	µg/l	2,300	< 50	< 20	< 25	< 17	< 5.0	< 13	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-11	µg/l	7,300	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
CFC-12	µg/l	4,800	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorobenzene	µg/l	100	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chlorodibromomethane	µg/l	80	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroethane	µg/l	1,700	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloroform	µg/l	80	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Chloromethane	µg/l	1,100	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	47	36	15	9.6	5.7	4.5	20	18	13	13	10	13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,3-Dichloropropene	µg/l	NS	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Cyclohexane	µg/l	NS	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Dichloromethane	µg/l	5.0	< 50	< 20	< 25	1.8 J	< 5.0	< 13	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
Diethyl ether	µg/l	10	< 20	< 8.0	< 10	< 6.7	< 2.0	< 5.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Ethylbenzene	µg/l	74	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Isopropylbenzene	µg/l	2,300	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Methyl Acetate	µg/l	NS	< 100	< 40	< 50	< 33	< 10	< 25	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 100	< 40	< 50	< 33	< 10	< 25	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
Methylcyclohexane	µg/l	NS	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-67						MW-68						MW-69				
Screen Interval (ft. bgs):			9-14						15-20						15-20				
Date:	Unit		4/21/2017	7/31/2017	11/14/2017	2/12/2018	5/14/2018	8/13/2018	4/24/2017	8/1/2017	11/10/2017	2/12/2018	5/15/2018	8/9/2018	4/25/2017	11/10/2017	2/14/2018	5/10/2018	8/13/2018
Methyl-tert-butylether	µg/l	40	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Styrene (Monomer)	µg/l	100	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Toluene	µg/l	790	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Total Xylenes	µg/l	280	< 20	< 8.0	< 10	< 6.7	< 2.0	< 5.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 10	2.4 J	1.7 J	1.1 J	0.75 J	0.78 J	1.9	1.9	1.5	1.8	1.4	1.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 10	< 4.0	< 5.0	< 3.3	< 1.0	< 2.5	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	5.0	**94**	**91**	**110**	**83**	**57**	**60**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	2.0	**14**	< 4.0	< 5.0	< 3.3	1.3	< 2.5	**12**	**2.1**	**18**	**2.5**	**2.1**	**2.2**	**2.8**	< 1.0	< 1.0	**3.3**	**2.7**
Gases																			
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																			
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																			
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-70						MW-71						PW-16-01				
Screen Interval (ft. bgs):			15-20						15-20						9.7-19.7				
Date:	Unit		4/24/2017	8/1/2017	11/13/2017	2/12/2018	5/14/2018	8/9/2018	4/24/2017	8/1/2017	11/13/2017	2/12/2018	5/8/2018	8/9/2018	8/2/2017	11/7/2017	2/7/2018	5/15/2018	8/6/2018
Semi-volatile Organic Compounds (SVOC's)																			
1,4-Dioxane	µg/l	350	0.76 J	0.68 J	1.1 J	0.91 J	3.0	1.6 J	4.3	1.4 J	0.72 J	0.57 J	0.38 J	0.95 J	< 2.0	14	0.76 J	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)																			
1,1,1-Trichloroethane	µg/l	200	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,1,2,2-Tetrachloroethane	µg/l	35	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,1,2-Trichloroethane	µg/l	5.0	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,1-Dichloroethane	µg/l	2,500	2.4 J	3.3 J	3.4 J	< 13	2.2 J	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,1-Dichloroethene	µg/l	7.0	< 6.7	< 10	< 10	< 13	2.1 J	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,2,3-Trimethylbenzene	µg/l	NS	< 33	< 50	< 50	< 67	NA*	< 63	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 1,000	< 71	< 71	< 200
1,2,4-Trichlorobenzene	µg/l	70	< 6.7	< 10	< 10	< 13	2.5 J	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,2,4-Trimethylbenzene	µg/l	63	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,2-Dibromoethane	µg/l	0.05	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,2-Dichlorobenzene	µg/l	600	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,2-Dichloroethane	µg/l	5.0	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,2-Dichloropropane	µg/l	5.0	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,3,5-Trimethylbenzene	µg/l	72	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,3-Dichlorobenzene	µg/l	19	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
1,4-Dichlorobenzene	µg/l	75	< 6.7	< 10	< 10	< 13	0.79 J	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
-2Butanone (MEK)	µg/l	38,000	< 67	< 100	< 100	< 130	< 33	< 130	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 2,000	< 140	< 140	< 400
-4Methyl-2-Pentanone	µg/l	5,200	< 67	< 100	< 100	< 130	< 33	< 130	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 2,000	< 140	< 140	< 400
Acetone	µg/l	2,100	< 67	< 100	< 100	< 130	15 J	< 130	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 2,000	< 140	32 J	< 400
Benzene	µg/l	5.0	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Bromodichloromethane	µg/l	80	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Bromoform	µg/l	80	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Bromomethane	µg/l	29	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Carbon Disulfide	µg/l	2,300	< 33	< 50	< 50	< 67	< 17	< 63	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 1,000	< 71	< 71	< 200
Carbon Tetrachloride	µg/l	5.0	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
CFC-11	µg/l	7,300	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
CFC-12	µg/l	4,800	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Chlorobenzene	µg/l	100	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Chlorodibromomethane	µg/l	80	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Chloroethane	µg/l	1,700	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.55 J	< 200	< 14	< 14	< 40
Chloroform	µg/l	80	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Chloromethane	µg/l	1,100	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
cis-1,2-Dichloroethene	µg/l	70	**190**	**200**	**200**	**230**	**260**	**200**	< 1.0	< 1.0	0.39 J	0.37 J	0.40 J	0.34 J	2.2	**550**	**82**	7.1 J	**180**
cis-1,3-Dichloropropene	µg/l	NS	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Cyclohexane	µg/l	NS	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Dichloromethane	µg/l	5.0	**8.9 J**	< 50	< 50	< 67	< 17	< 63	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 1,000	**11 J**	**8.6 J**	< 200
Diethyl ether	µg/l	10	< 13	< 20	< 20	< 27	< 6.7	< 25	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 400	< 29	< 29	< 80
Ethylbenzene	µg/l	74	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Isopropylbenzene	µg/l	2,300	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Methyl Acetate	µg/l	NS	< 67	< 100	< 100	< 130	< 33	< 130	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 2,000	< 140	< 140	< 400
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 67	< 100	< 100	< 130	< 33	< 130	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 2,000	< 140	< 140	< 400
Methylcyclohexane	µg/l	NS	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	MW-70						MW-71						PW-16-01				
Screen Interval (ft. bgs):			15-20						15-20						9.7-19.7				
Date:	Unit		4/24/2017	8/1/2017	11/13/2017	2/12/2018	5/14/2018	8/9/2018	4/24/2017	8/1/2017	11/13/2017	2/12/2018	5/8/2018	8/9/2018	8/2/2017	11/7/2017	2/7/2018	5/15/2018	8/6/2018
Methyl-tert-butylether	µg/l	40	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14 J	< 40
Styrene (Monomer)	µg/l	100	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.35 J	< 200	< 14	< 14	< 40
Tetrachloroethene	µg/l	5.0	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Toluene	µg/l	790	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Total Xylenes	µg/l	280	< 13	< 20	< 20	< 27	< 6.7	< 25	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 400	< 29	< 29	< 80
trans-1,2-Dichloroethene	µg/l	100	3.8 J	4.2 J	5.1 J	4.4 J	3.0 J	3.3 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	5.4 J	< 14	< 40
trans-1,3-Dichloropropene	µg/l	NS	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Trichloroethene	µg/l	5.0	< 6.7	< 10	< 10	< 13	< 3.3	< 13	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 200	< 14	< 14	< 40
Vinyl chloride	µg/l	2.0	**120**	**100**	**140**	**160**	**210**	**190**	< 1.0	0.68 J	0.83 J	0.59 J	0.59 J	< 1.0	**24**	**5,300**	**160**	**37 J**	**870**
Gases																			
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																			
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																			
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		MDEQ Nonresidential Drinking Water Criteria	PW-16-02					TW-16-01					TW-16-02					
Screen Interval (ft. bgs):			6-21					12-17					12-17					
Date:	Unit		8/3/2017	11/8/2017	2/14/2018	5/11/2018	8/8/2018	8/2/2017	11/7/2017	2/7/2018	5/15/2018	8/6/2018	4/25/2017	8/2/2017	11/7/2017	2/14/2018	5/11/2018	8/6/2018
Semi-volatile Organic Compounds (SVOC's)																		
1,4-Dioxane	µg/l	350	0.51 J	< 2.0	< 2.0	< 2.0	1.5 J	0.32 J	< 2.0	< 2.0	< 2.0	< 2.0	7.2	3.9	5.8	3.9	5.0	2.7
Volatile Organic Compounds (VOC's)																		
1,1,1-Trichloroethane	µg/l	200	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,1,2,2-Tetrachloroethane	µg/l	35	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,1,2-Trichloroethane	µg/l	5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,1-Dichloroethane	µg/l	2,500	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,1-Dichloroethene	µg/l	7.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,2,3-Trimethylbenzene	µg/l	NS	< 25	< 5.0	< 5.0	< 5.0	< 5.0	< 50	< 63	< 170	< 170	< 130	< 3,100	< 2,500	< 2,000	< 5,000	< 2,500	< 1,300
1,2,4-Trichlorobenzene	µg/l	70	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,2,4-Trimethylbenzene	µg/l	63	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,2-Dibromoethane	µg/l	0.05	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,2-Dichlorobenzene	µg/l	600	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,2-Dichloroethane	µg/l	5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,2-Dichloropropane	µg/l	5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,3,5-Trimethylbenzene	µg/l	72	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,3-Dichlorobenzene	µg/l	19	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
1,4-Dichlorobenzene	µg/l	75	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
-2Butanone (MEK)	µg/l	38,000	< 50	< 10	< 10	< 10	< 10	< 100	< 130	< 330	< 330	< 250	< 6,300	< 5,000	< 4,000	< 10,000	< 5,000	< 2,500
-4Methyl-2-Pentanone	µg/l	5,200	< 50	< 10	< 10	< 10	< 10	< 100	< 130	< 330	< 330	< 250	< 6,300	< 5,000	< 4,000	< 10,000	< 5,000	< 2,500
Acetone	µg/l	2,100	< 50	< 10	< 10	< 10	< 10	< 100	< 130	< 330	68 J	< 250	< 6,300	< 5,000	< 4,000	< 10,000	< 5,000	< 2,500
Benzene	µg/l	5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Bromodichloromethane	µg/l	80	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Bromoform	µg/l	80	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Bromomethane	µg/l	29	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Carbon Disulfide	µg/l	2,300	< 25	< 5.0	< 5.0	< 5.0	< 5.0	< 50	< 63	< 170	< 170	< 130	< 3,100	< 2,500	< 2,000	< 5,000	< 2,500	< 1,300
Carbon Tetrachloride	µg/l	5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
CFC-11	µg/l	7,300	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
CFC-12	µg/l	4,800	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Chlorobenzene	µg/l	100	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Chlorodibromomethane	µg/l	80	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Chloroethane	µg/l	1,700	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Chloroform	µg/l	80	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Chloromethane	µg/l	1,100	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
cis-1,2-Dichloroethene	µg/l	70	63	2.3	12	< 1.0	11	17	32	34	68	**140**	**5,200**	**3,100**	**6,000**	**3,500**	**4,400**	**4,100**
cis-1,3-Dichloropropene	µg/l	NS	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Cyclohexane	µg/l	NS	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Dichloromethane	µg/l	5.0	< 25	< 5.0	< 5.0	< 5.0	< 5.0	< 50	**10 J**	**23 J**	**20 J**	< 130	**1,200 J**	< 2,500	< 2,000	< 5,000	< 2,500	< 1,300
Diethyl ether	µg/l	10	< 10	< 2.0	< 2.0	< 2.0	< 2.0	< 20	< 25	< 67	< 67	< 50	< 1,300	< 1,000	< 800	< 2,000	< 1,000	< 500
Ethylbenzene	µg/l	74	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Isopropylbenzene	µg/l	2,300	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Methyl Acetate	µg/l	NS	< 50	< 10	< 10	< 10	< 10	< 100	< 130	< 330	< 330	< 250	< 6,300	< 5,000	< 4,000	< 10,000	< 5,000	< 2,500
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 50	< 10	< 10	< 10	< 10	< 100	< 130	< 330	< 330	< 250	< 6,300	< 5,000	< 4,000	< 10,000	< 5,000	< 2,500
Methylcyclohexane	µg/l	NS	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location: / Screen Interval (ft. bgs): / Date:	Unit	MDEQ Nonresidential Drinking Water Criteria	PW-16-02 6-21					TW-16-01 12-17					TW-16-02 12-17					
			8/3/2017	11/8/2017	2/14/2018	5/11/2018	8/8/2018	8/2/2017	11/7/2017	2/7/2018	5/15/2018	8/6/2018	4/25/2017	8/2/2017	11/7/2017	2/14/2018	5/11/2018	8/6/2018
Methyl-tert-butylether	µg/l	40	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33 J	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Styrene (Monomer)	µg/l	100	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Tetrachloroethene	µg/l	5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Toluene	µg/l	790	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Total Xylenes	µg/l	280	< 10	< 2.0	< 2.0	< 2.0	< 2.0	< 20	< 25	< 67	< 67	< 50	< 1,300	< 1,000	< 800	< 2,000	< 1,000	< 500
trans-1,2-Dichloroethene	µg/l	100	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	11 J	7.5 J	< 630	< 500	< 400	< 1,000	< 500	56 J
trans-1,3-Dichloropropene	µg/l	NS	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Trichloroethene	µg/l	5.0	< 5.0	< 1.0	< 1.0	< 1.0	< 1.0	< 10	< 13	< 33	< 33	< 25	< 630	< 500	< 400	< 1,000	< 500	< 250
Vinyl chloride	µg/l	2.0	**160**	2.0	**18**	< 1.0	**71**	**210**	**320**	**380**	**720**	**680**	**15,000**	**12,000**	**13,000**	**9,100**	**8,500**	**7,300**
Gases																		
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other																		
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals																		
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location: / Screen Interval (ft. bgs): / Date:	Unit	MDEQ Nonresidential Drinking Water Criteria	TW-16-03 9-19					TW-16-04 9-19					
			8/3/2017	11/8/2017	2/14/2018	5/11/2018	8/8/2018	4/25/2017	8/3/2017	11/8/2017	2/14/2018	5/11/2018	8/8/2018
Semi-volatile Organic Compounds (SVOC's)													
1,4-Dioxane	µg/l	350	0.54 J	< 2.0	< 2.0	< 2.0	1.0 J	1.7 J	0.81 J	0.89 J	< 2.0	< 2.0	1.2 J
Volatile Organic Compounds (VOC's)													
1,1,1-Trichloroethane	µg/l	200	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,1,2,2-Tetrachloroethane	µg/l	35	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,1,2-trichloro-1,2,2-trifluoroethane	µg/l	170,000	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,1,2-Trichloroethane	µg/l	5.0	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,1-Dichloroethane	µg/l	2,500	< 4.0	< 3.3	< 10	< 2.5	0.44 J	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	0.50 J
1,1-Dichloroethene	µg/l	7.0	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,2,3-Trimethylbenzene	µg/l	NS	< 20	< 17	< 50	< 13	< 10	< 20	< 20	< 33	< 33	< 13	< 5.0
1,2,4-Trichlorobenzene	µg/l	70	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,2,4-Trimethylbenzene	µg/l	63	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,2-Dibromo-3-chloropropane	µg/l	0.2	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,2-Dibromoethane	µg/l	0.05	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,2-Dichlorobenzene	µg/l	600	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,2-Dichloroethane	µg/l	5.0	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,2-Dichloropropane	µg/l	5.0	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,3,5-Trimethylbenzene	µg/l	72	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,3-Dichlorobenzene	µg/l	19	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
1,4-Dichlorobenzene	µg/l	75	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
-2Butanone (MEK)	µg/l	38,000	< 40	< 33	< 100	< 25	< 20	< 40	< 40	< 67	< 67	< 25	< 10
-4Methyl-2-Pentanone	µg/l	5,200	< 40	< 33	< 100	< 25	< 20	< 40	< 40	< 67	< 67	< 25	< 10
Acetone	µg/l	2,100	< 40	< 33	< 100	< 25	< 20	< 40	< 40	< 67	< 67	< 25	5.5 J
Benzene	µg/l	5.0	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Bromodichloromethane	µg/l	80	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Bromoform	µg/l	80	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Bromomethane	µg/l	29	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Carbon Disulfide	µg/l	2,300	< 20	< 17	< 50	< 13	< 10	< 20	< 20	< 33	< 33	< 13	< 5.0
Carbon Tetrachloride	µg/l	5.0	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
CFC-11	µg/l	7,300	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
CFC-12	µg/l	4,800	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Chlorobenzene	µg/l	100	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Chlorodibromomethane	µg/l	80	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Chloroethane	µg/l	1,700	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Chloroform	µg/l	80	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Chloromethane	µg/l	1,100	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
cis-1,2-Dichloroethene	µg/l	70	37	36	40	39	36	20	18	23	25	20	21
cis-1,3-Dichloropropene	µg/l	NS	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Cyclohexane	µg/l	NS	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Dichloromethane	µg/l	5.0	< 20	< 17	< 50	< 13	< 10	4.4 J	< 20	< 33	< 33	< 13	< 5.0
Diethyl ether	µg/l	10	< 8.0	< 6.7	< 20	< 5.0	< 4.0	< 8.0	< 8.0	< 13	< 13	< 5.0	< 2.0
Ethylbenzene	µg/l	74	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Isopropylbenzene	µg/l	2,300	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Methyl Acetate	µg/l	NS	< 40	< 33	< 100	< 25	< 20	< 40	< 40	< 67	< 67	< 25	< 10
Methyl N-Butyl Ketone (2-Hexanone)	µg/l	2,900	< 40	< 33	< 100	< 25	< 20	< 40	< 40	< 67	< 67	< 25	< 10
Methylcyclohexane	µg/l	NS	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0

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Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location: / Screen Interval (ft. bgs): / Date:	Unit	MDEQ Nonresidential Drinking Water Criteria	TW-16-03 9-19					TW-16-04 9-19					
			8/3/2017	11/8/2017	2/14/2018	5/11/2018	8/8/2018	4/25/2017	8/3/2017	11/8/2017	2/14/2018	5/11/2018	8/8/2018
Methyl-tert-butylether	µg/l	40	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Styrene (Monomer)	µg/l	100	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Tetrachloroethene	µg/l	5.0	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Toluene	µg/l	790	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Total Xylenes	µg/l	280	< 8.0	< 6.7	< 20	< 5.0	< 4.0	< 8.0	< 8.0	< 13	< 13	< 5.0	< 2.0
trans-1,2-Dichloroethene	µg/l	100	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
trans-1,3-Dichloropropene	µg/l	NS	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Trichloroethene	µg/l	5.0	< 4.0	< 3.3	< 10	< 2.5	< 2.0	< 4.0	< 4.0	< 6.7	< 6.7	< 2.5	< 1.0
Vinyl chloride	µg/l	2.0	**100**	**77**	**95**	**78**	**76**	**150**	**120**	**100**	**77**	**65**	**63**
Gases													
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Other													
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Metals													
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 2
On-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Notes:
Results are compared to the Michigan Department of Environmental Quality Part 201 Generic Cleanup Criteria, December 31, 2013.

Bold	Result denotes exceedance of MDEQ Non-Residential Drinking Water Criteria.
<	Denotes not detected above reporting limit.

Abbreviations:

ft. bgs	Feet below ground surface
ID	Insufficient data to develop criterion
J	Estimated result
NA	Not Analyzed/Not Available
NA*	Result not reported due to laboratory instrument calibration.
NS	No Standard
mg/l	Milligrams per liter
µg/l	Micrograms per liter

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Table 3
Off-Site Groundwater Elevations
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Well ID	TOC Elevation (ft. amsl)	Screen Interval (ft. bgs)	Gauging Date	Depth to LNAPL (ft. btoc)	Depth to Water (ft. btoc)	Total Depth (ft.)	LNAPL Thickness (ft.)	Corrected Groundwater Elevation (ft. amsl)
MW-72	668.81	15-20	05/22/17	NP	6.98	19.31	NM	661.83
			07/24/17	NP	8.60	19.60	NM	660.21
			11/06/17	NP	9.20	19.54	NM	659.61
			02/05/18	NP	8.58	19.86	NM	660.23
			05/07/18	NP	6.83	19.63	NM	661.98
			08/16/18	NP	8.68	NM	NM	660.13
MW-73S	666.89	7-12	05/22/17	NP	4.72	11.31	NM	662.17
			07/24/17	NP	6.38	11.48	NM	660.51
			11/06/17	NP	6.94	11.42	NM	659.95
			02/05/18	NP	6.30	11.62	NM	660.59
			05/07/18	NP	4.77	11.55	NM	662.12
			08/16/18	NP	6.25	NM	NM	660.64
MW-73D	667.08	13.5-18.5	05/22/17	NP	4.98	17.21	NM	662.10
			07/24/17	NP	6.64	17.47	NM	660.44
			11/06/17	NP	7.22	17.38	NM	659.86
			02/05/18	NP	6.54	17.52	NM	660.54
			05/07/18	NP	5.02	17.36	NM	662.06
			08/16/18	NP	6.49	NM	NM	660.59
MW-74	668.02	14-19	05/22/17	NP	5.94	18.52	NM	662.08
			07/24/17	NP	7.47	18.81	NM	660.55
			11/06/17	NP	8.12	18.76	NM	659.90
			02/05/18	NP	7.49	18.85	NM	660.53
			05/07/18	NP	5.95	18.77	NM	662.07
			08/16/18	NP	7.38	NM	NM	660.64
MW-75S	666.86	5-10	05/22/17	NP	5.16	9.23	NM	661.70
			07/24/17	NP	6.15	9.48	NM	660.71
			11/06/17	NP	6.83	9.43	NM	660.03
			02/05/18	NP	6.56	9.82	NM	660.30
			05/07/18	NP	5.08	9.67	NM	661.78
			08/16/18	NP	5.81	NM	NM	661.05
MW-75D	666.89	12-17	05/22/17	NP	5.20	16.59	NM	661.69
			07/24/17	NP	6.19	16.78	NM	660.70
			11/06/17	NP	6.81	17.80	NM	660.08
			02/05/18	NP	6.59	16.83	NM	660.30
			05/07/18	NP	5.04	16.77	NM	661.85
			08/16/18	NP	6.09	NM	NM	660.80
MW-76	670.10	15-20	05/22/17	NP	9.43	19.44	NM	660.67
			07/24/17	NP	10.05	19.73	NM	660.05
			11/06/17	NP	10.73	19.66	NM	659.37
			02/05/18	NP	10.89	19.71	NM	659.21
			05/07/18	NP	9.34	19.64	NM	660.76
			08/16/18	NP	9.59	NM	NM	660.51
MW-77	660.56	9-14	05/22/17	NP	4.59	13.45	NM	655.97
			07/24/17	NP	5.90	13.75	NM	654.66
			11/06/17	NP	6.30	13.67	NM	654.26
			02/05/18	NP	5.43	13.75	NM	655.13
			05/07/18	NP	4.28	13.70	NM	656.28
			08/16/18	NP	5.88	NM	NM	654.68

See Notes on Last Page.

Table 3
Off-Site Groundwater Elevations
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Well ID	TOC Elevation (ft. amsl)	Screen Interval (ft. bgs)	Gauging Date	Depth to LNAPL (ft. btoc)	Depth to Water (ft. btoc)	Total Depth (ft.)	LNAPL Thickness (ft.)	Corrected Groundwater Elevation (ft. amsl)
MW-78	657.23	7-12	05/22/17	NP	1.78	11.47	NM	655.45
			07/24/17	NP	3.55	11.79	NM	653.68
			11/06/17	NP	3.50	11.72	NM	653.73
			02/05/18	NP	3.09	11.80	NM	654.14
			05/07/18	NP	1.54	11.75	NM	655.69
			08/16/18	NP	3.53	NM	NM	653.70
MW-79S	663.10	5-10	05/22/17	NP	4.15	9.49	NM	658.95
			07/24/17	NP	6.37	9.76	NM	656.73
			11/06/17	NP	6.56	9.71	NM	656.54
			02/05/18	NP	5.46	9.78	NM	657.64
			05/07/18	NP	3.49	9.73	NM	659.61
			08/16/18	NP	6.40	NM	NM	656.70
MW-79D	663.35	10-15	05/22/17	NP	4.20	14.38	NM	659.15
			07/24/17	NP	6.45	14.66	NM	656.90
			11/06/17	NP	6.62	14.60	NM	656.73
			02/05/18	NP	5.51	14.69	NM	657.84
			05/07/18	NP	3.55	14.62	NM	659.80
			08/16/18	NP	6.49	NM	NM	656.86
MW-80S	656.08	7-12	05/22/17	NP	2.41	11.29	NM	653.67
			07/24/17	NP	4.19	11.50	NM	651.89
			11/06/17	NP	3.41	11.53	NM	652.67
			02/05/18	NP	2.86	11.81	NM	653.22
			05/07/18	NP	1.23	11.56	NM	654.85
			08/16/18	NP	4.14	NM	NM	651.94
MW-81	657.32	8-13	05/22/17	NP	6.05	12.40	NM	651.27
			07/24/17	NP	7.24	12.70	NM	650.08
			11/06/17	NP	8.27	12.63	NM	649.05
			02/05/18	NP	7.29	12.71	NM	650.03
			05/07/18	NP	5.98	12.66	NM	651.34
			08/16/18	NP	7.40	NM	NM	649.92
MW-82S	658.63	9-14	05/22/17	NP	6.93	13.12	NM	651.70
			07/24/17	NP	8.24	11.50	NM	650.39
			11/06/17	NP	9.08	13.34	NM	649.55
			02/05/18	NP	8.32	13.44	NM	650.31
			05/07/18	NP	7.10	13.36	NM	651.53
			08/16/18	NP	8.38	NM	NM	650.25
MW-82D	658.45	18-23	05/22/17	NP	7.34	22.45	NM	651.11
			07/24/17	NP	8.50	22.80	NM	649.95
			11/06/17	NP	9.41	22.72	NM	649.04
			02/05/18	NP	8.65	22.81	NM	649.80
			05/07/18	NP	7.33	22.74	NM	651.12
			08/16/18	NP	8.49	NM	NM	649.96
MW-83	660.09	8-13	05/22/17	NP	6.46	12.11	NM	653.63
			07/24/17	NP	7.61	12.44	NM	652.48
			11/06/17	NP	8.08	12.46	NM	652.01
			02/05/18	NP	7.53	12.48	NM	652.56
			05/07/18	NP	6.28	12.43	NM	653.81
			08/16/18	NP	7.71	NM	NM	652.38

See Notes on Last Page.

Table 3
Off-Site Groundwater Elevations
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Well ID	TOC Elevation (ft. amsl)	Screen Interval (ft. bgs)	Gauging Date	Depth to LNAPL (ft. btoc)	Depth to Water (ft. btoc)	Total Depth (ft.)	LNAPL Thickness (ft.)	Corrected Groundwater Elevation (ft. amsl)
MW-84	662.50	8-13	05/22/17	NP	3.26	12.28	NM	659.24
			07/24/17	NP	5.19	12.59	NM	657.31
			11/06/17	NP	5.54	12.52	NM	656.96
			02/05/18	NP	4.60	12.60	NM	657.90
			05/07/18	NP	2.90	12.55	NM	659.60
			08/16/18	NP	5.22	NM	NM	657.28
MW-85	658.85	8-13	05/22/17	NP	4.71	12.43	NM	654.14
			07/24/17	NP	6.12	12.75	NM	652.73
			11/06/17	NP	6.34	12.70	NM	652.51
			02/05/18	NP	5.53	12.76	NM	653.32
			05/07/18	NP	4.16	12.69	NM	654.69
			08/16/18	NP	6.12	NM	NM	652.73
MW-86	666.11	12-17	05/22/17	NP	6.25	16.35	NM	659.86
			07/24/17	NP	8.07	16.66	NM	658.04
			11/06/17	NP	8.70	16.58	NM	657.41
			02/05/18	NP	7.87	16.72	NM	658.24
			05/07/18	NP	6.03	16.60	NM	660.08
			08/16/18	NP	8.06	NM	NM	658.05
MW-87	668.89	14-19	05/22/17	NP	9.41	18.55	NM	659.48
			07/24/17	NP	10.65	18.85	NM	658.24
			11/06/17	NP	11.42	18.79	NM	657.47
			02/05/18	NP	11.06	18.86	NM	657.83
			05/07/18	NP	9.39	18.80	NM	659.50
			08/16/18	NP	10.61	NM	NM	658.28

Notes:
Water level measurements collected from top of well casing.
MW-81 and MW-83 were re-surveyed on November 20, 2017 by Geodetic Designs Inc.

Abbreviations:

ft.	Feet
ft. amsl	Feet above mean sea level
ft. bgs	Feet below ground surface
ft. btoc	Feet below top of casing
LNAPL	Light non-aqueous phase liquid
NM	Not measured
NP	No product detected
TOC	Top of casing

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Table 4
Off-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:			MW-72						MW-73D					
Screen Interval (ft. bgs):		Residential Drinking Water Criteria	15-20						13.5-18.5					
Date:	Unit		5/22/2017	7/26/2017	11/7/2017	2/6/2018	5/9/2018	8/10/2018	5/22/2017	7/26/2017	11/7/2017	2/6/2018	5/9/2018	8/10/2018
Semi-volatile Organic Compounds (SVOC's)														
1,4-Dioxane	µg/l	7.2*	1.1 J	0.53 J	0.97 J	0.78 J	0.32 J	1.1 J	3.2	3.1	2.8	1.5 J	3.0	1.9 J
Volatile Organic Compounds (VOC's)														
1,1-Dichloroethene	µg/l	7.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	0.45 J	0.50 J	0.43 J	0.35 J	0.56 J
Tetrachloroethene	µg/l	5.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,2-Dichloroethene	µg/l	100	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	1.0**	**3.9**	**2.9**	**1.6**	**1.3**	**1.5 J**	**1.2**	**1.1**	0.85 J	**1.3**	0.79 J	0.80 J	0.75 J
Metals														
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron, Total	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Total	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Anions														
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon (TOC)														
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Gases														
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 4
Off-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		Residential Drinking Water Criteria	MW-73S						MW-74					
Screen Interval (ft. bgs):			7-12						14-19					
Date:	Unit		5/22/2017	7/26/2017	11/7/2017	2/6/2018	5/9/2018	8/10/2018	5/23/2017	7/26/2017	11/7/2017	2/6/2018	5/9/2018	8/9/2018
Semi-volatile Organic Compounds (SVOC's)														
1,4-Dioxane	µg/l	7.2*	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	1.5 J	1.3 J	0.66 J	0.34 J	1.6 J
Volatile Organic Compounds (VOC's)														
1,1-Dichloroethene	µg/l	7.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	NA	1.9	1.8	1.3	1.3	1.5	NA	< 1.0	< 1.0	0.42 J	0.96 J	0.41 J
Tetrachloroethene	µg/l	5.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,2-Dichloroethene	µg/l	100	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	1.0**	0.40 J	0.48 J	0.48 J	0.33 J	0.38 J	0.51 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	1.0**	**1.6**	**1.3**	**1.9**	**1.1**	**1.2**	0.62 J	< 1.0	**2.7**	**2.4**	**2.0**	0.70 J	**2.8**
Metals														
Iron, Dissolved	µg/l	300	**3,900**	NA	**1,200**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron, Total	µg/l	300	**3,900**	NA	**1,200**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	**1,200**	NA	**940**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Total	µg/l	50	**1,200**	NA	**890**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Anions														
Nitrate-N	mg/l	10	< 1.0	NA	< 0.10 J	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	80	NA	89	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon (TOC)														
Carbon, Dissolved	mg/l	NS	6.1	NA	4.8	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	5.2	NA	4.6	NA	NA	NA	NA	NA	NA	NA	NA	NA
Gases														
Ethane	µg/l	NS	NA	NA	< 1.0	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	< 1.0	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	24	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 4
Off-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		Residential Drinking Water Criteria	MW-75D						MW-75S					
Screen Interval (ft. bgs):			12-17						5-10					
Date:	Unit		5/23/2017	7/26/2017	11/8/2017	2/6/2018	5/9/2018	8/9/2018	5/23/2017	7/26/2017	11/8/2017	2/6/2018	5/9/2018	8/9/2018
Semi-volatile Organic Compounds (SVOC's)														
1,4-Dioxane	µg/l	7.2*	1.9 J	1.8 J	1.8 J	0.91 J	0.65 J	2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)														
1,1-Dichloroethene	µg/l	7.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,2-Dichloroethene	µg/l	100	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	1.0**	**6.4**	**3.7**	**4.9 J**	**1.9**	**2.4**	**1.8**	0.45 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Metals														
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	< 100	NA	**330**	NA	NA	NA
Iron, Total	µg/l	300	NA	NA	NA	NA	NA	NA	210	NA	**350**	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	**63**	NA	42	NA	NA	NA
Manganese, Total	µg/l	50	NA	NA	NA	NA	NA	NA	**70**	NA	42	NA	NA	NA
Anions														
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	**21**	NA	8.0 J	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	89	NA	110	NA	NA	NA
Total Organic Carbon (TOC)														
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	4.6	NA	13	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	3.6	NA	13	NA	NA	NA
Gases														
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	0.95 J	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	< 1.0	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	3,200	NA	NA	NA

See Notes on Last Page.

Table 4
Off-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		Residential Drinking Water Criteria	MW-76						MW-77					
Screen Interval (ft. bgs):			15-20						9-14					
Date:	Unit		5/23/2017	7/26/2017	11/8/2017	2/6/2018	5/10/2018	8/9/2018	5/25/2017	7/26/2017	11/10/2017	2/8/2018	5/11/2018	8/6/2018
Semi-volatile Organic Compounds (SVOC's)														
1,4-Dioxane	µg/l	7.2*	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	NA	0.32 J	< 2.0	< 2.0	0.27 J	< 2.0
Volatile Organic Compounds (VOC's)														
1,1-Dichloroethene	µg/l	7.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	NA	3.9	4.0	2.2	2.6	2.2	NA	0.67 J	0.73 J	0.66 J	0.54 J	0.61 J
Tetrachloroethene	µg/l	5.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,2-Dichloroethene	µg/l	100	NA	0.54 J	0.49 J	< 1.0	0.35 J	0.35 J	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.87 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.51 J	0.45 J	< 1.0	< 1.0	< 1.0	0.24 J
Metals														
Iron, Dissolved	µg/l	300	**340**	NA	270	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron, Total	µg/l	300	**480**	NA	280	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	**760**	NA	**760**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Total	µg/l	50	**800**	NA	**770**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Anions														
Nitrate-N	mg/l	10	1.2 J	NA	3.3 J	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	120	NA	160	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon (TOC)														
Carbon, Dissolved	mg/l	NS	1.1	NA	4.1	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	0.90 J	NA	1.3	NA	NA	NA	NA	NA	NA	NA	NA	NA
Gases														
Ethane	µg/l	NS	NA	NA	< 1.0	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	< 1.0	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	1.5	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 4
Off-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		Residential Drinking Water Criteria	MW-78						MW-79D					
Screen Interval (ft. bgs):			7-12						10-15					
Date:	Unit		5/25/2017	7/25/2017	11/9/2017	2/8/2018	5/8/2018	8/6/2018	5/24/2017	7/25/2017	11/9/2017	2/8/2018	5/8/2018	8/6/2018
Semi-volatile Organic Compounds (SVOC's)														
1,4-Dioxane	µg/l	7.2*	NA	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	NA	< 2.0	< 2.0	< 2.0	0.49 J	0.87 J
Volatile Organic Compounds (VOC's)														
1,1-Dichloroethene	µg/l	7.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	NA	< 1.0	< 1.0	< 1.0	< 1.0	0.28 J	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,2-Dichloroethene	µg/l	100	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	**3.2**	**4.1**	**3.6**	**1.9**	**3.5**	**2.8**
Metals														
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron, Total	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Total	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Anions														
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon (TOC)														
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Gases														
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 4
Off-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		Residential Drinking Water Criteria	MW-79S						MW-80S					
Screen Interval (ft. bgs):			5-10						7-12					
Date:	Unit		5/24/2017	7/25/2017	11/9/2017	2/8/2018	5/8/2018	8/6/2018	5/24/2017	7/25/2017	11/8/2017	2/8/2018	5/8/2018	8/6/2018
Semi-volatile Organic Compounds (SVOC's)														
1,4-Dioxane	µg/l	7.2*	NA	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	NA	0.52 J	0.55 J	0.33 J	0.46 J	< 2.0
Volatile Organic Compounds (VOC's)														
1,1-Dichloroethene	µg/l	7.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,2-Dichloroethene	µg/l	100	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	**4.6**	**7.1**	**7.6**	**2.9**	**6.3**	**6.2**
Metals														
Iron, Dissolved	µg/l	300	**990**	NA	**2,500**	NA	NA	NA	**600**	NA	**3,600**	NA	NA	NA
Iron, Total	µg/l	300	**1,100**	NA	**2,900**	NA	NA	NA	**530**	NA	**3,600**	NA	NA	NA
Manganese, Dissolved	µg/l	50	**110**	NA	**200**	NA	NA	NA	**200**	NA	**230**	NA	NA	NA
Manganese, Total	µg/l	50	**120**	NA	**200**	NA	NA	NA	**190**	NA	**230**	NA	NA	NA
Anions														
Nitrate-N	mg/l	10	0.063 J	NA	< 0.10	NA	NA	NA	< 0.10	NA	< 0.10	NA	NA	NA
Sulfate	mg/l	250	41	NA	69	NA	NA	NA	97	NA	110	NA	NA	NA
Total Organic Carbon (TOC)														
Carbon, Dissolved	mg/l	NS	4.1	NA	4.9	NA	NA	NA	5.6	NA	5.7	NA	NA	NA
Total Organic Carbon	mg/l	NS	3.1	NA	4.4	NA	NA	NA	4.5	NA	5.2	NA	NA	NA
Gases														
Ethane	µg/l	NS	NA	NA	< 1.0	NA	NA	NA	NA	NA	< 1.0	NA	NA	NA
Ethene	µg/l	NS	NA	NA	< 1.0	NA	NA	NA	NA	NA	< 1.0	NA	NA	NA
Methane	µg/l	NS	NA	NA	6.6	NA	NA	NA	NA	NA	55	NA	NA	NA

See Notes on Last Page.

Table 4
Off-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		Residential Drinking Water Criteria	MW-81						MW-82D					
Screen Interval (ft. bgs):			8-13						18-23					
Date:	Unit		5/26/2017	7/25/2017	11/9/2017	2/6/2018	5/10/2018	8/9/2018	5/24/2017	7/25/2017	11/8/2017	2/6/2018	5/10/2018	8/8/2018
Semi-volatile Organic Compounds (SVOC's)														
1,4-Dioxane	µg/l	7.2*	NA	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	NA	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)														
1,1-Dichloroethene	µg/l	7.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,2-Dichloroethene	µg/l	100	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Metals														
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron, Total	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Total	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Anions														
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon (TOC)														
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Gases														
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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Table 4
Off-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		Residential Drinking Water Criteria	MW-82S						MW-83					
Screen Interval (ft. bgs):			9-14						8-13					
Date:	Unit		5/24/2017	7/25/2017	11/8/2017	2/6/2018	5/10/2018	8/8/2018	5/26/2017	7/25/2017	11/9/2017	2/8/2018	5/11/2018	8/8/2018
Semi-volatile Organic Compounds (SVOC's)														
1,4-Dioxane	µg/l	7.2*	NA	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	NA	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)														
1,1-Dichloroethene	µg/l	7.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,2-Dichloroethene	µg/l	100	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Metals														
Iron, Dissolved	µg/l	300	180	NA	**710**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron, Total	µg/l	300	**380**	NA	**720**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	**510**	NA	**390**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Total	µg/l	50	**550**	NA	**380**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Anions														
Nitrate-N	mg/l	10	< 0.10	NA	< 0.10 J	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	**470**	NA	**270**	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon (TOC)														
Carbon, Dissolved	mg/l	NS	2.7	NA	4.8	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	2.1	NA	2.2	NA	NA	NA	NA	NA	NA	NA	NA	NA
Gases														
Ethane	µg/l	NS	NA	NA	< 1.0	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	< 1.0	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	10	NA	NA	NA	NA	NA	NA	NA	NA	NA

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Table 4
Off-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		Residential Drinking Water Criteria	MW-84						MW-85					
Screen Interval (ft. bgs):			8-13						8-13					
Date:	Unit		5/25/2017	7/25/2017	11/9/2017	2/8/2018	5/8/2018	8/6/2018	5/25/2017	7/25/2017	11/7/2017	2/8/2018	5/8/2018	8/8/2018
Semi-volatile Organic Compounds (SVOC's)														
1,4-Dioxane	µg/l	7.2*	NA	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0	NA	0.29 J	< 2.0	0.41 J	0.45 J	< 2.0
Volatile Organic Compounds (VOC's)														
1,1-Dichloroethene	µg/l	7.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,2-Dichloroethene	µg/l	100	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	0.14 J	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	**8.6**	**7.3**	**7.3**	**5.5**	**7.5**	**7.2**
Metals														
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron, Total	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Total	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Anions														
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon (TOC)														
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Gases														
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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Table 4
Off-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:		Residential Drinking Water Criteria	MW-86						MW-87					
Screen Interval (ft. bgs):			12-17						14-19					
Date:	Unit		5/25/2017	7/26/2017	11/10/2017	2/8/2018	5/10/2018	8/6/2018	5/23/2017	7/26/2017	11/10/2017	2/8/2018	5/10/2018	8/6/2018
Semi-volatile Organic Compounds (SVOC's)														
1,4-Dioxane	µg/l	7.2*	NA	0.99 J	0.87 J	< 2.0	1.2 J	< 2.0	NA	< 2.0	< 2.0	< 2.0	< 2.0	< 2.0
Volatile Organic Compounds (VOC's)														
1,1-Dichloroethene	µg/l	7.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
cis-1,2-Dichloroethene	µg/l	70	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Tetrachloroethene	µg/l	5.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
trans-1,2-Dichloroethene	µg/l	100	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	NA	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Trichloroethene	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Vinyl chloride	µg/l	1.0**	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0
Metals														
Iron, Dissolved	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Iron, Total	µg/l	300	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Dissolved	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Manganese, Total	µg/l	50	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Anions														
Nitrate-N	mg/l	10	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Sulfate	mg/l	250	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon (TOC)														
Carbon, Dissolved	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Total Organic Carbon	mg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Gases														
Ethane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Ethene	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Methane	µg/l	NS	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

See Notes on Last Page.

Table 4
Off-Site Groundwater Analytical Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Notes:
All results are compared to the Michigan Department of Environmental Quality (MDEQ) Part 201 Generic Cleanup Criteria, December 31, 2013.
Bolded Result exceeds residential Drinking Water criteria
< Result not detected above reporting limit.

Footnote:
* Residential Drinking Water Criteria for 1,4-dioxane is derived from the MDEQ Proposed Rule Changes (September 2016) and Emergency Rules (October 27, 2016).
** Groundwater results for Trichloroethene and Vinyl Chloride are compared to the published MDEQ Remediation and Redevelopment Division (RRD) Target Detection Limit (TDL) of 1.0 µg/l.

Abbreviations:
ft. bgs feet below ground surface
J Estimated Result
mg/l milligrams per liter
NA Not Analyzed
NS No Standard
µg/l micrograms per liter

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Table 5
Soil Vapor Monitoring Point Helium Tracer Test Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location ID	June 2017		September 2017		November 2017		February 2018		May 2018		August 2018	
	Helium Pre Sample (ppm)	Helium Post Sample (ppm)	Helium Pre Sample (ppm)	Helium Post Sample (ppm)	Helium Pre Sample (ppm)	Helium Post Sample (ppm)	Helium Pre Sample (ppm)	Helium Post Sample (ppm)	Helium Pre Sample (ppm)	Helium Post Sample (ppm)	Helium Pre Sample (ppm)	Helium Post Sample (ppm)
SVMP-1-3.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-1-7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-2-4.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-2-8.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-3-3.5	50	75	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-3-7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-4-3.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1,750
SVMP-5-4.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-6-4.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-7-3.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-8-3.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-9-4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-10-3	0.0	1,475	0.0	0.0	0.0	0.0	0.0	0.0	NS	NS	0.0	0.0
SVMP-11-3.5	0.0	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-12-3.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	5.0
SVMP-13-2	250	4,750	0.0	0.0	0.0	0.0	NS	NS	NS	NS	0.0	0.0
SVMP-14-2	225	0.0	0.0	0.0	0.0	0.0	NS	NS	NS	NS	0.0	0.0
SVMP-15-2	2,450	3,800	0.0	0.0	0.0	0.0	NS	NS	NS	NS	0.0	0.0
SVMP-16-2	450	1,725	0.0	0.0	0.0	0.0	NS	NS	NS	NS	0.0	0.0
SVMP-17-2	4,675	2,925	0.0	0.0	0.0	NA	NS	NS	0.0	0.0	0.0	0.0
SVMP-18-3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-19-3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	NA	NS	NS	0.0	0.0
SVMP-20-3	0.0	850	0.0	0.0	NS	NS	NS	NS	NS	NS	0.0	0.0
SVMP-21-2	0.0	0.0	0.0	0.0	0.0	0.0	NS	NS	0.0	0.0	0.0	0.0
SVMP-22-3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	NS	NS	0.0	0.0
SVMP-23-3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	NS	NS	0.0	0.0
SVMP-24-4	0.0	0.0	0.0	0.0	800	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-25-3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-25-6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SVMP-26-4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	5.0
SVMP-27-4.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	5.0
SVMP-28-3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	5.0
SVMP-29-3.5	0.0	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-29-7.5	0.0	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-30-4	0.0	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-31-5.5	0.0	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-32-3	0.0	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-32-6	0.0	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-33-4	0.0	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-34-4	0.0	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-35-4	0.0	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-36-4	0.0	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-37-2.5	0.0	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS

See Notes on Last Page.

Table 5
Soil Vapor Monitoring Point Helium Tracer Test Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Notes:

Helium tracer test readings collected using a Helium Leak Detector MGD-2002.

Shroud concentrations ranged from 30-40% helium during all sampling events.

As discussed in the MDEQ VI Guidance, a tracer gas can be used to verify that soil gas samples are from the installed point and not from leaks in the sampling train.

No unacceptable helium leak test results were noted during the June 2017, September 2017, November 2017, February 2018, May 2018, or August 2018 sampling events.

Samples were deemed acceptable, as all exhibited concentrations of helium in purged soil gas less than 10% of the initial shroud concentration of helium, as presented in the MDEQ VI guidance.

SVMP-11 abandoned after the initial sampling event per the adjacent property owners request.

SVMP-29 through SVMP-37 are located on residential properties and were therefore only sampled during the initial sampling event.

SVMP-17 and SVMP-20 were not sampled during the November 2017 sampling event due to saturated screens.

SVMP-13 through SVMP-17, SVMP-20, and SVMP-21 were not sampled during the February 2018 sampling event due to saturated screens.

SVMP-10, SVMP-13 through SVMP-16, SVMP-19, SVMP-22, and SVMP-23 were not sampled during the May 2018 sampling event due to saturated screens.

SVMP-20 not sampled during the May 2018 sampling event due to a blockage in the tubing.

Abbreviations:

MDEQ	Michigan Department of Environmental Quality
NA	Not analyzed
NS	Not sampled
ppm	parts per million
SVMP	Soil Vapor Monitoring Point
VI	Vapor intrusion

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Table 6
Soil Vapor Monitoring Point Purged Air Parameter Readings
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location ID	June 2017			September 2017			November 2017			February 2018			May 2018			August 2018		
	CO_2 (%)	O_2 (%)	CH_4 (%)	CO_2 (%)	O_2 (%)	CH_4 (%)	CO_2 (%)	O_2 (%)	CH_4 (%)	CO_2 (%)	O_2 (%)	CH_4 (%)	CO_2 (%)	O_2 (%)	CH_4 (%)	CO_2 (%)	O_2 (%)	CH_4 (%)
SVMP-1-3.5	1.3	19.7	0.0	1.2	19.3	0.0	1.7	21.1	0.0	1.8	18.5	NA	1.7	17.9	NA	3.2	17.3	NA
SVMP-1-7	0.9	19.4	0.0	1.7	19.2	0.0	2.4	20.0	0.0	1.9	18.9	NA	1.2	16.2	NA	3.1	16.2	NA
SVMP-2-4.5	4.8	17.4	0.0	0.9	20.1	0.0	9.3	7.7	0.0	0.1	21.6	NA	6.7	16.1	NA	3.7	17.4	NA
SVMP-2-8.5	6.7	16.3	0.0	1.7	19.3	0.0	10.5	5.4	0.0	0.0	21.6	NA	7.2	14.5	NA	4.5	16.7	NA
SVMP-3-3.5	0.3	20.6	0.0	0.6	20.4	0.0	0.7	21.4	0.0	0.0	21.4	NA	0.9	17.2	NA	1.0	19.0	NA
SVMP-3-7	0.4	21.2	0.0	0.8	19.9	0.0	0.9	21.1	0.0	0.0	21.2	NA	0.7	19.6	NA	1.0	18.8	NA
SVMP-4-3.5	0.6	20.1	0.0	1.0	20.0	0.0	0.8	19.1	0.0	1.6	16.2	NA	0.8	18.4	NA	2.3	19.0	NA
SVMP-5-4.5	0.2	22.0	0.0	0.2	20.7	0.0	0.5	26.9	0.0	1.2	19.6	NA	0.6	20.0	NA	1.0	20.1	NA
SVMP-6-4.5	0.5	20.8	0.0	0.9	20.1	0.0	0.7	21.0	0.0	0.4	20.8	NA	1.0	19.8	NA	3.8	17.6	NA
SVMP-7-3.5	1.2	20.5	0.0	0.0	20.8	0.0	1.3	19.7	0.0	1.0	20.4	NA	2.2	19.9	NA	4.0	18.5	NA
SVMP-8-3.5	2.5	19.8	0.0	1.4	19.6	0.0	8.9	21.6	0.0	0.3	20.8	NA	1.7	17.8	NA	2.6	18.9	NA
SVMP-9-4	0.3	21.2	0.0	0.0	20.8	0.0	0.7	21.6	0.0	0.0	21.0	NA	0.7	20.5	NA	3.2	17.8	NA
SVMP-10-3	0.2	20.1	0.0	0.4	19.9	0.0	0.5	19.5	0.0	0.1	20.9	NA	NS	NS	NS	2.2	18.9	NA
SVMP-11-3.5	0.3	21.1	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-12-3.5	0.2	21.2	0.0	1.2	19.9	0.0	1.0	19.9	0.0	0.0	20.9	NA	0.9	16.5	NA	1.6	18.5	NA
SVMP-13-2	0.6	20.0	0.0	1.2	18.6	0.0	2.6	11.8	0.0	NS	NS	NS	NS	NS	NS	3.8	17.5	NA
SVMP-14-2	0.9	18.5	0.0	1.5	19.5	0.0	1.4	19.1	0.0	NS	NS	NS	NS	NS	NS	4.2	16.9	NA
SVMP-15-2	0.8	21.4	0.0	0.7	20.3	0.0	0.1	20.1	0.0	NS	NS	NS	NS	NS	NS	11.2	6.1	NA
SVMP-16-2	0.9	20.8	0.0	1.2	19.8	0.0	0.3	20.5	0.0	NS	NS	NS	NS	NS	NS	NA	NA	NA
SVMP-17-2	1.3	19.5	0.0	4.9	16.8	0.0	NS	NS	NS	NS	NS	NS	2.8	16.9	NA	NA	NA	NA
SVMP-18-3	2.6	18.6	0.0	5.2	16.8	0.0	4.3	17.6	0.0	2.7	16.6	NA	5.5	15.6	NA	6.3	12.4	NA
SVMP-19-3	6.4	14.8	0.0	6.4	16.3	0.0	7.0	15.0	0.0	NA	NA	NA	NS	NS	NS	10.3	10.6	NA
SVMP-20-3	6.3	15.7	0.0	6.0	16.1	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	10.3	7.9	NA
SVMP-21-2	2.5	19.8	0.0	1.8	19.3	0.0	0.8	19.9	0.0	NS	NS	NS	8.8	14.0	NA	3.0	19.8	NA
SVMP-22-3	0.9	20.3	0.0	1.8	19.8	0.0	1.3	20.2	0.0	0.0	21.0	NA	NS	NS	NS	9.2	11.2	NA
SVMP-23-3	1.4	20.2	0.0	0.1	15.8	0.0	1.1	20.6	0.0	NA	NA	NA	NS	NS	NS	9.7	11.1	NA
SVMP-24-4	2.8	19.4	0.0	2.5	18.9	0.0	2.6	19.5	0.0	2.0	19.2	NA	3.1	17.5	NA	9.6	10.9	NA
SVMP-25-3	3.2	18.0	0.0	4.0	15.5	0.0	4.0	18.0	0.0	0.2	20.9	NA	2.9	17.4	NA	3.5	17.9	NA
SVMP-25-6	2.4	18.4	0.0	5.4	14.0	0.0	4.6	17.4	0.0	0.0	21.0	NA	2.1	17.6	NA	4.0	17.2	NA
SVMP-26-4	3.8	12.0	0.0	11.4	8.6	0.0	12.0	5.6	0.0	0.6	20.7	NA	6.1	10.2	NA	15.3	2.2	NA
SVMP-27-4.5	3.8	20.3	0.0	1.1	19.2	0.0	1.5	20.4	0.0	0.1	21.3	NA	1.1	18.4	NA	2.5	17.7	NA
SVMP-28-3	1.8	21.0	0.0	3.4	16.7	0.0	2.3	16.2	0.0	0.1	21.1	NA	2.4	16.6	NA	4.6	11.3	NA
SVMP-29-3.5	0.6	20.5	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-29-7.5	0.9	20.8	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-30-4	0.4	20.9	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-31-5.5	1.2	19.7	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-32-3	1.6	19.5	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-32-6	1.3	19.7	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-33-4	5.7	16.9	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-34-4	0.9	20.3	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-35-4	1.1	21.4	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-36-4	1.4	19.5	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
SVMP-37-2.5	7.2	15.8	0.0	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS

See Notes on Last Page.

Table 6
Soil Vapor Monitoring Point Purged Air Parameter Readings
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Notes:

Air parameter readings collected directly after each round of sample collection using a GEM 2000.
SVMP-11 abandoned after the initial sampling event per the adjacent property owners request.
SVMP-29 through SVMP-37 are located on residential properties and therefore only sampled during the initial sampling event.
SVMP-17 and SVMP-20 were not sampled during the November 2017 sampling event due to saturated screens.
SVMP-13 through SVMP-17, SVMP-20, and SVMP-21 were not sampled during the February 2018 sampling event due to saturated screens.
SVMP-10, SVMP-13 through SVMP-16, SVMP-19, SVMP-22, and SVMP-23 were not sampled during the May 2018 sampling event due to saturated screens.
SVMP-20 not sampled during the May 2018 sampling event due to a blockage in the tubing.

Abbreviations:

%	Percent
CH_4	Methane
CO_2	Carbon dioxide
NA	Not analyzed
NS	Not sampled
O_2	Oxygen
SVMP	Soil Vapor Monitoring Point

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Table 7
Off-Site Soil Vapor Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:	Residential RIASL	SVMP-01												SVMP-02					
Sample Depth (ft. bgs):		3.5						7						4.5					
Sample Date:		6/8/2017	9/20/2017	11/17/2017	2/19/2018	5/29/2018	8/22/2018	6/8/2017	9/20/2017	11/17/2017	2/19/2018	5/29/2018	8/22/2018	6/9/2017	9/20/2017	11/17/2017	2/19/2018	5/29/2018	8/22/2018
VOCs (Method TO-15) µg/m^3																			
1,1-Dichloroethene	7,000	NA	< 5.0	< 4.2	< 4.6	< 4.8	< 4.8	NA	< 4.8	< 4.8	< 4.5	< 5.1	< 4.7	NA	< 5.2	< 4.5	< 8.3	< 4.9	< 5.0
1,4-Dioxane	170	NA	< 18	< 15	< 16	< 18	< 18	NA	< 17	< 17	< 16	< 18	< 17	NA	< 19	< 16	< 30	< 18	< 18
cis-1,2-Dichloroethene	280	NA	< 5.0	< 4.2	< 4.6	< 4.8	< 4.8	NA	< 4.8	< 4.8	< 4.5	< 5.1	< 4.7	NA	< 5.2	< 4.5	< 8.3	< 4.9	< 5.0
Tetrachloroethene	1,400	NA	< 8.5	< 7.1	< 7.8	< 8.3	< 8.3	NA	< 8.2	< 8.2	< 7.6	< 8.7	< 8.1	NA	< 9.0	< 7.8	< 14	< 8.4	< 8.5
trans-1,2-Dichloroethene	9,000	NA	< 5.0	< 4.2	< 4.6	< 4.8	< 4.8	NA	< 4.8	< 4.8	< 4.5	< 5.1	< 4.7	NA	< 5.2	< 4.5	< 8.3	< 4.9	< 5.0
Trichloroethene	67	< 6.2	< 6.8	< 5.6	< 6.2	< 6.6	< 6.6	< 6.2	< 6.5	< 6.5	< 6.0	< 6.9	< 6.4	< 6.0	< 7.1	< 6.2	< 11	< 6.7	< 6.8
Vinyl chloride	54	< 3.0	< 3.2	< 2.7	< 2.9	< 3.1	< 3.1	< 3.0	< 3.1	< 3.1	< 2.9	< 3.3	< 3.0	< 2.8	< 3.4	< 2.9	< 5.3	< 3.2	< 3.2

See Notes on Last Page.

Table 7
Off-Site Soil Vapor Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:	Residential RIASL	SVMP-02						SVMP-03											
Sample Depth (ft. bgs):		8.5						3.5						7					
Sample Date:		6/9/2017	9/20/2017	11/17/2017	2/19/2018	5/29/2018	8/22/2018	6/12/2017	9/21/2017	11/17/2017	2/19/2018	5/29/2018	8/22/2018	6/12/2017	9/21/2017	11/17/2017	2/19/2018	5/29/2018	8/22/2018
VOCs (Method TO-15) µg/m^3																			
1,1-Dichloroethene	7,000	NA	< 5.2	< 4.6	< 8.3	< 5.1	< 4.9	NA	< 4.9	< 4.0	< 4.3	< 5.5	< 4.6	NA	< 4.7	< 4.3	< 4.6	< 5.0	< 4.6
1,4-Dioxane	170	NA	< 19	< 17	< 30	< 18	< 18	NA	< 18	< 15	< 16	< 20	< 17	NA	< 17	< 16	< 17	< 18	< 17
cis-1,2-Dichloroethene	280	NA	< 5.2	< 4.6	< 8.3	< 5.1	< 4.9	NA	< 4.9	< 4.0	< 4.3	< 5.5	< 4.6	NA	< 4.7	< 4.3	< 4.6	< 5.0	< 4.6
Tetrachloroethene	1,400	NA	< 9.0	< 7.9	< 14	< 8.7	< 8.4	NA	< 8.3	< 6.9	< 7.3	< 9.4	< 7.8	NA	< 8.1	< 7.4	< 7.9	< 8.5	< 7.8
trans-1,2-Dichloroethene	9,000	NA	< 5.2	< 4.6	< 8.3	< 5.1	< 4.9	NA	< 4.9	< 4.0	< 4.3	< 5.5	< 4.6	NA	< 4.7	< 4.3	< 4.6	< 5.0	< 4.6
Trichloroethene	67	< 6.1	< 7.1	< 6.3	< 11	< 6.9	< 6.6	< 6.3	< 6.6	< 5.5	< 5.8	< 7.4	< 6.2	< 6.8	< 6.4	< 5.8	< 6.3	< 6.7	< 6.2
Vinyl chloride	54	< 2.9	< 3.4	< 3.0	< 5.3	< 3.3	< 3.2	< 3.0	< 3.1	< 2.6	< 2.8	< 3.5	< 3.0	< 3.2	< 3.0	< 2.8	< 3.0	< 3.2	< 3.0

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Table 7
Off-Site Soil Vapor Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:	Residential RIASL	SVMP-04						SVMP-05						SVMP-06					
Sample Depth (ft. bgs):		3.5						4.5						4.5					
Sample Date:		6/12/2017	9/20/2017	11/20/2017	2/21/2018	5/30/2018	8/23/2018	6/12/2017	9/20/2017	11/20/2017	2/21/2018	5/30/2018	8/23/2018	6/13/2017	9/20/2017	11/20/2017	2/21/2018	5/30/2018	8/23/2018
VOCs (Method TO-15) µg/m^3																			
1,1-Dichloroethene	7,000	NA	< 4.9	< 4.9	< 4.7	< 4.8	< 4.9	NA	< 4.8	< 4.6	< 4.2	< 4.7	< 4.6	NA	< 4.6	< 4.5	< 4.6	< 4.7	< 4.6
1,4-Dioxane	170	NA	< 18	< 18	< 17	< 17	< 18	NA	< 17	< 16	< 15	< 17	< 17	NA	< 17	< 16	< 17	< 17	< 16
cis-1,2-Dichloroethene	280	NA	< 4.9	< 4.9	< 4.7	< 4.8	< 4.9	NA	< 4.8	< 4.6	< 4.2	< 4.7	< 4.6	NA	**8.0**	< 4.5	< 4.6	< 4.7	< 4.6
Tetrachloroethene	1,400	NA	**8.3 J**	< 8.4	< 8.1	< 8.2	< 8.4	NA	< 8.2	< 7.8	< 7.2	< 8.0	< 7.8	NA	**24**	< 7.7	< 7.8	< 8.1	< 7.8
trans-1,2-Dichloroethene	9,000	NA	< 4.9	< 4.9	< 4.7	< 4.8	< 4.9	NA	< 4.8	< 4.6	< 4.2	< 4.7	< 4.6	NA	< 4.6	< 4.5	< 4.6	< 4.7	< 4.6
Trichloroethene	67	< 6.0	< 6.6	< 6.7	< 6.4	< 6.5	< 6.6	< 6.7	< 6.5	< 6.2	< 5.7	< 6.3	< 6.2	< 6.0	< 6.3	< 6.1	< 6.2	< 6.4	< 6.2
Vinyl chloride	54	< 2.9	< 3.2	< 3.2	< 3.0	< 3.1	< 3.2	< 3.2	< 3.1	< 2.9	< 2.7	< 3.0	< 3.0	< 2.9	< 3.0	< 2.9	< 3.0	< 3.0	< 2.9

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Table 7
Off-Site Soil Vapor Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:	Residential RIASL	SVMP-07						SVMP-08						SVMP-09					
Sample Depth (ft. bgs):		3.5						3.5						4					
Sample Date:		6/13/2017	9/20/2017	11/20/2017	2/19/2018	5/30/2018	8/23/2018	6/15/2017	9/20/2017	11/20/2017	2/20/2018	5/29/2018	8/23/2018	6/14/2017	9/20/2017	11/20/2017	2/20/2018	5/30/2018	8/23/2018
VOCs (Method TO-15) µg/m^3																			
1,1-Dichloroethene	7,000	NA	< 4.8	< 4.7	< 4.5	< 4.9	< 4.7	NA	< 4.7	< 4.6	< 4.6	< 5.0	< 4.8	NA	< 4.9	< 4.5	< 4.8	< 4.5	< 4.9
1,4-Dioxane	170	NA	< 17	< 17	< 16	< 18	< 17	NA	< 17	< 17	< 17	< 18	< 17	NA	< 18	< 16	< 17	< 16	< 18
cis-1,2-Dichloroethene	280	NA	< 4.8	< 4.7	< 4.5	< 4.9	< 4.7	NA	< 4.7	< 4.6	< 4.6	< 5.0	< 4.8	NA	< 4.9	< 4.5	< 4.8	< 4.5	< 4.9
Tetrachloroethene	1,400	NA	< 8.2	< 8.1	< 7.7	< 8.4	< 8.1	NA	< 8.1	< 7.9	< 7.9	< 8.6	< 8.2	NA	< 8.4	< 7.7	< 8.2	< 7.7	< 8.4
trans-1,2-Dichloroethene	9,000	NA	< 4.8	< 4.7	< 4.5	< 4.9	< 4.7	NA	< 4.7	< 4.6	< 4.6	< 5.0	< 4.8	NA	< 4.9	< 4.5	< 4.8	< 4.5	< 4.9
Trichloroethene	67	< 6.3	< 6.5	< 6.4	< 6.1	< 6.7	< 6.4	< 6.5	< 6.4	< 6.2	< 6.3	**11**	< 6.5	**6.9**	< 6.6	< 6.1	< 6.5	< 6.1	< 6.6
Vinyl chloride	54	< 3.0	< 3.1	< 3.0	< 2.9	< 3.2	< 3.0	< 3.1	< 3.0	< 3.0	< 3.0	< 3.2	< 3.1	< 3.0	< 3.2	< 2.9	< 3.1	< 2.9	< 3.2

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Table 7
Off-Site Soil Vapor Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:	Residential RIASL	SVMP-10						SVMP-11	SVMP-12						SVMP-13					
Sample Depth (ft. bgs):		3						3.5	3.5						2					
Sample Date:		6/13/2017	9/20/2017	11/21/2017	2/20/2018	5/31/2018	8/23/2018	6/13/2017	6/13/2017	9/19/2017	11/21/2017	2/20/2018	5/29/2018	8/23/2018	6/16/2017	9/19/2017	11/21/2017	2/19/2018	5/31/2018	8/24/2018
VOCs (Method TO-15) µg/m^3																				
1,1-Dichloroethene	7,000	NA	< 4.8	< 4.4	< 4.7	NA	< 4.9	NA	NA	< 4.8	< 4.7	< 4.7	< 4.8	< 4.7	NA	< 4.6	< 4.6	NA	NA	< 4.8
1,4-Dioxane	170	NA	< 17	< 16	< 17	NA	< 18	NA	NA	< 17	< 17	< 17	< 18	< 17	NA	< 17	< 16	NA	NA	< 17
cis-1,2-Dichloroethene	280	NA	< 4.8	< 4.4	< 4.7	NA	< 4.9	NA	NA	< 4.8	< 4.7	< 4.7	< 4.8	< 4.7	NA	< 4.6	< 4.6	NA	NA	< 4.8
Tetrachloroethene	1,400	NA	< 8.2	< 7.5	< 8.1	NA	< 8.4	NA	NA	< 8.2	< 8.0	< 8.1	< 8.2	< 8.0	NA	< 7.9	< 7.8	NA	NA	< 8.2
trans-1,2-Dichloroethene	9,000	NA	< 4.8	< 4.4	< 4.7	NA	< 4.9	NA	NA	< 4.8	< 4.7	< 4.7	< 4.8	< 4.7	NA	< 4.6	< 4.6	NA	NA	< 4.8
Trichloroethene	67	< 6.7	< 6.5	< 5.9	< 6.4	NA	< 6.6	< 6.3	< 6.4	< 6.5	< 6.3	< 6.4	< 6.5	< 6.4	< 6.6	< 6.3	< 6.2	NA	NA	< 6.5
Vinyl chloride	54	< 3.2	< 3.1	< 2.8	< 3.0	NA	< 3.2	< 3.0	< 3.0	< 3.1	< 3.0	< 3.0	< 3.1	< 3.0	< 3.2	< 3.0	< 2.9	NA	NA	< 3.1

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Table 7
Off-Site Soil Vapor Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:	Residential RIASL	SVMP-14						SVMP-15						SVMP-16					
Sample Depth (ft. bgs):		2						2						2					
Sample Date:		6/16/2017	9/19/2017	11/21/2017	2/19/2018	5/31/2018	8/24/2018	6/16/2017	9/19/2017	11/20/2017	2/19/2018	5/31/2018	8/24/2018	6/16/2017	9/19/2017	11/20/2017	2/19/2018	5/31/2018	8/24/2018
VOCs (Method TO-15) µg/m^3																			
1,1-Dichloroethene	7,000	NA	< 4.5	< 4.1	NA	NA	< 4.7	NA	< 4.7	< 4.4	NA	NA	< 4.8	NA	< 4.5	< 4.3	NA	NA	< 5.0
1,4-Dioxane	170	NA	< 16	< 15	NA	NA	< 17	NA	< 17	< 16	NA	NA	< 17	NA	< 16	< 16	NA	NA	< 18
cis-1,2-Dichloroethene	280	NA	< 4.5	< 4.1	NA	NA	< 4.7	NA	< 4.7	< 4.4	NA	NA	< 4.8	NA	< 4.5	< 4.3	NA	NA	< 5.0
Tetrachloroethene	1,400	NA	< 7.8	< 7.0	NA	NA	< 8.1	NA	< 8.1	< 7.6	NA	NA	< 8.2	NA	< 7.8	< 7.4	NA	NA	< 8.5
trans-1,2-Dichloroethene	9,000	NA	< 4.5	< 4.1	NA	NA	< 4.7	NA	< 4.7	< 4.4	NA	NA	< 4.8	NA	< 4.5	< 4.3	NA	NA	< 5.0
Trichloroethene	67	< 6.4	< 6.2	< 5.6	NA	NA	< 6.4	< 6.3	< 6.4	< 6.0	NA	NA	< 6.5	< 6.4	< 6.2	< 5.9	NA	NA	< 6.8
Vinyl chloride	54	< 3.0	< 2.9	< 2.6	NA	NA	< 3.0	< 3.0	< 3.0	< 2.9	NA	NA	< 3.1	< 3.0	< 2.9	< 2.8	NA	NA	< 3.2

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Off-Site Soil Vapor Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:	Residential RIASL	SVMP-17						SVMP-18						SVMP-19					
Sample Depth (ft. bgs):		2						3						3					
Sample Date:		6/16/2017	9/19/2017	11/20/2017	2/19/2018	5/30/2018	8/24/2018	6/16/2017	9/18/2017	11/17/2017	2/20/2018	5/30/2018	8/22/2018	6/16/2017	9/18/2017	11/17/2017	2/20/2018	5/31/2018	8/22/2018
VOCs (Method TO-15) µg/m^3																			
1,1-Dichloroethene	7,000	NA	< 4.8	NA	NA	< 4.8	< 4.9	NA	< 4.6	< 4.3	< 4.5	< 4.7	< 5.1	NA	< 5.1	< 4.3	< 4.1	NA	< 4.5
1,4-Dioxane	170	NA	< 17	NA	NA	< 17	< 18	NA	< 17	< 16	< 16	< 17	< 18	NA	< 18	< 16	< 15	NA	< 16
cis-1,2-Dichloroethene	280	NA	< 4.8	NA	NA	< 4.8	< 4.9	NA	< 4.6	< 4.3	< 4.5	< 4.7	< 5.1	NA	< 5.1	< 4.3	< 4.1	NA	< 4.5
Tetrachloroethene	1,400	NA	< 8.2	NA	NA	< 8.1	< 8.4	NA	< 7.9	< 7.3	< 7.8	< 8.1	< 8.8	NA	< 8.8	< 7.4	< 7.1	NA	< 7.7
trans-1,2-Dichloroethene	9,000	NA	< 4.8	NA	NA	< 4.8	< 4.9	NA	< 4.6	< 4.3	< 4.5	< 4.7	< 5.1	NA	< 5.1	< 4.3	< 4.1	NA	< 4.5
Trichloroethene	67	**18**	**22**	NA	NA	< 6.4	< 6.6	< 6.6	< 6.3	< 5.8	< 6.2	< 6.4	< 6.9	< 6.4	< 6.9	< 5.9	< 5.6	NA	< 6.1
Vinyl chloride	54	< 3.0	< 3.1	NA	NA	< 3.1	< 3.2	< 3.2	< 3.0	< 2.8	< 2.9	< 3.0	< 3.3	< 3.0	< 3.3	< 2.8	< 2.7	NA	< 2.9

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Ford Livonia Transmission Plant
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Location:	Residential RIASL	SVMP-20						SVMP-21						SVMP-22					
Sample Depth (ft. bgs):		3						2						3					
Sample Date:		6/19/2017	9/19/2017	11/20/2017	2/19/2018	5/31/2018	8/22/2018	6/19/2017	9/19/2017	11/20/2017	2/19/2018	5/30/2018	8/24/2018	6/19/2017	9/18/2017	11/17/2017	2/20/2018	5/31/2018	8/21/2018
VOCs (Method TO-15) µg/m^3																			
1,1-Dichloroethene	7,000	NA	< 4.8	NA	NA	NA	< 4.7	NA	< 4.6	< 4.6	NA	< 4.8	< 4.8	NA	< 4.8	< 4.9	< 4.7	NA	< 4.7
1,4-Dioxane	170	NA	< 17	NA	NA	NA	< 17	NA	< 17	< 17	NA	< 18	< 17	NA	< 17	< 18	< 17	NA	< 17
cis-1,2-Dichloroethene	280	NA	< 4.8	NA	NA	NA	< 4.7	NA	< 4.6	< 4.6	NA	< 4.8	< 4.8	NA	< 4.8	< 4.9	< 4.7	NA	< 4.7
Tetrachloroethene	1,400	NA	< 8.2	NA	NA	NA	< 8.0	NA	< 7.9	< 7.9	NA	< 8.3	< 8.2	NA	< 8.2	< 8.4	< 8.1	NA	< 8.0
trans-1,2-Dichloroethene	9,000	NA	< 4.8	NA	NA	NA	< 4.7	NA	< 4.6	< 4.6	NA	< 4.8	< 4.8	NA	< 4.8	< 4.9	< 4.7	NA	< 4.7
Trichloroethene	67	< 5.8	< 6.5	NA	NA	NA	< 6.3	< 6.2	< 6.3	< 6.2	NA	< 6.6	< 6.5	< 6.4	< 6.5	< 6.7	< 6.4	NA	< 6.3
Vinyl chloride	54	< 2.7	< 3.1	NA	NA	NA	< 3.0	< 3.0	< 3.0	< 3.0	NA	< 3.1	< 3.1	< 3.1	< 3.1	< 3.2	< 3.0	NA	< 3.0

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Table 7
Off-Site Soil Vapor Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:	Residential RIASL	SVMP-23						SVMP-24						SVMP-25					
Sample Depth (ft. bgs):		3						4						3					
Sample Date:		6/19/2017	9/18/2017	11/17/2017	2/20/2018	5/31/2018	8/22/2018	6/19/2017	9/18/2017	11/17/2017	2/21/2018	5/30/2018	8/22/2018	6/19/2017	9/21/2017	11/21/2017	2/21/2018	5/29/2018	8/23/2018
VOCs (Method TO-15) µg/m^3																			
1,1-Dichloroethene	7,000	NA	< 4.6	< 4.3	< 4.2	NA	< 4.6	NA	< 4.6	< 4.4	< 4.7	< 4.6	< 4.7	NA	< 4.7	< 4.5	< 4.4	< 5.0	< 5.0
1,4-Dioxane	170	NA	< 17	< 16	< 15	NA	< 17	NA	< 17	< 16	< 17	< 17	< 17	NA	< 17	< 16	< 16	< 18	< 18
cis-1,2-Dichloroethene	280	NA	< 4.6	< 4.3	< 4.2	NA	< 4.6	NA	< 4.6	< 4.4	< 4.7	< 4.6	< 4.7	NA	< 4.7	< 4.5	< 4.4	< 5.0	< 5.0
Tetrachloroethene	1,400	NA	< 7.9	< 7.4	< 7.2	NA	< 7.9	NA	< 7.9	< 7.5	< 8.1	< 7.9	< 8.1	NA	< 8.1	< 7.7	< 7.6	< 8.5	< 8.5
trans-1,2-Dichloroethene	9,000	NA	< 4.6	< 4.3	< 4.2	NA	< 4.6	NA	< 4.6	< 4.4	< 4.7	< 4.6	< 4.7	NA	< 4.7	< 4.5	< 4.4	< 5.0	< 5.0
Trichloroethene	67	< 6.4	< 6.3	< 5.8	< 5.7	NA	< 6.3	< 6.2	< 6.3	< 5.9	< 6.4	< 6.3	**6.9**	< 6.2	< 6.4	< 6.1	< 6.0	< 6.7	< 6.7
Vinyl chloride	54	< 3.1	< 3.0	< 2.8	< 2.7	NA	< 3.0	< 3.0	< 3.0	< 2.8	< 3.0	< 3.0	< 3.0	< 3.0	< 3.0	< 2.9	< 2.9	< 3.2	< 3.2

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Off-Site Soil Vapor Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:	Residential RIASL	SVMP-25						SVMP-26						SVMP-27					
Sample Depth (ft. bgs):		6						4						4.5					
Sample Date:		6/19/2017	9/21/2017	11/21/2017	2/21/2018	5/29/2018	8/23/2018	6/19/2017	9/21/2017	11/21/2017	2/21/2018	5/29/2018	8/23/2018	6/19/2017	9/21/2017	11/21/2017	2/21/2018	5/29/2018	8/23/2018
VOCs (Method TO-15) µg/m^3																			
1,1-Dichloroethene	7,000	NA	< 4.4	< 4.7	< 4.4	< 5.1	< 4.7	NA	< 4.9	< 4.4	< 4.4	< 4.9	< 4.6	NA	< 4.4	< 4.4	< 4.4	< 4.9	< 5.0
1,4-Dioxane	170	NA	< 16	< 17	< 16	< 19	< 17	NA	< 18	< 16	< 16	< 18	< 17	NA	< 16	< 16	< 16	< 18	< 18
cis-1,2-Dichloroethene	280	NA	< 4.4	< 4.7	< 4.4	< 5.1	< 4.7	NA	< 4.9	< 4.4	< 4.4	< 4.9	**14**	NA	**11**	< 4.4	< 4.4	< 4.9	< 5.0
Tetrachloroethene	1,400	NA	**12**	< 8.1	< 7.6	< 8.8	< 8.1	NA	< 8.4	< 7.6	< 7.5	< 8.4	< 8.0	NA	< 7.6	< 7.5	< 7.6	< 8.4	< 8.5
trans-1,2-Dichloroethene	9,000	NA	< 4.4	< 4.7	< 4.4	< 5.1	< 4.7	NA	< 4.9	< 4.4	< 4.4	< 4.9	< 4.6	NA	< 4.4	< 4.4	< 4.4	< 4.9	< 5.0
Trichloroethene	67	< 6.4	< 6.0	< 6.4	< 6.0	< 7.0	< 6.4	< 6.2	< 6.6	< 6.0	< 5.9	< 6.7	**24**	< 6.2	**7.2**	< 5.9	< 6.0	< 6.7	< 6.7
Vinyl chloride	54	< 3.0	< 2.9	< 3.0	< 2.9	< 3.3	< 3.0	< 3.0	< 3.2	< 2.9	< 2.8	< 3.2	< 3.0	< 3.0	< 2.9	< 2.8	< 2.9	< 3.2	< 3.2

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Off-Site Soil Vapor Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Location:	Residential RIASL	SVMP-28						SVMP-29		SVMP-30	SVMP-31	SVMP-32		SVMP-33	SVMP-34	SVMP-35	SVMP-36	SVMP-37
Sample Depth (ft. bgs):		3						3.5	7.5	4	5.5	3	6	4	4	4	4	2.5
Sample Date:		6/19/2017	9/21/2017	11/21/2017	2/21/2018	5/29/2018	8/23/2018	6/14/2017	6/14/2017	6/14/2017	6/14/2017	6/15/2017	6/15/2017	6/15/2017	6/15/2017	6/15/2017	6/16/2017	6/16/2017
VOCs (Method TO-15) µg/m^3																		
1,1-Dichloroethene	7,000	NA	< 4.8	< 4.6	< 4.3	< 5.2	< 4.7	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
1,4-Dioxane	170	NA	< 17	< 17	< 16	< 19	< 17	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
cis-1,2-Dichloroethene	280	NA	< 4.8	< 4.6	< 4.3	< 5.2	< 4.7	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Tetrachloroethene	1,400	NA	**25**	< 7.9	< 7.3	< 8.9	**8.9**	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
trans-1,2-Dichloroethene	9,000	NA	< 4.8	< 4.6	< 4.3	< 5.2	< 4.7	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Trichloroethene	67	< 6.1	< 6.5	< 6.3	< 5.8	< 7.1	< 6.3	< 6.3	< 6.0	**31**	< 6.1	< 6.4	< 6.5	< 6.5	< 6.3	< 6.9	< 6.2	< 6.2
Vinyl chloride	54	< 2.9	< 3.1	< 3.0	< 2.8	< 3.4	< 3.0	< 3.0	< 2.8	< 2.9	< 2.9	< 3.0	< 3.1	< 3.1	< 3.0	< 3.3	< 2.9	< 3.0

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Table 7
Off-Site Soil Vapor Results
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Notes:
The residential RIASLs apply to a residential structure with a basement.
SVMP-11 abandoned after the initial sampling event per the adjacent property owners request.
SVMP-29 through SVMP-37 are located on residential properties and therefore only sampled during the initial sampling event.
SVMP-17 and SVMP-20 were not sampled during the November 2017 sampling event due to saturated screens.
SVMP-13 through SVMP-17, SVMP-20, and SVMP-21 were not sampled during the February 2018 sampling event due to saturated screens.
SVMP-10, SVMP-13 through SVMP-16, SVMP-19, SVMP-22, and SVMP-23 were not sampled during the May 2018 sampling event due to saturated screens.
SVMP-20 was not sampled during the May 2018 sampling event due to a blockage in the tubing.

Bold Concentration was detected above reporting limit.

Abbreviations:

<	denotes not detected above reporting limit
µg/m^3	Micrograms per cubic meter
ft. bgs	Feet below ground surface
J	Reported value is estimated
NA	Not analyzed
RIASL	Recommended Interim Action Screening Levels
SVMP	Soil vapor monitoring point
VOC	Volatile organic compounds

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Table 8
Hydraulic Control System Monthly Discharge Volumes
Ford Livonia Transmission Plant
36200 Plymouth Road
Livonia, Michigan

Date	Approximate Volume of Treated Water Discharged ¥ (Gallons)	Date	Approximate Volume of Treated Water Discharged ¥ (Gallons)	Date	Approximate Volume of Treated Water Discharged ¥ (Gallons)
7/1/2018	36,031	8/1/2018	23,423	9/1/2018	31,493
7/2/2018	35,448	8/2/2018*	23,736	9/2/2018	31,268
7/3/2018	35,121	8/3/2018MΩ	22,781	9/3/2018	31,032
7/4/2018	34,987	8/4/2018	33,327	9/4/2018	31,058
7/5/2018	34,838	8/5/2018	31,513	9/5/2018	31,082
7/6/2018A*	34,545	8/6/2018	27,911	9/6/2018	30,798
7/7/2018AΩ	34,222	8/7/2018	26,000	9/7/2018*Ω	30,600
7/8/2018A	34,091	8/8/2018	32,921	9/8/2018Ω	30,060
7/9/2018	34,036	8/9/2018	35,415	9/9/2018	31,829
7/10/2018	34,208	8/10/2018Ω	33,725	9/10/2018	30,876
7/11/2018	33,943	8/11/2018	34,267	9/11/2018	30,488
7/12/2018	31,035	8/12/2018	33,794	9/12/2018	29,676
7/13/2018	25,090	8/13/2018	33,686	9/13/2018	29,998
7/14/2018Ω	24,855	8/14/2018	33,497	9/14/2018Ω	28,497
7/15/2018	25,863	8/15/2018	33,230	9/15/2018	33,504
7/16/2018A	25,192	8/16/2018	32,929	9/16/2018	31,929
7/17/2018	24,940	8/17/2018Ω	33,133	9/17/2018H	29,192
7/18/2018	31,209	8/18/2018	32,979	9/18/2018H	26,683
7/19/2018	34,810	8/19/2018	32,799	9/19/2018H	24,245
7/20/2018Ω	34,021	8/20/2018	32,658	9/20/2018H	17,833
7/21/2018	33,735	8/21/2018	32,566	9/21/2018ΩH	19,975
7/22/2018	33,364	8/22/2018	32,184	9/22/2018H	25,883
7/23/2018	33,090	8/23/2018	32,101	9/23/2018H	25,013
7/24/2018	25,166	8/24/2018Ω	30,927	9/24/2018H	21,829
7/25/2018	24,157	8/25/2018	34,483	9/25/2018H	19,955
7/26/2018	23,806	8/26/2018	33,421	9/26/2018HM	10,393
7/27/2018Ω	23,547	8/27/2018	32,600	9/27/2018M	939
7/28/2018	23,429	8/28/2018	32,126	9/28/2018HM	11,787
7/29/2018	23,345	8/29/2018	31,739	9/29/2018H	31,192
7/30/2018	23,170	8/30/2018	31,360	9/30/2018H	28,727
7/31/2018	23,135	8/31/2018Ω	31,898	--	--
Total volume discharged during July 2018	**928,429**	**Total volume discharged during August 2018**	**979,129**	**Total volume discharged during September 2018**	**787,834**

Notes:
Treated groundwater discharge volume readings are recorded daily.

Footnotes:

* Monthly treated groundwater discharge compliance sample collected as required by the Wastewater Discharge Permit Addendum #1 (Permit No.: 006-27510-IU).

¥ Volume of treated groundwater discharged from the Groundwater Remediation System is based on a totalizer flow meter installed on the effluent discharge pipe inside the system building.

Ω Groundwater remediation treatment system inspection visit.

A Daily discharge amounts recorded from daily Master Trend file instead of Daily System Screenshot .

S System shut down.

C System deactivated to collect carbon sample from each carbon vessel.

M System deactivated to perform maintenance of the air stripper.

H Up to two of four wells offline to perform routine cleaning and maintenance activities, two wells remained online at all times.

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FIGURES

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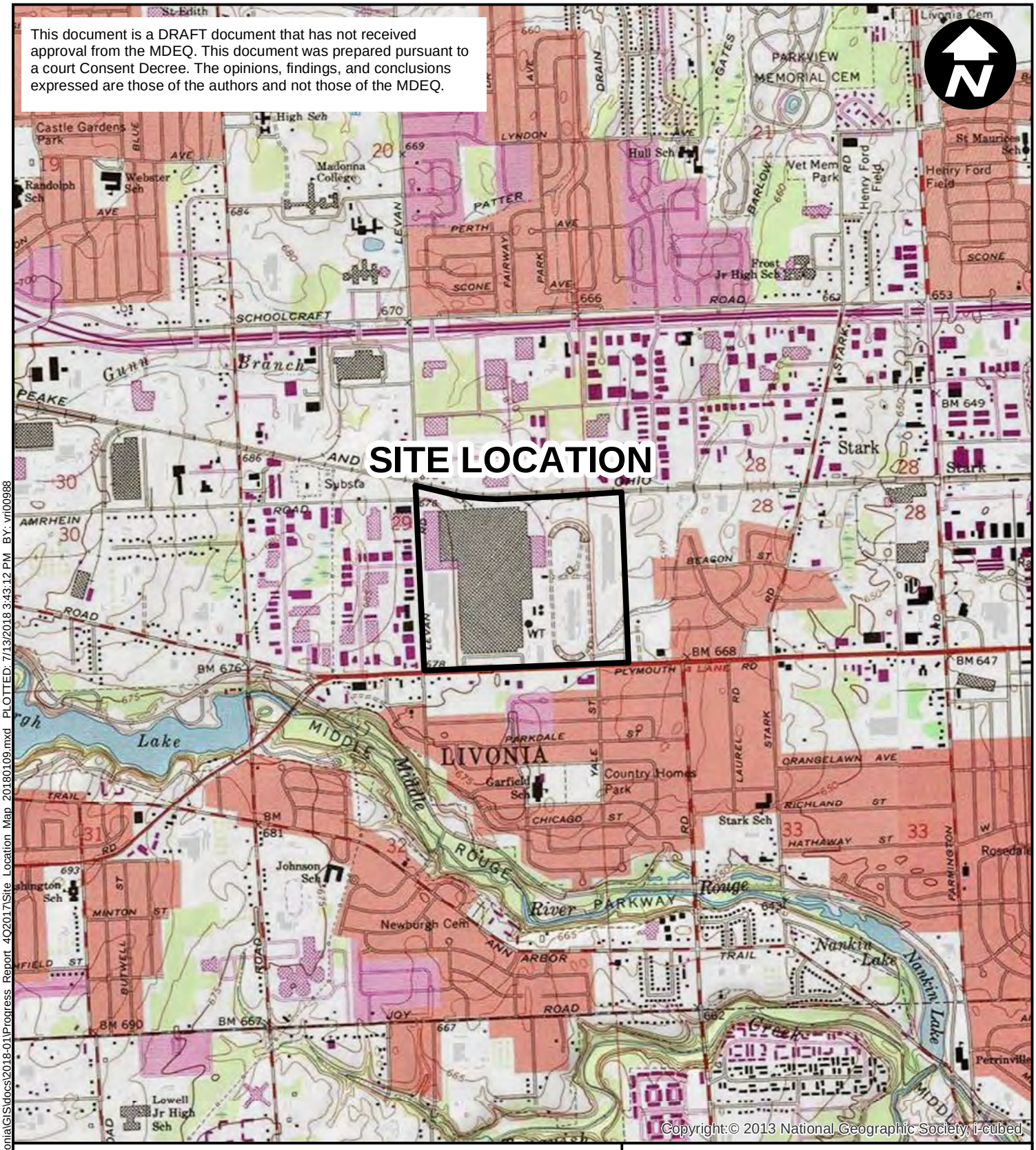

0 2,000 4,000

SCALE IN FEET

NOTES:

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

SOURCE:

USGS 7.5 MINUTE TOPOGRAPHIC MAP
NORTHVILLE AND WAYNE QUADRANGLES

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

SITE LOCATION MAP

ARCADIS Design & Consultancy for natural and built assets

FIGURE
1

CITY: Novi DIV: ENV DB: MG PROJECT NUMBER: MI001322.0001 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects\ ENV\Novi\Brighton MI\Ford\Livonia\GIS\docs\2018-01\Progress Report 4Q2017\Site Location Map 20180109.mxd PLOTTED: 7/13/2018 3:43:12 PM BY: vri00988

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CITY: Novi DIV: ENV DB: MG PIC: R. ELLIS PM: K. HINSKEY PROJECT NUMBER: MI001322.0001 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MIFordLivonia\GIS\docs\GEC\Progress Report_Quarter 3_2018\2018-10-01\Site Layout On-site and Off-site_20180109.mxd PLOTTED: 10/22/2018 7:22:53 PM BY: msi01059

ON-SITE AREA

OFF-SITE AREA

LIVONIA TRANSMISSION PLANT

TEST TRACK

ATNPC BUILDING

SSDS Location

HCS Location

ROSATI AVE

CONCORD ST

CAPITOL ST

BEACON ST

WADSWORTH ST

BOSTON POST ST

BREWSTER ST

BELDEN CT

STARK RD

STANDISH ST

PRISCILLA LN

LAUREL ST

LEVAN RD

PLYMOUTH RD

MW-15-59D MW-27 MW-56 MW-55 MW-54 MW-26 SVMP-15-01 MW-28 MW-57 MW-53 VAULT V-ESD-1 SVMP-25 MW-72 MW-85 SVMP-22 SVMP-23 SVMP-24 MW-58 MW-52 SVMP-15-03 SVMP-36 MW-83 TW-16-03 TW-16-04 PW-16-02 MW-62 MW-43 SVMP-19 SVMP-18 MW-29 MW-50 MW-73S SVMP-26 SVMP-11 SVMP-20 MW-80S MW-82D VAULT V-ESD-2 MW-63 SVMP-16-01 MW-79D MW-79S MW-82S SVMP-12 SVMP-34 SVMP-21 MW-65 MW-64 SVMP-15-04 MW-35 MW-73D SVMP-37 MW-74 SVMP-32 SVMP-33 MW-78 SVMP-16 SVMP-17 MW-81 MW-51 SVMP-27 SVMP-08 MW-84 SVMP-10 SVMP-13 SVMP-14 MW-66 MW-48 MW-42 SVMP-09 SVMP-15 MW-15-61D MW-67 VAULT V-ESD-3 MW-34 MW-44 SVMP-15-05 MW-68 MW-86 SVMP-05 SVMP-04 MW-3 MW-19 SVMP-15-02 MW-75D SVMP-07 MW-47 MW-41 SVMP-06 MW-75S SVMP-35 SVMP-31 MW-22 VAULT V-ESD-4 SVMP-28 SVMP-30 MW-77 MW-46 SVMP-16-09 MW-69 MW-30 SVMP-16-02 SVMP-16-08 SVMP-29 MW-5 MW-21 MW-70 SVMP-15-06 MW-87 SVMP-03 SVMP-01 SVMP-02 MW-49 SVMP-16-07 MW-2 MW-4 MW-10 MW-25 SVMP-15-08 SVMP-16-03 PW-16-01 TW-16-02 MW-45 MW-71 SVMP-16-04 MW-31 TW-16-01 SVMP-16-06 SVMP-16-05 MW-23 MW-40 MW-9 MW-15-60D MW-1 MW-7 MW-14 MW-18 MW-20 VAULT V-ESD-5 SVMP-15-07 MW-76 MW-37 MW-38 MW-39 MW-32 MW-36 MW-24 MW-33

LEGEND

- ABANDONED SOIL VAPOR MONITORING POINT
- SOIL VAPOR MONITORING POINT
- MONITORING WELL
- VAULT (2 FT x 2 FT)
- VAULT (4 FT x 6 FT)
- SUCTION PITS
- WELL SCREEN (4-INCH SDR-11 HDPE, CUSTOM SLOTTED)
- WELL BLANK CASING (4-INCH SDR-11 HDPE)
- WELL BLANK CASING (6-INCH SDR-11 HDPE)
- SSDS CONVEYANCE PIPING
- FORD PROPERTY BOUNDARY
- COMMERCIAL/RESIDENTIAL PROPERTY BOUNDARY
- AREA OF CONCERN

NOTES:

ATNPC - AUTOMATIC TRANSMISSION NEW PRODUCT CENTER

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

HDPE = HIGH-DENSITY POLYETHYLENE

SSDS = SUB-SLAB DEPRESSURIZATION SYSTEM

HCS = HYDRAULIC CONTROL SYSTEM

0 400 800

SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

SITE LAYOUT

ARCADIS Design & Consultancy for natural and built assets

FIGURE 2

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CITY: NOVI DIV: ENV DB: MG PIC: R. ELLIS PM: K. HINSKEY TM: A. DEGRANDIS TR: P. CURRY PROJECT NUMBER: MI001454.0004.00001 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GIS\Projects_ENV\Novi\Brighton_MI\Ford\Livonia\GIS\docs\GEC\Progress Report_Quarter 3_2018\2018-10-01\Figure 3_Site Wide GWE Contour.mxd PLOTTED: 10/22/2018 7:24:41 PM BY: msi01059

LEGEND

- MONITORING WELL
- LNAPL MONITORING WELL
- VAULT (2 FT x 2 FT)
- VAULT (4 FT x 6 FT)
- WELL SCREEN (4-INCH SDR-11 HDPE, CUSTOM SLOTTED)
- WELL BLANK CASING (4-INCH SDR-11 HDPE)
- WELL BLANK CASING (6-INCH SDR-11 HDPE)
- (662.85) GROUNDWATER ELEVATION
- 650 GROUNDWATER ELEVATION CONTOUR (DASHED WHERE INFERRED; CONTOUR INTERVAL = 1.0 FT)
- APPARENT GROUNDWATER FLOW DIRECTION
- PROPERTY BOUNDARIES
- FORD PROPERTY BOUNDARY

NOTES:
1. ALL ELEVATIONS COLLECTED ON AUGUST 16, 2018 AND MEASURED FROM TOP OF WELL CASING.
2. ALL ELEVATIONS ARE REFERENCED TO A MEAN SEA LEVEL DATUM AND ARE IN UNITS OF FEET ABOVE SEA LEVEL.
3. WHERE NESTED WELLS ARE PRESENT, THE DEEP WELL IS USED FOR CONTOURING PURPOSES.
4. *WELL NOT USED TO CREATE CONTOURS.
5. LNAPL = LIGHT NON-AQUEOUS PHASE LIQUID
6. NM = NOT MEASURED, CNL = COULD NOT LOCATE
7. GROUNDWATER ELEVATION AT HYDRAULIC CONTROL SYSTEM HORIZONTAL WELLS ARE DETERMINED BY ESTIMATING AN APPARENT AMBIENT GROUNDWATER ELEVATION AND SUBTRACTING THE PUMPING WATER LEVEL.
8. HYDRAULIC CONTROL SYSTEM PERFORMANCE MONITORING WELLS RE-SURVEYED IN OCTOBER 2017. MONITORING WELLS RE-SURVEYED IN NOVEMBER 2017. MW-5 AND MW-21 WERE UNABLE TO BE RE-SURVEYED DURING THE NOVEMBER 2017 EVENT DUE TO ACCESS. HYDRAULIC CONTROL SYSTEM HORIZONTAL WELLS RE-SURVEYED IN SEPTEMBER 2018.
9. MONITORING WELLS WITH LNAPL PRESENT IN THEM HAVE HAD THEIR GROUNDWATER ELEVATIONS CORRECTED TO ACCOUNT FOR THE LNAPL.
10. MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY
11. HDPE = HIGH-DENSITY POLYETHYLENE
12. SSDS = SUB-SLAB DEPRESSURIZATION SYSTEM
13. HCS = HYDRAULIC CONTROL SYSTEM

0 400 800
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

SITE-WIDE GROUNDWATER ELEVATION CONTOUR MAP UNDER PUMPING CONDITIONS AUGUST 2018

ARCADIS Design & Consultancy for natural and built assets

FIGURE 3

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MW-15-59D (94-99 FT)
11/15/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-26 (4.5-14.5 FT)
11/14/2017: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-28 (2-12 FT)
11/8/2017: 0.91 J µg/L
2/7/2018: 0.50 J µg/L
5/15/2018: 0.43 J µg/L
8/13/2018: 0.86 J µg/L

MW-27

MW-56 (16-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: 0.24 J µg/L

MW-55 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-54 (16-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-57 (17-22 FT)
11/7/2017: ND (< 1.0 µg/L)
2/9/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-53 (16-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 J µg/L)

MW-58 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

VAULT V-ESD-1

MW-52 (15-20 FT)
11/10/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

TW-16-04 (9-19 FT)
11/8/2017: 23 µg/L
2/14/2018: 25 µg/L
5/11/2018: 20 µg/L
8/8/2018: 21 µg/L

TW-16-03 (9-14 FT)
11/8/2017: 36 µg/L
2/14/2018: 40 µg/L
5/11/2018: 39 µg/L
8/8/2018: 36 µg/L

MW-62 (16.3-21.3 FT)
11/13/2017: 0.30 J µg/L
2/6/2018: 0.30 J µg/L
5/9/2018: 0.83 J µg/L
8/6/2018: ND (< 1.0 µg/L)

MW-43 (17-22 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

LMW-15-07
LMW-15-06
LMW-15-08
LMW-15-10

MW-50 (16-21 FT)
11/13/2017: 23 µg/L
2/12/2018: 22 µg/L
5/9/2018: 12 µg/L
8/6/2018: 17 µg/L

ESD-1

MW-29 (5-15 FT)
11/14/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

PW-16-02 (6-21 FT)
11/8/2017: 2.3 µg/L
2/14/2018: 12 µg/L
5/11/2018: ND (< 1.0 µg/L)
8/8/2018: 11 µg/L

MW-65 (16-21 FT)
11/8/2017: 3.9 µg/L
2/6/2018: 4.1 µg/L
5/10/2018: 6.0 µg/L
8/8/2018: 6.2 µg/L

MW-63 (7-12 FT)
11/13/2017: ND (< 10 µg/L)
2/7/2018: 1.7 µg/L
5/9/2018: 2.5 µg/L
8/6/2018: 3.3 µg/L

VAULT V-ESD-2

MW-35 (19.5-24.5 FT)
11/7/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

LMW-15-09

MW-51 (15-20 FT)
11/9/2017: ND (< 1.0 µg/L)
2/8/2018: 0.31 J µg/L
5/14/2018: ND (< 1.0 µg/L)
8/6/2018: 0.37 J µg/L

MW-66 (15-20 FT)
11/13/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-64 (15-20 FT)
11/7/2017: 0.31 J µg/L
2/9/2018: 0.30 J µg/L
5/10/2018: ND (< 1.0 µg/L)
8/13/2018: 0.29 J µg/L

MW-42 (16-21 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-44 (16-21 FT)
11/7/2017: ND (< 20 µg/L)
2/6/2018: ND (< 6.7 µg/L)
5/14/2018: ND (< 13 µg/L)
8/13/2018: ND (< 20 µg/L)

ESD-2

MW-48 (17-23 FT)
11/14/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-15-61D (88-93 FT)
11/15/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

LMW-15-02

MW-47 (16-21 FT)
11/10/2017: 79 µg/L
5/10/2018: 49 J µg/L
8/9/2018: 55 µg/L

VAULT V-ESD-3

MW-67 (9-14 FT)
11/14/2017: 15 µg/L
2/12/2018: 9.6 µg/L
5/14/2018: 5.7 µg/L
8/13/2018: 4.5 µg/L

MW-34 (16.5-21.5 FT)
11/9/2017: 0.35 J µg/L
2/13/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: 0.33 J µg/L

MW-19 (15-20 FT)
11/14/2017: 1.1 µg/L
2/14/2018: 0.94 J µg/L
5/14/2018: 0.71 J µg/L
8/10/2018: 1.0 µg/L

MW-3 (14-19 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

LMW-15-05

MW-46 (16-21 FT)
11/13/2017: 22 µg/L
2/12/2018: 14 µg/L
5/14/2018: 6.0 µg/L
8/9/2018: 11 µg/L

MW-68 (15-20 FT)
11/10/2017: 13 µg/L
2/12/2018: 13 µg/L
5/15/2018: 10 µg/L
8/9/2018: 13 µg/L

MW-41 (16-21 FT)
11/9/2017: 2.3 µg/L
2/13/2018: 2.1 µg/L
5/8/2018: 2.6 µg/L
8/10/2018: 2.5 µg/L

MW-22 (16.5-21.5 FT)
11/7/2017: 25 J µg/L
2/6/2018: 200 µg/L
5/10/2018: 180 µg/L
8/6/2018: 310 µg/L

LMW-15-03

MW-70 (15-20 FT)
11/13/2017: 200 µg/L
2/12/2018: 230 µg/L
5/14/2018: 260 µg/L
8/9/2018: 200 µg/L

ESD-3

VAULT V-ESD-4

MW-30 (19-24 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

SSDS Location

MW-10 (16.5-21.5 FT)
11/9/2017: ND (< 100 µg/L)
2/13/2018: ND (< 200 µg/L)
5/10/2018: ND (< 100 µg/L)
8/9/2018: ND (< 140 µg/L)

MW-21 (13.5-18.5 FT)
2/13/2018: 20,000 µg/L
5/15/2018: 18,000 µg/L
8/14/2018: 26,000 µg/L

MW-5 (15.5-20.5 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/10/2018: 0.58 J µg/L
8/7/2018: ND (< 1.0 µg/L)

LMW-15-04

MW-49 (12.5-17.5 FT)
2/13/2018: 20,000 µg/L
5/11/2018: 17,000 µg/L
8/14/2018: 15,000 µg/L

PW-16-01 (9.7-19.7 FT)
11/7/2017: 550 µg/L
2/7/2018: 82 µg/L
5/15/2018: 7.1 J µg/L
8/6/2018: 180 µg/L

MW-45 (15-20 FT)
11/13/2017: 2,100 µg/L
2/12/2018: 1,800 µg/L
5/8/2018: 1,200 µg/L
8/9/2018: 1,000 µg/L

MW-69 (15-20 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-31 (17-22 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-2 (15.5-20.5 FT)
11/9/2017: 1,000 µg/L
2/13/2018: 1,400 µg/L
5/10/2018: 1,700 J µg/L
8/10/2018: 2,300 µg/L

MW-4 (15.5-20.5 FT)
11/9/2017: 21,000 µg/L
2/13/2018: 26,000 µg/L
5/10/2018: 21,000 J µg/L
8/7/2018: 22,000 µg/L

MW-25 (16-21 FT)
11/14/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-18 (13-18 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-23 (15-20 FT)
11/7/2017: 78,000 µg/L
2/6/2018: 33,000 µg/L
5/7/2018: 2,400 µg/L
8/6/2018: 43,000 µg/L

HCS Location

TW-16-01 (12-17 FT)
11/7/2017: 32 µg/L
2/7/2018: 34 µg/L
5/15/2018: 68 µg/L
8/6/2018: 140 µg/L

MW-71 (15-20 FT)
11/13/2017: 0.39 J µg/L
2/12/2018: 0.37 J µg/L
5/8/2018: 0.40 J µg/L
8/9/2018: 0.34 J µg/L

MW-40 (20-25 FT)
11/15/2017: 3.2 µg/L
5/8/2018: 2.3 J µg/L
8/10/2018: 2.4 µg/L

LEVAN RD

MW-1 (14-19 FT)
11/10/2017: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-7 (18-23 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-9 (19.5-24.5 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: 0.29 J µg/L

LMW-15-01

MW-14 (15-20 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: 0.31 J µg/L

MW-20 (13.5-18.5 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

TW-16-02 (12-17 FT)
11/7/2017: 6,000 µg/L
2/14/2018: 3,500 µg/L
5/11/2018: 4,400 µg/L
8/6/2018: 4,100 µg/L

VAULT V-ESD-5

MW-32 (18-23 FT)
11/7/2017: 0.31 J µg/L
2/12/2018: 0.37 J µg/L
5/8/2018: 0.50 J µg/L
8/7/2018: 0.32 J µg/L

MW-15-60D (93-98 FT)
11/15/2017: ND (< 1.0 J µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-36 (20-25 FT)
11/10/2017: ND (< 1.0 µg/L)
2/15/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

WESTERN DIVERSION CHAMBER

PLYMOUTH RD

MW-24 (19-24 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-37 (18-23 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-38 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/15/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-33 (14-19 FT)
11/8/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

EASTERN DIVERSION CHAMBER

MW-39 (20-25 FT)
11/7/2017: ND (< 1.0 µg/L)
2/15/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

LEGEND

- ON-SITE MONITORING WELL CIS-1,2-DICHLOROETHENE ≤ 70 µg/L
- ON-SITE MONITORING WELL CIS-1,2-DICHLOROETHENE > 70 µg/L
- **BLUE/BOLD TEXT** — EXCEEDANCE OF THE NONRESIDENTIAL DRINKING WATER CRITERIA FROM PAST AND PRESENT SAMPLING EVENTS
- WELL NOT SAMPLED
- VAULT (2 FT x 2 FT)
- VAULT (4 FT x 6 FT)
- WELL SCREEN (4-INCH SDR-11 HDPE, CUSTOM SLOTTED)
- WELL BLANK CASING (4-INCH SDR-11 HDPE)
- WELL BLANK CASING (6-INCH SDR-11 HDPE)
- FORD PROPERTY BOUNDARY

NOTES:
FIGURE ONLY SHOWS THE FOUR MOST RECENT QUARTERS OF DATA (NOVEMBER 2017, FEBRUARY 2018, MAY 2018, AND AUGUST 2018). FULL SET OF DATA CAN BE FOUND IN THE CORRESPONDING TABLES.

µg/L - MICROGRAMS PER LITER (PARTS PER BILLION)

≤ - LESS THAN OR EQUAL TO

> - GREATER THAN

THE NONRESIDENTIAL DRINKING WATER CRITERIA FOR CIS-1,2-DICHLOROETHENE IS 70 µg/L.

FT = FEET BELOW GROUND SURFACE

"ND", "<" INDICATES VALUE IS BELOW THE LABORATORY REPORTING LIMIT OF 1.0 µg/L FOR CIS-1,2-DICHLOROETHENE.

J = ESTIMATED RESULT

MW = MONITORING WELL

LMW = LIGHT NON-AQUEOUS PHASE LIQUID MONITORING WELL

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

HDPE = HIGH-DENSITY POLYETHYLENE

SSDS = SUB-SLAB DEPRESSURIZATION SYSTEM

HCS = HYDRAULIC CONTROL SYSTEM

BLUE BOX INDICATES EXCEEDANCE OF THE NONRESIDENTIAL DRINKING WATER CRITERIA ASSOCIATED WITH THE MOST RECENT SAMPLING EVENT POSSIBLE

0 300 600
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

ON-SITE MONITORING WELLS CIS-1,2-DICHLOROETHENE IN GROUNDWATER

ARCADIS Design & Consultancy for natural and built assets

FIGURE 4

CITY: Novi DIV: ENV DB: MG PROJECT NUMBER: MI001454.0004.00001 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MI\Ford\Livonia\GIS\docs\GE\Progress Report_Quarter 3_2018\2018-10-01\Figure 4_On-Site GWA cis.mxd PLOTTED: 10/22/2018 7:23:06 PM BY: msi01059

This document is a DRAFT document that has not received approval from the MDEQ. This document was prepared pursuant to a court Consent Decree. The opinions, findings, and conclusions expressed are those of the authors and not those of the MDEQ.

MW-15-59D (94-99 FT)
11/15/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-26 (4.5-14.5 FT)
11/14/2017: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-27

MW-28 (2-12 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-56 (16-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-55 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-54 (16-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-57 (17-22 FT)
11/7/2017: ND (< 1.0 µg/L)
2/9/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-53 (16-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 J µg/L)

MW-58 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-52 (15-20 FT)
11/10/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

TW-16-03 (9-14 FT)
11/8/2017: ND (< 3.3 µg/L)
2/14/2018: ND (< 10 µg/L)
5/11/2018: ND (< 2.5 µg/L)
8/8/2018: ND (< 2.0 µg/L)

TW-16-04 (9-19 FT)
11/8/2017: ND (< 6.7 µg/L)
2/14/2018: ND (< 6.7 µg/L)
5/11/2018: ND (< 2.5 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-50 (16-21 FT)
11/13/2017: ND (< 5.0 µg/L)
2/12/2018: ND (< 5.0 µg/L)
5/9/2018: ND (< 5.0 µg/L)
8/6/2018: 0.31 J µg/L

MW-62 (16.3-21.3 FT)
11/13/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-43 (17-22 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-29 (5-15 FT)
11/14/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

PW-16-02 (6-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-63 (7-12 FT)
11/13/2017: ND (< 10 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/6/2018: 0.30 J µg/L

MW-35 (19.5-24.5 FT)
11/7/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-64 (15-20 FT)
11/7/2017: ND (< 1.0 µg/L)
2/9/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-42 (16-21 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-51 (15-20 FT)
11/9/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-65 (16-21 FT)
11/8/2017: ND (< 2.0 µg/L)
2/6/2018: ND (< 2.0 µg/L)
5/10/2018: ND (< 2.0 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-48 (17-23 FT)
11/14/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-15-61D (88-93 FT)
11/15/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-44 (16-21 FT)
11/7/2017: ND (< 20 µg/L)
2/6/2018: ND (< 6.7 µg/L)
5/14/2018: ND (< 13 µg/L)
8/13/2018: ND (< 20 µg/L)

MW-66 (15-20 FT)
11/13/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-34 (16.5-21.5 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-19 (15-20 FT)
11/14/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-22 (16.5-21.5 FT)
11/7/2017: ND (< 50 µg/L)
2/6/2018: ND (< 140 µg/L)
5/10/2018: ND (< 67 µg/L)
8/6/2018: ND (< 50 µg/L)

MW-67 (9-14 FT)
11/14/2017: 1.7 J µg/L
2/12/2018: 1.1 J µg/L
5/14/2018: 0.75 J µg/L
8/13/2018: 0.78 J µg/L

MW-47 (16-21 FT)
11/10/2017: 9.3 J µg/L
5/10/2018: 6.5 J µg/L
8/9/2018: 7.2 µg/L

MW-41 (16-21 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: 0.34 J µg/L

MW-3 (14-19 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-68 (15-20 FT)
11/10/2017: 1.5 µg/L
2/12/2018: 1.8 µg/L
5/15/2018: 1.4 µg/L
8/9/2018: 1.7 µg/L

MW-46 (16-21 FT)
11/13/2017: 2.7 µg/L
2/12/2018: 1.7 µg/L
5/14/2018: 0.86 J µg/L
8/9/2018: 1.2 µg/L

MW-69 (15-20 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-5 (15.5-20.5 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-10 (16.5-21.5 FT)
11/9/2017: ND (< 100 µg/L)
2/13/2018: ND (< 200 µg/L)
5/10/2018: ND (< 100 µg/L)
8/9/2018: ND (< 140 µg/L)

MW-21 (13.5-18.5 FT)
2/13/2018: ND (< 1,000 µg/L)
5/15/2018: ND (< 1,000 µg/L)
8/14/2018: 190 J µg/L

TW-16-02 (12-17 FT)
11/7/2017: ND (< 400 µg/L)
2/14/2018: ND (< 1,000 µg/L)
5/11/2018: ND (< 500 µg/L)
8/6/2018: 56 J µg/L

PW-16-01 (9.7-19.7 FT)
11/7/2017: ND (< 200 µg/L)
2/7/2018: 5.4 J µg/L
5/15/2018: ND (< 14 µg/L)
8/6/2018: ND (< 40 µg/L)

MW-70 (15-20 FT)
11/13/2017: 5.1 J µg/L
2/12/2018: 4.4 J µg/L
5/14/2018: 3.0 J µg/L
8/9/2018: 3.3 J µg/L

MW-30 (19-24 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-4 (15.5-20.5 FT)
11/9/2017: 850 J µg/L
2/13/2018: 1,100 J µg/L
5/10/2018: 860 J µg/L
8/7/2018: 1,000 µg/L

MW-49 (12.5-17.5 FT)
2/13/2018: ND (< 1,700 µg/L)
5/11/2018: ND (< 1,700 µg/L)
8/14/2018: 110 J µg/L

MW-71 (15-20 FT)
11/13/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-31 (17-22 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-25 (16-21 FT)
11/14/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-2 (15.5-20.5 FT)
11/9/2017: 260 µg/L
2/13/2018: 390 µg/L
5/10/2018: 510 µg/L
8/10/2018: 510 µg/L

MW-18 (13-18 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-23 (15-20 FT)
11/7/2017: 4,100 µg/L
2/6/2018: 1,800 µg/L
5/7/2018: 180 µg/L
8/6/2018: 2,300 J µg/L

TW-16-01 (12-17 FT)
11/7/2017: ND (< 13 µg/L)
2/7/2018: ND (< 33 µg/L)
5/15/2018: 11 J µg/L
8/6/2018: 7.5 J µg/L

MW-45 (15-20 FT)
11/13/2017: ND (< 67 µg/L)
2/12/2018: ND (< 100 µg/L)
5/8/2018: ND (< 67 µg/L)
8/9/2018: ND (< 33 µg/L)

MW-40 (20-25 FT)
11/15/2017: 0.48 J µg/L
5/8/2018: 0.34 J µg/L
8/10/2018: 0.37 J µg/L

MW-1 (14-19 FT)
11/10/2017: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-7 (18-23 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-9 (19.5-24.5 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-14 (15-20 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-32 (18-23 FT)
11/7/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-15-60D (93-98 FT)
11/15/2017: ND (< 1.0 J µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-36 (20-25 FT)
11/10/2017: ND (< 1.0 µg/L)
2/15/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-24 (19-24 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-20 (13.5-18.5 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-37 (18-23 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-38 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/15/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-33 (14-19 FT)
11/8/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-39 (20-25 FT)
11/7/2017: ND (< 1.0 µg/L)
2/15/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

LMW-15-02
LMW-15-03
LMW-15-04
LMW-15-05
LMW-15-06
LMW-15-07
LMW-15-08
LMW-15-09
LMW-15-10
LMW-15-01

VAULT V-ESD-1
VAULT V-ESD-2
VAULT V-ESD-3
VAULT V-ESD-4
VAULT V-ESD-5

ESD-1
ESD-2
ESD-3
ESD-4

SSDS Location
HCS Location
EASTERN DIVERSION CHAMBER
WESTERN DIVERSION CHAMBER

LEVAN RD
PLYMOUTH RD

LEGEND

- ON-SITE MONITORING WELL TRANS-1,2-DICHLOROETHENE ≤ 100 µg/L
- ON-SITE MONITORING WELL TRANS-1,2-DICHLOROETHENE > 100 µg/L
- BLUE/BOLD TEXT — EXCEEDANCE OF THE NONRESIDENTIAL DRINKING WATER CRITERIA FROM PAST AND PRESENT SAMPLING EVENTS
- WELL NOT SAMPLED
- VAULT (2 FT x 2 FT)
- VAULT (4 FT x 6 FT)
- WELL SCREEN (4-INCH SDR-11 HDPE, CUSTOM SLOTTED)
- WELL BLANK CASING (4-INCH SDR-11 HDPE)
- WELL BLANK CASING (6-INCH SDR-11 HDPE)
- FORD PROPERTY BOUNDARY

NOTES:
FIGURE ONLY SHOWS THE FOUR MOST RECENT QUARTERS OF DATA (NOVEMBER 2017, FEBRUARY 2018, MAY 2018, AND AUGUST 2018). FULL SET OF DATA CAN BE FOUND IN THE CORRESPONDING TABLES.

µg/L - MICROGRAMS PER LITER (PARTS PER BILLION)

≤ - LESS THAN OR EQUAL TO

> - GREATER THAN

THE NONRESIDENTIAL DRINKING WATER CRITERIA FOR TRANS-1,2-DICHLOROETHENE IS 100 µg/L.

FT = FEET BELOW GROUND SURFACE

"ND", "<" INDICATES VALUE IS BELOW THE LABORATORY REPORTING LIMIT OF 1.0 µg/L FOR TRANS-1,2-DICHLOROETHENE.

J = ESTIMATED RESULT

MW = MONITORING WELL

LMW = LIGHT NON-AQUEOUS PHASE LIQUID MONITORING WELL

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

HDPE = HIGH-DENSITY POLYETHYLENE

SSDS = SUB-SLAB DEPRESSURIZATION SYSTEM

HCS = HYDRAULIC CONTROL SYSTEM

BLUE BOX INDICATES EXCEEDANCE OF THE NONRESIDENTIAL DRINKING WATER CRITERIA ASSOCIATED WITH THE MOST RECENT SAMPLING EVENT POSSIBLE

0 300 600
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

ON-SITE MONITORING WELLS
TRANS-1,2-DICHLOROETHENE IN GROUNDWATER

ARCADIS Design & Consultancy for natural and built assets

FIGURE
5

CITY: Novi DIV: ENV DB: MG PROJECT NUMBER: MI001454.0004.00001 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MI\Ford\Livonia\GIS\docs\GEC\Progress Report_Quarter 3_2018\2018-10-01\Figure 5_On-Site GWA trans.mxd PLOTTED: 10/22/2018 7:37:03 PM BY: msi01059

This document is a DRAFT document that has not received approval from the MDEQ. This document was prepared pursuant to a court Consent Decree. The opinions, findings, and conclusions expressed are those of the authors and not those of the MDEQ.

MW-15-59D (94-99 FT)
11/15/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-26 (4.5-14.5 FT)
11/14/2017: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-28 (2-12 FT)
11/8/2017: 0.59 J µg/L
2/7/2018: 0.45 J µg/L
5/15/2018: 0.51 J µg/L
8/13/2018: 0.66 J µg/L

MW-27

MW-56 (16-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-55 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-54 (16-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-53 (16-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 J µg/L)

MW-57 (17-22 FT)
11/7/2017: ND (< 1.0 µg/L)
2/9/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-58 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

TW-16-03 (9-14 FT)
11/8/2017: ND (< 3.3 µg/L)
2/14/2018: ND (< 10 µg/L)
5/11/2018: ND (< 2.5 µg/L)
8/8/2018: ND (< 2.0 µg/L)

VAULT V-ESD-1

MW-52 (15-20 FT)
11/10/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-43 (17-22 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-62 (16.3-21.3 FT)
11/13/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

TW-16-04 (9-19 FT)
11/8/2017: ND (< 6.7 µg/L)
2/14/2018: ND (< 6.7 µg/L)
5/11/2018: ND (< 2.5 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-50 (16-21 FT)
11/13/2017: ND (< 5.0 µg/L)
2/12/2018: ND (< 5.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-35 (19.5-24.5 FT)
11/7/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-63 (7-12 FT)
11/13/2017: ND (< 10 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

PW-16-02 (6-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-29 (5-15 FT)
11/14/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

VAULT V-ESD-2

MW-42 (16-21 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-65 (16-21 FT)
11/8/2017: ND (< 2.0 µg/L)
2/6/2018: ND (< 2.0 µg/L)
5/10/2018: ND (< 2.0 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-51 (15-20 FT)
11/9/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-64 (15-20 FT)
11/7/2017: ND (< 1.0 µg/L)
2/9/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-15-61D (88-93 FT)
11/15/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-44 (16-21 FT)
11/7/2017: ND (< 20 µg/L)
2/6/2018: ND (< 6.7 µg/L)
5/14/2018: ND (< 13 µg/L)
8/13/2018: ND (< 20 µg/L)

MW-66 (15-20 FT)
11/13/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-48 (17-23 FT)
11/14/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-34 (16.5-21.5 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

VAULT V-ESD-3

MW-67 (9-14 FT)
11/14/2017: 110 µg/L
2/12/2018: 83 µg/L
5/14/2018: 57 µg/L
8/13/2018: 60 µg/L

MW-47 (16-21 FT)
11/10/2017: ND (< 10 µg/L)
5/10/2018: ND (< 5.0 J µg/L)
8/9/2018: ND (< 1.7 µg/L)

MW-41 (16-21 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-19 (15-20 FT)
11/14/2017: 1.1 µg/L
2/14/2018: 1.0 µg/L
5/14/2018: 0.91 J µg/L
8/10/2018: 1.0 µg/L

MW-22 (16.5-21.5 FT)
11/7/2017: ND (< 50 µg/L)
2/6/2018: ND (< 140 µg/L)
5/10/2018: ND (< 67 µg/L)
8/6/2018: ND (< 50 µg/L)

MW-46 (16-21 FT)
11/13/2017: ND (< 2.5 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.7 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-68 (15-20 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-69 (15-20 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-3 (14-19 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-5 (15.5-20.5 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-10 (16.5-21.5 FT)
11/9/2017: ND (< 100 µg/L)
2/13/2018: ND (< 200 µg/L)
5/10/2018: ND (< 100 µg/L)
8/9/2018: ND (< 140 µg/L)

MW-21 (13.5-18.5 FT)
2/13/2018: 460 J µg/L
5/15/2018: ND (< 1,000 µg/L)
8/14/2018: ND (< 1,000 µg/L)

SSDS Location

TW-16-02 (12-17 FT)
11/7/2017: ND (< 400 µg/L)
2/14/2018: ND (< 1,000 µg/L)
5/11/2018: ND (< 500 µg/L)
8/6/2018: ND (< 250 µg/L)

MW-70 (15-20 FT)
11/13/2017: ND (< 10 µg/L)
2/12/2018: ND (< 13 µg/L)
5/14/2018: ND (< 3.3 µg/L)
8/9/2018: ND (< 13 µg/L)

VAULT V-ESD-4

PW-16-01 (9.7-19.7 FT)
11/7/2017: ND (< 200 µg/L)
2/7/2018: ND (< 14 µg/L)
5/15/2018: ND (< 14 µg/L)
8/6/2018: ND (< 40 µg/L)

MW-30 (19-24 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-4 (15.5-20.5 FT)
11/9/2017: 19,000 µg/L
2/13/2018: 23,000 µg/L
5/10/2018: 23,000 J µg/L
8/7/2018: 31,000 µg/L

MW-49 (12.5-17.5 FT)
2/13/2018: ND (< 1,700 µg/L)
5/11/2018: ND (< 1,700 µg/L)
8/14/2018: ND (< 500 µg/L)

MW-71 (15-20 FT)
11/13/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-31 (17-22 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-25 (16-21 FT)
11/14/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-2 (15.5-20.5 FT)
11/9/2017: ND (< 67 µg/L)
2/13/2018: ND (< 67 µg/L)
5/10/2018: ND (< 25 µg/L)
8/10/2018: ND (< 140 µg/L)

MW-20 (13.5-18.5 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

TW-16-01 (12-17 FT)
11/7/2017: ND (< 13 µg/L)
2/7/2018: ND (< 33 µg/L)
5/15/2018: ND (< 33 µg/L)
8/6/2018: ND (< 25 µg/L)

MW-45 (15-20 FT)
11/13/2017: ND (< 67 µg/L)
2/12/2018: ND (< 100 µg/L)
5/8/2018: ND (< 67 µg/L)
8/9/2018: ND (< 33 µg/L)

MW-40 (20-25 FT)
11/15/2017: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-23 (15-20 FT)
11/7/2017: 25,000 µg/L
2/6/2018: 11,000 µg/L
5/7/2018: 1,000 µg/L
8/6/2018: 12,000 µg/L

EASTERN DIVERSION CHAMBER

VAULT V-ESD-5

MW-32 (18-23 FT)
11/7/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-1 (14-19 FT)
11/10/2017: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-7 (18-23 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-9 (19.5-24.5 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-18 (13-18 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

HCS Location

MW-15-60D (93-98 FT)
11/15/2017: ND (< 1.0 J µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-36 (20-25 FT)
11/10/2017: ND (< 1.0 µg/L)
2/15/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-24 (19-24 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-14 (15-20 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-37 (18-23 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-38 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/15/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-33 (14-19 FT)
11/8/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-39 (20-25 FT)
11/7/2017: ND (< 1.0 µg/L)
2/15/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

LMW-15-01
LMW-15-02
LMW-15-03
LMW-15-04
LMW-15-05
LMW-15-06
LMW-15-07
LMW-15-08
LMW-15-09
LMW-15-10

ESD-1
ESD-2
ESD-3
ESD-4

LEVAN RD
PLYMOUTH RD
WESTERN DIVERSION CHAMBER

LEGEND

- ON-SITE MONITORING WELL TRICHLOROETHENE ≤ 5.0 µg/L
- ON-SITE MONITORING WELL TRICHLOROETHENE > 5.0 µg/L
- BLUE/BOLD TEXT — EXCEEDANCE OF THE NONRESIDENTIAL DRINKING WATER CRITERIA FROM PAST AND PRESENT SAMPLING EVENTS
- WELL NOT SAMPLED
- VAULT (2 FT x 2 FT)
- VAULT (4 FT x 6 FT)
- WELL SCREEN (4-INCH SDR-11 HDPE, CUSTOM SLOTTED)
- WELL BLANK CASING (4-INCH SDR-11 HDPE)
- WELL BLANK CASING (6-INCH SDR-11 HDPE)
- FORD PROPERTY BOUNDARY

NOTES:
FIGURE ONLY SHOWS THE FOUR MOST RECENT QUARTERS OF DATA (NOVEMBER 2017, FEBRUARY 2018, MAY 2018, AND AUGUST 2018). FULL SET OF DATA CAN BE FOUND IN THE CORRESPONDING TABLES.

µg/L - MICROGRAMS PER LITER (PARTS PER BILLION)

≤ - LESS THAN OR EQUAL TO

> - GREATER THAN

THE NONRESIDENTIAL DRINKING WATER CRITERIA FOR TRICHLOROETHENE IS 5.0 µg/L.

FT = FEET BELOW GROUND SURFACE

"ND", "<" INDICATES VALUE IS BELOW THE LABORATORY REPORTING LIMIT OF 1.0 µg/L FOR TRICHLOROETHENE.

J = ESTIMATED RESULT

MW = MONITORING WELL

LMW = LIGHT NON-AQUEOUS PHASE LIQUID MONITORING WELL

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

HDPE = HIGH-DENSITY POLYETHYLENE

SSDS = SUB-SLAB DEPRESSURIZATION SYSTEM

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BLUE BOX INDICATES EXCEEDANCE OF THE NONRESIDENTIAL DRINKING WATER CRITERIA ASSOCIATED WITH THE MOST RECENT SAMPLING EVENT POSSIBLE

0 300 600
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

ON-SITE MONITORING WELLS TRICHLOROETHENE IN GROUNDWATER

ARCADIS Design & Consultancy for natural and built assets

FIGURE 6

CITY: Novi DIV: ENV DB: MG PROJECT NUMBER: MI001454.0004.00001 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MIFord\LivoniaGIS\docs\GEC\Progress Report_Quarter 3_2018\2018-10-01\Figure 6_On-Site GWA TCE.mxd PLOTTED: 10/22/2018 7:42:26 PM BY: msi01059

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MW-15-59D (94-99 FT)
11/15/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-26 (4.5-14.5 FT)
11/14/2017: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-28 (2-12 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-56 (16-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-55 (15-20 FT)
11/8/2017: 0.65 J µg/L
2/7/2018: ND (< 1.0 µg/L)
5/10/2018: 0.48 J µg/L
8/13/2018: 0.39 J µg/L

MW-54 (16-21 FT)
11/8/2017: 1.5 µg/L
2/7/2018: 1.2 µg/L
5/9/2018: 0.98 J µg/L
8/13/2018: 0.34 J µg/L

MW-57 (17-22 FT)
11/7/2017: ND (< 1.0 µg/L)
2/9/2018: 0.59 J µg/L
5/9/2018:0.56 J µg/L
8/6/2018: 0.39 J µg/L

MW-53 (16-21 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: 0.45 J µg/L

MW-27

LMW-15-07

MW-58 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

TW-16-03 (9-14 FT)
11/8/2017: 77 µg/L
2/14/2018: 95 µg/L
5/11/2018: 78 µg/L
8/8/2018: 76 µg/L

VAULT V-ESD-1

MW-52 (15-20 FT)
11/10/2017: 9.1 µg/L
2/13/2018: 4.0 µg/L
5/9/2018: 4.3 µg/L
8/10/2018: 4.5 µg/L

MW-50 (16-21 FT)
11/13/2017: 150 µg/L
2/12/2018: 76 µg/L
5/9/2018: 150 µg/L
8/6/2018: 97 µg/L

TW-16-04 (9-19 FT)
11/8/2017: 100 µg/L
2/14/2018: 77 µg/L
5/11/2018: 65 µg/L
8/8/2018: 63 µg/L

LMW-15-06

LMW-15-08

LMW-15-10

ESD-1

MW-62 (16.3-21.3 FT)
11/13/2017: 1.0 µg/L
2/6/2018: 1.3 µg/L
5/9/2018: 1.2 µg/L
8/6/2018: 0.66 J µg/L

MW-43 (17-22 FT)
11/9/2017: 2.2 µg/L
2/13/2018: 8.0 µg/L
5/9/2018: 6.4 J µg/L
8/10/2018: 1.0 µg/L

MW-29 (5-15 FT)
11/14/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

PW-16-02 (6-21 FT)
11/8/2017: 2.0 µg/L
2/14/2018: 18 µg/L
5/11/2018: ND (< 1.0 µg/L)
8/8/2018: 71 µg/L

MW-63 (7-12 FT)
11/13/2017: ND (< 10 µg/L)
2/7/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

VAULT V-ESD-2

MW-64 (15-20 FT)
11/7/2017: 7.0 µg/L
2/9/2018: 6.7 µg/L
5/10/2018: 1.3 µg/L
8/13/2018: 5.9 µg/L

MW-35 (19.5-24.5 FT)
11/7/2017: 2.4 µg/L
2/14/2018: 4.5 µg/L
5/9/2018: 7.2 µg/L
8/10/2018: 3.0 µg/L

LMW-15-09

MW-65 (16-21 FT)
11/8/2017: 48 µg/L
2/6/2018: 36 µg/L
5/10/2018: 41 µg/L
8/8/2018: 35 µg/L

MW-66 (15-20 FT)
11/13/2017: 3.0 µg/L
2/12/2018: 2.7 µg/L
5/10/2018: 2.4 µg/L
8/8/2018: 3.2 µg/L

MW-42 (16-21 FT)
11/9/2017: 1.0 µg/L
2/13/2018: 0.81 J µg/L
5/9/2018: 0.99 J µg/L
8/10/2018: 0.60 J µg/L

MW-51 (15-20 FT)
11/9/2017: 0.47 J µg/L
2/8/2018: ND (< 1.0 µg/L)
5/14/2018: 0.70 J µg/L
8/6/2018: 0.40 J µg/L

ESD-2

MW-34 (16.5-21.5 FT)
11/9/2017: 2.0 µg/L
2/13/2018: 0.97 J µg/L
5/8/2018: 0.87 J µg/L
8/10/2018: 1.1 µg/L

MW-15-61D (88-93 FT)
11/15/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/15/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

LMW-15-02

MW-48 (17-23 FT)
11/14/2017: 5.2 µg/L
2/12/2018: 3.8 µg/L
5/15/2018: 7.4 µg/L
8/6/2018: 5.3 µg/L

VAULT V-ESD-3

MW-19 (15-20 FT)
11/14/2017: 1.8 µg/L
2/14/2018: 1.5 µg/L
5/14/2018: 1.3 µg/L
8/10/2018: ND (< 1.0 µg/L)

MW-44 (16-21 FT)
11/7/2017: 520 µg/L
2/6/2018: 210 µg/L
5/14/2018: 270 µg/L
8/13/2018: 240 µg/L

MW-67 (9-14 FT)
11/14/2017: ND (< 5.0 µg/L)
2/12/2018: ND (< 3.3 µg/L)
5/14/2018: 1.3 µg/L
8/13/2018: ND (< 2.5 µg/L)

MW-41 (16-21 FT)
11/9/2017: 2.4 µg/L
2/13/2018: 2.1 µg/L
5/8/2018: 5.3 µg/L
8/10/2018: 3.0 µg/L

MW-47 (16-21 FT)
11/10/2017: 220 µg/L
5/10/2018: 88 J µg/L
8/9/2018: 59 µg/L

MW-68 (15-20 FT)
11/10/2017: 18 µg/L
2/12/2018: 2.5 µg/L
5/15/2018: 2.1 µg/L
8/9/2018: 2.2 µg/L

MW-69 (15-20 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/10/2018: 3.3 µg/L
8/13/2018: 2.7 µg/L

MW-3 (14-19 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

LMW-15-05

LMW-15-03

MW-22 (16.5-21.5 FT)
11/7/2017: 1,600 µg/L
2/6/2018: 1,500 µg/L
5/10/2018: 2,400 µg/L
8/6/2018: 1,300 µg/L

MW-46 (16-21 FT)
11/13/2017: 57 µg/L
2/12/2018: 38 µg/L
5/14/2018: 30 µg/L
8/9/2018: 66 µg/L

ESD-3

MW-5 (15.5-20.5 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-10 (16.5-21.5 FT)
11/9/2017: 2,000 µg/L
2/13/2018: 1,900 µg/L
5/10/2018: 3,100 µg/L
8/9/2018: 2,300 µg/L

SSDS Location

MW-21 (13.5-18.5 FT)
2/13/2018: 5,400 µg/L
5/15/2018: 3,700 µg/L
8/14/2018: 3,400 µg/L

VAULT V-ESD-4

MW-30 (19-24 FT)
11/9/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

LEVAN RD

MW-49 (12.5-17.5 FT)
2/13/2018: 8,400 µg/L
5/11/2018: 8,100 µg/L
8/14/2018: 4,900 µg/L

LMW-15-04

PW-16-01 (9.7-19.7 FT)
11/7/2017: 5,300 µg/L
2/7/2018: 160 µg/L
5/15/2018: 37 J µg/L
8/6/2018: 870 µg/L

MW-70 (15-20 FT)
11/13/2017: 140 µg/L
2/12/2018: 160 µg/L
5/14/2018: 210 µg/L
8/9/2018: 190 µg/L

MW-45 (15-20 FT)
11/13/2017: 1,500 µg/L
2/12/2018: 1,200 µg/L
5/8/2018:1,400 µg/L
8/9/2018: 800 µg/L

MW-2 (15.5-20.5 FT)
11/9/2017: 140 µg/L
2/13/2018: 210 µg/L
5/10/2018: 190 µg/L
8/10/2018: 170 µg/L

MW-4 (15.5-20.5 FT)
11/9/2017: 470 J µg/L
2/13/2018: ND (< 1,700 µg/L)
5/10/2018: 610 J µg/L
8/7/2018: ND (< 1,000 µg/L)

TW-16-02 (12-17 FT)
11/7/2017: 13,000 µg/L
2/14/2018: 9,100 µg/L
5/11/2018: 8,500 µg/L
8/6/2018: 7,300 µg/L

MW-71 (15-20 FT)
11/13/2017: 0.83 J µg/L
2/12/2018: 0.59 J µg/L
5/8/2018: 0.59 J µg/L
8/9/2018: ND (< 1.0 µg/L)

MW-31 (17-22 FT)
11/10/2017: 0.84 J µg/L
2/14/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-25 (16-21 FT)
11/14/2017: ND (< 1.0 µg/L)
2/13/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/13/2018: ND (< 1.0 µg/L)

MW-18 (13-18 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

ESD-4

MW-40 (20-25 FT)
11/15/2017: 1.8 µg/L
5/8/2018: 1.3 J µg/L
8/10/2018: 0.54 J µg/L

MW-1 (14-19 FT)
11/10/2017: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-7 (18-23 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-9 (19.5-24.5 FT)
11/10/2017: 7.1 µg/L
2/12/2018: 4.6 µg/L
5/11/2018: 2.2 µg/L
8/14/2018: 1.7 µg/L

LMW-15-01

MW-14 (15-20 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-23 (15-20 FT)
11/7/2017: 2,400 µg/L
2/6/2018: 820 J µg/L
5/7/2018: 77 J µg/L
8/6/2018: ND (< 2,500 µg/L)

TW-16-01 (12-17 FT)
11/7/2017: 320 µg/L
2/7/2018: 380 µg/L
5/15/2018: 720 µg/L
8/6/2018: 680 µg/L

MW-32 (18-23 FT)
11/7/2017: 0.67 J µg/L
2/12/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

EASTERN DIVERSION CHAMBER

HCS Location

VAULT V-ESD-5

MW-15-60D (93-98 FT)
11/15/2017: ND (< 1.0 J µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

MW-36 (20-25 FT)
11/10/2017: ND (< 1.0 µg/L)
2/15/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

WESTERN DIVERSION CHAMBER

PLYMOUTH RD

MW-24 (19-24 FT)
11/10/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/14/2018: ND (< 1.0 µg/L)
8/14/2018: ND (< 1.0 µg/L)

MW-20 (13.5-18.5 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-37 (18-23 FT)
11/10/2017: ND (< 1.0 µg/L)
2/12/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-38 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/15/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-33 (14-19 FT)
11/8/2017: ND (< 1.0 µg/L)
2/14/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-39 (20-25 FT)
11/7/2017: ND (< 1.0 µg/L)
2/15/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/7/2018: ND (< 1.0 µg/L)

LEGEND

- ON-SITE MONITORING WELL VINYL CHLORIDE ≤ 2.0 µg/L
- ON-SITE MONITORING WELL VINYL CHLORIDE > 2.0 µg/L
- **BLUE/BOLD TEXT** — EXCEEDANCE OF THE NONRESIDENTIAL DRINKING WATER CRITERIA FROM PAST AND PRESENT SAMPLING EVENTS
- WELL NOT SAMPLED
- VAULT (2 FT x 2 FT)
- VAULT (4 FT x 6 FT)
- WELL SCREEN (4-INCH SDR-11 HDPE, CUSTOM SLOTTED)
- WELL BLANK CASING (4-INCH SDR-11 HDPE)
- WELL BLANK CASING (6-INCH SDR-11 HDPE)
- FORD PROPERTY BOUNDARY

NOTES:
FIGURE ONLY SHOWS THE FOUR MOST RECENT QUARTERS OF DATA (NOVEMBER 2017, FEBRUARY 2018, MAY 2018, AND AUGUST 2018). FULL SET OF DATA CAN BE FOUND IN THE CORRESPONDING TABLES.

µg/L - MICROGRAMS PER LITER (PARTS PER BILLION)

≤ - LESS THAN OR EQUAL TO

> - GREATER THAN

THE NONRESIDENTIAL DRINKING WATER CRITERIA FOR VINYL CHLORIDE IS 2.0 µg/L.

FT = FEET BELOW GROUND SURFACE

"ND", "<" INDICATES VALUE IS BELOW THE LABORATORY REPORTING LIMIT OF 1.0 µg/L FOR VINYL CHLORIDE.

J = ESTIMATED RESULT

MW = MONITORING WELL

LMW = LIGHT NON-AQUEOUS PHASE LIQUID MONITORING WELL

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

HDPE = HIGH-DENSITY POLYETHYLENE

SSDS = SUB-SLAB DEPRESSURIZATION SYSTEM

HCS = HYDRAULIC CONTROL SYSTEM

BLUE BOX INDICATES EXCEEDANCE OF THE NONRESIDENTIAL DRINKING WATER CRITERIA ASSOCIATED WITH THE MOST RECENT SAMPLING EVENT POSSIBLE

0 300 600
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

ON-SITE MONITORING WELLS VINYL CHLORIDE IN GROUNDWATER

ARCADIS Design & Consultancy for natural and built assets

FIGURE 7

CITY: Novi DIV: ENV DB: MG PROJECT NUMBER: MI001454.0004.00001 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MIFordLivonia\GIS\docs\GEC\Progress Report_Quarter 3_2018\2018-10-01\Figure 7_On-Site GWA VC.mxd PLOTTED: 10/22/2018 8:13:45 PM BY: msi01059

This document is a DRAFT document that has not received approval from the MDEQ. This document was prepared pursuant to a court Consent Decree. The opinions, findings, and conclusions expressed are those of the authors and not those of the MDEQ.

MW-15-59D (94-99 FT)
11/15/2017: ND (< 2.0 µg/L)
2/6/2018: ND (< 2.0 µg/L)
5/15/2018: ND (< 2.0 µg/L)
8/9/2018: ND (< 2.0 µg/L)

MW-26 (4.5-14.5 FT)
11/14/2017: ND (< 2.0 µg/L)
5/15/2018: ND (< 2.0 µg/L)
8/9/2018: ND (< 2.0 µg/L)

MW-27

MW-28 (2-12 FT)
11/8/2017: ND (< 2.0 µg/L)
2/7/2018: ND (< 2.0 µg/L)
5/15/2018: ND (< 2.0 µg/L)
8/13/2018: ND (< 2.0 µg/L)

MW-56 (16-21 FT)
11/8/2017: 2.2 µg/L
2/14/2018: 1.6 J µg/L
5/9/2018: 2.7 µg/L
8/13/2018: 2.3 µg/L

MW-55 (15-20 FT)
11/8/2017: 1.4 J µg/L
2/7/2018: 0.96 J µg/L
5/10/2018: 1.2 J µg/L
8/13/2018: 1.1 J µg/L

MW-54 (16-21 FT)
11/8/2017: 2.0 µg/L
2/7/2018: 2.7 µg/L
5/9/2018: 1.7 J µg/L
8/13/2018: 1.4 J µg/L

MW-58 (15-20 FT)
11/8/2017: 8.0 µg/L
2/7/2018: 9.6 µg/L
5/14/2018: 3.6 µg/L
8/13/2018: 2.2 µg/L

MW-57 (17-22 FT)
11/7/2017: 4.9 µg/L
2/9/2018: 4.9 µg/L
5/9/2018: 3.9 µg/L
8/6/2018: 4.5 µg/L

MW-53 (16-21 FT)
11/8/2017: 0.61 J µg/L
2/7/2018: 1.1 J µg/L
5/9/2018: 1.4 J µg/L
8/13/2018: 1.6 J µg/L

MW-52 (15-20 FT)
11/10/2017: 0.68 J µg/L
2/13/2018: 1.2 J µg/L
5/9/2018: 0.30 J µg/L
8/10/2018: 1.8 J µg/L

MW-43 (17-22 FT)
11/9/2017: 3.5 µg/L
2/13/2018: 2.2 J µg/L
5/9/2018: 2.8 µg/L
8/10/2018: 3.3 µg/L

MW-35 (19.5-24.5 FT)
11/7/2017: 4.6 µg/L
2/14/2018: 4.3 µg/L
5/9/2018: 4.7 µg/L
8/10/2018: 4.3 µg/L

MW-42 (16-21 FT)
11/9/2017: 2.4 µg/L
2/13/2018: 1.8 J µg/L
5/9/2018: 2.2 µg/L
8/10/2018: 2.3 µg/L

MW-15-61D (88-93 FT)
11/15/2017: ND (< 2.0 µg/L)
2/6/2018: ND (< 2.0 µg/L)
5/15/2018: ND (< 2.0 µg/L)
8/7/2018: ND (< 2.0 µg/L)

MW-34 (16.5-21.5 FT)
11/9/2017: 6.6 µg/L
2/13/2018: 7.4 µg/L
5/8/2018: 4.9 µg/L
8/10/2018: 7.6 µg/L

MW-41 (16-21 FT)
11/9/2017: 2.2 µg/L
2/13/2018: 0.77 J µg/L
5/8/2018: 0.75 J µg/L
8/10/2018: 1.6 J µg/L

MW-30 (19-24 FT)
11/9/2017: 13 µg/L
2/13/2018: 12 µg/L
5/8/2018: 14 µg/L
8/10/2018: 15 µg/L

MW-31 (17-22 FT)
11/10/2017: ND (< 2.0 µg/L)
2/14/2018: ND (< 2.0 µg/L)
5/8/2018: ND (< 2.0 µg/L)
8/10/2018: ND (< 2.0 µg/L)

MW-40 (20-25 FT)
11/15/2017: ND (< 2.0 µg/L)
5/8/2018: ND (< 2.0 µg/L)
8/10/2018: ND (< 2.0 µg/L)

MW-32 (18-23 FT)
11/7/2017: ND (< 2.0 µg/L)
2/12/2018: ND (< 2.0 µg/L)
5/8/2018: ND (< 2.0 µg/L)
8/7/2018: ND (< 2.0 µg/L)

MW-39 (20-25 FT)
11/7/2017: ND (< 2.0 µg/L)
2/15/2018: ND (< 2.0 µg/L)
5/8/2018: ND (< 2.0 µg/L)
8/7/2018: ND (< 2.0 µg/L)

MW-33 (14-19 FT)
11/8/2017: ND (< 2.0 µg/L)
2/14/2018: ND (< 2.0 µg/L)
5/8/2018: ND (< 2.0 µg/L)
8/9/2018: ND (< 2.0 µg/L)

MW-62 (16.3-21.3 FT)
11/13/2017: 3.7 µg/L
2/6/2018: 2.1 µg/L
5/9/2018: 1.5 J µg/L
8/6/2018: 3.1 µg/L

MW-50 (16-21 FT)
11/13/2017: 0.68 J µg/L
2/12/2018: 0.78 J µg/L
5/9/2018: 2.8 µg/L
8/6/2018: 1.7 J µg/L

MW-64 (15-20 FT)
11/7/2017: ND (< 2.0 µg/L)
2/9/2018: ND (< 2.0 µg/L)
5/10/2018: ND (< 2.0 µg/L)
8/13/2018: ND (< 2.0 µg/L)

MW-48 (17-23 FT)
11/14/2017: 2.1 µg/L
2/12/2018: 7.7 µg/L
5/15/2018: 12 µg/L
8/6/2018: 6.2 µg/L

MW-67 (9-14 FT)
11/14/2017: ND (< 2.0 µg/L)
2/12/2018: ND (< 2.0 µg/L)
5/14/2018: ND (< 2.0 µg/L)
8/13/2018: ND (< 2.0 µg/L)

MW-68 (15-20 FT)
11/10/2017: 0.73 J µg/L
2/12/2018: 0.54 J µg/L
5/15/2018: ND (< 2.0 µg/L)
8/9/2018: ND (< 2.0 µg/L)

MW-69 (15-20 FT)
11/10/2017: 35 µg/L
2/14/2018: 23 µg/L
5/10/2018: 7.3 µg/L
8/13/2018: 7.1 µg/L

MW-70 (15-20 FT)
11/13/2017: 1.1 J µg/L
2/12/2018: 0.91 J µg/L
5/14/2018: 3.0 µg/L
8/9/2018: 1.6 J µg/L

MW-71 (15-20 FT)
11/13/2017: 0.72 J µg/L
2/12/2018: 0.57 J µg/L
5/8/2018: 0.38 J µg/L
8/9/2018: 0.95 J µg/L

MW-45 (15-20 FT)
11/13/2017: ND (< 2.0 µg/L)
2/12/2018: ND (< 2.0 µg/L)
5/8/2018: 0.40 J µg/L
8/9/2018: 1.0 J µg/L

MW-46 (16-21 FT)
11/13/2017: 3.7 µg/L
2/12/2018: 11 µg/L
5/14/2018: 13 µg/L
8/9/2018: 8.5 µg/L

MW-47 (16-21 FT)
11/10/2017: 0.52 J µg/L
5/10/2018: ND (< 2.0 µg/L)
8/9/2018: ND (< 2.0 µg/L)

MW-63 (7-12 FT)
11/13/2017: ND (< 2.0 µg/L)
2/7/2018: ND (< 2.0 µg/L)
5/9/2018: ND (< 2.0 µg/L)
8/6/2018: ND (< 2.0 µg/L)

MW-66 (15-20 FT)
11/13/2017: 0.49 J µg/L
2/12/2018: 1.3 J µg/L
5/10/2018: ND (< 2.0 µg/L)
8/8/2018: ND (< 2.0 µg/L)

MW-65 (16-21 FT)
11/8/2017: 3.8 µg/L
2/6/2018: 3.4 µg/L
5/10/2018: 2.1 µg/L
8/8/2018: 1.8 J µg/L

MW-51 (15-20 FT)
11/9/2017: 1.1 J µg/L
2/8/2018: 1.1 J µg/L
5/14/2018: 0.49 J µg/L
8/6/2018: 1.6 J µg/L

MW-44 (16-21 FT)
11/7/2017: 12 µg/L
2/6/2018: 9.0 µg/L
5/14/2018: 11 µg/L
8/13/2018: 9.5 µg/L

MW-19 (15-20 FT)
11/14/2017: 120 µg/L
2/14/2018: 130 µg/L
5/14/2018: 140 µg/L
8/10/2018: 130 µg/L

MW-22 (16.5-21.5 FT)
11/7/2017: 49 µg/L
2/6/2018: 22 µg/L
5/10/2018: 34 µg/L
8/6/2018: 19 µg/L

MW-21 (13.5-18.5 FT)
2/13/2018: 25 µg/L
5/15/2018: 5.3 µg/L
8/14/2018: 6.5 µg/L

TW-16-03 (9-14 FT)
11/8/2017: ND (< 2.0 µg/L)
2/14/2018: ND (< 2.0 µg/L)
5/11/2018: ND (< 2.0 µg/L)
8/8/2018: 1.0 J µg/L

TW-16-04 (9-19 FT)
11/8/2017: 0.89 J µg/L
2/14/2018: ND (< 2.0 µg/L)
5/11/2018: ND (< 2.0 µg/L)
8/8/2018: 1.2 J µg/L

PW-16-02 (6-21 FT)
11/8/2017: ND (< 2.0 µg/L)
2/14/2018: ND (< 2.0 µg/L)
5/11/2018: ND (< 2.0 µg/L)
8/8/2018: 1.5 J µg/L

PW-16-01 (9.7-19.7 FT)
11/7/2017: 14 µg/L
2/7/2018: 0.76 J µg/L
5/15/2018: ND (< 2.0 µg/L)
8/6/2018: ND (< 2.0 µg/L)

TW-16-02 (12-17 FT)
11/7/2017: 5.8 µg/L
2/14/2018: 5.9 µg/L
5/11/2018: 5.0 µg/L
8/6/2018: 2.7 µg/L

TW-16-01 (12-17 FT)
11/7/2017: ND (< 2.0 µg/L)
2/7/2018: ND (< 2.0 µg/L)
5/15/2018: ND (< 2.0 µg/L)
8/6/2018: ND (< 2.0 µg/L)

MW-29 (5-15 FT)
11/14/2017: 9.0 µg/L
2/14/2018: 0.90 J µg/L
5/14/2018: 0.47 J µg/L
8/9/2018: ND (< 2.0 µg/L)

MW-49 (12.5-17.5 FT)
2/13/2018: 7.0 µg/L
5/11/2018: 5.5 µg/L
8/14/2018: 5.0 µg/L

MW-20 (13.5-18.5 FT)
11/10/2017: ND (< 2.0 µg/L)
2/12/2018: ND (< 2.0 µg/L)
5/11/2018: ND (< 2.0 µg/L)
8/9/2018: ND (< 2.0 µg/L)

MW-23 (15-20 FT)
11/7/2017: ND (< 20 µg/L)
2/6/2018: ND (< 20 µg/L)
5/7/2018: ND (< 2.0 µg/L)
8/6/2018: ND (< 200 µg/L)

MW-14 (15-20 FT)
11/10/2017: ND (< 2.0 µg/L)
2/12/2018: ND (< 2.0 µg/L)
5/11/2018: ND (< 2.0 µg/L)
8/14/2018: ND (< 2.0 µg/L)

MW-3 (14-19 FT)
11/9/2017: 0.57 J µg/L
2/13/2018: ND (< 2.0 µg/L)
5/10/2018: 0.50 J µg/L
8/7/2018: 1.4 J µg/L

MW-5 (15.5-20.5 FT)
11/9/2017: ND (< 2.0 µg/L)
2/13/2018: ND (< 2.0 µg/L)
5/10/2018: ND (< 2.0 µg/L)
8/7/2018: ND (< 2.0 µg/L)

MW-10 (16.5-21.5 FT)
11/9/2017: 5.6 µg/L
2/13/2018: 4.4 µg/L
5/10/2018: 4.4 µg/L
8/9/2018: 4.8 µg/L

MW-2 (15.5-20.5 FT)
11/9/2017: 4.5 µg/L
2/13/2018: 4.4 µg/L
5/10/2018: 5.7 µg/L
8/10/2018: 5.1 µg/L

MW-4 (15.5-20.5 FT)
11/9/2017: ND (< 20 µg/L)
2/13/2018: 0.38 J µg/L
5/10/2018: 0.76 J µg/L
8/7/2018: ND (< 200 µg/L)

MW-25 (16-21 FT)
11/14/2017: 0.86 J µg/L
2/13/2018: 0.68 J µg/L
5/9/2018: 0.99 J µg/L
8/13/2018: 1.9 J µg/L

MW-36 (20-25 FT)
11/10/2017: ND (< 2.0 µg/L)
2/15/2018: ND (< 2.0 µg/L)
5/14/2018: ND (< 2.0 µg/L)
8/14/2018: ND (< 2.0 µg/L)

MW-7 (18-23 FT)
11/10/2017: ND (< 2.0 µg/L)
2/12/2018: ND (< 2.0 µg/L)
5/11/2018: ND (< 2.0 µg/L)
8/14/2018: ND (< 2.0 µg/L)

MW-1 (14-19 FT)
11/10/2017: ND (< 2.0 µg/L)
5/11/2018: ND (< 2.0 µg/L)
8/14/2018: ND (< 2.0 µg/L)

MW-15-60D (93-98 FT)
11/15/2017: ND (< 2.0 µg/L)
2/6/2018: ND (< 2.0 µg/L)
5/11/2018: ND (< 2.0 µg/L)
8/7/2018: ND (< 2.0 µg/L)

MW-9 (19.5-24.5 FT)
11/10/2017: 11 µg/L
2/12/2018: 12 µg/L
5/11/2018: 3.6 µg/L
8/14/2018: 4.3 µg/L

MW-24 (19-24 FT)
11/10/2017: ND (< 2.0 µg/L)
2/14/2018: ND (< 2.0 µg/L)
5/14/2018: ND (< 2.0 µg/L)
8/14/2018: ND (< 2.0 µg/L)

MW-18 (13-18 FT)
11/10/2017: ND (< 2.0 µg/L)
2/14/2018: ND (< 2.0 µg/L)
5/8/2018: ND (< 2.0 µg/L)
8/7/2018: ND (< 2.0 µg/L)

MW-37 (18-23 FT)
11/10/2017: ND (< 2.0 µg/L)
2/12/2018: ND (< 2.0 µg/L)
5/10/2018: ND (< 2.0 µg/L)
8/9/2018: ND (< 2.0 µg/L)

MW-38 (15-20 FT)
11/8/2017: ND (< 2.0 µg/L)
2/15/2018: ND (< 2.0 µg/L)
5/8/2018: ND (< 2.0 µg/L)
8/9/2018: ND (< 2.0 µg/L)

LMW-15-07
LMW-15-06
LMW-15-08
LMW-15-10
LMW-15-09
LMW-15-02
LMW-15-05
LMW-15-03
LMW-15-04
LMW-15-01

VAULT V-ESD-1
VAULT V-ESD-2
VAULT V-ESD-3
VAULT V-ESD-4
VAULT V-ESD-5

ESD-1
ESD-2
ESD-3
ESD-4

SSDS Location
HCS Location

EASTERN DIVERSION CHAMBER
WESTERN DIVERSION CHAMBER

LEVAN RD
YALE ST
STANDISH ST

LEGEND

- ON-SITE MONITORING WELL 1,4-DIOXANE ≤ 350 µg/L
- WELL NOT SAMPLED
- VAULT (2 FT x 2 FT)
- VAULT (4 FT x 6 FT)
- WELL SCREEN (4-INCH SDR-11 HDPE, CUSTOM SLOTTED)
- WELL BLANK CASING (4-INCH SDR-11 HDPE)
- WELL BLANK CASING (6-INCH SDR-11 HDPE)
- FORD PROPERTY BOUNDARY

NOTES:
FIGURE ONLY SHOWS THE FOUR MOST RECENT QUARTERS OF DATA (NOVEMBER 2017, FEBRUARY 2018, MAY 2018, AND AUGUST 2018). FULL SET OF DATA CAN BE FOUND IN THE CORRESPONDING TABLES.

µg/L - MICROGRAMS PER LITER (PARTS PER BILLION)

≤ - LESS THAN OR EQUAL TO

> - GREATER THAN

THE NONRESIDENTIAL DRINKING WATER CRITERIA FOR 1,4-DIOXANE IS 350 µg/L.

FT = FEET BELOW GROUND SURFACE

"ND", "<" INDICATES VALUE IS BELOW THE LABORATORY REPORTING LIMIT OF 2.0 µg/L FOR 1,4-DIOXANE.

J = ESTIMATED RESULT

MW = MONITORING WELL

LMW = LIGHT NON-AQUEOUS PHASE LIQUID MONITORING WELL

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

HDPE = HIGH-DENSITY POLYETHYLENE

SSDS = SUB-SLAB DEPRESSURIZATION SYSTEM

HCS = HYDRAULIC CONTROL SYSTEM

0 300 600
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

ON-SITE MONITORING WELLS 1,4-DIOXANE IN GROUNDWATER

ARCADIS Design & Consultancy for natural and built assets

FIGURE 8

CITY: Novi DIV: ENV DB: MG PROJECT NUMBER: MI001454.0004.00001 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MI\Ford\Livonia\GIS\docs\GEC\Progress Report_Quarter 3_2018\2018-10-01\Figure 8_On-Site GWA DX.mxd PLOTTED: 10/22/2018 8:17:20 PM BY: msi01059

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MW-72 (15-20 FT)
11/7/2017: 0.97 J µg/L
2/6/2018: 0.78 J µg/L
5/9/2018: 0.32 J µg/L
8/10/2018: 1.1 J µg/L

MW-85 (8-13 FT)
11/7/2017: ND (< 2.0 µg/L)
2/8/2018: 0.41 J µg/L
5/8/2018: 0.45 J µg/L
8/8/2018: ND (< 2.0 µg/L)

MW-83 (8-13 FT)
11/9/2017: ND (< 2.0 µg/L)
2/8/2018: ND (< 2.0 µg/L)
5/11/2018: ND (< 2.0 µg/L)
8/8/2018: ND (< 2.0 µg/L)

ROSATI AVE

MW-80S (7-12 FT)
11/8/2017: 0.55 J µg/L
2/8/2018: 0.33 J µg/L
5/8/2018: 0.46 J µg/L
8/6/2018: ND (< 2.0 µg/L)

MW-73S (7-12 FT)
11/7/2017: ND (< 2.0 µg/L)
2/6/2018: ND (< 2.0 µg/L)
5/9/2018: ND (< 2.0 µg/L)
8/10/2018: ND (< 2.0 µg/L)

MW-73D (13.5-18.5 FT)
11/7/2017: 2.8 µg/L
2/6/2018: 1.5 J µg/L
5/9/2018: 3.0 µg/L
8/10/2018: 1.9 J µg/L

MW-79D (10-15 FT)
11/9/2017: ND (< 2.0 µg/L)
2/8/2018: ND (< 2.0 µg/L)
5/8/2018: 0.49 J µg/L
8/6/2018: 0.87 J µg/L

MW-79S (5-10 FT)
11/9/2017: ND (< 2.0 µg/L)
2/8/2018: ND (< 2.0 µg/L)
5/8/2018: ND (< 2.0 µg/L)
8/6/2018: ND (< 2.0 µg/L)

CAPITOL ST

MW-82D (18-23 FT)
11/8/2017: ND (< 2.0 µg/L)
2/6/2018: ND (< 2.0 µg/L)
5/10/2018: ND (< 2.0 µg/L)
8/8/2018: ND (< 2.0 µg/L)

MW-74 (14-19 FT)
11/7/2017: 1.3 J µg/L
2/6/2018: 0.66 J µg/L
5/9/2018: 0.34 J µg/L
8/9/2018: 1.6 J µg/L

MW-84 (8-13 FT)
11/9/2017: ND (< 2.0 µg/L)
2/8/2018: ND (< 2.0 µg/L)
5/8/2018: ND (< 2.0 µg/L)
8/6/2018: ND (< 2.0 µg/L)

MW-78 (7-12 FT)
11/9/2017: ND (< 2.0 µg/L)
2/8/2018: ND (< 2.0 µg/L)
5/8/2018: ND (< 2.0 µg/L)
8/6/2018: ND (< 2.0 µg/L)

MW-82S (9-14 FT)
11/8/2017: ND (< 2.0 µg/L)
2/6/2018: ND (< 2.0 µg/L)
5/10/2018: ND (< 2.0 µg/L)
8/8/2018: ND (< 2.0 µg/L)

BEACON ST

STARK RD

MW-81 (8-13 FT)
11/9/2017: ND (< 2.0 µg/L)
2/6/2018: ND (< 2.0 µg/L)
5/10/2018: ND (< 2.0 µg/L)
8/9/2018: ND (< 2.0 µg/L)

BELDEN CT

BREWSTER ST

MW-86 (12-17 FT)
11/10/2017: 0.87 J µg/L
2/8/2018: ND (< 2.0 µg/L)
5/10/2018: 1.2 J µg/L
8/6/2018: ND (< 2.0 µg/L)

MW-75D (12-17 FT)
11/8/2017: 1.8 J µg/L
2/6/2018: 0.91 J µg/L
5/9/2018: 0.65 J µg/L
8/9/2018: 2.0 µg/L

MW-77 (9-14 FT)
11/10/2017: ND (< 2.0 µg/L)
2/8/2018: ND (< 2.0 µg/L)
5/11/2018: 0.27 J µg/L
8/6/2018: ND (< 2.0 µg/L)

WADSWORTH ST

MW-75S (5-10 FT)
11/8/2017: ND (< 2.0 µg/L)
2/6/2018: ND (< 2.0 µg/L)
5/9/2018: ND (< 2.0 µg/L)
8/9/2018: ND (< 2.0 µg/L)

MW-87 (14-19 FT)
11/10/2017: ND (< 2.0 µg/L)
2/8/2018: ND (< 2.0 µg/L)
5/10/2018: ND (< 2.0 µg/L)
8/6/2018: ND (< 2.0 µg/L)

BOSTON POST ST

STANDISH ST

PRISCILLA LN

MW-76 (15-20 FT)
11/8/2017: ND (< 2.0 µg/L)
2/6/2018: ND (< 2.0 µg/L)
5/10/2018: ND (< 2.0 µg/L)
8/9/2018: ND (< 2.0 µg/L)

PLYMOUTH RD

WAYNE RD

LAUREL ST

LEGEND

- PROPERTY BOUNDARY
- FORD PROPERTY BOUNDARY
- OFF-SITE MONITORING WELL 1,4-DIOXANE ≤ 7.2 µg/L

NOTES:
FIGURE ONLY SHOWS THE FOUR MOST RECENT QUARTERS OF DATA (NOVEMBER 2017, FEBRUARY 2018, MAY 2018, AND AUGUST 2018). FULL SET OF DATA CAN BE FOUND IN THE CORRESPONDING TABLES.

µg/L - MICROGRAMS PER LITER (PARTS PER BILLION)

≤ - LESS THAN OR EQUAL TO

> - GREATER THAN

THE SITE SPECIFIC RESIDENTIAL DRINKING WATER CRITERIA FOR 1,4-DIOXANE IS 7.2 µg/L.

FT = FEET BELOW GROUND SURFACE

J = ESTIMATED CONCENTRATION ABOVE THE METHOD DETECTION LIMIT AND BELOW THE REPORTING LIMIT.

"ND", "<" INDICATES VALUE IS BELOW THE LABORATORY REPORTING LIMIT OF 2.0 µg/L FOR 1,4-DIOXANE.

MW = MONITORING WELL

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

0 300 600
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

OFF-SITE MONITORING WELLS 1,4-DIOXANE IN GROUNDWATER

ARCADIS Design & Consultancy for natural and built assets

FIGURE 9

CITY: NOVI DIV: ENV DB: MG PIC: R. ELLIS PM: K. HINSKEY TM: A. DEGRANDIS TR: P. CURRY PROJECT NUMBER: MI001454.0004.00002 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MI\FordLivonia\GIS\docs\GEC\Progress Report_Quarter 3_2018\2018-10-01\Figure 9_Off-Site GWA DX.mxd PLOTTED: 10/16/2018 11:06:10 AM BY: MAI00749

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MW-72 (15-20 FT)
11/7/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-85 (8-13 FT)
11/7/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/8/2018: ND (< 1.0 µg/L)

ROSATI AVE

MW-83 (8-13 FT)
11/9/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-73S (7-12 FT)
11/7/2017: 0.48 J µg/L
2/6/2018: 0.33 J µg/L
5/9/2018: 0.38 J µg/L
8/10/2018: 0.51 J µg/L

MW-73D (13.5-18.5 FT)
11/7/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/10/2018: ND (< 1.0 µg/L)

MW-79D (10-15 FT)
11/9/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-79S (5-10 FT)
11/9/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-80S (7-12 FT)
11/8/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

CAPITOL ST

MW-82D (18-23 FT)
11/8/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/8/2018: ND (< 1.0 J µg/L)

MW-82S (9-14 FT)
11/8/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-74 (14-19 FT)
11/7/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 J µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-84 (8-13 FT)
11/9/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/6/2018: 0.14 J µg/L

BEACON ST

MW-78 (7-12 FT)
11/9/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

STARK RD

MW-81 (8-13 FT)
11/9/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

BREWSTER ST

MW-86 (12-17 FT)
11/10/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-75D (12-17 FT)
11/8/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

BELDEN CT

MW-75S (5-10 FT)
11/8/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 J µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-77 (9-14 FT)
11/10/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

WADSWORTH ST

MW-87 (14-19 FT)
11/10/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

BOSTON POST ST

STANDISH ST

PRISCILLA LN

MW-76 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

PLYMOUTH RD

WAYNE RD

LAUREL ST

LEGEND

- PROPERTY BOUNDARY
- FORD PROPERTY BOUNDARY
- OFF-SITE MONITORING WELL TRICHLOROETHENE ≤ 1.0 µg/L

NOTES:
FIGURE ONLY SHOWS THE FOUR MOST RECENT QUARTERS OF DATA (NOVEMBER 2017, FEBRUARY 2018, MAY 2018, AND AUGUST 2018). FULL SET OF DATA CAN BE FOUND IN THE CORRESPONDING TABLES.

µg/L - MICROGRAMS PER LITER (PARTS PER BILLION)

≤ - LESS THAN OR EQUAL TO

THE PUBLISHED 2016 MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY REMEDIATION AND REDEVELOPMENT DIVISION TARGET DETECTION LIMIT FOR TRICHLOROETHENE IS 1.0 µg/L.

FT = FEET BELOW GROUND SURFACE

J = ESTIMATED CONCENTRATION ABOVE THE METHOD DETECTION LIMIT AND BELOW THE REPORTING LIMIT.

"ND", "<" INDICATES VALUE IS BELOW THE LABORATORY REPORTING LIMIT OF 1.0 µg/L FOR TRICHLOROETHENE.

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

MW = MONITORING WELL

0 300 600
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

OFF-SITE MONITORING WELLS TRICHLOROETHENE IN GROUNDWATER

ARCADIS Design & Consultancy for natural and built assets

FIGURE
10

CITY: NOVI DIV: ENV DB: MG PIC: R. ELLIS PM: K. HINSKEY TM: A. DEGRANDIS TR: P. CURRY PROJECT NUMBER: MI001454.0004.00002 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MI\Ford\Livonia\GIS\docs\GEC\Progress Report_Quarter 3_2018\2018-10-01\Figure 10_Off-Site GWA TCE.mxd PLOTTED: 10/15/2018 5:50:06 PM BY: MAI00749

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MW-72 (15-20 FT)
11/7/2017: 1.6 µg/L
2/6/2018: 1.3 µg/L
5/9/2018: 1.5 J µg/L
8/10/2018: 1.2 µg/L

MW-85 (8-13 FT)
11/7/2017: 7.3 µg/L
2/8/2018: 5.5 µg/L
5/8/2018: 7.5 µg/L
8/8/2018: 7.2 µg/L

MW-83 (8-13 FT)
11/9/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-73S (7-12 FT)
11/7/2017: 1.9 µg/L
2/6/2018: 1.1 µg/L
5/9/2018: 1.2 µg/L
8/10/2018: 0.62 J µg/L

MW-73D (13.5-18.5 FT)
11/7/2017: 1.3 µg/L
2/6/2018: 0.79 J µg/L
5/9/2018: 0.80 J µg/L
8/10/2018: 0.75 J µg/L

MW-79D (10-15 FT)
11/9/2017: 3.6 µg/L
2/8/2018: 1.9 µg/L
5/8/2018: 3.5 µg/L
8/6/2018: 2.8 µg/L

MW-79S (5-10 FT)
11/9/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-80S (7-12 FT)
11/8/2017: 7.6 µg/L
2/8/2018: 2.9 µg/L
5/8/2018: 6.3 µg/L
8/6/2018: 6.2 µg/L

MW-82S (9-14 FT)
11/8/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/8/2018: ND (< 1.0 µg/L)

MW-82D (18-23 FT)
11/8/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/8/2018: ND (< 1.0 J µg/L)

MW-74 (14-19 FT)
11/7/2017: 2.4 µg/L
2/6/2018: 2.0 µg/L
5/9/2018: 0.70 J µg/L
8/9/2018: 2.8 µg/L

MW-84 (8-13 FT)
11/9/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-78 (7-12 FT)
11/9/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/8/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-81 (8-13 FT)
11/9/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-86 (12-17 FT)
11/10/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-75D (12-17 FT)
11/8/2017: 4.9 J µg/L
2/6/2018: 1.9 µg/L
5/9/2018: 2.4 µg/L
8/9/2018: 1.8 µg/L

MW-75S (5-10 FT)
11/8/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/9/2018: ND (< 1.0 J µg/L)
8/9/2018: ND (< 1.0 µg/L)

MW-77 (9-14 FT)
11/10/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/11/2018: ND (< 1.0 µg/L)
8/6/2018: 0.24 J µg/L

MW-87 (14-19 FT)
11/10/2017: ND (< 1.0 µg/L)
2/8/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/6/2018: ND (< 1.0 µg/L)

MW-76 (15-20 FT)
11/8/2017: ND (< 1.0 µg/L)
2/6/2018: ND (< 1.0 µg/L)
5/10/2018: ND (< 1.0 µg/L)
8/9/2018: ND (< 1.0 µg/L)

ROSATI AVE
CAPITOL ST
STARK RD
BEACON ST
BREWSTER ST
WADSWORTH ST
BOSTON POST ST
STANDISH ST
PRISCILLA LN
BELDEN CT
WAYNE RD
PLYMOUTH RD
LAUREL ST

LEGEND

- PROPERTY BOUNDARY
- FORD PROPERTY BOUNDARY
- OFF-SITE MONITORING WELL VINYL CHLORIDE ≤ 1.0 µg/L
- OFF-SITE MONITORING WELL VINYL CHLORIDE > 1.0 µg/L
- **BLUE/BOLD TEXT** — EXCEEDANCE OF THE TDL FROM PAST AND PRESENT SAMPLING EVENTS

NOTES:
FIGURE ONLY SHOWS THE FOUR MOST RECENT QUARTERS OF DATA (NOVEMBER 2017, FEBRUARY 2018, MAY 2018, AND AUGUST 2018). FULL SET OF DATA CAN BE FOUND IN THE CORRESPONDING TABLES.

µg/L - MICROGRAMS PER LITER (PARTS PER BILLION)

≤ - LESS THAN OR EQUAL TO

> - GREATER THAN

TDL - TARGET DETECTION LIMIT

THE PUBLISHED 2016 MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY REMEDIATION AND REDEVELOPMENT DIVISION TARGET DETECTION LIMIT FOR VINYL CHLORIDE IS 1.0 µg/L.

FT = FEET BELOW GROUND SURFACE

J = ESTIMATED CONCENTRATION ABOVE THE METHOD DETECTION LIMIT AND BELOW THE REPORTING LIMIT.

"ND", "<" INDICATES VALUE IS BELOW THE LABORATORY REPORTING LIMIT OF 1.0 µg/L FOR VINYL CHLORIDE.

MW = MONITORING WELL

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

BLUE BOX INDICATES EXCEEDANCE OF THE TARGET DETECTION LIMIT FOR VINYL CHLORIDE ASSOCIATED WITH THE MOST RECENT SAMPLING EVENT POSSIBLE

0 300 600
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

OFF-SITE MONITORING WELLS VINYL CHLORIDE IN GROUNDWATER

ARCADIS Design & Consultancy for natural and built assets

FIGURE
11

CITY: NOVI DIV: ENV DB: MG PIC: R. ELLIS PM: K. HINSKEY TM: A. DEGRANDIS TR: P. CURRY PROJECT NUMBER: MI001454.0004.00002 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MI\Ford\Livonia\GIS\docs\GEC\Progress Report_Quarter 3_2018\2018-10-01\Figure 11_Off-Site GWA VC.mxd PLOTTED: 10/11/2018 4:45:58 PM BY: MAI00749

This document is a DRAFT document that has not received approval from the MDEQ. This document was prepared pursuant to a court Consent Decree. The opinions, findings, and conclusions expressed are those of the authors and not those of the MDEQ.

SVMP-25 (6.0 FT)
11/21/2017: ND (< 4.7 µg/m^3)
2/21/2018: ND (< 4.4 µg/m^3)
5/29/2018: ND (< 5.1 µg/m^3)
8/23/2018: ND (< 4.7 µg/m^3)

SVMP-25 (3.0 FT)
11/21/2017: ND (< 4.5 µg/m^3)
2/21/2018: ND (< 4.4 µg/m^3)
5/29/2018: ND (< 5.0 µg/m^3)
8/23/2018: ND (< 5.0 µg/m^3)

SVMP-26 (4.0 FT)
11/21/2017: ND (< 4.4 µg/m^3)
2/21/2018: ND (< 4.4 µg/m^3)
5/29/2018: ND (< 4.9 µg/m^3)
8/23/2018: 14 µg/m^3

SVMP-27 (4.5 FT)
11/21/2017: ND (< 4.4 µg/m^3)
2/21/2018: ND (< 4.4 µg/m^3)
5/29/2018: ND (< 4.9 µg/m^3)
8/23/2018: ND (< 5.0 µg/m^3)

SVMP-28 (3.0 FT)
11/21/2017: ND (< 4.6 µg/m^3)
2/21/2018: ND (< 4.3 µg/m^3)
5/29/2018: ND (< 5.2 µg/m^3)
8/23/2018: ND (< 4.7 µg/m^3)

SVMP-01 (7.0 FT)
11/17/2017: ND (< 4.8 µg/m^3)
2/19/2018: ND (< 4.5 µg/m^3)
5/29/2018: ND (< 5.1 µg/m^3)
8/22/2018: ND (< 4.7 µg/m^3)

SVMP-01 (3.5 FT)
11/17/2017: ND (< 4.2 µg/m^3)
2/19/2018: ND (< 4.6 µg/m^3)
5/29/2018: ND (< 4.8 µg/m^3)
8/22/2018: ND (< 4.8 µg/m^3)

SVMP-08 (3.5 FT)
11/20/2017: ND (< 4.6 µg/m^3)
2/20/2018: ND (< 4.6 µg/m^3)
5/29/2018: ND (< 5.0 µg/m^3)
8/23/2018: ND (< 4.8 µg/m^3)

SVMP-32 (3.0 FT)

SVMP-32 (6.0 FT)

SVMP-33 (4.0 FT)

SVMP-34 (4.0 FT)

SVMP-11 (3.5 FT)

SVMP-06 (4.5 FT)
11/20/2017: ND (< 4.5 µg/m^3)
2/21/2018: ND (< 4.6 µg/m^3)
5/30/2018: ND (< 4.7 µg/m^3)
8/23/2018: ND (< 4.6 µg/m^3)

SVMP-07 (3.5 FT)
11/20/2017: ND (< 4.7 µg/m^3)
2/19/2018: ND (< 4.5 µg/m^3)
5/30/2018: ND (< 4.9 µg/m^3)
8/23/2018: ND (< 4.7 µg/m^3)

SVMP-35 (4.0 FT)

SVMP-31 (5.5 FT)

SVMP-29 (3.5 FT)

SVMP-29 (7.5 FT)

SVMP-09 (4.0 FT)
11/20/2017: ND (< 4.5 µg/m^3)
2/20/2018: ND (< 4.8 µg/m^3)
5/30/2018: ND (< 4.5 µg/m^3)
8/23/2018: ND (< 4.9 µg/m^3)

SVMP-13 (2.0 FT)
11/21/2017: ND (< 4.6 µg/m^3)
8/24/2018: ND (< 4.8 µg/m^3)

SVMP-12 (3.5 FT)
11/21/2017: ND (< 4.7 µg/m^3)
2/20/2018: ND (< 4.7 µg/m^3)
5/29/2018: ND (< 4.8 µg/m^3)
8/23/2018: ND (< 4.7 µg/m^3)

SVMP-14 (2.0 FT)
11/21/2017: ND (< 4.1 µg/m^3)
8/24/2018: ND (< 4.7 µg/m^3)

SVMP-10 (3.0 FT)
11/21/2017: ND (< 4.4 µg/m^3)
2/20/2018: ND (< 4.7 µg/m^3)
8/23/2018: ND (< 4.9 µg/m^3)

SVMP-02 (8.5 FT)
11/17/2017: ND (< 4.6 µg/m^3)
2/19/2018: ND (< 8.3 µg/m^3)
5/29/2018: ND (< 5.1 µg/m^3)
8/22/2018: ND (< 4.9 µg/m^3)

SVMP-02 (4.5 FT)
11/17/2017: ND (< 4.5 µg/m^3)
2/19/2018: ND (< 8.3 µg/m^3)
5/29/2018: ND (< 4.9 µg/m^3)
8/22/2018: ND (< 5.0 µg/m^3)

SVMP-22 (3.0 FT)
11/17/2017: ND (< 4.9 µg/m^3)
2/20/2018: ND (< 4.7 µg/m^3)
8/21/2018: ND (< 4.7 µg/m^3)

SVMP-05 (4.5 FT)
11/20/2017: ND (< 4.6 µg/m^3)
2/21/2018: ND (< 4.2 µg/m^3)
5/30/2018: ND (< 4.7 µg/m^3)
8/23/2018: ND (< 4.6 µg/m^3)

SVMP-30 (4.0 FT)

SVMP-03 (3.5 FT)
11/17/2017: ND (< 4.0 µg/m^3)
2/19/2018: ND (< 4.3 µg/m^3)
5/29/2018: ND (< 5.5 µg/m^3)
8/22/2018: ND (< 4.6 µg/m^3)

SVMP-03 (7.0 FT)
11/17/2017: ND (< 4.3 µg/m^3)
2/19/2018: ND (< 4.6 µg/m^3)
5/29/2018: ND (< 5.0 µg/m^3)
8/22/2018: ND (< 4.6 µg/m^3)

SVMP-23 (3.0 FT)
11/17/2017: ND (< 4.3 µg/m^3)
2/20/2018: ND (< 4.2 µg/m^3)
8/22/2018: ND (< 4.6 µg/m^3)

SVMP-24 (4.0 FT)
11/17/2017: ND (< 4.4 µg/m^3)
2/21/2018: ND (< 4.7 µg/m^3)
5/30/2018: ND (< 4.6 µg/m^3)
8/22/2018: ND (< 4.7 µg/m^3)

SVMP-36 (4.0 FT)

SVMP-19 (3.0 FT)
11/17/2017: ND (< 4.3 µg/m^3)
2/20/2018: ND (< 4.1 µg/m^3)
8/22/2018: ND (< 4.5 µg/m^3)

SVMP-18 (3.0 FT)
11/17/2017: ND (< 4.3 µg/m^3)
2/20/2018: ND (< 4.5 µg/m^3)
5/30/2018: ND (< 4.7 µg/m^3)
8/22/2018: ND (< 5.1 µg/m^3)

SVMP-20 (3.0 FT)
8/22/2018: ND (< 4.7 µg/m^3)

SVMP-15 (2.0 FT)
11/20/2017: ND (< 4.4 µg/m^3)
8/24/2018: ND (< 4.8 µg/m^3)

SVMP-21 (2.0 FT)
11/20/2017: ND (< 4.6 µg/m^3)
5/30/2018: ND (< 4.8 µg/m^3)
8/24/2018: ND (< 4.8 µg/m^3)

SVMP-37 (2.5 FT)

SVMP-16 (2.0 FT)
11/20/2017: ND (< 4.3 µg/m^3)
8/24/2018: ND (< 5.0 µg/m^3)

SVMP-17 (2.0 FT)
5/30/2018: ND (< 4.8 µg/m^3)
8/24/2018: ND (< 4.9 µg/m^3)

SVMP-04 (3.5 FT)
11/20/2017: ND (< 4.9 µg/m^3)
2/21/2018: ND (< 4.7 µg/m^3)
5/30/2018: ND (< 4.8 µg/m^3)
8/23/2018: ND (< 4.9 µg/m^3)

ROSATI AVE
CONCORD ST
CAPITOL ST
STARK RD
BEACON ST
BREWSTER ST
WADSWORTH ST
BOSTON POST ST
PRISCILLA LN
BELDEN CT
WAYNE RD
LAUREL ST
PLYMOUTH RD

LEGEND

- PROPERTY BOUNDARIES
- FORD PROPERTY BOUNDARY
- OFF-SITE SVMP CIS-1,2-DICHLOROETHENE < 280 µg/m^3
- OFF-SITE SVMP NOT SAMPLED FOR CIS-1,2-DICHLOROETHENE

NOTES:
FIGURE ONLY SHOWS THE FOUR MOST RECENT QUARTERS OF DATA (NOVEMBER 2017, FEBRUARY 2018, MAY 2018, AND AUGUST 2018). FULL SET OF DATA CAN BE FOUND IN THE CORRESPONDING TABLES.

µg/m^3 - MICROGRAMS PER CUBIC METER

THE MDEQ PROVIDED RESIDENTIAL VOLATILIZATION TO INDOOR AIR SOIL VAPOR SCREENING LEVEL FOR CIS-1,2-DICHLOROETHENE IS 280 µg/m.^{3}

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

FT = FEET BELOW GROUND SURFACE

"ND", "<" = NON-DETECT INDICATES VALUE IS BELOW THE LABORATORY REPORTING LIMIT, RANGING FROM 4.0 TO 8.3 µg/m^3 , FOR CIS-1,2-DICHLOROETHENE.

SVMP = SOIL VAPOR MONITORING POINT

SVMP-29 THROUGH 37 WERE NOT SAMPLED DURING THE NOVEMBER 2017, FEBRUARY 2018, MAY 2018, OR AUGUST 2018 SAMPLING EVENTS.

SVMP-17 AND SVMP-20 WERE NOT SAMPLED DURING THE NOVEMBER 2017 EVENT DUE TO SATURATED SCREENS.

SVMP-13 THROUGH SVMP-17, SVMP-20, AND SVMP-21 WERE NOT SAMPLED DURING THE FEBRUARY 2018 EVENT DUE TO SATURATED SCREENS.

SVMP-10, SVMP-13 THROUGH SVMP-16, SVMP-19, SVMP-22, AND SVMP-23 WERE NOT SAMPLED DURING THE MAY 2018 SAMPLING EVENT DUE TO SATURATED SCREENS. SVMP-20 WAS NOT SAMPLED DURING THE MAY 2018 SAMPLING EVENT DUE TO A BLOCKAGE IN THE TUBING.

SVMP-11, WHICH RESIDED IN THE CITY OF LIVONIA RIGHT-OF-WAY, WAS REMOVED PER THE ADJACENT PROPERTY OWNERS REQUEST.

0 300 600
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

OFF-SITE VAPOR INTRUSION ASSESSMENT
CIS-1,2-DICHLOROETHENE IN SOIL VAPOR

ARCADIS Design & Consultancy for natural and built assets

FIGURE
12

CITY: NOVI DIV: ENV DB: MG PIC: R. ELLIS PM: K. HINSKEY TM: A. DEGRANDIS TR: M.WACKSMAN PROJECT NUMBER: MI001454.0004.00003 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MIFord\Livonia\GIS\docs\GEC\Progress Report_Quarter 3_2018\2018-10-01\Figure 12_Off-Site SVMP cis-DCE.mxd PLOTTED: 10/15/2018 5:52:23 PM BY: MAI00749

This document is a DRAFT document that has not received approval from the MDEQ. This document was prepared pursuant to a court Consent Decree. The opinions, findings, and conclusions expressed are those of the authors and not those of the MDEQ.

SVMP-25 (6.0 FT)
11/21/2017: ND (< 8.1 µg/m^3)
2/21/2018: ND (< 7.6 µg/m^3)
5/29/2018: ND (< 8.8 µg/m^3)
8/23/2018: ND (< 8.1 µg/m^3)

SVMP-25 (3.0 FT)
11/21/2017: ND (< 7.7 µg/m^3)
2/21/2018: ND (< 7.6 µg/m^3)
5/29/2018: ND (< 8.5 µg/m^3)
8/23/2018: ND (< 8.5 µg/m^3)

SVMP-26 (4.0 FT)
11/21/2017: ND (< 7.6 µg/m^3)
2/21/2018: ND (< 7.5 µg/m^3)
5/29/2018: ND (< 8.4 µg/m^3)
8/23/2018: ND (< 8.0 µg/m^3)

SVMP-27 (4.5 FT)
11/21/2017: ND (< 7.5 µg/m^3)
2/21/2018: ND (< 7.6 µg/m^3)
5/29/2018: ND (< 8.4 µg/m^3)
8/23/2018: ND (< 8.5 µg/m^3)

SVMP-28 (3.0 FT)
11/21/2017: ND (< 7.9 µg/m^3)
2/21/2018: ND (< 7.3 µg/m^3)
5/29/2018: ND (< 8.9 µg/m^3)
8/23/2018: 8.9 µg/m^3

SVMP-22 (3.0 FT)
11/17/2017: ND (< 8.4 µg/m^3)
2/20/2018: ND (< 8.1 µg/m^3)
8/21/2018: ND (< 8.0 µg/m^3)

SVMP-23 (3.0 FT)
11/17/2017: ND (< 7.4 µg/m^3)
2/20/2018: ND (< 7.2 µg/m^3)
8/22/2018: ND (< 7.9 µg/m^3)

SVMP-24 (4.0 FT)
11/17/2017: ND (< 7.5 µg/m^3)
2/21/2018: ND (< 8.1 µg/m^3)
5/30/2018: ND (< 7.9 µg/m^3)
8/22/2018: ND (< 8.1 µg/m^3)

SVMP-19 (3.0 FT)
11/17/2017: ND (< 7.4 µg/m^3)
2/20/2018: ND (< 7.1 µg/m^3)
8/22/2018: ND (< 7.7 µg/m^3)

SVMP-36 (4.0 FT)

SVMP-18 (3.0 FT)
11/17/2017: ND (< 7.3 µg/m^3)
2/20/2018: ND (< 7.8 µg/m^3)
5/30/2018: ND (< 8.1 µg/m^3)
8/22/2018: ND (< 8.8 µg/m^3)

SVMP-11 (3.5 FT)

SVMP-12 (3.5 FT)
11/21/2017: ND (< 8.0 µg/m^3)
2/20/2018: ND (< 8.1 µg/m^3)
5/29/2018: ND (< 8.2 µg/m^3)
8/23/2018: ND (< 8.0 µg/m^3)

SVMP-20 (3.0 FT)
8/22/2018: ND (< 8.0 µg/m^3)

SVMP-34 (4.0 FT)

SVMP-16 (2.0 FT)
11/20/2017: ND (< 7.4 µg/m^3)
8/24/2018: ND (< 8.5 µg/m^3)

SVMP-21 (2.0 FT)
11/20/2017: ND (< 7.9 µg/m^3)
5/30/2018: ND (< 8.3 µg/m^3)
8/24/2018: ND (< 8.2 µg/m^3)

SVMP-32 (3.0 FT)

SVMP-33 (4.0 FT)

SVMP-32 (6.0 FT)

SVMP-15 (2.0 FT)
11/20/2017: ND (< 7.6 µg/m^3)
8/24/2018: ND (< 8.2 µg/m^3)

SVMP-13 (2.0 FT)
11/21/2017: ND (< 7.8 µg/m^3)
8/24/2018: ND (< 8.2 µg/m^3)

SVMP-37 (2.5 FT)

SVMP-08 (3.5 FT)
11/20/2017: ND (< 7.9 µg/m^3)
2/20/2018: ND (< 7.9 µg/m^3)
5/29/2018: ND (< 8.6 µg/m^3)
8/23/2018: ND (< 8.2 µg/m^3)

SVMP-09 (4.0 FT)
11/20/2017: ND (< 7.7 µg/m^3)
2/20/2018: ND (< 8.2 µg/m^3)
5/30/2018: ND (< 7.7 µg/m^3)
8/23/2018: ND (< 8.4 µg/m^3)

SVMP-10 (3.0 FT)
11/21/2017: ND (< 7.5 µg/m^3)
2/20/2018: ND (< 8.1 µg/m^3)
8/23/2018: ND (< 8.4 µg/m^3)

SVMP-14 (2.0 FT)
11/21/2017: ND (< 7.0 µg/m^3)
8/24/2018: ND (< 8.1 µg/m^3)

SVMP-17 (2.0 FT)
5/30/2018: ND (< 8.1 µg/m^3)
8/24/2018: ND (< 8.4 µg/m^3)

SVMP-06 (4.5 FT)
11/20/2017: ND (< 7.7 µg/m^3)
2/21/2018: ND (< 7.8 µg/m^3)
5/30/2018: ND (< 8.1 µg/m^3)
8/23/2018: ND (< 7.8 µg/m^3)

SVMP-05 (4.5 FT)
11/20/2017: ND (< 7.8 µg/m^3)
2/21/2018: ND (< 7.2 µg/m^3)
5/30/2018: ND (< 8.0 µg/m^3)
8/23/2018: ND (< 7.8 µg/m^3)

SVMP-04 (3.5 FT)
11/20/2017: ND (< 8.4 µg/m^3)
2/21/2018: ND (< 8.1 µg/m^3)
5/30/2018: ND (< 8.2 µg/m^3)
8/23/2018: ND (< 8.4 µg/m^3)

SVMP-07 (3.5 FT)
11/20/2017: ND (< 8.1 µg/m^3)
2/19/2018: ND (< 7.7 µg/m^3)
5/30/2018: ND (< 8.4 µg/m^3)
8/23/2018: ND (< 8.1 µg/m^3)

SVMP-31 (5.5 FT)

SVMP-30 (4.0 FT)

SVMP-35 (4.0 FT)

SVMP-02 (4.5 FT)
11/17/2017: ND (< 7.8 µg/m^3)
2/19/2018: ND (< 14 µg/m^3)
5/29/2018: ND (< 8.4 µg/m^3)
8/22/2018: ND (< 8.5 µg/m^3)

SVMP-29 (3.5 FT)

SVMP-29 (7.5 FT)

SVMP-01 (7.0 FT)
11/17/2017: ND (< 8.2 µg/m^3)
2/19/2018: ND (< 7.6 µg/m^3)
5/29/2018: ND (< 8.7 µg/m^3)
8/22/2018: ND (< 8.1 µg/m^3)

SVMP-03 (7.0 FT)
11/17/2017: ND (< 7.4 µg/m^3)
2/19/2018: ND (< 7.9 µg/m^3)
5/29/2018: ND (< 8.5 µg/m^3)
8/22/2018: ND (< 7.8 µg/m^3)

SVMP-01 (3.5 FT)
11/17/2017: ND (< 7.1 µg/m^3)
2/19/2018: ND (< 7.8 µg/m^3)
5/29/2018: ND (< 8.3 µg/m^3)
8/22/2018: ND (< 8.3 µg/m^3)

SVMP-02 (8.5 FT)
11/17/2017: ND (< 7.9 µg/m^3)
2/19/2018: ND (< 14 µg/m^3)
5/29/2018: ND (< 8.7 µg/m^3)
8/22/2018: ND (< 8.4 µg/m^3)

SVMP-03 (3.5 FT)
11/17/2017: ND (< 6.9 µg/m^3)
2/19/2018: ND (< 7.3 µg/m^3)
5/29/2018: ND (< 9.4 µg/m^3)
8/22/2018: ND (< 7.8 µg/m^3)

ROSATI AVE
CONCORD ST
CAPITOL ST
STARK RD
BEACON ST
BREWSTER ST
BELDEN CT
WADSWORTH ST
BOSTON POST ST
PRISCILLA LN
PLYMOUTH RD
WAYNE RD
LAUREL ST

LEGEND

- PROPERTY BOUNDARIES
- FORD PROPERTY BOUNDARY
- OFF-SITE SVMP TETRACHLOROETHENE < 1,400 µg/m^3
- OFF-SITE SVMP NOT SAMPLED FOR TETRACHLOROETHENE

NOTES:
FIGURE ONLY SHOWS THE FOUR MOST RECENT QUARTERS OF DATA (NOVEMBER 2017, FEBRUARY 2018, MAY 2018, AND AUGUST 2018). FULL SET OF DATA CAN BE FOUND IN THE CORRESPONDING TABLES.

µg/m^3 - MICROGRAMS PER CUBIC METER

THE MDEQ PROVIDED RESIDENTIAL VOLATILIZATION TO INDOOR AIR SOIL VAPOR SCREENING LEVEL FOR TETRACLOROETHENE IS 1,400 µg/m.^{3}

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

FT = FEET BELOW GROUND SURFACE

"ND", "<" = NON-DETECT INDICATES VALUE IS BELOW THE LABORATORY REPORTING LIMIT, RANGING FROM 6.9 TO 14 µg/m^3, FOR TETRACHLOROETHENE.

SVMP = SOIL VAPOR MONITORING POINT

SVMP-29 THROUGH 37 WERE NOT SAMPLED DURING THE NOVEMBER 2017, FEBRUARY 2018, MAY 2018, OR AUGUST 2018 SAMPLING EVENTS.

SVMP-17 AND SVMP-20 WERE NOT SAMPLED DURING THE NOVEMBER 2017 EVENT DUE TO SATURATED SCREENS.

SVMP-13 THROUGH SVMP-17, SVMP-20, AND SVMP-21 WERE NOT SAMPLED DURING THE FEBRUARY 2018 EVENT DUE TO SATURATED SCREENS.

SVMP-10, SVMP-13 THROUGH SVMP-16, SVMP-19, SVMP-22, AND SVMP-23 WERE NOT SAMPLED DURING THE MAY 2018 SAMPLING EVENT DUE TO SATURATED SCREENS. SVMP-20 WAS NOT SAMPLED DURING THE MAY 2018 SAMPLING EVENT DUE TO A BLOCKAGE IN THE TUBING.

SVMP-11, WHICH RESIDED IN THE CITY OF LIVONIA RIGHT-OF-WAY, WAS REMOVED PER THE ADJACENT PROPERTY OWNERS REQUEST.

0 300 600
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

OFF-SITE VAPOR INTRUSION ASSESSMENT TETRACHLOROETHENE IN SOIL VAPOR

ARCADIS Design & Consultancy for natural and built assets

FIGURE
13

CITY: NOVI DIV: ENV DB: MG PIC: R. ELLIS PM: K. HINSKEY TM: A. DEGRANDIS TR: M.WACKSMAN PROJECT NUMBER: MI001454.0004.00003 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MI\FordLivonia\GIS\docs\GEO\Progress Report_Quarter 3_2018\2018-10-01\Figure 13_Off-Site SVMP PCE.mxd PLOTTED: 10/15/2018 5:59:24 PM BY: MAI00749

This document is a DRAFT document that has not received approval from the MDEQ. This document was prepared pursuant to a court Consent Decree. The opinions, findings, and conclusions expressed are those of the authors and not those of the MDEQ.

SVMP-25 (3.0 FT)
11/21/2017: ND (< 6.1 µg/m³)
2/21/2018: ND (< 6.0 µg/m³)
5/29/2018: ND (< 6.7 µg/m³)
8/23/2018: ND (< 6.7 µg/m³)

SVMP-25 (6.0 FT)
11/21/2017: ND (< 6.4 µg/m³)
2/21/2018: ND (< 6.0 µg/m³)
5/29/2018: ND (< 7.0 µg/m³)
8/23/2018: ND (< 6.4 µg/m³)

SVMP-22 (3.0 FT)
11/17/2017: ND (< 6.7 µg/m³)
2/20/2018: ND (< 6.4 µg/m³)
8/21/2018: ND (< 6.3 µg/m³)

SVMP-23 (3.0 FT)
11/17/2017: ND (< 5.8 µg/m³)
2/20/2018: ND (< 5.7 µg/m³)
8/22/2018: ND (< 6.3 µg/m³)

SVMP-24 (4.0 FT)
11/17/2017: ND (< 5.9 µg/m³)
2/21/2018: ND (< 6.4 µg/m³)
5/30/2018: ND (< 6.3 µg/m³)
8/22/2018: 6.9 µg/m³

ROSATI AVE

CONCORD ST

SVMP-19 (3.0 FT)
11/17/2017: ND (< 5.9 µg/m³)
2/20/2018: ND (< 5.6 µg/m³)
8/22/2018: ND (< 6.1 µg/m³)

SVMP-36 (4.0 FT)

SVMP-26 (4.0 FT)
11/21/2017: ND (< 6.0 µg/m³)
2/21/2018: ND (< 5.9 µg/m³)
5/29/2018: ND (< 6.7 µg/m³)
8/23/2018: 24 µg/m³

SVMP-11 (3.5 FT)

SVMP-12 (3.5 FT)
11/21/2017: ND (< 6.3 µg/m³)
2/20/2018: ND (< 6.4 µg/m³)
5/29/2018: ND (< 6.5 µg/m³)
8/23/2018: ND (< 6.4 µg/m³)

SVMP-20 (3.0 FT)
8/22/2018: ND (< 6.3 µg/m³)

SVMP-21 (2.0 FT)
11/20/2017: ND (< 6.2 µg/m³)
5/30/2018: ND (< 6.6 µg/m³)
8/24/2018: ND (< 6.5 µg/m³)

SVMP-18 (3.0 FT)
11/17/2017: ND (< 5.8 µg/m³)
2/20/2018: ND (< 6.2 µg/m³)
5/30/2018: ND (< 6.4 µg/m³)
8/22/2018: ND (< 6.9 µg/m³)

CAPITOL ST

STARK RD

SVMP-34 (4.0 FT)

SVMP-27 (4.5 FT)
11/21/2017: ND (< 5.9 µg/m³)
2/21/2018: ND (< 6.0 µg/m³)
5/29/2018: ND (< 6.7 µg/m³)
8/23/2018: ND (< 6.7 µg/m³)

SVMP-32 (6.0 FT)

SVMP-32 (3.0 FT)

SVMP-33 (4.0 FT)

SVMP-13 (2.0 FT)
11/21/2017: ND (< 6.2 µg/m³)
8/24/2018: ND (< 6.5 µg/m³)

SVMP-14 (2.0 FT)
11/21/2017: ND (< 5.6 µg/m³)
8/24/2018: ND (< 6.4 µg/m³)

SVMP-37 (2.5 FT)

SVMP-17 (2.0 FT)
5/30/2018: ND (< 6.4 µg/m³)
8/24/2018: ND (< 6.6 µg/m³)

BEACON ST

SVMP-16 (2.0 FT)
11/20/2017: ND (< 5.9 µg/m³)
8/24/2018: ND (< 6.8 µg/m³)

SVMP-08 (3.5 FT)
11/20/2017: ND (< 6.2 µg/m³)
2/20/2018: ND (< 6.3 µg/m³)
5/29/2018: 11 µg/m³
8/23/2018: ND (< 6.5 µg/m³)

SVMP-09 (4.0 FT)
11/20/2017: ND (< 6.1 µg/m³)
2/20/2018: ND (< 6.5 µg/m³)
5/30/2018: ND (< 6.1 µg/m³)
8/23/2018: ND (< 6.6 µg/m³)

SVMP-10 (3.0 FT)
11/21/2017: ND (< 5.9 µg/m³)
2/20/2018: ND (< 6.4 µg/m³)
8/23/2018: ND (< 6.6 µg/m³)

SVMP-15 (2.0 FT)
11/20/2017: ND (< 6.0 µg/m³)
8/24/2018: ND (< 6.5 µg/m³)

BELDEN CT

SVMP-06 (4.5 FT)
11/20/2017: ND (< 6.1 µg/m³)
2/21/2018: ND (< 6.2 µg/m³)
5/30/2018: ND (< 6.4 µg/m³)
8/23/2018: ND (< 6.2 µg/m³)

SVMP-05 (4.5 FT)
11/20/2017: ND (< 6.2 µg/m³)
2/21/2018: ND (< 5.7 µg/m³)
5/30/2018: ND (< 6.3 µg/m³)
8/23/2018: ND (< 6.2 µg/m³)

SVMP-04 (3.5 FT)
11/20/2017: ND (< 6.7 µg/m³)
2/21/2018: ND (< 6.4 µg/m³)
5/30/2018: ND (< 6.5 µg/m³)
8/23/2018: ND (< 6.6 µg/m³)

SVMP-28 (3.0 FT)
11/21/2017: ND (< 6.3 µg/m³)
2/21/2018: ND (< 5.8 µg/m³)
5/29/2018: ND (< 7.1 µg/m³)
8/23/2018: ND (< 6.3 µg/m³)

SVMP-07 (3.5 FT)
11/20/2017: ND (< 6.4 µg/m³)
2/19/2018: ND (< 6.1 µg/m³)
5/30/2018: ND (< 6.7 µg/m³)
8/23/2018: ND (< 6.4 µg/m³)

SVMP-31 (5.5 FT)

SVMP-30 (4.0 FT)

WADSWORTH ST

SVMP-35 (4.0 FT)

SVMP-02 (4.5 FT)
11/17/2017: ND (< 6.2 µg/m³)
2/19/2018: ND (< 11 µg/m³)
5/29/2018: ND (< 6.7 µg/m³)
8/22/2018: ND (< 6.8 µg/m³)

SVMP-29 (7.5 FT)

SVMP-29 (3.5 FT)

SVMP-03 (7.0 FT)
11/17/2017: ND (< 5.8 µg/m³)
2/19/2018: ND (< 6.3 µg/m³)
5/29/2018: ND (< 6.7 µg/m³)
8/22/2018: ND (< 6.2 µg/m³)

SVMP-01 (7.0 FT)
11/17/2017: ND (< 6.5 µg/m³)
2/19/2018: ND (< 6.0 µg/m³)
5/29/2018: ND (< 6.9 µg/m³)
8/22/2018: ND (< 6.4 µg/m³)

SVMP-03 (3.5 FT)
11/17/2017: ND (< 5.5 µg/m³)
2/19/2018: ND (< 5.8 µg/m³)
5/29/2018: ND (< 7.4 µg/m³)
8/22/2018: ND (< 6.2 µg/m³)

PRISCILLA LN

SVMP-01 (3.5 FT)
11/17/2017: ND (< 5.6 µg/m³)
2/19/2018: ND (< 6.2 µg/m³)
5/29/2018: ND (< 6.6 µg/m³)
8/22/2018: ND (< 6.6 µg/m³)

SVMP-02 (8.5 FT)
11/17/2017: ND (< 6.3 µg/m³)
2/19/2018: ND (< 11 µg/m³)
5/29/2018: ND (< 6.9 µg/m³)
8/22/2018: ND (< 6.6 µg/m³)

PLYMOUTH RD

WAYNE RD

LAUREL ST

LEGEND

- PROPERTY BOUNDARIES
- FORD PROPERTY BOUNDARY
- OFF-SITE SVMP TRICHLOROETHENE < 67 µg/m³

NOTES:
FIGURE ONLY SHOWS THE FOUR MOST RECENT QUARTERS OF DATA (NOVEMBER 2017, FEBRUARY 2018, MAY 2018, AND AUGUST 2018). FULL SET OF DATA CAN BE FOUND IN THE CORRESPONDING TABLES.

µg/m³ - MICROGRAMS PER CUBIC METER

THE MDEQ PROVIDED RESIDENTIAL VOLATILIZATION TO INDOOR AIR SOIL VAPOR SCREENING LEVEL FOR TRICHLOROETHENE IS 67 µg/m.[3]

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

FT = FEET BELOW GROUND SURFACE

"ND", "<" = NON-DETECT INDICATES VALUE IS BELOW THE LABORATORY REPORTING LIMIT, RANGING FROM 5.5 TO 11 µg/m³, FOR TRICHLOROETHENE.

SVMP = SOIL VAPOR MONITORING POINT

SVMP-29 THROUGH 37 WERE NOT SAMPLED DURING THE NOVEMBER 2017, FEBRUARY 2018, MAY 2018, OR AUGUST 2018 SAMPLING EVENTS.

SVMP-17 AND SVMP-20 WERE NOT SAMPLED DURING THE NOVEMBER 2017 EVENT DUE TO SATURATED SCREENS.

SVMP-13 THROUGH SVMP-17, SVMP-20, AND SVMP-21 WERE NOT SAMPLED DURING THE FEBRUARY 2018 EVENT DUE TO SATURATED SCREENS.

SVMP-10, SVMP-13 THROUGH SVMP-16, SVMP-19, SVMP-22, AND SVMP-23 WERE NOT SAMPLED DURING THE MAY 2018 SAMPLING EVENT DUE TO SATURATED SCREENS. SVMP-20 WAS NOT SAMPLED DURING THE MAY 2018 SAMPLING EVENT DUE TO A BLOCKAGE IN THE TUBING.

SVMP-11, WHICH RESIDED IN THE CITY OF LIVONIA RIGHT-OF-WAY, WAS REMOVED PER THE ADJACENT PROPERTY OWNERS REQUEST.

0 300 600
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

OFF-SITE VAPOR INTRUSION ASSESSMENT TRICHLOROETHENE IN SOIL VAPOR

ARCADIS Design & Consultancy for natural and built assets

FIGURE
14

CITY: NOVI DIV./ ENV DB: MG PIC: R. ELLIS PM: K. HINSKEY TM: A. DEGRANDIS TR: M.WACKSMAN PROJECT NUMBER: MI001454.0004.00003 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MI\Ford\Livonia\GIS\docs\GEC\Progress Report_Quarter 3_2018\2018-10-01\Figure 14_Off-Site SVMP TCE.mxd PLOTTED: 10/15/2018 6:01:14 PM BY: MAI00749

This document is a DRAFT document that has not received approval from the MDEQ. This document was prepared pursuant to a court Consent Decree. The opinions, findings, and conclusions expressed are those of the authors and not those of the MDEQ.

SVMP-25 (3.0 FT)
11/21/2017: ND (< 2.9 µg/m^3)
2/21/2018: ND (< 2.9 µg/m^3)
5/29/2018: ND (< 3.2 µg/m^3)
8/23/2018: ND (< 3.2 µg/m^3)

SVMP-25 (6.0 FT)
11/21/2017: ND (< 3.0 µg/m^3)
2/21/2018: ND (< 2.9 µg/m^3)
5/29/2018: ND (< 3.3 µg/m^3)
8/23/2018: ND (< 3.0 µg/m^3)

SVMP-22 (3.0 FT)
11/17/2017: ND (< 3.2 µg/m^3)
2/20/2018: ND (< 3.0 µg/m^3)
8/21/2018: ND (< 3.0 µg/m^3)

SVMP-23 (3.0 FT)
11/17/2017: ND (< 2.8 µg/m^3)
2/20/2018: ND (< 2.7 µg/m^3)
8/22/2018: ND (< 3.0 µg/m^3)

SVMP-24 (4.0 FT)
11/17/2017: ND (< 2.8 µg/m^3)
2/21/2018: ND (< 3.0 µg/m^3)
5/30/2018: ND (< 3.0 µg/m^3)
8/22/2018: ND (< 3.0 µg/m^3)

ROSATI AVE

CONCORD ST

SVMP-26 (4.0 FT)
11/21/2017: ND (< 2.9 µg/m^3)
2/21/2018: ND (< 2.8 µg/m^3)
5/29/2018: ND (< 3.2 µg/m^3)
8/23/2018: ND (< 3.0 µg/m^3)

SVMP-19 (3.0 FT)
11/17/2017: ND (< 2.8 µg/m^3)
2/20/2018: ND (< 2.7 µg/m^3)
8/22/2018: ND (< 2.9 µg/m^3)

SVMP-36 (4.0 FT)

SVMP-18 (3.0 FT)
11/17/2017: ND (< 2.8 µg/m^3)
2/20/2018: ND (< 2.9 µg/m^3)
5/30/2018: ND (< 3.0 µg/m^3)
8/22/2018: ND (< 3.3 µg/m^3)

SVMP-11 (3.5 FT)

SVMP-12 (3.5 FT)
11/21/2017: ND (< 3.0 µg/m^3)
2/20/2018: ND (< 3.0 µg/m^3)
5/29/2018: ND (< 3.1 µg/m^3)
8/23/2018: ND (< 3.0 µg/m^3)

SVMP-20 (3.0 FT)
8/22/2018: ND (< 3.0 µg/m^3)

CAPITOL ST

SVMP-21 (2.0 FT)
11/20/2017: ND (< 3.0 µg/m^3)
5/30/2018: ND (< 3.1 µg/m^3)
8/24/2018: ND (< 3.1 µg/m^3)

SVMP-34 (4.0 FT)

SVMP-27 (4.5 FT)
11/21/2017: ND (< 2.8 µg/m^3)
2/21/2018: ND (< 2.9 µg/m^3)
5/29/2018: ND (< 3.2 µg/m^3)
8/23/2018: ND (< 3.2 µg/m^3)

STARK RD

SVMP-32 (6.0 FT)

SVMP-33 (4.0 FT)

SVMP-13 (2.0 FT)
11/21/2017: ND (< 2.9 µg/m^3)
8/24/2018: ND (< 3.1 µg/m^3)

SVMP-14 (2.0 FT)
11/21/2017: ND (< 2.6 µg/m^3)
8/24/2018: ND (< 3.0 µg/m^3)

SVMP-37 (2.5 FT)

SVMP-32 (3.0 FT)

SVMP-17 (2.0 FT)
5/30/2018: ND (< 3.1 µg/m^3)
8/24/2018: ND (< 3.2 µg/m^3)

BEACON ST

SVMP-08 (3.5 FT)
11/20/2017: ND (< 3.0 µg/m^3)
2/20/2018: ND (< 3.0 µg/m^3)
5/29/2018: ND (< 3.2 µg/m^3)
8/23/2018: ND (< 3.1 µg/m^3)

SVMP-09 (4.0 FT)
11/20/2017: ND (< 2.9 µg/m^3)
2/20/2018: ND (< 3.1 µg/m^3)
5/30/2018: ND (< 2.9 µg/m^3)
8/23/2018: ND (< 3.2 µg/m^3)

SVMP-10 (3.0 FT)
11/21/2017: ND (< 2.8 µg/m^3)
2/20/2018: ND (< 3.0 µg/m^3)
8/23/2018: ND (< 3.2 µg/m^3)

SVMP-16 (2.0 FT)
11/20/2017: ND (< 2.8 µg/m^3)
8/24/2018: ND (< 3.2 µg/m^3)

SVMP-15 (2.0 FT)
11/20/2017: ND (< 2.9 µg/m^3)
8/24/2018: ND (< 3.1 µg/m^3)

SVMP-07 (3.5 FT)
11/20/2017: ND (< 3.0 µg/m^3)
2/19/2018: ND (< 2.9 µg/m^3)
5/30/2018: ND (< 3.2 µg/m^3)
8/23/2018: ND (< 3.0 µg/m^3)

SVMP-05 (4.5 FT)
11/20/2017: ND (< 2.9 µg/m^3)
2/21/2018: ND (< 2.7 µg/m^3)
5/30/2018: ND (< 3.0 µg/m^3)
8/23/2018: ND (< 3.0 µg/m^3)

SVMP-04 (3.5 FT)
11/20/2017: ND (< 3.2 µg/m^3)
2/21/2018: ND (< 3.0 µg/m^3)
5/30/2018: ND (< 3.1 µg/m^3)
8/23/2018: ND (< 3.2 µg/m^3)

BELDEN CT

SVMP-28 (3.0 FT)
11/21/2017: ND (< 3.0 µg/m^3)
2/21/2018: ND (< 2.8 µg/m^3)
5/29/2018: ND (< 3.4 µg/m^3)
8/23/2018: ND (< 3.0 µg/m^3)

WADSWORTH ST

SVMP-35 (4.0 FT)

SVMP-31 (5.5 FT)

SVMP-06 (4.5 FT)
11/20/2017: ND (< 2.9 µg/m^3)
2/21/2018: ND (< 3.0 µg/m^3)
5/30/2018: ND (< 3.0 µg/m^3)
8/23/2018: ND (< 2.9 µg/m^3)

SVMP-30 (4.0 FT)

BOSTON POST ST

SVMP-29 (7.5 FT)

SVMP-29 (3.5 FT)

SVMP-02 (4.5 FT)
11/17/2017: ND (< 2.9 µg/m^3)
2/19/2018: ND (< 5.3 µg/m^3)
5/29/2018: ND (< 3.2 µg/m^3)
8/22/2018: ND (< 3.2 µg/m^3)

SVMP-03 (3.5 FT)
11/17/2017: ND (< 2.6 µg/m^3)
2/19/2018: ND (< 2.8 µg/m^3)
5/29/2018: ND (< 3.5 µg/m^3)
8/22/2018: ND (< 3.0 µg/m^3)

PRISCILLA LN

SVMP-01 (7.0 FT)
11/17/2017: ND (< 3.1 µg/m^3)
2/19/2018: ND (< 2.9 µg/m^3)
5/29/2018: ND (< 3.3 µg/m^3)
8/22/2018: ND (< 3.0 µg/m^3)

SVMP-02 (8.5 FT)
11/17/2017: ND (< 3.0 µg/m^3)
2/19/2018: ND (< 5.3 µg/m^3)
5/29/2018: ND (< 3.3 µg/m^3)
8/22/2018: ND (< 3.2 µg/m^3)

SVMP-03 (7.0 FT)
11/17/2017: ND (< 2.8 µg/m^3)
2/19/2018: ND (< 3.0 µg/m^3)
5/29/2018: ND (< 3.2 µg/m^3)
8/22/2018: ND (< 3.0 µg/m^3)

SVMP-01 (3.5 FT)
11/17/2017: ND (< 2.7 µg/m^3)
2/19/2018: ND (< 2.9 µg/m^3)
5/29/2018: ND (< 3.1 µg/m^3)
8/22/2018: ND (< 3.1 µg/m^3)

PLYMOUTH RD

WAYNE RD

LAUREL ST

LEGEND

- PROPERTY BOUNDARIES
- FORD PROPERTY BOUNDARY
- OFF-SITE SVMP VINYL CHLORIDE < 54 µg/m^3

NOTES:
FIGURE ONLY SHOWS THE FOUR MOST RECENT QUARTERS OF DATA (NOVEMBER 2017, FEBRUARY 2018, MAY 2018, AND AUGUST 2018). FULL SET OF DATA CAN BE FOUND IN THE CORRESPONDING TABLES.

µg/m^3 - MICROGRAMS PER CUBIC METER

THE MDEQ PROVIDED RESIDENTIAL VOLATILIZATION TO INDOOR AIR SOIL VAPOR SCREENING LEVEL FOR VINYL CHLORIDE IS 54 µg/m.^{3}

MDEQ = MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY

FT = FEET BELOW GROUND SURFACE

"ND", "<" = NON-DETECT INDICATES VALUE IS BELOW THE LABORATORY REPORTING LIMIT, RANGING FROM 2.6 TO 5.3 µg/m^3, FOR VINYL CHLORIDE.

SVMP = SOIL VAPOR MONITORING POINT

SVMP-29 THROUGH 37 WERE NOT SAMPLED DURING THE NOVEMBER 2017, FEBRUARY 2018, MAY 2018, OR AUGUST 2018 SAMPLING EVENTS.

SVMP-17 AND SVMP-20 WERE NOT SAMPLED DURING THE NOVEMBER 2017 EVENT DUE TO SATURATED SCREENS.

SVMP-13 THROUGH SVMP-17, SVMP-20, AND SVMP-21 WERE NOT SAMPLED DURING THE FEBRUARY 2018 EVENT DUE TO SATURATED SCREENS.

SVMP-10, SVMP-13 THROUGH SVMP-16, SVMP-19, SVMP-22, AND SVMP-23 WERE NOT SAMPLED DURING THE MAY 2018 SAMPLING EVENT DUE TO SATURATED SCREENS. SVMP-20 WAS NOT SAMPLED DURING THE MAY 2018 SAMPLING EVENT DUE TO A BLOCKAGE IN THE TUBING.

SVMP-11, WHICH RESIDED IN THE CITY OF LIVONIA RIGHT-OF-WAY, WAS REMOVED PER THE ADJACENT PROPERTY OWNERS REQUEST.

0 300 600
SCALE IN FEET

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

OFF-SITE VAPOR INTRUSION ASSESSMENT
VINYL CHLORIDE IN SOIL VAPOR

ARCADIS Design & Consultancy for natural and built assets

FIGURE
15

CITY: NOVI DIV: ENV DB: MG PIC: R. ELLIS PM: K. HINSKEY TM: A. DEGRANDIS TR: M.WACKSMAN PROJECT NUMBER: MI001454.0004.00003 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
Z:\GISProjects_ENV\NoviBrighton_MIFordLivonia\GIS\docs\GEC\Progress Report_Quarter 3_2018\2018-10-01\Figure 15_Off-Site SVMP VC.mxd PLOTTED: 10/15/2018 6:02:55 PM BY: MA100749

APPENDIX A

On-Site Groundwater Field Sampling Logs

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8/6/18

Site/Well No.: MW-48 | Replicate No.: — | Code No.:

Weather: CLOUDY, 70s | Sampling Time: Begin 1610 End 1615

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.94
Depth to Water (ft bmp)	9.22
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.72
Casing Diameter/Type	2" PVC
Gallons in Well	1.7152
Gallons Pumped/Bailed Prior to Sampling	~2.5
Sample Pump Intake Setting (ft bmp)	17.94
Purge Time	begin 1535 end 1610
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.89
SpC (mS/cm)	4.192
CND (mS/cm)	3.709
Dissolved Oxygen (%)	3.6
Dissolved Oxygen (mg/L)	0.33
pH (s.u.)	7.08
ORP (mV)	-38.6
Turbidity (NTU)	1.63
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: NCAMATH

Well Casing Volumes

Gal./Ft.				
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-48 PROJ #: MI001454.0004.00001

DATE : 6th Aug '18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1540	20.22	2.787	2.533	17.3	1.53	7.42	28.8	200	3.09	9.58
1545	20.17	2.849	2.588	8.7	0.78	7.25	15.3	↑	3.29	9.57
1550	19.60	3.249	2.918	4.3	0.39	7.12	-19.6	|	2.69	9.58
1555	19.36	3.462	3.116	3.9	0.36	7.10	-27.3	|	2.69	9.58
1600	19.30	3.704	3.309	3.8	0.34	7.09	-31.8	|	2.10	9.57
1605	18.89	4.192	3.709	3.6	0.33	7.08	-38.6	↓	1.63	9.58
1610	COLLECT SAMPLE									

Total Depth of Well:	19.94
Depth To Water Before Purging:	9.22
Depth To Water After Purging:	9.58

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 6th Aug '18

Site/Well No.: MW-63 | Replicate No.: - | Code No.: -

Weather: SUNNY, 70s | Sampling Time: Begin 1340 End 1345

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	11.80
Depth to Water (ft bmp)	7.57
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	4.23
Casing Diameter/Type	2" PVC
Gallons in Well	0.6768
Gallons Pumped/Bailed Prior to Sampling	~2.5
Sample Pump Intake Setting (ft bmp)	9.80
Purge Time	begin 1255 end 1340
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	21.04
SpC (mS/cm)	1.982
CND (mS/cm)	1.833
Dissolved Oxygen (%)	5.0
Dissolved Oxygen (mg/L)	0.44
pH (s.u.)	7.27
ORP (mV)	39.4
Turbidity (NTU)	1.31
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: DCAMATH

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-63 PROJ #: MI001454.0004.00001

DATE : 6th Aug '18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1300	21.13	1.888	1.748	25.0	2.19	7.63	61.9	200	6.38	7.68
1305	21.61	1.835	1.715	8.6	0.74	7.36	65.0	"	5.15	7.68
1310	21.40	1.849	1.722	6.9	0.61	7.34	65.3	"	3.83	7.68
1320	21.00	1.899	1.754	5.1	0.45	7.28	65.2	"	2.25	"
1325	20.81	1.943	1.788	5.7	0.51	7.28	56.7	"	1.90	"
1330	21.02	1.978	1.828	5.1	0.45	7.27	43.5	"	1.08	"
1335	21.04	1.982	1.833	5.0	0.44	7.27	39.4	↓	1.31	"
1340	COLLECT SAMPLE									

Total Depth of Well:	11.80
Depth To Water Before Purging:	7.57
Depth To Water After Purging:	7.68

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 6th Aug '18

Site/Well No.: MW-57 | Replicate No.: — | Code No.: —

Weather: SUNNY, 70s | Sampling Time: Begin 1505 End 1510

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	21.73
Depth to Water (ft bmp)	~~8.07~~ 7.98
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	13.75
Casing Diameter/Type	2" PVC
Gallons in Well	2.2
Gallons Pumped/Bailed Prior to Sampling	~2.5
Sample Pump Intake Setting (ft bmp)	19.73
Purge Time	begin 1425 end 1505
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.98
SpC (mS/cm)	4.159
CND (mS/cm)	3.602
Dissolved Oxygen (%)	3.7
Dissolved Oxygen (mg/L)	0.35
pH (s.u.)	7.13
ORP (mV)	-35.2
Turbidity (NTU)	5.07
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: DKAMATH

Well Casing Volumes

Gal./Ft.				
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-57 PROJ #: MI001454.0004.00001

DATE : 6th Aug '18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1435	19.32	3.962	3.533	9.9	0.91	7.40	-25.8	200	4.43	8.07
1440	19.07	3.965	3.515	8.0	0.72	7.35	-26.3	"	4.25	"
1445	18.73	3.965	3.490	5.7	0.53	7.29	-26.0	"	4.73	"
1450	18.59	4.008	3.516	4.3	0.40	7.21	-29.3	"	4.85	"
1455	18.28	4.109	3.580	3.9	0.37	7.16	-31.7	"	3.45	"
1500	17.98	4.159	3.602	3.7	0.35	7.13	-35.2	↓	5.07	"
1505	COLLECT SAMPLE									

Total Depth of Well:	21.73	
Depth To Water Before Purging:	7.98	
Depth To Water After Purging:	7.98	

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 6th Aug '18

Site/Well No.: MW-50 | Replicate No.: - | Code No.: -

Weather: HUMID, 70s | Sampling Time: Begin 1200 End 1205

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.00
Depth to Water (ft bmp)	7.55
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.45
Casing Diameter/Type	2" PVC
Gallons in Well	1.832
Gallons Pumped/Bailed Prior to Sampling	~2.5
Sample Pump Intake Setting (ft bmp)	17.00
Purge Time	begin 1125 end 1200
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.26
SpC (mS/cm)	2.299
CND (mS/cm)	1.960
Dissolved Oxygen (%)	8.0
Dissolved Oxygen (mg/L)	0.76
pH (s.u.)	6.70
ORP (mV)	-2.2
Turbidity (NTU)	1.51
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: KAMATH

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-50 PROJ #: MI001454.0004.00001

DATE : 6th Aug '18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1130	17.48	1.229	1.056	22.6	2.14	7.36	-26.6	200	12.0	7.78
1135	17.25	1.604	1.370	11.6	1.10	6.92	-10.5	↓	7.08	7.78
1140	17.21	1.728	1.475	10.4	0.99	6.85	-7.9	↓	6.95	7.78
1145	17.26	1.974	1.685	8.3	0.79	6.75	-4.7	↓	4.37	7.78
1150	17.32	2.212	1.889	8.2	0.78	6.70	-3.3	↓	2.17	7.78
1155	17.26	2.299	1.960	8.0	0.76	6.70	-2.2	↓	1.51	7.78
1200	COLLECT SAMPLE									

Total Depth of Well:	19.00
Depth To Water Before Purging:	7.55
Depth To Water After Purging:	7.78

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 6th Aug '18

Site/Well No.: MW-62 | Replicate No.: - | Code No.: -

Weather: HUMID & CLOUDY, 70s | Sampling Time: Begin 1100 End 1105

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	21.15
Depth to Water (ft bmp)	8.73
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	12.42
Casing Diameter/Type	2" PVC
Gallons in Well	1.9872
Gallons Pumped/Bailed Prior to Sampling	~2.5
Sample Pump Intake Setting (ft bmp)	19.15
Purge Time	begin 1025 end 1100
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.95
SpC (mS/cm)	5.005
CND (mS/cm)	4.523
Dissolved Oxygen (%)	6.3
Dissolved Oxygen (mg/L)	0.56
pH (s.u.)	6.88
ORP (mV)	-65.5
Turbidity (NTU)	9.25
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: DKAMATH

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-62 PROJ #: MI001454.0004.00001

DATE : 6th Aug '18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1030	20.14	4.909	4.454	16.3	1.45	6.94	-72.2	200	18.4	8.82
1035	19.63	4.975	4.465	7.9	0.72	6.88	-70.7	|	12.8	8.83
1040	19.49	4.996	4.469	6.1	0.55	6.87	-67.3	|	9.20	8.82
1045	19.38	5.015	4.477	6.6	0.60	6.86	-65.5	|	6.46	8.84
1050	19.51	5.005	4.482	6.8	0.61	6.87	-66.2	|	6.76	8.83
1055	19.95	5.005	4.523	6.3	0.56	6.88	-65.5	↓	9.25	8.83
1100	COLLECT	SAMPLE								

Total Depth of Well:	21.15
Depth To Water Before Purging:	8.73
Depth To Water After Purging:	8.83

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 6th Aug '18

Site/Well No.: PW-16-01 | Replicate No.: – | Code No.: –

Weather: CLOUDY, 70s | Sampling Time: Begin 0920 | End 0925

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	21.44
Depth to Water (ft bmp)	7.24
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	14.20
Casing Diameter/Type	2" PVC
Gallons in Well	2.272
Gallons Pumped/Bailed Prior to Sampling	~2.5
Sample Pump Intake Setting (ft bmp)	18.44
Purge Time	begin 0845 end 0920
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.45
SpC (mS/cm)	4.898
CND (mS/cm)	4.287
Dissolved Oxygen (%)	5.5
Dissolved Oxygen (mg/L)	0.51
pH (s.u.)	6.96
ORP (mV)	-93.6
Turbidity (NTU)	6.39
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: DKAMATH

Well Casing Volumes

Gal./Ft.				
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : PW-16-01 PROJ #: MI001454.0004.00001

DATE : 6th Aug'18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm (4.910)	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
0850	18.17	~~4.274~~	4.252	16.8	1.56	6.64	-63.0	200	16.4	-
~~0855~~	~~18.39~~	~~4.910~~								
0855	18.39	4.911	4.289	7.3	0.67	6.75	-77.5	↓	14.8	
0900	18.37	4.909	4.288	6.4	0.59	6.79	-81.8		16.3	
0905	18.30	4.906	4.278	6.1	0.56	6.86	-87.5		11.4	
0910	18.27	4.906	4.274	6.0	0.56	6.89	-88.8		9.9	
0915	18.46	4.902	4.291	5.4	0.50	6.92	-91.5		7.47	
0920	18.45	4.898	4.287	5.5	0.51	6.96	-93.6		6.39	
0925	COLLECT SAMPLE									

Total Depth of Well:	21.44
Depth To Water Before Purging:	7.24
Depth To Water After Purging:	7.25

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 7th Aug '18

Site/Well No.: MW-4 | Replicate No.: — | Code No.: —

Weather: HUMID, 80s | Sampling Time: Begin 0955 End 1000

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.12
Depth to Water (ft bmp)	7.74
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	12.38
Casing Diameter/Type	2" PVC
Gallons in Well	1.9808
Gallons Pumped/Bailed Prior to Sampling	~2.0
Sample Pump Intake Setting (ft bmp)	18.12
Purge Time	begin 0920 end 0955
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	20.16
SpC (mS/cm)	10.61
CND (mS/cm)	9.628
Dissolved Oxygen (%)	6.6
Dissolved Oxygen (mg/L)	0.58
pH (s.u.)	7.25
ORP (mV)	-82.2
Turbidity (NTU)	0.85
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: DKAMATH

Well Casing Volumes

0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

	ow measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	es Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft		msl	Mean sea level	s.u.	Standard units
	ar minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
	er liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-4 PROJ #: MI001454.0004.00001

DATE : 7th Aug '18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
0925	20.15	11.26	10.21	22.6	1.96	7.73	-92.4	200	1.17	7.81
0930	20.15	11.19	10.15	12.4	1.08	7.49	-87.9	↓	1.11	7.82
0935	20.15	11.02	9.990	9.2	0.80	7.41	-85.5	↓	1.13	7.81
0940	20.15	10.82	9.817	7.7	0.67	7.34	-85.4	↓	2.11	7.81
0945	20.16	10.68	9.694	7.1	0.62	7.28	-82.6	↓	1.05	7.81
0950	20.16	10.61	9.628	6.6	0.58	7.25	-82.2	↓	0.85	7.81
0955	COLLECT SAMPLE									

Depth of Well: 20.12

Water Before Purging: 7.74

Dep Water After Purging: 7.81

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 7th Aug '18

Site/Well No.: MW-3 | Replicate No.: — | Code No.: —

Weather: HUMID & CLOUDY; 70s | Sampling Time: Begin _____ End _____

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	18.74
Depth to Water (ft bmp)	7.48
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.26
Casing Diameter/Type	2" PVC
Gallons in Well	1.8016
Gallons Pumped/Bailed Prior to Sampling	~2
Sample Pump Intake Setting (ft bmp)	16.74
Purge Time	begin 1100 end _____
Pumping Rate (ml/min)	_____
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	20.20
SpC (mS/cm)	14.37
CND (mS/cm)	13.05
Dissolved Oxygen (%)	3.6
Dissolved Oxygen (mg/L)	0.31
pH (s.u.)	7.49
ORP (mV)	-85.1
Turbidity (NTU)	0.66
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	_____

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: NCAMATH

Well Casing Volumes

Gal./Ft.				
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-3 PROJ #: MI001454.0004.00001

DATE : LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1105	19.53	14.21	12.73	13.2	1.14	7.41	-77.2	150	1.53	7.63
1110	19.53	14.22	12.73	10.0	0.86	7.39	-76.7		0.86	7.63
1115	19.53	14.22	12.74	6.0	0.52	7.36	-73.3		0.73	
1120	19.54	14.23	12.75	4.6	0.41	7.35	-76.7		0.60	
1125	19.54	14.24	12.76	4.2	0.37	7.34	-73.2		0.63	
1130	19.54	14.26	12.77	4.2	0.37	7.33	-70.0		0.66	
1135	20.20	14.37	13.05	3.6	0.31	7.49	-85.1	↓	~~0.72~~ NC	V
1140	COLLECT SAMPLE									
Total Depth of Well:		18.74								
Depth To Water Before Purging:			7.48							
Depth To Water After Purging:			7.63							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 7th Aug '18

Site/Well No.: MW-5 | Replicate No.: — | Code No.: —

Weather: CLOUDY & HUMID, 60s | Sampling Time: Begin 1255 End 1300

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.63
Depth to Water (ft bmp)	~~8.34~~ 7.34
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.29
Casing Diameter/Type	2" PVC
Gallons in Well	
Gallons Pumped/Bailed Prior to Sampling	~~17.6~~ N2
Sample Pump Intake Setting (ft bmp)	17.63
Purge Time	begin 1215 end 1255
Pumping Rate (ml/min)	150
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	20.12
SpC (mS/cm)	14.35
CND (mS/cm)	13.01
Dissolved Oxygen (%)	7.1
Dissolved Oxygen (mg/L)	0.62
pH (s.u.)	7.47
ORP (mV)	-89.5
Turbidity (NTU)	0.72
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	SOME BLACK SUSPENDED PARTICLES DURING INITIAL PURGING

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: DKAMATH

Well Casing Volumes

Gal./Ft.				
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-5 PROJ #: MI001454.0004.00001

DATE : 9th Aug 18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW DM
1220	20.03	14.28	12.93	23.8	2.06	7.62	-68.1	150	1.07	~~8.77~~ 7.77
1225	20.15	14.34	13.01	10.6	0.91	7.55	-84.2		1.01	8.78 7.78
1230	20.19	14.38	13.06	5.3	0.46	7.51	-86.7		0.79	~~8.77~~ 7.77
1235	20.19	14.38	13.06	4.4	0.38	7.50	-89.1		0.82	~~8.78~~ 7.78
~~1240~~	~~19.91~~	~~7.630~~	~~6.847~~	~~75.0~~						
1245	20.07	14.40	13.04	13.0	1.12	7.47	-90.7		0.82	7.77
1250	20.12	14.35	13.01	7.1	0.62	7.47	-89.5		0.72	
1255	COLLECT SAMPLE									

Total Depth of Well:	19.63
Depth To Water Before Purging:	7.34
Depth To Water After Purging:	7.77

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 7th Aug '18

Site/Well No.: MW-18 | Replicate No.: — | Code No.: —

Weather: SUNNY, 70s | Sampling Time: Begin 1550 End 1600

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	18.01
Depth to Water (ft bmp)	Transducer Data
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	-
Casing Diameter/Type	2" PVC
Gallons in Well	-
Gallons Pumped/Bailed Prior to Sampling	-
Sample Pump Intake Setting (ft bmp)	16.01
Purge Time	begin 1515 end 1550
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	20.68
SpC (mS/cm)	2.108
CND (mS/cm)	1.934
Dissolved Oxygen (%)	3.0
Dissolved Oxygen (mg/L)	0.26
pH (s.u.)	6.78
ORP (mV)	-38.2
Turbidity (NTU)	8.17
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	Transducer wasn't moved during sampling

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: SKAMATH

Well Casing Volumes

Gal./Ft.				
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-18 PROJ #: MI001454.0004.00001

DATE : 7th Aug '18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1520	22.29	2.126	2.016	10.5	0.90	7.00	-16.2	200	18.7	Transducer Data
1525	21.86	2.125	1.997	5.2	0.45	6.88	-21.0	↓	13.5	↑
1530	21.92	2.124	1.999	3.4	0.30	6.83	-25.5	↓	13.2	↑
1535	21.80	2.123	1.994	3.1	0.27	6.82	-32.9	↓	7.76	↑
1540	21.39	2.120	1.973	3.2	0.28	6.81	-38.0	↓	8.17	↑
1545	20.68	2.108	1.934	3.0	0.26	6.78	-38.2	↓	8.17	↓
1550	COLLECT	SAMPLE								

Total Depth of Well:	~~Transducer~~
Depth To Water Before Purging:	Transducer
Depth To Water After Purging:	Transducer

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 9th Aug '18

Site/Well No.: MW-33 | Replicate No.: — | Code No.: —

Weather: SUNNY, 70s | Sampling Time: Begin 1430 End 1435

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	18.66
Depth to Water (ft bmp)	7.62
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.04
Casing Diameter/Type	2" PVC
Gallons in Well	1.7664
Gallons Pumped/Bailed Prior to Sampling	~2
Sample Pump Intake Setting (ft bmp)	16.66
Purge Time	begin 1350 end 1430
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.15
SpC (mS/cm)	3.554
CND (mS/cm)	3.155
Dissolved Oxygen (%)	4.4
Dissolved Oxygen (mg/L)	0.40
pH (s.u.)	6.65
ORP (mV)	-58.2
Turbidity (NTU)	6.01
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: NLAMATH

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-33 PROJ #: MI001454.0004.00001

DATE : 9th Aug '18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
~~1310~~	~~15.75~~	~~4.162~~	~~3.428~~	~~12.2~~	~~1.19~~	~~7.01~~	~~-75.9~~		~~22.9~~	
1355	19.40	3.122	2.791	17.2	1.56	7.06	-81.5	200	24.1	7.71
1400	20.88	3.449	3.180	8.5	0.75	6.81	-70.8	"	16.4	7.69
1410	20.13	3.451	3.128	7.4	0.67	6.78	-65.8	"	11.8	7.70
1415	19.20	3.505	3.117	4.7	0.42	6.73	-64.2	"	7.91	7.70
1420	19.12	3.502	3.110	4.5	0.41	6.71	-61.8	"	8.32	7.70
1425	19.15	3.554	3.155	4.4	0.40	6.65	-58.2	↓	6.01	7.70
1430	COLLECT SAMPLE									

Total Depth of Well:	18.66
Depth To Water Before Purging:	7.62
Depth To Water After Purging:	7.70

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 9th Aug '18

Site/Well No.: MW-26 | Replicate No.: — | Code No.: —

Weather: SUNNY, 60s | Sampling Time: Begin 1115 End 1120

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	13.90
Depth to Water (ft bmp)	5.98
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	7.92
Casing Diameter/Type	2" PVC
Gallons in Well	1.2672
Gallons Pumped/Bailed Prior to Sampling	~2 1.5
Sample Pump Intake Setting (ft bmp)	11.90
Purge Time	begin 1040 end 1115
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.43
SpC (mS/cm)	3.397
CND (mS/cm)	2.841
Dissolved Oxygen (%)	4.1
Dissolved Oxygen (mg/L)	0.40
pH (s.u.)	6.54
ORP (mV)	55.5
Turbidity (NTU)	1.96
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: NCAMATH

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-26 PROJ #: MI001454.0004.00001

DATE : 9th Aug'18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1045	16.82	3.612	3.046	21.3	2.03	7.16	48.5	200	9.68	6.00
1050	16.74	3.594	3.026	11.4	1.09	6.93	55.2	|	11.1	6.01
1055	16.47	3.522	2.947	6.1	0.59	6.72	58.1	|	7.04	6.00
1100	16.48	3.459	2.895	5.1	0.49	6.64	57.7	|	6.64	6.00 → 4.3
1105	16.42	3.407	2.849	4.5	0.44	6.56	56.0	|	3.78	6.00
1110	16.43	3.397	2.841	4.1	0.40	6.54	55.5	↓	1.96	6.00
1115	COLLECT SAMPLE									

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 9th Aug'18

Site/Well No.: MW-29 | Replicate No.: – | Code No.: –

Weather: CLOUDY, 68° | Sampling Time: Begin 1000 End 1005

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	14.80
Depth to Water (ft bmp)	5.46
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	9.34
Casing Diameter/Type	2" PVC
Gallons in Well	1.4944
Gallons Pumped/Bailed Prior to Sampling	~1.2
Sample Pump Intake Setting (ft bmp)	12.80
Purge Time	begin 0925 end 1000
Pumping Rate (ml/min)	150
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.75
SpC (mS/cm)	12.66
CND (mS/cm)	11.16
Dissolved Oxygen (%)	4.5
Dissolved Oxygen (mg/L)	0.40
pH (s.u.)	6.98
ORP (mV)	-74.3
Turbidity (NTU)	2.17
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: DKAMATH

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-29 PROJ #: MI001454.0004.00001

DATE : 9th Aug'18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
0930	18.04	15.93	13.80	16.2	1.43	8.20	-110.7	150	3.35	5.52
0935	18.03	14.64	12.67	8.7	0.78	7.72	-99.2	↓	3.11	5.50
0940	18.33	13.63	11.89	6.9	0.61	7.42	-88.9	↓	2.37	5.52
0945	18.49	13.02	11.39	5.9	0.53	7.22	-81.1	↓	2.19	5.52
0950	18.59	12.73	11.17	4.8	0.43	7.06	-76.1	↓	1.82	5.52
0955	18.75	12.66	11.16	4.5	0.40	6.98	-74.3	↓	2.17	5.52
1000	COLLECT SAMPLE									

Total Depth of Well:	14.80
Depth To Water Before Purging:	5.46
Depth To Water After Purging:	5.52

ARCADIS

Water Sampling Log

MI001456.0004.0001

Project: Ford LTP | Project No. ~~MI001373.0001.00002~~ | Page 1 of 2

Location: Livonia, MI | Date: 9th Aug '18

Site/Well No.: MW-20 | Replicate No.: — | Code No.: —

Weather: CLOUDY, 60s | Sampling Time: Begin 1625 End 1630

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	16.85
Depth to Water (ft bmp)	5.76
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.09
Casing Diameter/Type	2" PVC
Gallons in Well	1.7744
Gallons Pumped/Bailed Prior to Sampling	~2.5
Sample Pump Intake Setting (ft bmp)	13.85
Purge Time	begin 1550 end 1625
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	20.45
SpC (mS/cm)	0.259
CND (mS/cm)	0.237
Dissolved Oxygen (%)	0.8
Dissolved Oxygen (mg/L)	0.07
pH (s.u.)	7.17
ORP (mV)	-112.2
Turbidity (NTU)	3.02
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
Vinly Chloride	40mL voa	3	HCL
1,4-dioxane	40mL voa	3	HCL

Sampling Personnel: DKAMATH

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

MI001456.0006.0001 PAGE 1 OF 1

WELL : MW-20 PROJ #: ~~MI009010.2017.00700~~

DATE : ~~9/14/2017~~ 9th Aug'18 LOC: ~~6468 Farr St., Detroit, Michigan~~ LIVONIA FORD,

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
15:55	20.30	0.186	0.169	7.9	0.72	7.29	-126.8	200	7.71	6.08
16:00	20.11	0.185	0.168	5.6	0.50	7.20	-126.6	|	7.67	6.07
1605	20.41	0.198	0.181	1.3	0.12	7.06	-122.7	|	4.78	6.05
1610	20.28	0.218	0.199	1.1	0.10	7.12	-123.7	|	4.12	6.08
1615	20.38	0.239	0.219	0.9	0.08	7.14	-114.2	|	3.47	6.08
1620	20.45	0.259	0.237	0.8	~~0.08~~	7.17	-12.2	↓	3.02	6.08
1625	COLLECT SAMPLE				0.07 DK					

ARCADIS

Water Sampling Log

MI001456.0004.00001

Project: Ford LTP | Project No.: ~~MI001373.0001.00002~~ | Page 1 of 2

Location: Livonia, MI | Date: 9TH Aug '18

Site/Well No.: MW-10 | Replicate No.: — | Code No.: —

Weather: CLOUDY, 60s | Sampling Time: Begin 1740 End 1745

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.24
Depth to Water (ft bmp)	8.68
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.56
Casing Diameter/Type	2" PVC
Gallons in Well	1.8496
Gallons Pumped/Bailed Prior to Sampling	~2
Sample Pump Intake Setting (ft bmp)	18.24
Purge Time	begin 1705 end 1740
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	20.20
SpC (mS/cm)	8.931
CND (mS/cm)	8.113
Dissolved Oxygen (%)	3.6
Dissolved Oxygen (mg/L)	0.32
pH (s.u.)	6.41
ORP (mV)	-41.9
Turbidity (NTU)	2.27
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
Vinly Chloride	40mL voa	3	HCL
1,4-dioxane	40mL voa	3	HCL

Sampling Personnel: DKAMATH

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

MI001454.0004.00001

WELL : MW-10 PROJ #: ~~MI009010.2018.00700~~

DATE : ~~3/7/2018~~ 9th Aug'18 LOC:

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1710	20.47	8.650	7.902	17.2	1.19	6.57	-27.3	200	5.00	9.07
1715	20.38	8.664	7.901	8.6	0.76	6.43	-28.2	↓	3.85	9.07
1720	20.28	8.725	7.939	5.1	0.44	6.36	-30.7		2.69	9.07
1725	20.23	8.777	7.979	4.1	0.36	6.35	-32.8		2.52	9.07
1730	20.19	8.870	8.056	3.6	0.32	6.39	-38.9		2.27	9.07
1735	20.20	8.931	8.113	3.6	0.32	6.41	-41.9	↓	2.27	9.07
1740	COLLECT SAMPLE									

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 10th Aug '18

Site/Well No.: MW-34 | Replicate No.: – | Code No.: –

Weather: SUNNY, 60s | Sampling Time: Begin 1116 End 1120

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	21.26
Depth to Water (ft bmp)	9.15
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	12.11
Casing Diameter/Type	2" PVC
Gallons in Well	1.9376
Gallons Pumped/Bailed Prior to Sampling	0.80 ~ 1
Sample Pump Intake Setting (ft bmp)	19.26
Purge Time	begin 1040 end 1115
Pumping Rate (ml/min)	100
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.86
SpC (mS/cm)	5.742
CND (mS/cm)	4.854
Dissolved Oxygen (%)	40.1
Dissolved Oxygen (mg/L)	3.81
pH (s.u.)	7.35
ORP (mV)	-34.6
Turbidity (NTU)	3.99
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: DICAMATH

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

* DO all over the place. ~~OK~~ Stable shortly after.

WELL : MW-34 PROJ #: MI001454.0004.00001

DATE : 10th Aug'18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO * mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1045	17.18	5.726	4.868	17.9	1.67	7.68	-19.5	100	8.12	9.93
1050	17.10	5.701	4.842	16.2	1.53	7.59	-28.3	|	5.37	9.92
1055	17.18	5.705	4.853	21.4	2.03	7.52	-31.8	|	5.77	9.91
1100	17.64	5.715	4.912	32.2	3.01	7.46	-30.9	|	5.60	9.93
1105	16.95	5.748	4.856	34.0	3.24	7.40	-35.9	|	3.86	9.91
1110	16.64	5.747	4.829	34.7	3.33	7.36	-37.6	|	4.49	9.93
1115	16.86	5.742	4.854	40.1	3.81	7.35	-34.6	↓	3.99	9.93
1116	COLLECT SAMPLE									

Total Depth of Well:	21.26
Depth To Water Before Purging:	9.15
Depth To Water After Purging:	9.93

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 10th Aug '18

Site/Well No.: MW-19 | Replicate No.: — | Code No.: —

Weather: SUNNY, 70s | Sampling Time: Begin 0930 End 0935

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.98
Depth to Water (ft bmp)	5.72
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	14.26
Casing Diameter/Type	2" PVC
Gallons in Well	2.2816
Gallons Pumped/Bailed Prior to Sampling	~3
Sample Pump Intake Setting (ft bmp)	17.98
Purge Time	begin 0855 end 0930
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.32
SpC (mS/cm)	13.72
CND (mS/cm)	11.70
Dissolved Oxygen (%)	10.0
Dissolved Oxygen (mg/L)	0.91
pH (s.u.)	7.00
ORP (mV)	-108.7
Turbidity (NTU)	5.33
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: DICAMATH

Well Casing Volumes

Gal./Ft.					
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65	
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47	

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-19 PROJ #: MI001454.0004.00001

DATE : 10th Aug'18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
0900	18.26	21.16	18.45	12.3	1.07	7.23	-106.8	300	17.8	6.06
0905	17.08	14.83	12.59	5.1	0.47	7.04	-107.7	↓	8.95	6.06
0910	17.05	14.55	12.34	4.8	0.45	7.03	-107.7	↓	5.63	6.05
0915	17.19	14.04	11.94	5.5	0.52	7.00	-108.2	↓	5.65	6.06
0920	17.25	13.89	11.82	10.8	1.03	7.00	-108.5	↓	6.24	6.05
0925	17.32	13.72	11.70	10.3	~~0.0~~ 0.91	7.00	-108.7	↓	5.33	6.05
0930	COLLECT SAMPLE									

Total Depth of Well:	19.98
Depth To Water Before Purging:	5.72
Depth To Water After Purging:	6.05

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 10th Aug '18

Site/Well No.: MW-2 | Replicate No.: — | Code No.: —

Weather: SUNNY, 60s | Sampling Time: Begin 1315 End 1320

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.47
Depth to Water (ft bmp)	7.02
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	13.45
Casing Diameter/Type	2" PVC
Gallons in Well	2.152
Gallons Pumped/Bailed Prior to Sampling	~2.0
Sample Pump Intake Setting (ft bmp)	18.47
Purge Time	begin 1240 end 1315
Pumping Rate (ml/min)	950
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.71
SpC (mS/cm)	14.09
CND (mS/cm)	12.67
Dissolved Oxygen (%)	49.3
Dissolved Oxygen (mg/L)	4.31
pH (s.u.)	7.40
ORP (mV)	-117.8
Turbidity (NTU)	5.49
Color	NONE
Odor	NONE
Appearance	CLEAR
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: DICAMATH

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-2 PROJ #: MI001454.0004.00001

DATE : 18 10th Aug 18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1245	20.06	12.86	11.65	48.1	4.17	7.65	-107.8	250	4.65	7.44
1250	19.86	13.37	12.07	42.9	3.76	7.48	-117.1	↓	3.78	7.47
1255	19.81	13.62	12.28	44.3	3.85	7.44	-121.8	↓	4.49	7.45
1300	19.79	13.78	12.41	44.6	3.85	7.43	-118.7	↓	4.23	7.51
1305	19.75	13.94	12.55	45.8	4.01	7.41	-115.2	↓	4.07	7.49
1310	19.71	14.09	12.67	49.3	4.31	7.40	-117.8	↓	5.49	7.51
1315	COLLECT SAMPLE									

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-7-18

Site/Well No.: MW-15-60D | Replicate No.: — | Code No.: —

Weather: | Sampling Time: Begin 857 End 957

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	98.0
Depth to Water (ft bmp)	22.72
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	75.28
Casing Diameter/Type	2" PVC
Gallons in Well	12.05
Gallons Pumped/Bailed Prior to Sampling	5.55
Sample Pump Intake Setting (ft bmp)	(KB) 8-7-18 ~~11.0~~ V
Purge Time	begin 857 end 957
Pumping Rate (ml/min)	(KB) 8-7-18 ~~300~~ 350
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.25
SpC (mS/cm)	0.481
CND (mS/cm)	—
Dissolved Oxygen (%)	0.2
Dissolved Oxygen (mg/L)	0.02
pH (s.u.)	8.20
ORP (mV)	2.5
Turbidity (NTU)	17.7
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: KACAN BRIGGS

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-15-60D PROJ #: MI001454.0004.00001

DATE : 8-7-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
857	17.64	0.673	—	38.9	3.49	8.58	121.4	350	12.6	22.72
902	17.60	0.661	—	17.8	1.64	8.49	119.0	350	25.2	22.98
907	16.24	0.552	—	2.8	0.27	8.02	92.3	350	97.1	23.24
912	15.64	0.548	—	2.2	0.22	7.98	89.5	350	95.8	23.41
917	15.86	0.530	—	1.1	0.10	7.93	82.1	350	69.2	23.41
922	16.45	0.523	—	0.9	0.09	7.90	78.8	350	68.7	23.41
927	16.90	0.515	—	0.8	0.08	7.93	66.3	350	49.0	23.41
932	16.79	0.509	—	0.8	0.08	7.99	54.8	350	35.4	23.41
937	16.66	0.507	—	0.9	0.09	8.02	48.4	350	28.4	23.41
942	16.19	0.500	—	0.8	0.08	8.09	35.4	350	21.7	23.41
947	15.96	0.491	—	0.5	0.05	8.11	25.9	350	17.1	23.41
952	16.34	0.485	—	0.2	0.01	8.14	13.9	350	26.3	23.41
957	16.25	0.481	—	0.2	0.02	8.20	2.5	350	17.7	23.41
Total Depth of Well:		98.0'								
Depth To Water Before Purging:				22.72						
Depth To Water After Purging:				23.41						

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-7-18

Site/Well No.: MW-15-61D | Replicate No.: — | Code No.: —

Weather: 74°F CLOUDY | Sampling Time: Begin 1036 End 1136

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	93.0
Depth to Water (ft bmp)	26.64
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	66.36
Casing Diameter/Type	2" PVC
Gallons in Well	10.62
Gallons Pumped/Bailed Prior to Sampling	4.76
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1036 end 1136
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.08
SpC (mS/cm)	0.725
CND (mS/cm)	—
Dissolved Oxygen (%)	6.9
Dissolved Oxygen (mg/L)	0.67
pH (s.u.)	7.76
ORP (mV)	-74.1
Turbidity (NTU)	9.41
Color	CLEAR (SEE NOTE ON P.2)
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	DUP-01_080718 COLLECTED

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: KALAN BRIGGS

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-15-601D PROJ #: MI001454.0004.00001

DATE : 8-7-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1036	14.15	0.726	-	45.0	3.97	8.34	5.7	300	8.20	26.64
1041	14.99	0.741	-	8.3	0.80	8.18	-4.5	300	66.7	26.52
1046	16.42	1.034	-	3.1	0.30	8.27	-13.0	300	722	28.38
1051	15.87	1.041	-	1.7	0.17	8.17	-22.1	300	618	30.56
1056	15.31	0.919	-	1.7	0.17	8.18	-40.1	300	52	32.79
1101	15.32	0.845	-	1.5	0.15	8.12	-46.0	300	33.9	34.85
1106	15.45	0.796	-	0.9	0.09	8.03	-50.9	300	15.0	39.02
1111	15.02	0.749	-	0.6	0.06	7.95	-58.2	300	16.5	45.61
1116	16.00	0.733	-	0.2	0.03	7.85	-63.4	300	9.01	49.88
1121	15.45	0.737	-	0.3	0.03	7.84	-66.2	300	15.1	52.98
1126	15.50	0.727	-	0.6	0.05	7.79	-68.7	300	7.73	58.37
1131	16.19	0.721	-	2.3	0.24	7.76	-72.1	300	14.5	61.08
1136	16.08	0.725	-	6.9	0.67	7.76	-74.1	300	9.41	64.31
		NOTE:	DARK	GRAY / BLACK		IN COLOR FROM 1041 - 1056				
Total Depth of Well:		930								
Depth To Water Before Purging:				26.64						
Depth To Water After Purging:				64.31						

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-7-18

Site/Well No.: MW-32 | Replicate No.: — | Code No.: —

Weather: 85°F PARTLY CLOUDY | Sampling Time: Begin 1401 End 1436

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	22.83
Depth to Water (ft bmp)	9.02
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	13.81
Casing Diameter/Type	2" PVC
Gallons in Well	2.21
Gallons Pumped/Bailed Prior to Sampling	1.85
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1401 end 1436
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	15.30
SpC (mS/cm)	3.739
CND (mS/cm)	—
Dissolved Oxygen (%)	1.0
Dissolved Oxygen (mg/L)	0.10
pH (s.u.)	7.64
ORP (mV)	-95.3
Turbidity (NTU)	6.21
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	MS/MSD COLLECTED

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: KALAN BRIGGS

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-32 PROJ #: MI001454.0004.00001

DATE : 8-7-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1401	15.35	3.854	-	47.7	4.32	7.92	-23.3	200	50.8	9.02
1406	14.80	3.742	-	3.1	0.31	7.84	-46.2	200	39.0	9.56
1411	15.22	3.735	-	1.5	0.15	7.73	-64.0	200	19.4	9.42
1416	15.19	3.734	-	1.6	0.16	7.67	-69.7	200	13.3	9.42
1421	15.23	3.735	-	1.6	0.16	7.64	-77.1	200	11.31	9.42
1426	15.31	3.731	-	1.2	0.12	7.62	-85.5	200	8.53	9.42
1431	15.41	3.728	-	1.3	0.12	7.61	-89.0	200	7.43	9.42
1436	15.30	3.739	-	1.0	0.10	7.64	-95.3	200	6.21	9.42

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-7-18

Site/Well No.: mw-39 | Replicate No.: — | Code No.: —

Weather: 86°F clear | Sampling Time: Begin 1311 End 1346

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	24.16
Depth to Water (ft bmp)	10.53
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	13.63
Casing Diameter/Type	2" PVC
Gallons in Well	2.18
Gallons Pumped/Bailed Prior to Sampling	1.85
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1311 end 1346
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.34
SpC (mS/cm)	5.624
CND (mS/cm)	—
Dissolved Oxygen (%)	1.5
Dissolved Oxygen (mg/L)	0.14
pH (s.u.)	7.43
ORP (mV)	-14.1
Turbidity (NTU)	1.12
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: KACAN BRIGGS

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-39 PROJ #: MI001454.0004.00001

DATE : 8-7-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1311	18.44	4.468	-	16.3	1.42	7.49	30.0	200	15.6	10.53
1316	18.20	4.500	-	6.7	0.62	7.46	11.9	200	9.39	10.53
1321	18.42	4.522	-	4.7	0.43	7.43	-1.4	200	2.48	10.53
1326	18.69	5.438	-	2.6	0.24	7.62	-6.7	200	1.59	10.53
1331	18.58	5.491	-	2.2	0.20	7.56	-7.7	200	1.17	10.53
1336	18.85	5.541	-	1.9	0.19	7.51	-9.3	200	0.98	10.53
1341	18.20	5.599	-	1.6	0.15	7.46	-11.8	200	1.40	10.53
1346	18.34	5.624	-	1.5	0.14	7.43	-14.1	200	1.12	10.53
Total Depth of Well:		24.16								
Depth To Water Before Purging:				10.53						
Depth To Water After Purging:				10.53						

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 08-13-2018

Site/Well No.: MW-53 | Replicate No.: — | Code No.: —

Weather: 75°F, SUNNY | Sampling Time: Begin 0925 End 0930

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.77
Depth to Water (ft bmp)	7.75
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	13.02
Casing Diameter/Type	2" PVC
Gallons in Well	2.0832
Gallons Pumped/Bailed Prior to Sampling	2.6420
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 0835 end 0925
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	15.45
SpC (mS/cm)	5.338
CND (mS/cm)	4.365
Dissolved Oxygen (%)	1.3
Dissolved Oxygen (mg/L)	0.13
pH (s.u.)	8.25
ORP (mV)	133.7
Turbidity (NTU)	2.76
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-53 PROJ #: MI001454.0004.00001

DATE : 08-13-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
0835	15.71	4.837	3.982	14.6	1.39	7.95	182.1	200	26.38	7.75
0840	15.82	4.949	4.083	7.9	0.76	8.06	176.9	200	17.21	8.17
0845	15.78	5.025	4.142	4.3	0.47	8.03	189.4	200	9.82	8.18
0850	15.56	5.089	4.172	3.4	0.34	8.07	187.3	200	6.21	8.21
0855	15.34	5.174	4.221	2.7	0.27	8.12	182.3	200	6.34	8.25
0900	15.31	5.238	4.269	1.7	0.17	8.16	175.0	200	6.45	8.25
0905	15.45	5.272	4.310	1.7	0.17	8.18	169.8	200	3.93	8.21
0910	15.40	5.276	4.309	2.0	0.20	8.20	163.5	200	3.60	8.21
0915	15.43	5.301	4.332	1.4	0.13	8.25	142.8	200	2.81	8.21
0920	15.43	5.328	4.355	1.3	0.13	8.25	133.1	200	2.62	8.21
0925	15.45	5.338	4.365	1.3	0.13	8.25	133.7	200	2.78	8.21
Total Depth of Well:		20.77								
Depth To Water Before Purging:			7.75							
Depth To Water After Purging:			8.21							

ARCADIS

Water Sampling Log

Project	Ford LTP	Project No.	MI001454.0004.00001	Page	1 of 2
Location	Livonia, MI			Date	08-13-2018
Site/Well No.	MW-28	Replicate No.	—	Code No.	—
Weather	80°F, SUNNY	Sampling Time: Begin	1145	End	1150

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	11.67
Depth to Water (ft bmp)	4.55
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	7.12
Casing Diameter/Type	2" PVC
Gallons in Well	1.1392
Gallons Pumped/Bailed Prior to Sampling	3.1704
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1045 end 1145
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	22.60
SpC (mS/cm)	6.012
CND (mS/cm)	5.736
Dissolved Oxygen (%)	4.1
Dissolved Oxygen (mg/L)	0.34
pH (s.u.)	8.88
ORP (mV)	94.6
Turbidity (NTU)	4.49
Color	CLEAR - SLIGHTLY TURBID
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: C. O'NEIL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : 08-13-2018 PROJ #: MI001454.0004.00001

DATE : MW-28 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1045	22.28	6.170	6.134	17.9	1.51	8.31	124.3	200	4.25	4.55
1050	22.66	6.408	6.121	11.0	0.93	8.56	115.6	200	2.04	4.61
1055	22.85	6.328	6.068	8.0	0.68	8.70	112.7	200	1.51	4.61
1100	23.23	6.215	6.007	6.9	0.57	8.39	110.2	200	1.65	4.61
1105	22.93	6.541	6.102	7.2	0.69	8.31	109.6	200	3.53	4.61
1110	21.49	7.028	6.546	7.8	0.77	8.33	108.2	200	3.34	4.61
1115	22.39	6.319	6.003	8.2	0.69	8.27	104.5	200	20.73	4.61
1120	22.74	6.164	5.892	4.9	0.42	8.79	102.0	200	13.56	4.61
1125	22.64	6.064	5.790	4.5	0.38	8.33	100.1	200	16.70	4.61
1130	22.74	6.021	5.751	4.1	0.35	8.83	98.3	200	15.08	4.61
1135	22.50	6.008	5.721	4.2	0.35	8.84	97.0	200	9.67	4.61
1140	22.52	6.013	5.727	4.1	0.35	8.87	95.2	200	5.38	4.61
1145	22.60	6.012	5.736	4.1	0.34	8.88	94.6	200	4.49	4.61
Total Depth of Well:		11.67								
Depth To Water Before Purging:			4.55							
Depth To Water After Purging:			4.61							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 08-13-2018

Site/Well No.: MW-67 | Replicate No.: — | Code No.: —

Weather: 85°F, SUNNY | Sampling Time: Begin 1420 End 1425

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	14.01
Depth to Water (ft bmp)	9.47
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	4.54
Casing Diameter/Type	2" PVC
Gallons in Well	0.7264
Gallons Pumped/Bailed Prior to Sampling	1.5852
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1350 end 1420
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	20.22
SpC (mS/cm)	7.358
CND (mS/cm)	6.689
Dissolved Oxygen (%)	2.4
Dissolved Oxygen (mg/L)	0.21
pH (s.u.)	7.65
ORP (mV)	65.9
Turbidity (NTU)	2.63
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : 08-13-2018 PROJ #: MI001454.0004.00001

DATE : MW-67 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1350	20.25	7.372	6.706	41.8	3.29	8.06	60.1	200	3.65	9.47
1355	20.11	7.409	6.717	1.2	0.10	8.18	60.9	200	2.72	9.48
1400	19.84	7.402	6.668	4.0	0.33	8.14	64.3	200	1.33	9.48
1405	20.02	7.365	6.666	4.1	0.40	8.09	64.7	200	2.07	9.49
1410	20.20	7.377	6.700	2.9	0.25	7.79	66.1	200	2.49	9.49
1415	20.16	7.378	6.694	2.6	0.23	7.68	66.1	200	2.87	9.49
1420	20.22	7.358	6.689	2.4	0.21	7.65	65.9	200	2.63	9.49
~~1425~~										
to 8/13/18										
Total Depth of Well:		14.01								
Depth To Water Before Purging:			9.47							
Depth To Water After Purging:			9.49							

ARCADIS

Water Sampling Log

Project	Ford LTP	Project No.	MI001454.0004.00001	Page	1 of 2
Location	Livonia, MI			Date	08-13-2018
Site/Well No.	MW-56	Replicate No.	—	Code No.	—
Weather	85°F, SUNNY	Sampling Time:	Begin 1625	End	1630

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.48
Depth to Water (ft bmp)	7.81
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	12.67
Casing Diameter/Type	2" PVC
Gallons in Well	2.0272
Gallons Pumped/Bailed Prior to Sampling	1.8494
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1550 end 1625
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.00
SpC (mS/cm)	11.57
CND (mS/cm)	10.24
Dissolved Oxygen (%)	3.9
Dissolved Oxygen (mg/L)	0.35
pH (s.u.)	8.48
ORP (mV)	0.0
Turbidity (NTU)	5.62
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-56 PROJ #: MI001454.0004.00001

DATE : 08-13-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1550	19.54	12.14	10.88	11.5	1.00	8.71	24.9	200	4.93	7.81
1555	19.48	11.63	10.39	7.8	0.69	8.67	6.2	200	3.88	8.12
1600	19.09	11.47	10.17	9.3	0.91	8.64	0.0	200	2.94	8.13
1605	18.91	11.45	10.11	1.8	0.15	8.60	0.0	200	3.31	8.13
1610	18.57	11.45	10.04	3.5	0.31	8.56	0.0	200	4.04	8.13
1615	18.42	11.45	10.02	4.9	0.44	8.55	0.0	200	4.89	8.13
1620	18.36	11.49	10.04	4.0	0.36	8.53	0.0	200	5.17	8.13
1625	19.00	11.57	10.24	3.9	0.35	8.48	0.0	200	5.62	8.13
Total Depth of Well:		20.48								
Depth To Water Before Purging:			7.31							
Depth To Water After Purging:			8.13							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 03-13-2018

Site/Well No.: mw-64 | Replicate No.: — | Code No.: —

Weather: 85°F, SUNNY | Sampling Time: Begin 1740 End 1745

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.05
Depth to Water (ft bmp)	9.38
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.67
Casing Diameter/Type	2" PVC
Gallons in Well	1.7072
Gallons Pumped/Bailed Prior to Sampling	1.8494
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1705 end 1740
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.01
SpC (mS/cm)	4.834
CND (mS/cm)	4.096
Dissolved Oxygen (%)	3.1
Dissolved Oxygen (mg/L)	0.30
pH (s.u.)	8.24
ORP (mV)	0.0
Turbidity (NTU)	1.37
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-64 PROJ #: MI001454.0004.00001

DATE : 08-13-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1705	17.22	5.514	4.694	52.6	4.55	8.36	0.0	200	3.39	9.38
1710	17.17	5.443	4.626	9.3	0.92	8.30	0.0	200	2.39	9.42
1715	17.14	5.222	4.436	5.4	0.51	3.40	0.0	200	2.08	9.42
1720	17.13	5.056	4.294	4.4	0.42	3.46	0.0	200	1.11	9.43
1725	17.15	4.957	4.211	4.0	0.38	8.41	0.0	200	1.53	9.43
1730	17.09	4.885	4.146	3.4	0.33	3.33	0.0	200	1.41	9.43
1735	17.05	4.854	4.116	3.4	0.32	3.25	0.0	200	1.65	9.43
1740	17.01	4.834	4.096	3.1	0.30	3.24	0.0	200	~~1.56~~ 1.37	9.43
~~1745~~	CO 8/18/18						~~0.0~~	~~200~~		~~9.43~~
Total Depth of Well:		20.05								
Depth To Water Before Purging:			9.38							
Depth To Water After Purging:			9.43							

ARCADIS

Water Sampling Log

Project	Ford LTP	Project No.	MI001454.0004.00001	Page	1 of 2
Location	Livonia, MI			Date	08-14-2018
Site/Well No.	MW-21	Replicate No.	—	Code No.	—
Weather	75°F, SUNNY	Sampling Time:	Begin 0920	End	0925

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	17.65
Depth to Water (ft bmp)	6.62
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.03
Casing Diameter/Type	2" PVC
Gallons in Well	1.7648
Gallons Pumped/Bailed Prior to Sampling	3.1704
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 0820 end 0920
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.65
SpC (mS/cm)	5.672
CND (mS/cm)	5.093
Dissolved Oxygen (%)	3.5
Dissolved Oxygen (mg/L)	0.32
pH (s.u.)	8.56
ORP (mV)	5.8
Turbidity (NTU)	~~CLEAR~~ CO 8/14/18 1.29
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-21 PROJ #: MI001454.0004.00001

DATE : 08-14-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
0820	19.29	6.177	5.499	16.9	1.51	8.31	121.4	200	7.56	6.62
0825	19.34	5.630	5.013	10.6	0.96	8.46	106.5	200	7.96	6.78
0830	19.35	5.277	4.706	9.7	0.88	8.56	95.5	200	5.14	6.79
0835	19.25	5.333	4.750	9.0	0.82	8.61	85.5	200	5.12	6.79
0840	19.29	5.445	4.854	7.9	0.71	8.62	76.4	200	4.12	6.79
0845	19.31	5.543	4.942	7.1	0.64	8.61	66.9	200	2.64	6.79
0850	19.38	5.570	4.971	6.0	0.55	8.61	59.7	200	2.93	6.79
0855	19.40	5.600	5.001	5.3	0.48	8.61	51.4	200	1.51	6.79
0900	19.44	5.611	5.015	4.8	0.43	8.60	43.4	200	1.89	6.79
0905	19.39	5.621	5.019	4.2	0.38	8.60	33.1	200	1.21	6.79
0910	19.68	5.622	5.051	4.3	0.39	8.58	24.9	200	1.49	6.79
0915	19.28	5.663	5.044	3.8	0.35	8.57	16.8	200	1.46	6.79
0920	19.65	5.672	5.093	3.5	0.32	8.56	5.8	200	1.29	6.79
Total Depth of Well:		17.65								
Depth To Water Before Purging:			6.62							
Depth To Water After Purging:			6.79							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 08-14-2018

Site/Well No.: mw-49 | Replicate No.: — | Code No.: —

Weather: 75°F, SUNNY | Sampling Time: Begin 1040 End 1045

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	17.40
Depth to Water (ft bmp)	6.35
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.05
Casing Diameter/Type	2" PVC
Gallons in Well	1.768
Gallons Pumped/Bailed Prior to Sampling	1.3494
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1005 end 1040
Pumping Rate (ml/min)	260
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.44
SpC (mS/cm)	2.471
CND (mS/cm)	2.161
Dissolved Oxygen (%)	5.2
Dissolved Oxygen (mg/L)	0.48
pH (s.u.)	8.35
ORP (mV)	0.6
Turbidity (NTU)	1.7
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	OUTER WELL CASING FILLED WITH WATER; PUMPED OUT BEFORE BEGINNING PURGE OF WELL mw-49

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-49 PROJ #: MI001454.0004.00001

DATE : 08-14-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1005	18.57	4.146	3.626	44.2	3.98	8.46	20.6	200	16.97	6.35
1010	18.71	3.940	3.464	21.5	1.96	8.42	15.1	200	13.04	6.53
1015	18.66	3.576	3.143	9.6	0.88	8.38	1.6	200	7.68	6.53
1020	18.50	3.261	2.853	7.9	0.74	8.32	0.0	200	4.59	6.53
1025	18.62	2.776	2.434	6.5	0.60	8.36	0.0	200	2.43	6.53
1030	18.50	2.632	2.304	6.0	0.56	8.37	0.0	200	2.09	6.53
1035	18.47	2.546	2.228	5.6	0.51	8.36	0.0	200	2.47	6.53
1040	18.44	2.471	2.161	5.2	0.48	8.35	0.0	200	1.70	6.53
Total Depth of Well:		17.40								
Depth To Water Before Purging:			6.35							
Depth To Water After Purging:			6.53							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 08-14-2013

Site/Well No.: MW-14 | Replicate No.: — | Code No.: —

Weather: 80F, SUNNY | Sampling Time: Begin 1225 End 1230

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.65
Depth to Water (ft bmp)	6.61
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	13.04
Casing Diameter/Type	2" PVC
Gallons in Well	2.0864
Gallons Pumped/Bailed Prior to Sampling	1.8494
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1150 end 1225
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	20.86
SpC (mS/cm)	3.427
CND (mS/cm)	3.158
Dissolved Oxygen (%)	6.4
Dissolved Oxygen (mg/L)	0.57
pH (s.u.)	8.44
ORP (mV)	0.0
Turbidity (NTU)	2.38
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65	
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47	

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-14 PROJ #: MI001454.0004.00001

DATE : 08-14-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1150	20.83	3.970	3.635	17.6	1.55	9.13	0.0	200	9.53	6.61
1155	20.74	3.670	3.372	13.2	1.16	9.08	0.0	200	6.37	6.69
1200	20.63	5.039	4.590	10.2	0.90	8.99	0.0	200	10.94	6.69
1205	20.56	3.484	3.185	8.7	0.77	8.88	0.0	200	3.12	6.69
1210	20.68	3.344	3.066	8.2	0.73	8.81	0.0	200	2.74	6.69
1215	20.60	3.355	3.074	7.8	0.69	8.64	0.0	200	3.56	6.69
1220	~~20.48~~ 20.61	3.413	3.134	6.9	0.61	8.50	0.0	200	2.56	6.69
1225	20.86	3.427	3.158	6.4	0.57	8.44	0.0	200	2.88	6.69
Total Depth of Well:		19.65								
Depth To Water Before Purging:			6.61							
Depth To Water After Purging:			6.69							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 08-14-2018

Site/Well No.: MW-9 | Replicate No.: — | Code No.: —

Weather: 85°F; SUNNY | Sampling Time: Begin 1425 End 1430

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	24.20
Depth to Water (ft bmp)	5.97
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	18.23
Casing Diameter/Type	2" PVC
Gallons in Well	2.9168
Gallons Pumped/Bailed Prior to Sampling	1.9419
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1350 end 1425
Pumping Rate (ml/min)	210
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.27
SpC (mS/cm)	3.926
CND (mS/cm)	3.422
Dissolved Oxygen (%)	7.8
Dissolved Oxygen (mg/L)	0.73
pH (s.u.)	8.43
ORP (mV)	0.0
Turbidity (NTU)	0.95
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	BLACK/DARK GRAY PARTICULATE MATTER FLOATING IN SUSPENSION (PRODUCT?)

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-9 PROJ #: MI001454.0004.00001

DATE : 03-14-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1350	19.03	3.449	3.049	194.6	17.17	9.01	8.3	210	4.13	5.97
1355	18.69	3.248	2.854	22.4	2.06	8.80	0.0	210	3.75	7.26
1400	18.38	3.260	2.850	13.0	1.20	8.70	0.0	210	2.30	7.37
1405	18.32	3.435	3.000	11.2	1.04	8.63	0.0	210	1.73	7.37
1410	18.32	3.669	3.203	9.6	0.89	8.53	0.0	210	1.04	7.37
1415	18.22	3.768	3.282	9.1	0.84	8.49	0.0	210	0.95	7.37
1420	18.11	3.884	3.374	8.3	0.77	8.45	0.0	210	1.06	7.37
1425	18.27	3.926	3.422	7.8	0.73	8.43	0.0	210	0.95	7.37
Total Depth of Well:		24.20								
Depth To Water Before Purging:			5.97							
Depth To Water After Purging:			7.37							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-8-18

Site/Well No.: TW-16-04 | Replicate No.: — | Code No.: —

Weather: 75°F, PARTLY SUNNY | Sampling Time: Begin 11:32 End 12:32

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	18.90
Depth to Water (ft bmp)	6.16
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	12.74
Casing Diameter/Type	2" PVC
Gallons in Well	2.04
Gallons Pumped/Bailed Prior to Sampling	3.96
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 11:32 end 12:32
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	15.13
SpC (mS/cm)	1.538
CND (mS/cm)	1.248
Dissolved Oxygen (%)	2.5
Dissolved Oxygen (mg/L)	0.25
pH (s.u.)	6.88
ORP (mV)	-30.4
Turbidity (NTU)	1.99
Color	light brown, dirty
Odor	NONE
Appearance	SLIGHTLY DIRTY
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: RACHEL STERN (RCS)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

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ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL: TW-16-04 PROJ #: MI001454.0004.00001

DATE: 8-8-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
11:32	18.00	1.577	1.346	333.7	26.74	5.95	85.0	250	3.20	6.16
11:37	15.81	1.455	1.199	11.1	1.09	5.09	96.5	250	2.36	6.22
11:42	15.44	1.464	1.197	5.6	0.55	5.54	52.4	250	1.77	6.23
11:47	15.19	1.489	1.210	4.9	0.48	5.88	25.9	250	1.33	6.22
11:52	15.23	1.492	1.213	4.2	0.42	6.12	12.3	250	1.20	6.21
11:57	15.27	1.493	1.215	4.1	0.42	6.35	-5.4	200	1.55	6.20
12:02	15.03	1.505	1.219	3.8	0.38	6.51	-13.8	250	2.20	6.21
12:07	15.18	1.504	1.224	3.3	0.33	6.58	-11.0	250	1.06	6.22
12:12	15.28	1.508	1.228	3.0	0.31	6.71	-15.2	250	1.28	6.21
12:17	15.28	1.518	1.237	3.2	0.32	6.78	-10.5	250	0.84	6.21
12:22	15.58	1.526	1.251	3.3	0.32	7.04	-32.9	250	1.71	6.21
12:27	15.42	1.535	1.254	2.7	0.27	7.04	-38.0	250	1.30	6.21
12:32	15.13	1.538	1.248	2.5	0.25	6.88	-30.4	250	1.99	6.21
Total Depth of Well:		18.90								
Depth To Water Before Purging:			6.16							
Depth To Water After Purging:			6.21							

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ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-8-18

Site/Well No.: TW-16-03 | Replicate No.: — | Code No.: —

Weather: 75°F, PARTLY SUNNY | Sampling Time: Begin 1320 End 1420

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	~~5.75~~ RCS 18.72
Depth to Water (ft bmp)	5.75
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	12.97
Casing Diameter/Type	2" PVC
Gallons in Well	2.0752
Gallons Pumped/Bailed Prior to Sampling	3.96
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1320 end 1420
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	15.33
SpC (mS/cm)	1.318
CND (mS/cm)	1.075
Dissolved Oxygen (%)	2.3
Dissolved Oxygen (mg/L)	0.23
pH (s.u.)	6.95
ORP (mV)	-25.1
Turbidity (NTU)	1.14
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	NONE

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: RACHEL STERN (RCS)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

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ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL: TW-16-03 PROJ #: MI001454.0004.00001

DATE: 8-8-16 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1320	17.16	1.751	1.487	112.0	10.40	8.11	-55.4	150	6.94	5.75
1325	15.06	1.664	1.348	3.6	0.36	6.48	-27.0	250	7.09	5.83
1330	15.10	1.541	1.249	3.0	0.30	6.33	-28.0	250	4.01	5.84
1335	15.15	1.372	1.114	3.0	0.31	6.03	-13.9	250	3.03	5.85
1340	15.16	1.344	1.091	4.3	0.42	5.74	-20.3	250	3.61	5.85
1345	15.16	1.328	1.077	5.4	0.53	5.83	-13.3	250	2.81	5.85
1350	15.09	1.319	1.069	4.0	0.39	6.27	-17.2	250	2.51	5.85
1355	15.17	1.320	1.072	3.4	0.34	6.52	-22.0	250	2.12	5.85
1400	15.13	1.320	1.071	3.0	0.30	6.64	-23.8	250	1.96	5.85
1405	15.13	1.317	1.069	3.0	0.30	6.74	-30.8	250	2.49	5.85
1410	15.31	1.317	1.074	2.6	0.26	6.91	-22.9	250	1.24	5.85
1415	15.38	1.316	1.074	2.3	0.22	6.94	-25.5	250	1.53	5.85
1420	15.33	1.318	1.075	2.3	0.23	6.95	-25.1	250	1.14	5.85

Total Depth of Well:	18.72	
Depth To Water Before Purging:		5.75
Depth To Water After Purging:		5.85

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ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-9-18

Site/Well No.: MW-15-59D | Replicate No.: — | Code No.: —

Weather: 74°F MOSTLY SUNNY | Sampling Time: Begin 0910 End 1010

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	100.8
Depth to Water (ft bmp)	29.08
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	71.72
Casing Diameter/Type	2" PVC
Gallons in Well	11.48
Gallons Pumped/Bailed Prior to Sampling	4.76
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 0910 end 1010
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.14
SpC (mS/cm)	0.432
CND (mS/cm)	0.359
Dissolved Oxygen (%)	2.1
Dissolved Oxygen (mg/L)	0.21
pH (s.u.)	7.94
ORP (mV)	40.0
Turbidity (NTU)	22.2
Color	GRAY, TURBID
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: RACHEL STERN (RCS)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

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ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-15-59D PROJ #: MI001454.0004.00001

DATE : 8-9-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
9:10	16.45	0.429	0.359	16.0	1.54	5.74	205.9	<500	135	*sump
9:15	16.92	0.427	0.361	5.6	0.54	6.26	174.8	250	140	does not
9:20	16.27	0.428	0.356	5.1	0.51	6.72	145.8	250	108.9	fit in
9:25	16.28	0.423	0.353	4.7	0.46	6.77	142.9	300	96.5	well with
9:30	16.44	0.432	0.361	4.2	0.41	7.18	118.6	300	97.2	water
9:35	15.97	0.434	0.359	3.3	0.33	7.30	105.2	300	76.9	level
9:40	15.98	0.433	0.358	2.7	0.26	7.23	104.0	300	72.4	meter
9:45	16.32	0.432	0.361	2.3	0.22	7.69	73.8	300	56.6	—
9:50	16.22	0.428	0.356	2.2	0.22	7.68	67.8	250	42.1	—
9:55	16.40	0.435	0.364	2.2	0.22	7.92	51.3	250	38.1	—
10:00	16.53	0.435	0.365	2.6	0.25	8.05	41.6	450	31.6	—
10:05	15.98	0.435	0.360	2.1	0.20	7.68	56.5	350	30.1	—
10:10	16.14	0.432	0.359	2.1	0.21	7.94	40.0	250	22.2	—
Total Depth of Well:										
Depth To Water Before Purging:			29.08							
Depth To Water After Purging:			29.08							

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ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-9-18

Site/Well No.: MW-38 | Replicate No.: — | Code No.: —

Weather: 82°F SUNNY | Sampling Time: Begin 1404 End 1504

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.5
Depth to Water (ft bmp)	7.63
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.87
Casing Diameter/Type	2" PVC
Gallons in Well	1.90
Gallons Pumped/Bailed Prior to Sampling	3.57
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1404 end 1504
Pumping Rate (ml/min)	225
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.33
SpC (mS/cm)	3.525
CND (mS/cm)	2.943
Dissolved Oxygen (%)	6.3
Dissolved Oxygen (mg/L)	0.61
pH (s.u.)	7.42
ORP (mV)	-74.8
Turbidity (NTU)	7.44
Color	BROWN
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: RACHEL STERN (RCS)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

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ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-38 PROJ #: MI001454.0004.00001

DATE : 8-9-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1404	18.46	3.832	3.352	146.9	12.30	7.48	5.1	200	40.6	7.63
1409	17.13	3.811	3.236	7.8	0.74	6.83	-29.5	200	35.8	8.10
1414	16.64	3.798	3.190	6.2	0.59	6.74	-33.5	225	32.3	8.10
1419	16.32	3.801	3.171	5.1	0.49	6.66	-39.5	225	26.0	8.10
1424	16.15	3.846	3.196	3.8	0.36	6.63	-48.2	225	17.9	8.10
1429	16.01	3.827	3.170	3.6	0.35	6.86	-54.0	200	12.8	8.10
1434	15.96	3.773	3.119	3.4	0.33	7.05	-56.5	200	10.68	8.10
1439	16.02	3.719	3.018	4.1	0.39	7.17	-59.8	200	8.78	8.10
1444	16.27	3.595	2.995	6.3	0.61	7.38	-55.7	200	8.41	8.10
1449	16.16	3.558	2.957	5.6	0.54	7.32	-61.9	225	7.25	8.10
1454	16.22	3.536	2.943	5.6	0.54	7.34	-66.2	225	6.41	8.10
1459	16.20	3.540	2.946	6.5	0.63	7.38	-71.1	225	5.78	8.10
1504	16.33	3.585	2.943	6.3	0.61	7.42	-74.8	225	7.44	8.10

Total Depth of Well: 19.5

Depth To Water Before Purging: 7.63

Depth To Water After Purging: 8.10

Scanned with CamScanner

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-9-18

Site/Well No.: MW-37 | Replicate No.: — | Code No.: —

Weather: 82°F SUNNY | Sampling Time: Begin 1555 End 1650

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	22.76
Depth to Water (ft bmp)	7.56
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	15.2
Casing Diameter/Type	2" PVC
Gallons in Well	2.43
Gallons Pumped/Bailed Prior to Sampling	3.17
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1555 end 1650
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.10
SpC (mS/cm)	2.361
CND (mS/cm)	1.959
Dissolved Oxygen (%)	3.8
Dissolved Oxygen (mg/L)	0.37
pH (s.u.)	7.41
ORP (mV)	-84.5
Turbidity (NTU)	7.45
Color	brown/yellow esp. at beginning
Odor	NONE
Appearance	~~Brown/yellow~~ RCS normal
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: RACHEL STERN (RCS)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

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ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-37 PROJ #: MI001454.0004.00001

DATE : 8-9-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1555	18.44	1.497	1.329	117.4	11.04	6.78	83.3	200	72.8	7.56
1600	16.89	2.806	2.371	9.3	0.89	6.42	84.9	200	73.4	7.82
1605	16.49	2.748	2.301	7.2	0.71	6.64	58.4	200	39.5	7.82
1610	16.39	2.692	2.249	5.7	0.56	6.80	39.0	200	26.8	7.82
1615	16.24	2.603	2.167	5.2	0.51	6.92	12.3	200	14.8	7.82
1620	16.16	2.528	2.101	4.5	0.45	7.02	-14.1	200	10.22	7.79
1625	16.30	2.480	2.068	4.4	0.44	7.14	-39.7	200	10.20	7.79
1630	16.34	2.446	2.042	4.5	0.44	7.27	-58.9	200	8.97	7.80
1635	16.21	2.410	2.005	4.5	0.43	7.30	-69.6	200	7.77	7.80
1640	16.27	2.387	1.988	4.0	0.39	7.38	-78.8	200	6.77	7.81
1645	16.12	2.364	1.963	3.8	0.38	7.42	-83.1	200	7.09	7.81
1650	16.10	2.361	1.959	3.8	0.37	7.41	-84.5	200	7.45	7.81

Total Depth of Well:	22.76	
Depth To Water Before Purging:	7.56	
Depth To Water After Purging:	7.81	

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ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-10-18

Site/Well No.: MW-30 | Replicate No.: — | Code No.: —

Weather: 70°F CLOUDY | Sampling Time: Begin 0830 End 0915

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	24.70
Depth to Water (ft bmp)	9.46
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	15.24
Casing Diameter/Type	2" PVC
Gallons in Well	2.44
Gallons Pumped/Bailed Prior to Sampling	2.38
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 0830 end 0915
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.57
SpC (mS/cm)	4.474
CND (mS/cm)	3.753
Dissolved Oxygen (%)	4.5
Dissolved Oxygen (mg/L)	0.43
pH (s.u.)	7.29
ORP (mV)	-81.0
Turbidity (NTU)	0.95
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1;4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: RACHEL STERN (RCS)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

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ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-30 PROJ #: MI001454.0004.00001

DATE : 8-10-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
0830	18.47	2.268	1.977	111.3	10.39	6.73	88.5	200	7.97	9.46
0835	18.17	4.334	3.769	10.3	0.95	6.53	83.7	200	6.70	10.68
0840	17.75	4.346	3.743	7.0	0.66	6.64	45.2	200	4.86	10.74
0845	17.33	4.353	3.715	4.8	0.45	6.79	4.6	200	2.40	10.81
0850	17.07	4.374	3.711	3.7	0.36	6.91	-27.9	200	3.07	10.82
0855	16.84	4.397	3.712	3.7	0.36	7.00	-50.2	200	1.60	10.84
0900	16.64	4.444	3.734	3.5	0.34	7.08	-63.3	200	1.88	10.86
0905	16.58	4.466	3.748	3.9	0.37	7.14	-70.5	200	2.25	10.84
0910	16.59	4.481	3.760	4.1	0.40	7.22	-76.2	200	2.13	10.82
0915	16.57	4.474	3.753	4.5	0.43	7.29	-81.0	200	0.95	10.80

Total Depth of Well:	24.70		
Depth To Water Before Purging:		9.44	
Depth To Water After Purging:		10.80	

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ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-10-18

Site/Well No.: MW-31 | Replicate No.: — | Code No.: —

Weather: 70°F MOSTLY SUNNY | Sampling Time: Begin 1004 End 1049

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	21.67
Depth to Water (ft bmp)	9.57
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	12.03
Casing Diameter/Type	2" PVC
Gallons in Well	1.92
Gallons Pumped/Bailed Prior to Sampling	2.97
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1004 end 1049
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.48
SpC (mS/cm)	22.95
CND (mS/cm)	19.64
Dissolved Oxygen (%)	3.3
Dissolved Oxygen (mg/L)	0.29
pH (s.u.)	7.50
ORP (mV)	-45.7
Turbidity (NTU)	1.13
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: RACHEL STERN (RCS)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

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ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-31 PROJ #: MI001454.0004.00001

DATE : 8-10-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1004	18.17	23.53	20.45	67.0	5.21	7.97	14.7	250	2.38	9.57
1009	17.63	23.32	20.03	8.7	0.77	7.73	5.4	250	2.78	9.71
1014	17.50	23.26	19.92	6.0	0.52	7.61	-4.5	250	1.27	9.71
1019	17.48	23.12	19.80	5.4	0.48	7.56	-12.9	250	1.05	9.71
1024	17.47	22.95	19.65	4.7	0.42	7.56	-21.0	250	1.02	9.71
1029	17.47	22.78	19.52	4.1	0.36	7.52	-28.0	250	1.02	9.71
1034	17.52	22.72	19.47	4.0	0.35	7.51	-34.3	250	0.89	9.71
1039	17.53	22.75	19.50	3.6	0.32	7.48	-39.6	250	1.10	9.71
1044	17.55	22.80	19.56	3.6	0.32	7.48	-42.9	250	1.17	9.71
1049	17.48	22.95	19.64	3.3	0.29	7.50	-45.7	250	1.13	9.71

Total Depth of Well:	21.67	
Depth To Water Before Purging:		9.57
Depth To Water After Purging:		9.71

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Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-10-18

Site/Well No.: MW-42 | Replicate No.: — | Code No.: —

Weather: 77°F SUNNY | Sampling Time: Begin 1308 End 1338

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.43
Depth to Water (ft bmp)	8.87
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.56
Casing Diameter/Type	2" PVC
Gallons in Well	1.85
Gallons Pumped/Bailed Prior to Sampling	1.59
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1308 end 1338
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.18
SpC (mS/cm)	3.876
CND (mS/cm)	3.297
Dissolved Oxygen (%)	5.0
Dissolved Oxygen (mg/L)	0.48
pH (s.u.)	7.25
ORP (mV)	-96.6
Turbidity (NTU)	2.58
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: RACHEL STERN (CRCS)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

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ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-42 PROJ #: MI001454.0004.00001

DATE : 8-10-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1308	18.52	3.957	3.458	25.1	2.08	8.64	-118.6	300	2.17	8.87
1313	18.24	3.884	3.380	6.6	0.61	7.70	-106.7	200	1.84	9.21
1318	17.70	3.896	3.352	5.0	0.48	7.28	-102.7	200	2.07	9.20
1323	17.56	3.888	3.334	5.1	0.49	7.23	-100.9	200	2.83	9.21
1328	17.34	3.877	3.309	5.2	0.49	7.21	-98.4	200	3.04	9.21
1333	17.22	3.893	3.315	5.5	0.53	7.22	-96.5	200	3.25	9.21
1338	17.18	3.876	3.297	5.0	0.48	7.25	-96.6	200	2.58	9.21
RLS ~~1343~~										
RLS ~~1348~~										

Total Depth of Well: 20.43

Depth To Water Before Purging: 8.87

Depth To Water After Purging: 9.21

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Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 08-10-2018

Site/Well No.: MW-52 | Replicate No.: — | Code No.: —

Weather: 80°F, SUNNY TO CLOUDY | Sampling Time: Begin 1430 End 1435

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.76
Depth to Water (ft bmp)	8.23
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.53
Casing Diameter/Type	2" PVC
Gallons in Well	1.8448
Gallons Pumped/Bailed Prior to Sampling	2.6420
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1340 end 1430
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.21
SpC (mS/cm)	4.878
CND (mS/cm)	4.154
Dissolved Oxygen (%)	3.8
Dissolved Oxygen (mg/L)	0.36
pH (s.u.)	7.36
ORP (mV)	00
Turbidity (NTU)	0.94
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-52 PROJ #: MI001454.0004.00001

DATE : 08-10-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1340	17.48	4.330	3.708	31.2	2.91	8.04	0.0	200	2.26	8.23
1345	17.21	4.475	3.813	12.6	1.18	7.83	0.0	200	3.44	8.31
1350	17.17	4.629	3.938	8.3	0.79	7.68	0.0	200	2.15	8.31
1355	17.11	4.724	4.011	7.2	0.69	7.58	0.0	200	1.49	8.31
1400	17.26	4.783	4.076	6.3	0.60	7.51	0.0	200	1.17	8.31
1405	17.18	4.832	4.110	5.9	0.56	7.47	0.0	200	1.45	8.31
1410	17.18	4.831	4.111	5.2	0.50	7.42	0.0	200	1.66	8.31
1415	17.09	4.854	4.121	4.7	0.45	7.40	0.0	200	1.25	8.31
1420	17.29	4.883	4.158	4.2	0.40	7.41	0.0	200	0.86	8.31
1425	17.15	4.892	4.159	4.0	0.38	7.37	0.0	200	0.99	8.31
1430	17.21	4.878	4.154	3.8	0.36	7.36	0.0	200	0.94	8.31
Total Depth of Well:		19.76								
Depth To Water Before Purging:			8.23							
Depth To Water After Purging:			8.31							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: W-16-01 | Replicate No.: — | Code No.: —

Weather: Sunny 80°F | Sampling Time: Begin 840 End 910

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	16.64
Depth to Water (ft bmp)	6.84
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	9.80
Casing Diameter/Type	2" PVC
Gallons in Well	1.568
Gallons Pumped/Bailed Prior to Sampling	1.98
Sample Pump Intake Setting (ft bmp)	N/A ~~250 mL/min~~ EST/080618
Purge Time	begin 840 end 910
Pumping Rate (ml/min)	250 mL/min
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.69
SpC (mS/cm)	3.283
CND (mS/cm)	2.887
Dissolved Oxygen (%)	1.9
Dissolved Oxygen (mg/L)	0.17
pH (s.u.)	7.01
ORP (mV)	-81.8
Turbidity (NTU)	2.35
Color	clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	YSI was not set up to read CND at first, had to re-set it up mid way through to get measurements

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.				
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : TW-16-01 PROJ #: MI001454.0004.00001

DATE : ~~8~~ 8-6-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
8:40	18.29	3.187	—	9.0	0.82	6.79	-78.8	350	10.98	6.84
8:45	18.26	3.093	—	3.5	0.33	6.87	-87.8	250	3.35	6.92
8:50	18.29	3.204	—	2.8	0.26	6.94	-88.5	250	3.20	6.91
8:55	18.30	3.238	2.824	2.6	0.25	6.97	-83.7	250	3.46	6.91
9:00	18.24	3.263	2.843	2.3	0.22	6.98	-80.7	250	3.06	6.91
9:05	18.65	3.275	2.877	1.9	0.17	7.00	-81.7	250	3.13	6.91
9:10	18.69	3.283	2.887	1.9	0.17	7.01	-81.8	250	2.35	6.90

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: TW-116-02 | Replicate No.: — | Code No.: —

Weather: partly sunny 81°F | Sampling Time: Begin 1030 End 1110

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	16.91
Depth to Water (ft bmp)	6.68
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.23
Casing Diameter/Type	2" PVC
Gallons in Well	1.6368
Gallons Pumped/Bailed Prior to Sampling	2.642
Sample Pump Intake Setting (ft bmp)	— N/A
Purge Time	begin 10:30 end
Pumping Rate (ml/min)	250 mL/min
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.05
SpC (mS/cm)	4.830
CND (mS/cm)	4.282
Dissolved Oxygen (%)	0.9
Dissolved Oxygen (mg/L)	0.09
pH (s.u.)	7.15
ORP (mV)	-103.5
Turbidity (NTU)	0.59
Color	Clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : TW-16-02 PROJ #: MI001454.0004.00001

DATE : 8-6-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
10:30	18.74	4.802	4.230	23.6	2.02	7.30	-116.0	250	2.19	6.68
10:35	19.48	4.573	4.090	2.9	0.26	7.20	-116.3	250	2.30	6.74
10:40	19.30	4.503	4.010	1.9	0.17	7.18	-112.8	250	1.99	6.73
10:45	19.35	4.577	4.085	2.1	0.19	7.16	-105.3	250	1.95	6.73
10:50	19.51	4.618	4.135	1.9	0.18	7.16	-108.2	250	1.61	6.73
10:55	19.81	4.731	4.260	1.6	0.13	7.16	-110.3	250	1.97	6.73
11:00	19.18	4.793	4.259	1.5	0.14	7.16	-110.3	250	0.99	6.72
11:05	19.08	4.805	4.262	1.2	0.11	7.15	-107.4	250	0.79	6.72
11:10	19.05	4.830	4.282	0.9	0.09	7.15	-103.5	250	0.59	6.72

Total Depth of Well:	16.91	
Depth To Water Before Purging:		6.68
Depth To Water After Purging:		6.72

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: MW-23 | Replicate No.: — | Code No.: —

Weather: cloudy, 81°F | Sampling Time: Begin 11:58 End 1228

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.70
Depth to Water (ft bmp)	5.84
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	13.86
Casing Diameter/Type	2" PVC
Gallons in Well	2.2176
Gallons Pumped/Bailed Prior to Sampling	
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 11:58 end 1228
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.64
SpC (mS/cm)	6.141
CND (mS/cm)	5.399
Dissolved Oxygen (%)	1.6
Dissolved Oxygen (mg/L)	0.16
pH (s.u.)	7.47
ORP (mV)	-123.0
Turbidity (NTU)	2.91
Color	Clear
Odor	~~normal~~ EST08618 none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma Ter Beek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-23 PROJ #: MI001454.0004.00001

DATE : 8-6-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
11:58	17.69	6.254	5.390	6.9	0.62	7.51	-101.9	300	11.32	5.84
12:03	18.56	6.198	5.436	3.1	0.29	7.50	-117.8	250	6.92	6.07
12:08	18.73	6.180	5.440	2.0	0.18	7.51	-125.8	250	4.00	6.04
12:13	18.57	6.176	5.414	1.8	0.16	7.50	-125.2	250	2.58	6.03
12:18	18.65	6.168	5.420	1.4	0.13	7.49	-124.5	250	3.30	6.02
12:23	18.67	6.150	5.405	1.4	0.13	7.48	-122.3	250	2.37	6.02
12:28	18.64	6.141	5.399	1.6	0.16	7.47	-123.0	250	2.91	6.02

Total Depth of Well:	19.70	
Depth To Water Before Purging:	5.84	
Depth To Water After Purging:	6.02	

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Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: MW-22 | Replicate No.: — | Code No.: —

Weather: Sunny, 83°F | Sampling Time: Begin 1300 End 1330

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.50
Depth to Water (ft bmp)	6.82
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	13.68
Casing Diameter/Type	2" PVC
Gallons in Well	2.1888
Gallons Pumped/Bailed Prior to Sampling	1.982
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1300 end 1330
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.94
SpC (mS/cm)	9.520
CND (mS/cm)	8.418
Dissolved Oxygen (%)	1.3
Dissolved Oxygen (mg/L)	0.11
pH (s.u.)	6.97
ORP (mV)	-67.9
Turbidity (NTU)	2.57
Color	clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	All three bolts missing from well vault cover

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-22 PROJ #: MI001454.0004.00001

DATE : 8-6-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1300	17.98	10.78	9.335	9.6	0.86	7.15	-104.0	250	20.7	6.82
1305	18.20	10.08	8.739	2.0	0.18	7.04	-82.8	250	7.94	6.94
1310	18.00	9.820	8.508	1.9	0.17	7.00	-73.6	250	9.12	6.92
1315	18.46	9.637	8.433	1.6	0.15	6.99	-67.9	250	2.86	6.91
1320	18.74	9.587	8.444	1.4	0.13	6.98	-67.4	250	3.18	6.90
1325	18.95	9.564	8.456	1.3	0.12	6.98	-67.2	250	2.58	6.90
1330	18.94	9.520	8.418	1.3	0.11	6.97	-67.9	250	2.57	6.90

Total Depth of Well:	20.50	
Depth To Water Before Purging:	6.82	
Depth To Water After Purging:	6.90	

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Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: MW-51 | Replicate No.: — | Code No.: —

Weather: Cloudy, 81°F | Sampling Time: Begin 1425 End 1455

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	18.85
Depth to Water (ft bmp)	7.30
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.55
Casing Diameter/Type	2" PVC
Gallons in Well	1.848
Gallons Pumped/Bailed Prior to Sampling	1.982
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1425 end 1455
Pumping Rate (ml/min)	200-250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.41
SpC (mS/cm)	1.325
CND (mS/cm)	1.096
Dissolved Oxygen (%)	1.3
Dissolved Oxygen (mg/L)	0.13
pH (s.u.)	7.56
ORP (mV)	-30.8
Turbidity (NTU)	0.98
Color	Clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

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YSI/LOW FLOW SAMPLING LOG

WELL : MW-51 PROJ #: MI001454.0004.00001

DATE : 8-6-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1425	17.60	1.954	1.654	93.0	8.91	8.15	57.4	200	3.13	7.30
1430	16.55	1.760	1.475	4.5	0.42	7.83	28.1	200	1.67	7.37
1435	16.66	1.633	1.370	2.6	0.25	7.73	15.8	200	1.99	7.38
1440	16.47	1.493	1.249	1.8	0.18	7.65	-1.3	250	1.26	7.39
1445	16.43	1.369	1.144	1.3	0.14	7.58	-17.2	250	1.13	7.39
1450	16.47	1.326	1.109	1.3	0.13	7.55	-29.8	250	0.92	7.38
1455	16.41	1.325	1.096	1.3	0.13	7.56	-30.8	250	0.98	7.38

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Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-8-18

Site/Well No.: MW-65 | Replicate No.: — | Code No.: —

Weather: 75°F, partly sunny | Sampling Time: Begin 945 End 1030

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	21.18
Depth to Water (ft bmp)	9.07
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	12.11
Casing Diameter/Type	2" PVC
Gallons in Well	1.9376
Gallons Pumped/Bailed Prior to Sampling	
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 945 end 1030
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	15.23
SpC (mS/cm)	3.885
CND (mS/cm)	3.160
Dissolved Oxygen (%)	2.7
Dissolved Oxygen (mg/L)	0.27
pH (s.u.)	7.30
ORP (mV)	-97.3
Turbidity (NTU)	1.91
Color	Clear; slightly yellow/turbid
Odor	none
Appearance	normal - slightly dirty
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

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YSI/LOW FLOW SAMPLING LOG

WELL : MW-65 PROJ #: MI001454.0004.00001

DATE : 8-8-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
945	14.79	4.186	3.370	30.6	3.00	7.00	-105.4	250	30.5	9.07
950	14.73	3.952	3.169	9.4	0.92	7.14	-111.7	250	20.6	9.16
955	15.02	3.626	2.935	4.6	0.46	7.26	-105.2	250	14.3	9.13
1000	14.90	3.701	2.988	3.9	0.39	7.29	-104.4	200	8.82	9.14
1005	14.89	3.745	3.022	4.6	0.46	7.27	-102.0	250	6.04	9.14
1010	14.71	3.795	3.050	3.8	0.38	7.28	-98.7	250	4.12	9.14
1015	15.02	3.825	3.097	3.5	0.35	7.28	-93.9	250	2.98	9.14
1020	15.07	3.865	3.133	3.7	0.36	7.29	-98.1	250	2.18	9.14
1025	15.01	3.879	3.139	2.9	0.29	7.30	-98.2	250	2.24	9.14
1030	15.23	3.885	3.160	2.7	0.27	7.30	-97.3	250	1.91	9.14

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Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-8-18

Site/Well No.: PW-16-02 | Replicate No.: ← | Code No.: —

Weather: 75°F, partly sunny | Sampling Time: Begin 1320 End 1355

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	23.65
Depth to Water (ft bmp)	6.33
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	17.32
Casing Diameter/Type	~~2" PVC~~ Est 6" 6" PVC
Gallons in Well	25.46
Gallons Pumped/Bailed Prior to Sampling	2.312
Sample Pump Intake Setting (ft bmp)	— N/A
Purge Time	begin 1320 end 1355
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	15.10
SpC (mS/cm)	1.257
CND (mS/cm)	1.016
Dissolved Oxygen (%)	1.6
Dissolved Oxygen (mg/L)	0.16
pH (s.u.)	6.86
ORP (mV)	-78.8
Turbidity (NTU)	0.72
Color	Clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	*Had to give R. Stern IP for first 10-15 minutes, replaced battery, started DTW measurements again

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : PW-16-02 PROJ #: MI001454.0004.00001

DATE : 8-8-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1320	14.48	1.323	1.055	95.5	8.55	7.16	-66.6	300	3.60	6.33
1325	14.54	1.280	1.025	11.7	1.17	6.65	-60.3	250	3.77	*
1330	14.80	1.261	1.015	5.6	0.56	6.74	-70.8	250	1.36	*
1335	15.15	1.255	1.019	3.3	0.33	6.80	-75.3	250	0.75	6.53
1340	15.32	1.259	1.025	2.1	0.22	6.84	-79.5	250	0.85	6.51
1345	15.36	1.255	1.024	1.6	0.16	6.84	-77.3	250	0.79	6.52
1350	15.19	1.256	1.020	1.5	0.15	6.85	-75.9	250	0.66	6.52
1355	15.10	1.257	1.016	1.6	0.16	6.86	-78.8	250	0.72	6.51

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Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-8-18

Site/Well No.: MW-66 | Replicate No.: | Code No.:

Weather: 84°F Partly Cloudy | Sampling Time: Begin 1550 End 1650

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.02
Depth to Water (ft bmp)	7.25
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.77
Casing Diameter/Type	2" PVC
Gallons in Well	1.88
Gallons Pumped/Bailed Prior to Sampling	3.963
Sample Pump Intake Setting (ft bmp)	
Purge Time	begin 1550 end 1650
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.80
SpC (mS/cm)	3.388
CND (mS/cm)	2.923
Dissolved Oxygen (%)	1.2
Dissolved Oxygen (mg/L)	0.11
pH (s.u.)	7.58
ORP (mV)	-124.1
Turbidity (NTU)	67.4
Color	murky grey
Odor	none
Appearance	dirty/murky
Sampling Method	Low Flow
Remarks	Angela DeGrandis said O.K. to take sample eventhough turbidity >10NTU

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeck (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-66 PROJ #: MI001454.0004.00001

DATE : 8-8-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1550	17.49	3.169	2.712	22.8	2.09	8.12	-119.3	250	770	7.25
1555	17.49	3.154	2.702	5.7	0.51	7.59	-112.5	250	947	7.31
1600	17.63	3.192	2.741	21.8	2.01	7.61	-105.2	250	904	7.32
1605	17.29	3.210	2.737	3.8	0.36	7.52	-114.8	250	850	7.34
1610	17.17	3.231	2.748	2.2	0.22	7.52	-117.8	250	727	7.34
1615	17.23	3.254	2.772	2.9	0.29	7.55	-120.8	250	615	7.34
1620	17.13	3.285	2.787	1.9	0.18	7.55	-121.0	250	95	7.35
1625	17.05	3.315	2.851	1.4	0.13	7.80	-120.8	250	73	7.36
1630	17.57	3.333	2.862	1.0	0.09	7.56	-115.2	250	72	7.30
1635	17.65	3.359	2.888	1.1	0.10	7.56	-120.6	250	47	7.30
1640	17.76	3.363	2.899	1.1	0.10	7.56	-121.8	250	29	7.30
1645	17.87	3.378	2.918	1.2	0.12	7.57	-123.5	250	64.2	7.30
1650	17.80	3.388	2.923	1.2	0.11	7.58	-124.1	250	67.4	7.29
Total Depth of Well:		19.02								
Depth To Water Before Purging:			7.25							
Depth To Water After Purging:			7.29							

ARCADIS

Water Sampling Log

Project	Ford LTP	Project No.	MI001454.0004.00001	Page	1 of 2
Location	Livonia, MI			Date	8-9-18
Site/Well No.	MW-71	Replicate No.	—	Code No.	—
Weather	70°F, Cloudy	Sampling Time:	Begin 820	End	910

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.35
Depth to Water (ft bmp)	9.82
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.53
Casing Diameter/Type	2" PVC
Gallons in Well	1.685
Gallons Pumped/Bailed Prior to Sampling	3.96
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 820 end 910
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.47
SpC (mS/cm)	8.345
CND (mS/cm)	7.304
Dissolved Oxygen (%)	9.2
Dissolved Oxygen (mg/L)	0.80
pH (s.u.)	7.00
ORP (mV)	-46.1
Turbidity (NTU)	1.68
Color	Clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	transducer & plug removed to sample well & take DTW measurements

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-71 PROJ #: MI001454.0004.00001

DATE : 8-9-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
~~18.5~~ 320	18.48	8.433	7.381	151.0	12.49	6.64	-51.5	300	24.5	9.82
825	18.70	8.580	7.550	38.1	3.26	6.83	-69.7	200	7.12	10.08
830	18.68	8.584	7.547	33.0	3.13	6.92	-63.9	300	4.17	10.12
835	18.54	8.404	7.369	25.7	2.39	6.95	-61.1	300	2.54	10.14
840	18.46	8.369	7.324	19.3	1.73	6.95	-60.2	300	2.10	10.16
845	18.51	8.339	7.307	13.3	1.16	6.97	-57.6	300	2.40	10.15
850	18.49	8.333	7.296	12.3	1.13	6.98	-50.7	300	2.19	10.15
855	18.50	8.333	7.296	10.9	0.97	6.99	-48.9	300	1.80	10.14
900	18.50	8.335	7.300	9.7	0.86	7.00	-45.9	300	2.28	10.14
905	18.45	8.344	7.299	9.1	0.82	7.00	-46.4	300	1.88	10.14
910	18.47	8.345	7.304	9.2	0.80	7.00	-46.1	300	1.68	10.13
Total Depth of Well:		20.35								
Depth To Water Before Purging:			9.82							
Depth To Water After Purging:			10.13							

8-9-18

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-9-18

Site/Well No.: MW-45 | Replicate No.: — | Code No.: —

Weather: 75°F, partly Sunny | Sampling Time: Begin 935 End 1010

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.99
Depth to Water (ft bmp)	9.04
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.95
Casing Diameter/Type	2" PVC
Gallons in Well	1.752
Gallons Pumped/Bailed Prior to Sampling	2.774
Sample Pump Intake Setting (ft bmp)	~~300~~ EST080918 N/A
Purge Time	begin 935 end 1010
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.54
SpC (mS/cm)	1.889
CND (mS/cm)	1.584
Dissolved Oxygen (%)	12.3
Dissolved Oxygen (mg/L)	1.18
pH (s.u.)	7.20
ORP (mV)	-18.1
Turbidity (NTU)	3.59
Color	clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	removed splug + transducer before sampling/taking DTW reading per D. Kamath

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.				
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-45 PROJ #: MI001454.0004.00001

DATE : 8-9-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
935	16.66	1.990	1.670	60.70	5.63	7.59	-0.9	300	13.9	9.04
940	16.85	1.872	1.578	34.4	3.36	7.32	-1.9	300	9.10	9.09
945	16.68	1.744	1.467	25.4	2.50	7.22	-5.3	300	6.33	9.08
950	16.54	1.744	1.462	23.5	2.19	7.19	-7.1	300	3.49	9.09
955	16.57	1.755	1.472	17.6	1.76	7.19	-6.4	300	3.84	9.09
10:00 ~~955~~	16.55	1.787	1.500	14.6	1.38	7.19	-10.9	300	3.13	9.09
1005	16.59	1.861	1.562	13.0	1.27	7.20	-15.2	300	3.26	9.09
1010	16.54	1.889	1.584	12.3	1.18	7.20	-18.1	300	3.59	9.08

8-9-18

Total Depth of Well:	19.99	
Depth To Water Before Purging:		9.04
Depth To Water After Purging:		9.08

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-9-18

Site/Well No.: MW-70 | Replicate No.: — | Code No.: —

Weather: 75°F, partly sunny | Sampling Time: Begin 1035 End 1115

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.13
Depth to Water (ft bmp)	9.56
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.57
Casing Diameter/Type	2" PVC
Gallons in Well	1.69
Gallons Pumped/Bailed Prior to Sampling	3.17
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1035 end 1115
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.36
SpC (mS/cm)	3.122
CND (mS/cm)	2.680
Dissolved Oxygen (%)	3.8
Dissolved Oxygen (mg/L)	0.36
pH (s.u.)	7.31
ORP (mV)	-48.2
Turbidity (NTU)	1.19
Color	clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-70 PROJ #: MI001454.0004.00001

DATE : 8-9-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1035	17.85	2.977	2.566	41.0	3.89	7.42	-28.8	300	7.22	9.56
1040	17.65	2.982	2.564	17.4	1.67	7.36	-36.2	300	4.27	9.67
1045	17.50	2.950	2.527	9.6	0.92	7.36	-48.2	300	3.79	9.70
1050	17.39	2.989	2.555	5.6	0.52	7.33	-49.9	300	1.81	9.70
1055	17.35	3.039	2.595	4.6	0.43	7.32	-49.0	300	1.55	9.69
1100	17.34	3.074	2.624	4.1	0.39	7.31	-49.2	300	1.07	9.70
1105	17.32	3.108	2.653	3.6	0.35	7.31	-46.9	300	1.08	9.70
1110	17.36	3.123	2.682	3.4	0.34	7.30	-47.4	300	1.18	9.70
1115	17.36	3.122	2.680	3.8	0.36	7.31	-48.2	300	1.19	9.70
					8-9-18					
Total Depth of Well:		20.13								
Depth To Water Before Purging:			9.56							
Depth To Water After Purging:			9.70							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-9-18

Site/Well No.: MW-46 | Replicate No.: — | Code No.: —

Weather: 78°F, partly sunny | Sampling Time: Begin 1135 End 1230

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.94
Depth to Water (ft bmp)	9.36
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.58
Casing Diameter/Type	2" PVC
Gallons in Well	1.693
Gallons Pumped/Bailed Prior to Sampling	4.36
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1135 end 1230
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.38
SpC (mS/cm)	5.960
CND (mS/cm)	5.089
Dissolved Oxygen (%)	1.2
Dissolved Oxygen (mg/L)	0.12
pH (s.u.)	7.28
ORP (mV)	13.7
Turbidity (NTU)	1.24
Color	Clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	removed, plug & transducer prior to taking DTW measurement & sampling per D. Kamath instruction

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-46 PROJ #: MI001454.0004.00001

DATE : 8-9-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1135	17.91	6.116	5.288	39.1	3.51	7.46	66.8	300	12.2	9.36
1140	17.74	6.133	5.281	7.7	0.71	7.32	67.0	300	9.05	9.78
1145	17.90	6.010	5.194	4.0	0.37	7.29	61.1	300	7.60	9.75
1150	17.67	5.997	5.157	2.8	0.26	7.29	50.5	300	4.97	9.76
1155	17.48	5.995	5.134	2.2	0.21	7.28	40.2	300	5.75	9.77
1200	17.41	6.013	5.142	2.0	0.19	7.28	31.1	300	4.63	9.80
1205	17.46	6.017	5.150	1.6	0.16	7.28	26.0	300	3.41	9.79
1210	17.24	6.034	5.137	1.5	0.14	7.27	25.2	300	2.87	9.84
1215	17.31	6.023	5.138	1.3	0.12	7.27	21.5	300	2.02	9.85
1220	17.36	5.990	5.117	1.3	0.13	7.28	16.3	300	1.30	9.83
1225	17.43	5.975	5.110	1.2	0.11	7.28	14.5	300	1.35	9.82
1230	17.38	5.960	5.089	1.2	0.12	7.28	13.7	300	1.24	9.83

ARCADIS *DUP-02

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-9-18

Site/Well No.: MW-47 | Replicate No.: ~~DUP-02~~ | Code No.: ——

Weather: 80°F, Sunny | Sampling Time: Begin 1355 End 1455

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.94
Depth to Water (ft bmp)	9.46
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.48
Casing Diameter/Type	2" PVC
Gallons in Well	1.6768
Gallons Pumped/Bailed Prior to Sampling	3.96
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1355 end 1455
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.04
SpC (mS/cm)	4.189
CND (mS/cm)	3.708
Dissolved Oxygen (%)	1.6
Dissolved Oxygen (mg/L)	0.15
pH (s.u.)	7.27
ORP (mV)	-63.7
Turbidity (NTU)	2.60
Color	Clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	DUP-02

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	~~3~~ 6	HCL
VOCs	40mL voa	~~3~~ 6	HCL

DUP-02

*DUP-02 !!!

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

* DUP-02

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : ~~MW-46~~ EST080918 MW-47 PROJ #: MI001454.0004.00001

DATE : 8-9-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1355	20.15	3.588	3.247	56.7	5.09	7.43	-12.4	300	68.6	9.46
1400	19.82	3.629	3.272	12.1	1.07	7.18	-11.9	250	58.8	9.57
1405	19.52	3.798	3.401	5.0	0.45	7.16	-26.7	250	49.1	9.58
1410	19.79	3.842	3.466	3.5	0.32	7.18	-32.3	250	28.2	9.56
1415	19.32	3.941	3.513	2.8	0.26	7.20	-40.2	250	19.5	9.57
1420	19.19	3.996	3.555	2.6	0.24	7.21	-44.5	250	16.4	9.57
1425	19.19	4.036	3.590	2.5	0.22	7.22	-48.2	250	12.0	9.57
1430	19.07	4.099	3.635	1.9	0.17	7.23	-53.4	250	7.56	9.56
1435	18.96	4.118	3.643	1.8	0.18	7.23	-55.3	250	5.74	9.56
1440	19.01	4.145	3.672	1.8	0.17	7.24	-58.8	250	4.87	9.56
1445	19.12	4.153	3.685	1.6	0.16	7.25	-60.0	250	4.12	9.56
1450	19.10	4.175	3.705	1.8	0.16	7.26	-62.4	250	3.56	9.56
1455	19.04	4.189	3.708	1.6	0.15	7.27	-63.9	250	2.60	9.56

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-9-18

Site/Well No.: MW-68 | Replicate No.: — | Code No.: —

Weather: 80°F, Sunny | Sampling Time: Begin 1535 End 1610

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.84
Depth to Water (ft bmp)	8.83
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.01
Casing Diameter/Type	2" PVC
Gallons in Well	1.76
Gallons Pumped/Bailed Prior to Sampling	2.71
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1535 end 1610
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.89
SpC (mS/cm)	11.40
CND (mS/cm)	9.751
Dissolved Oxygen (%)	3.3
Dissolved Oxygen (mg/L)	0.31
pH (s.u.)	7.04
ORP (mV)	74.7
Turbidity (NTU)	2.43
Color	Clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-68 PROJ #: MI001454.0004.00001

DATE : 8-9-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1535	18.40	10.75	9.406	37.8	3.27	7.20	88.5	300	20.0	8.83
1540	19.02	10.72	9.496	9.6	0.86	7.05	77.1	300	2.89	8.88
1545	18.05	10.72	9.291	5.4	0.48	7.04	74.5	300	1.88	8.91
1550	17.87	10.95	9.462	4.2	0.38	7.03	72.7	300	1.56	8.91
1555	17.83	11.09	9.568	3.7	0.33	7.03	77.1	300	1.84	8.92
1600	17.70	11.26	9.692	3.4	0.31	7.04	75.3	300	2.82	8.92
1605	17.67	11.32	9.734	3.4	0.32	7.04	76.0	300	2.63	8.91
1610	17.89	11.40	9.751	3.3	0.31	7.04	74.7	300	2.43	8.91

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-10-18

Site/Well No.: MW-41 | Replicate No.: DUP-03 | Code No.: ____

Weather: 68°F, partly sunny | Sampling Time: Begin 825 End 900

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.94
Depth to Water (ft bmp)	8.98
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.96
Casing Diameter/Type	2" PVC
Gallons in Well	1.9136
Gallons Pumped/Bailed Prior to Sampling	2.774
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 825 end 900
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.41
SpC (mS/cm)	8.091
CND (mS/cm)	6.764
Dissolved Oxygen (%)	8.7
Dissolved Oxygen (mg/L)	0.32
pH (s.u.)	7.26
ORP (mV)	-78.0
Turbidity (NTU)	1.07
Color	clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	DUP-03

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	~~3~~ 6	HCL
VOCs	40mL voa	~~3~~ 6	HCL

* DUP-03 !!!

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.				
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

*DUP-03

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YSI/LOW FLOW SAMPLING LOG

WELL : MW-41 PROJ #: MI001454.0004.00001

DATE : 8-10-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
825	16.57	7.9916	6.713	36.8	3.40	6.83	60.4	300	5.35	8.98
830	16.68	8.043	6.767	21.4	2.00	6.99	-12.9	300	1.77	9.31
835	16.67	8.027	6.749	16.8	1.58	7.09	-54.0	300	1.35	9.32
840	16.49	8.017	6.712	13.6	1.30	7.16	-67.9	300	1.06	9.35
845	16.30	8.035	6.710	12.6	1.18	7.17	-70.5	300	1.24	9.36
850	16.41	8.056	6.735	10.1	0.95	7.21	-72.4	300	1.08	9.36
855	16.48	8.084	6.767	8.8	0.83	7.23	-75.0	300	1.29	9.36
900	16.41	8.091	6.764	8.7	0.32	7.26	-78.0	300	1.07	9.36

8-10-18

Total Depth of Well: 20.94

Depth To Water Before Purging: 8.98

Depth To Water After Purging: 9.36

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-10-18

Site/Well No.: MW-40 | Replicate No.: ~~MS/MSD~~ #3 | Code No.: —

Weather: 75°F, Sunny | Sampling Time: Begin 1000 End 1050

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.64
Depth to Water (ft bmp)	9.41
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.23
Casing Diameter/Type	2" PVC
Gallons in Well	1.637
Gallons Pumped/Bailed Prior to Sampling	3.963
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1000 end 1050
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.84
SpC (mS/cm)	10.98
CND (mS/cm)	9.475
Dissolved Oxygen (%)	5.3
Dissolved Oxygen (mg/L)	0.50
pH (s.u.)	7.35
ORP (mV)	-68.9
Turbidity (NTU)	2.21
Color	clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	MS/MSD #3

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	~~3~~ 9	HCL
VOCs	40mL voa	~~3~~ 9	HCL
MS/MSD #3!!!			

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG *MS/MSD #3

WELL : MW-40 PROJ #: MI001454.0004.00001

DATE : 8-10-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1000	17.76	9.914	8.543	102.3	8.34	7.42	-39.6	300	23.9	9.41
1005	17.71	9.946	8.566	31.8	2.90	7.29	-55.4	300	11.4	9.56
1010	17.66	10.32	8.881	17.8	1.66	7.33	-66.0	300	6.99	9.54
1015	17.77	10.53	9.077	15.3	1.39	7.34	-71.6	300	5.87	9.54
1020	17.78	10.64	9.168	13.0	1.15	7.34	-71.9	300	5.99	9.55
1025	17.75	10.70	9.223	11.8	1.03	7.35	-70.8	300	5.92	9.55
1030	17.86	10.77	9.307	10.6	0.98	7.35	-70.7	300	5.16	9.55
1035	17.82	10.86	9.374	8.6	0.79	7.34	-71.4	300	4.93	9.55
1040	17.78	10.92	9.416	6.3	0.59	7.34	-71.7	300	3.20	9.55
1045	17.88	10.95	9.460	5.9	0.53	7.34	-70.2	300	2.51	9.55
1050	17.84	10.98	9.475	5.3	0.50	7.35	-68.9	300	2.21	9.55

8-10-18

Total Depth of Well:	19.64
Depth To Water Before Purging:	9.41
Depth To Water After Purging:	~~QNS~~ EST081018

↑ 9.55

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-10-18

Site/Well No.: MW-35 | Replicate No.: — | Code No.: —

Weather: 75°F, partly sunny | Sampling Time: Begin 1140 End 1240

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	24.40
Depth to Water (ft bmp)	9.24
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	15.16
Casing Diameter/Type	2" PVC
Gallons in Well	2.4256
Gallons Pumped/Bailed Prior to Sampling	4.75
Sample Pump Intake Setting (ft bmp)	~~8~~ N/A
Purge Time	begin 1140 end 1240
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.51
SpC (mS/cm)	1.508
CND (mS/cm)	1.263
Dissolved Oxygen (%)	6.3
Dissolved Oxygen (mg/L)	0.61
pH (s.u.)	7.83
ORP (mV)	-136.8
Turbidity (NTU)	13.4
Color	clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-35 PROJ #: MI001454.0004.00001

DATE : 8-10-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1140	17.17	1.803	1.531	63.4	5.89	7.80	-64.9	300	17.2	9.24
1145	16.71	1.652	1.386	44.1	4.20	7.65	-76.3	300	14.4	9.58
1150	16.58	1.960	1.309	26.7	2.62	7.59	-91.5	300	32.4	9.60
1155	16.62	1.567	1.317	26.8	2.56	7.74	-111.6	300	25.0	9.65
1200	16.53	1.551	1.300	14.5	1.48	7.75	-121.2	300	30.4	9.64
1205	16.52	1.540	1.291	10.2	0.99	7.78	-126.6	300	20.3	~~9.65~~ EST 9.65
1210	16.64	1.534	1.289	7.6	0.74	7.81	-129.9	300	15.4	9.66
1215	16.49	1.515	1.269	9.4	0.92	7.82	-132.4	300	15.7	9.69
1220	16.66	1.514	1.274	6.5	0.62	7.84	-134.3	300	21.8	9.68
1225	16.45	1.512	1.265	7.7	0.75	7.84	-134.6	300	18.6	9.71
1230	16.45	1.502	1.257	4.6	0.48	7.83	-136.3	300	20.8	9.72
1235	16.54	1.505	1.262	4.5	0.43	7.85	-137.0	300	17.5	9.73
1240	16.51	1.508	1.263	6.3	0.61	7.83	-136.8	300	13.4	9.72

8-10-18

Total Depth of Well:	24.40
Depth To Water Before Purging:	9.24
Depth To Water After Purging:	9.72

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-10-18

Site/Well No.: MW-43 | Replicate No.: — | Code No.: —

Weather: 80°F, partly cunny | Sampling Time: Begin 1320 End 1400

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	21.76
Depth to Water (ft bmp)	8.38
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	13.38
Casing Diameter/Type	2" PVC
Gallons in Well	2.14
Gallons Pumped/Bailed Prior to Sampling	3.17
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1320 end 1400
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.30
SpC (mS/cm)	3.066
CND (mS/cm)	2.616
Dissolved Oxygen (%)	9.9
Dissolved Oxygen (mg/L)	0.93
pH (s.u.)	7.59
ORP (mV)	-91.0
Turbidity (NTU)	2.84
Color	clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-43 PROJ #: MI001454.0004.00001

DATE : 8-10-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1320	17.14	2.938	2.492	19.2	1.80	7.65	-56	300	23.2	8.38
1325	17.21	2.932	2.495	11.9	1.14	7.58	-9.8	300	21.4	8.43
1330	17.28	2.914	2.485	7.7	0.74	7.55	-24.2	300	12.8	8.45
1335	17.27	2.913	2.483	5.8	0.54	7.56	-43.2	300	6.90	8.44
1340	17.21	2.947	2.509	23.6	2.30	7.55	-61.3	300	10.48	8.44
1345	17.11	2.994	2.543	16.6	1.60	7.55	-70.2	300	4.34	8.45
1350	17.13	3.018	2.563	12.5	1.18	7.57	-78.4	300	3.39	8.45
1355	17.25	3.061	2.609	9.8	0.92	7.59	-86.4	300	2.61	8.45
1400	17.30	3.066	2.616	9.9	0.93	7.59	-91.0	300	2.84	8.45

8-10-18

Total Depth of Well:	21.76		
Depth To Water Before Purging:	8.38		
Depth To Water After Purging:	8.45		

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-13-18

Site/Well No.: MW-54 | Replicate No.: — | Code No.: —

Weather: 70°F, Sunny | Sampling Time: Begin 830 End 930

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.82
Depth to Water (ft bmp)	8.03
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	12.79
Casing Diameter/Type	2" PVC
Gallons in Well	2.0464
Gallons Pumped/Bailed Prior to Sampling	3.963
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 830 end 930
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	14.21
SpC (mS/cm)	1.896
CND (mS/cm)	1.507
Dissolved Oxygen (%)	2.5
Dissolved Oxygen (mg/L)	0.26
pH (s.u.)	7.41
ORP (mV)	138.1
Turbidity (NTU)	3.92
Color	slightly murky / light brown
Odor	none
Appearance	normal / slightly dirty
Sampling Method	Low Flow
Remarks	Turbidity meter #17991 quit functioning could not get readings at 830 or 835 began using meter #18962 at 840 - 930

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-54 PROJ #: MI001454.0004.00001

DATE : 8-13-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
830	14.56	0.597	0.476	46.8	4.77	6.48	211.3	250	*	8.03
835	14.58	0.543	0.435	43.0	4.34	6.58	195.9	250	*	8.27
840	14.51	0.579	0.464	33.4	3.42	6.83	207.3	200	90.82	8.25
845	14.27	0.747	0.595	21.2	2.14	7.02	195.4	250	56.88	8.31
850	14.22	0.902	0.717	15.0	1.53	7.15	184.1	250	33.58	8.33
855	14.19	1.027	0.816	11.1	1.13	7.22	176.0	250	25.31	8.34
900	14.16	1.162	0.924	8.9	0.91	7.27	169.3	250	23.84	8.35
905	14.12	1.321	1.048	7.4	0.76	7.31	163.4	250	15.88	8.35
910	14.20	1.436	1.140	6.0	0.61	7.34	159.5	250	14.52	8.32
915	14.20	1.535	1.219	4.9	0.50	7.37	155.0	250	9.50	8.30
920	14.20	1.655	1.314	3.9	0.39	7.38	150.7	250	6.95	8.31
925	14.22	1.816	1.443	2.8	0.28	7.40	141.9	250	4.19	8.32
930	14.21	1.896	1.507	2.5	0.26	7.41	138.1	250	3.92	8.32

DUP-04_081318

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-13-18

Site/Well No.: MW-58 | Replicate No.: DUP-04 | Code No.: —

Weather: 82°F, Sunny | Sampling Time: Begin 1045 End 1125

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.68
Depth to Water (ft bmp)	5.43
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	14.25
Casing Diameter/Type	2" PVC
Gallons in Well	2.28
Gallons Pumped/Bailed Prior to Sampling	2.64
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1045 end 1125
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.10
SpC (mS/cm)	5.632
CND (mS/cm)	4.890
Dissolved Oxygen (%)	1.3
Dissolved Oxygen (mg/L)	0.12
pH (s.u.)	7.10
ORP (mV)	-70.0
Turbidity (NTU)	1.51
Color	clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	~~3~~ 6	HCL
VOCs	40mL voa	~~3~~ 6	HCL

DUP-04!!!

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.				
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

* DUP-04

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-58 PROJ #: MI001454.0004.00001

DATE : 8-13-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1045	18.31	5.993	5.227	21.7	2.19	6.94	36.2	250	8.70	5.43
1050	18.17	5.987	5.206	5.9	0.54	6.93	16.5	250	5.10	5.64
1055	18.24	5.450	4.745	3.0	0.29	7.00	-29.5	250	5.36	5.65
EST 08/18 ~~#6~~ 1100	18.39	5.415	4.734	3.6	0.34	7.02	-40.4	250	2.41	5.62
1105	18.38	5.467	4.776	2.9	0.27	7.03	-47.4	250	1.95	5.63
1110	18.24	5.530	4.816	1.9	0.17	7.05	-55.9	250	1.85	5.63
1115	18.20	5.571	4.847	1.5	0.14	7.08	-63.3	250	1.81	5.64
1120	18.15	5.605	4.872	1.4	0.13	7.09	-67.8	250	1.76	5.64
1125	18.10	5.632	4.890	1.3	0.12	7.10	-70.0	250	1.51	5.64

8-13-18

Total Depth of Well:	19.68
Depth To Water Before Purging:	5.43
Depth To Water After Purging:	5.64

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Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-13-18

Site/Well No.: MW-44 | Replicate No.: — | Code No.: —

Weather: 83°F, Sunny | Sampling Time: Begin 1225 | End 1315

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA EST08/318
Sounded Well Depth (ft bmp)	~~7.83~~ 20.75
Depth to Water (ft bmp)	7.83
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	12.92
Casing Diameter/Type	2" PVC
Gallons in Well	2.0672
Gallons Pumped/Bailed Prior to Sampling	3.303
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1225 end 1315
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.47
SpC (mS/cm)	3.430
CND (mS/cm)	3.011
Dissolved Oxygen (%)	1.3
Dissolved Oxygen (mg/L)	0.12
pH (s.u.)	7.53
ORP (mV)	-108.5
Turbidity (NTU)	1.35
Color	Clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.				
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-44 PROJ #: MI001454.0004.00001

DATE : 8-13-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1225	19.07	3.827	3.378	21.9	1.92	7.65	-68.9	250	8.60	7.83
1230	18.23	3.595	3.123	4.7	0.43	7.53	-83.9	250	2.54	8.01
1235	17.88	3.498	3.020	3.4	0.32	7.51	-92.8	250	1.80	8.01
1240	18.29	3.457	3.018	2.6	0.25	7.51	-103.1	250	1.55	7.99
1245	18.61	3.465	3.036	2.1	0.19	7.54	-96.7	250	1.64	7.99
1250	18.62	3.443	3.024	2.3	0.21	7.56	-108.6	250	1.72	7.99
1255	18.25	3.537	3.083	2.3	0.20	7.54	-111.5	250	3.10	8.00
1300	18.80	3.460	3.049	1.6	0.15	7.55	-114.9	250	3.66	8.00
1305	18.34	3.429	2.990	1.5	0.14	7.53	-111.9	250	1.54	8.00
1310	18.43	3.429	3.001	1.5	0.14	7.53	-107.4	250	1.19	8.00
1315	18.47	3.430	3.011	1.3	0.12	7.53	-108.5	250	1.35	8.00

Total Depth of Well: 20.75

Depth To Water Before Purging: 7.83

Depth To Water After Purging: 8.00

8-13-18

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-13-18

Site/Well No.: MW-69 | Replicate No.: — | Code No.: —

Weather: 83°F, Sunny | Sampling Time: Begin 1355 End 1425

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.91
Depth to Water (ft bmp)	8.85
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.06
Casing Diameter/Type	2" PVC
Gallons in Well	1.77
Gallons Pumped/Bailed Prior to Sampling	2.38
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1355 end 1425
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.70
SpC (mS/cm)	5.724
CND (mS/cm)	4.923
Dissolved Oxygen (%)	2.2
Dissolved Oxygen (mg/L)	0.21
pH (s.u.)	7.13
ORP (mV)	-101.5
Turbidity (NTU)	4.75
Color	Clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-69 PROJ #: MI001454.0004.00001

DATE : 8-13-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1355	18.42	6.073	5.311	37.0	3.29	7.21	-88.2	300	11.7	8.85
1400	18.02	6.122	5.302	4.3	0.43	7.07	-88.0	300	11.5	9.10
1405	18.14	5.953	5.164	4.8	0.44	7.10	-95.0	300	11.5	9.10
1410	17.91	5.885	5.086	3.9	0.36	7.11	-97.1	300	8.33	9.12
1415	17.66	5.862	5.041	3.0	0.28	7.13	-99.8	300	5.31	9.12
1420	17.74	5.777	4.977	2.3	0.32	7.12	-99.9	300	5.35	9.12
1425	17.70	5.724	4.923	2.2	0.21	7.13	-101.5	300	4.75	9.12

Total Depth of Well: 19.91

Depth To Water Before Purging: 8.85

Depth To Water After Purging: 9.12

8-13-18

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-13-18

Site/Well No.: MW-55 | Replicate No.: — | Code No.: —

Weather: 85°F, partly cloudy | Sampling Time: Begin 1455 End 1555

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.74
Depth to Water (ft bmp)	8.17
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.57
Casing Diameter/Type	2" PVC
Gallons in Well	1.85
Gallons Pumped/Bailed Prior to Sampling	4.75
Sample Pump Intake Setting (ft bmp)	EST ~~30~~ N/A
Purge Time	begin 1455 end 1556
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.44
SpC (mS/cm)	4.243
CND (mS/cm)	3.711
Dissolved Oxygen (%)	0.7
Dissolved Oxygen (mg/L)	0.07
pH (s.u.)	7.49
ORP (mV)	-121.6
Turbidity (NTU)	2.93
Color	Clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-55 PROJ #: MI001454.0004.00001

DATE : 8-13-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1455	18.59	3.204	2.806	22.0	1.93	7.49	-84.3	300	9.42	8.17
1500	18.21	3.182	2.769	7.1	0.65	7.34	-84.5	300	3.29	8.28
1505	18.26	3.468	3.023	2.4	0.22	7.31	-90.6	300	2.59	8.28
1510	18.29	3.730	3.252	1.4	0.12	7.37	-98.8	300	2.68	8.29
1515	18.33	3.821	3.335	1.2	0.11	7.40	-102.1	300	2.15	8.29
1520	18.06	3.913	3.395	1.3	0.12	7.42	-105.9	300	2.18	8.30
1525	18.10	3.993	3.468	1.2	0.10	7.44	-110.3	300	1.97	8.31
1530	18.29	4.015	3.530	1.1	0.10	7.47	-94.8	300	4.29	8.32
1535	18.46	4.046	3.540	3.8	0.35	7.45	-102.1	300	3.75	8.31
1540	18.56	4.132	3.625	1.4	0.12	7.48	-112.1	300	3.15	8.32
1545	18.54	4.175	3.663	0.7	0.06	7.48	-115.9	300	3.16	8.31
1550	18.57	4.226	3.707	0.6	0.05	7.48	-120.7	300	2.73	8.31
1555	18.44	4.243	3.711	0.7	0.07	7.49	-121.6	300	2.93	8.31

8-13-18

Total Depth of Well:	19.74
Depth To Water Before Purging:	8.17
Depth To Water After Purging:	8.31

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-13-18

Site/Well No.: MW-25 | Replicate No.: — | Code No.: —

Weather: 78°F, cloudy | Sampling Time: Begin ~~20.25~~ EST 08:38 (1640) | End: 1715

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	20.25
Depth to Water (ft bmp)	6.18
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	14.07
Casing Diameter/Type	2" PVC
Gallons in Well	2.25
Gallons Pumped/Bailed Prior to Sampling	2.77
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1640 end 1715
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.89
SpC (mS/cm)	3.323
CND (mS/cm)	2.998
Dissolved Oxygen (%)	1.4
Dissolved Oxygen (mg/L)	0.13
pH (s.u.)	7.36
ORP (mV)	-114.1
Turbidity (NTU)	3.24
Color	Clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-25 PROJ #: MI001454.0004.00001

DATE : 8-13-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1640	22.45	3.275	3.107	35.5	2.87	7.35	104.2	300	6.24	6.18
1645	21.37	3.243	3.015	4.9	0.42	7.22	-110.2	300	3.69	6.57
1650	20.60	3.254	2.980	3.2	0.30	7.24	-113.3	300	6.82	6.58
1655	20.10	3.308	2.998	2.2	0.19	7.23	-111.4	300	5.28	6.58
1700	20.14	3.320	3.012	1.8	0.17	7.26	-116.5	300	2.73	6.58
1705	19.81	3.316	2.986	1.5	0.14	7.29	-115.3	300	2.82	6.58
1710	19.97	3.314	2.996	1.3	0.13	7.29	-117.8	300	2.89	6.58
1715	19.89	3.323	2.998	1.4	0.13	7.30	-114.1	300	3.24	6.58

8-13-18

Total Depth of Well:	20.25
Depth To Water Before Purging:	6.18
Depth To Water After Purging:	6.58

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-14-18

Site/Well No.: MW-24 | Replicate No.: — | Code No.: —

Weather: 70°F, sunny | Sampling Time: Begin 805 End 905

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	23.70
Depth to Water (ft bmp)	9.98
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	13.72
Casing Diameter/Type	2" PVC
Gallons in Well	2.1952
Gallons Pumped/Bailed Prior to Sampling	3.963
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 805 end 905
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	14.99
SpC (mS/cm)	1.774
CND (mS/cm)	1.435
Dissolved Oxygen (%)	2.0
Dissolved Oxygen (mg/L)	0.20
pH (s.u.)	7.14
ORP (mV)	-48.7
Turbidity (NTU)	7.20
Color	murky/yellow
Odor	none
Appearance	normal / slightly dirty
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-24 PROJ #: MI001454.0004.00001

DATE : 8-14-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
805	15.30	1.800	1.465	25.0	2.48	6.69	25.5	250	82.9	9.98
810	14.96	1.794	1.451	9.2	0.92	6.81	-17.8	250	58.6	10.30
815	14.93	1.793	1.449	6.6	0.66	6.89	-38.9	250	29.5	10.30
820	14.94	1.794	1.449	5.7	0.56	6.96	-41.5	250	25.9	10.30
825	14.93	1.791	1.447	4.7	0.47	7.03	-42.4	250	22.2	10.30
830	14.87	1.793	1.446	3.2	0.32	7.02	-42.6	250	20.5	10.29
835	14.88	1.791	1.445	2.9	0.29	7.07	-43.1	250	18.5	10.29
840	14.82	1.788	1.441	2.6	0.26	7.08	-43.4	250	13.5	10.29
845	14.84	1.785	1.438	2.7	0.27	7.08	-45.1	250	11.03	10.29
850	14.93	1.779	1.437	2.4	0.24	7.13	-47.1	250	11.23	10.29
855	14.93	1.778	1.436	2.1	0.21	7.14	-48.2	250	9.10	10.29
900	14.96	1.776	1.436	2.0	0.20	7.11	-47.5	250	7.50	10.29
905	14.99	1.774	1.435	2.0	0.20	7.14	-48.7	250	7.20	10.29

8-14-18

Total Depth of Well: 23.70

Depth To Water Before Purging: 9.98

Depth To Water After Purging: 10.29

ARCADIS

MS/MSD#4

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-14-18

Site/Well No.: MW-36 | Replicate No.: — | Code No.: —

Weather: 78°F, Sunny | Sampling Time: Begin 940 End 1020

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	24.72
Depth to Water (ft bmp)	9.53
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	15.19
Casing Diameter/Type	2" PVC
Gallons in Well	2.4304
Gallons Pumped/Bailed Prior to Sampling	3.17
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 940 end 1020
Pumping Rate (ml/min)	300
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	EST ~~14~~ 14.96
SpC (mS/cm)	5.736
CND (mS/cm)	4.635
Dissolved Oxygen (%)	1.5
Dissolved Oxygen (mg/L)	0.15
pH (s.u.)	7.41
ORP (mV)	-88.9
Turbidity (NTU)	1.68
Color	clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	MS/MSD #4 all samples have ID# MW-36_081418

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	~~3~~ 9	HCL
VOCs	40mL voa	~~3~~ 9	HCL

MS/MSD #4!!! ID# MW-36_081418 for ALL

Sampling Personnel: Emma Ter Beek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

MS/MSD #4

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-36 PROJ #: MI001454.0004.00001

DATE : 8-14-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
940	16.25	5.669	4.715	60.4	5.86	7.53	0.1	250	31.7	9.53
945	15.86	5.704	4.708	9.7	0.92	7.47	-35.5	300	12.3	10.24
950	15.43	5.714	4.668	3.4	0.33	7.45	-62.8	300	9.86	10.36
955	15.12	5.784	4.693	2.3	0.23	7.43	-69.8	300	6.03	10.39
1000	15.05	5.799	4.698	2.1	0.21	7.42	-76.3	300	4.29	10.41
1005	14.97	5.779	4.670	1.9	0.19	7.41	-82.7	300	2.31	10.42
1010	14.96	5.769	4.663	1.7	0.17	7.41	-85.3	300	1.82	10.41
1015	14.95	5.749	4.645	1.5	0.15	7.41	-87.9	300	1.77	10.42
1020	14.96	5.736	4.635	1.5	0.15	7.41	-88.9	300	1.68	10.42

8-14-18

Total Depth of Well: 24.72

Depth To Water Before Purging: 9.53

Depth To Water After Purging: 10.42

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-14-18

Site/Well No.: MW-1 | Replicate No.: — | Code No.: —

Weather: 85°F, sunny | Sampling Time: Begin 1135 End 1210

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	18.60
Depth to Water (ft bmp)	3.68
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	14.92
Casing Diameter/Type	2" PVC
Gallons in Well	2.3872
Gallons Pumped/Bailed Prior to Sampling	2.312
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1135 end 1210
Pumping Rate (ml/min)	250
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	20.91
SpC (mS/cm)	28.49
CND (mS/cm)	26.27
Dissolved Oxygen (%)	1.1
Dissolved Oxygen (mg/L)	0.09
pH (s.u.)	7.54
ORP (mV)	-124.3
Turbidity (NTU)	1.69
Color	slightly yellow / clear after 10 min purging
Odor	none
Appearance	normal / slightly dirty
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-1 PROJ #: MI001454.0004.00001

DATE : 8-14-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1135	23.42	1.900	1.860	9.8	0.82	7.62	-84.0	250	7.25	3.68
1140	22.32	17.22	16.64	1.4	0.13	7.23	-89.6	250	4.43	4.52
1145	21.28	25.28	23.48	2.2	0.18	7.50	-144.8	250	3.03	4.60
1150	20.86	26.11	24.06	1.6	0.13	7.56	-147.8	250	1.81	4.63
1155	20.73	28.01	25.74	1.3	0.10	7.56	-140.9	250	2.13	4.62
1200	20.87	28.15	25.94	1.1	0.09	7.55	-134.3	250	1.17	4.64
1205	20.82	28.51	26.24	1.0	0.08	7.54	-128.2	250	2.07	4.64
1210	20.91	28.49	26.27	1.1	0.09	7.54	-124.3	250	1.69	4.64

8-14-18

Total Depth of Well: 18.60

Depth To Water Before Purging: 3.68

Depth To Water After Purging: 4.64

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-14-18

Site/Well No.: MW-7 | Replicate No.: — | Code No.: —

Weather: 85°F, Sunny | Sampling Time: Begin 1350 End 1425

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	22.35
Depth to Water (ft bmp)	4.38
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	17.97
Casing Diameter/Type	2" PVC
Gallons in Well	2.875
Gallons Pumped/Bailed Prior to Sampling	2.312
Sample Pump Intake Setting (ft bmp)	N/A
Purge Time	begin 1350 end 1425
Pumping Rate (ml/min)	
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.23
SpC (mS/cm)	3.952
CND (mS/cm)	3.518
Dissolved Oxygen (%)	1.6
Dissolved Oxygen (mg/L)	0.14
pH (s.u.)	7.57
ORP (mV)	-120.3
Turbidity (NTU)	1.69
Color	clear
Odor	none
Appearance	normal
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

Sampling Personnel: Emma TerBeek (EST)

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-7 PROJ #: MI001454.0004.00001

DATE : 8-14-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1350	20.62	4.127	3.772	51.7	5.16	7.74	-86.4	200	9.87	4.83
1355	20.09	3.696	3.345	7.8	0.70	7.50	-83.8	250	9.88	5.11
1400	19.39	3.553	3.173	4.0	0.35	7.48	-95.6	250	6.13	5.12
1405	19.29	3.746	3.339	2.8	0.25	7.49	-100.2	250	2.47	5.13
1410	19.32	3.840	3.424	2.5	0.22	7.52	-107.3	250	2.09	5.13
1415	19.22	3.899	3.469	2.1	0.19	7.53	-113.5	250	2.35	5.13
1420	19.16	3.941	3.503	1.9	0.18	7.56	-118.8	250	1.71	5.13
1425	19.23	3.952	3.518	1.6	0.14	7.57	-120.3	250	1.69	5.13

APPENDIX B

Off-Site Groundwater Field Sampling Logs

ARCADIS

Water Sampling Log

2 (KB) 8-6-18

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: MW-87 | Replicate No.: — | Code No.: —

Weather: 75°F PARTLY CLOUDY | Sampling Time: Begin 805 End 835

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	18.80
Depth to Water (ft bmp)	11.01
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	7.79
Casing Diameter/Type	2" PVC
Gallons in Well	1.25
Gallons Pumped/Bailed Prior to Sampling	1.59
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 805 end 835
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.34
SpC (mS/cm)	1.820
CND (mS/cm)	—
Dissolved Oxygen (%)	2.0
Dissolved Oxygen (mg/L)	0.20
pH (s.u.)	8.41
ORP (mV)	-54.9
Turbidity (NTU)	2.27
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs (WATER ONLY)	40mL voa	3	HCL
SEE COC			

Sampling Personnel: KAIAN BRIGGS

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-87 PROJ #: MI001454.0004.00001

DATE : 8-6-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
805	16.02	1.530	-	12.8	1.27	9.34	196.1	200	22.5	11.01
810	15.99	1.597	-	4.7	0.47	9.59	166.1	200	9.64	11.02
815	15.89	1.765	-	2.8	0.28	9.40	122.8	200	3.51	11.02
820	15.71	1.808	-	2.1	0.21	8.99	118.0	200	2.72	11.02
825	15.82	1.807	-	1.9	0.19	8.97	95.5	200	2.78	11.02
830	15.95	1.814	-	1.9	0.19	8.90	54.9	200	2.61	11.02
835	16.05	1.815	-	2.0	0.20	8.80	34.1	200	2.47	11.02
840	16.12	1.822	-	1.8	0.18	8.68	12.3	200	2.38	11.02
845	16.09	1.822	-	1.6	0.16	8.59	-7.3	200	2.32	11.02
850	16.01	1.825	-	1.6	0.15	8.51	-19.2	200	2.43	11.02
855	15.87	1.814	-	2.0	0.20	8.47	-32.7	200	2.36	11.02
900	16.24	1.807	-	2.2	0.22	8.43	-48.2	200	2.39	11.02
905	16.34	1.820	-	2.0	0.20	8.41	-54.9	200	2.27	11.02
Total Depth of Well:		18.80								
Depth To Water Before Purging:				11.01						
Depth To Water After Purging:				11.02						

ARCADIS

Water Sampling Log

2 (FB) 8-6-18

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: MW-80S | Replicate No.: — | Code No.: —

Weather: 88°F CLOUDY | Sampling Time: Begin 1521 End 1556

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	11.56
Depth to Water (ft bmp)	3.95
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	7.61
Casing Diameter/Type	2" PVC
Gallons in Well	1.22
Gallons Pumped/Bailed Prior to Sampling	1.85
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1521 end 1556
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.62
SpC (mS/cm)	2.555
CND (mS/cm)	—
Dissolved Oxygen (%)	1.6
Dissolved Oxygen (mg/L)	0.15
pH (s.u.)	7.23
ORP (mV)	-48.0
Turbidity (NTU)	0.99
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL
SEE COC			

VARIOUS

Sampling Personnel: KALAN BRIGGS

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-805 PROJ #: MI001454.0004.00002 (EB) 8-6-18

DATE : 8-6-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1521	19.58	2.712	—	18.9	1.71	7.63	-102.2	200	12.7	3.95
1526	19.45	2.641	—	3.8	0.34	7.48	-104.3	200	11.19	4.19
1531	19.52	2.416	—	2.2	0.20	7.35	-102.4	200	5.81	4.21
1536	19.69	2.406	—	2.4	0.22	7.29	-104.2	200	2.75	4.21
1541	19.62	2.481	—	2.6	0.24	7.25	-98.3	200	2.21	4.21
1546	19.65	2.505	—	2.1	0.20	7.24	-97.9	200	1.96	4.21
1551	19.62	2.540	—	1.8	0.16	7.23	-97.7	200	1.41	4.21
1556	19.62	2.555	—	1.6	0.15	7.23	-98.0	200	0.99	4.21
Total Depth of Well:		11.56								
Depth To Water Before Purging:				3.95						
Depth To Water After Purging:				4.21						

ARCADIS

Water Sampling Log

2 (KB) 8-6-18

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: MW-78 | Replicate No.: — | Code No.: —

Weather: 89°F CLOUDY | Sampling Time: Begin 1431 End 1506

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	11.75
Depth to Water (ft bmp)	3.36
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	8.39
Casing Diameter/Type	2" PVC
Gallons in Well	1.34
Gallons Pumped/Bailed Prior to Sampling	1.85
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1431 end 1506
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.34
SpC (mS/cm)	3.242
CND (mS/cm)	—
Dissolved Oxygen (%)	1.0
Dissolved Oxygen (mg/L)	0.09
pH (s.u.)	7.53
ORP (mV)	-122.9
Turbidity (NTU)	0.72
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL
SEE COC			

VARIES

Sampling Personnel: KALAN BRIGGS

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-78 PROJ #: MI001454.0004.00002 (KB) 8-6-18

DATE : 8-6-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW (KB) 8-6-18
1431	17.59	4.705	–	34.7	3.01	7.77	-95.6	200	24.6	~~4.33~~ 3.36
1436	18.19	4.615	–	2.5	0.23	7.66	-107.1	200	8.76	3.49
1441	18.45	4.005	–	1.9	0.18	7.59	-111.1	200	3.52	3.49
1446	18.52	3.691	–	1.7	0.15	7.56	-114.8	200	2.76	3.49
1451	18.57	3.482	–	1.5	0.14	7.56	-119.0	200	1.94	3.49
1456	18.53	3.315	–	1.2	0.11	7.54	-122.3	200	1.21	3.49
1501	18.25	3.299	–	1.1	0.10	7.53	-121.9	200	0.78	3.49
1506	18.34	3.242	–	1.0	0.09	7.53	-122.9	200	0.72	3.49

ARCADIS

Water Sampling Log

2 (FB) 8-6-18

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: MW-79S | Replicate No.: – | Code No.: –

Weather: 88°F PARTLY CLOUDY | Sampling Time: Begin 1336 End 1411

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	9.73
Depth to Water (ft bmp)	6.30
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	3.43
Casing Diameter/Type	2" PVC
Gallons in Well	0.55
Gallons Pumped/Bailed Prior to Sampling	1.85
Sample Pump Intake Setting (ft bmp)	–
Purge Time	begin 1336 end 1411
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.62
SpC (mS/cm)	1.143
CND (mS/cm)	–
Dissolved Oxygen (%)	2.5
Dissolved Oxygen (mg/L)	0.25
pH (s.u.)	7.32
ORP (mV)	-110.4
Turbidity (NTU)	0.77
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs (VARIOUS)	40mL voa	3	HCL
SEE COC			

Sampling Personnel: KALAN BRIGGS

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-79S

PROJ #: MI001454.0004.00002 (2) 8-6-18

DATE : 8-6-18

LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1336	18.42	0.547	–	19.5	1.74	7.53	-101.8	200	3.79	6.30
1341	18.02	0.709	–	8.5	0.80	7.44	-102.5	200	3.30	6.33
1346	17.74	1.033	–	2.9	0.28	7.36	-104.9	200	1.50	6.40
1351	17.77	1.072	–	3.1	0.29	7.32	-105.1	200	1.21	6.40
1356	17.88	1.117	–	2.8	0.27	7.32	-105.9	200	0.78	6.40
1401	17.74	1.124	–	2.5	0.25	7.32	-106.6	200	0.95	6.40
1406	17.80	1.137	–	2.6	0.25	7.32	-109.1	200	0.89	6.40
1411	17.62	1.143	–	2.5	0.25	7.32	-110.4	200	0.77	6.40
Total Depth of Well:		9.73								
Depth To Water Before Purging:				6.30						
Depth To Water After Purging:				6.40						

ARCADIS

Water Sampling Log

2 (MS) 8-6-18

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: MW-79D | Replicate No.: — | Code No.: —

Weather: 83°F cloudy | Sampling Time: Begin 1254 End 1329

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	14.62
Depth to Water (ft bmp)	6.38
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	8.24
Casing Diameter/Type	2" PVC
Gallons in Well	1.32
Gallons Pumped/Bailed Prior to Sampling	1.85
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1254 end 1329
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	16.82
SpC (mS/cm)	2.648
CND (mS/cm)	—
Dissolved Oxygen (%)	3.1
Dissolved Oxygen (mg/L)	0.24
pH (s.u.)	7.26
ORP (mV)	-111.9
Turbidity (NTU)	4.71
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs (various)	40mL voa	3	HCL
SEE COC			

Sampling Personnel: KALAN BRIGGS

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-79D PROJ #: MI001454.0004.00002 8-6-18

DATE : 8-6-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1254	16.52	2.707	—	17.5	1.63	7.73	-91.6	200	7.58	6.38
1259	16.98	2.644	—	3.6	0.34	7.59	-101.7	200	6.20	6.45
1304	17.30	2.602	—	3.1	0.30	7.45	-101.6	200	6.18	6.45
1309	17.18	2.574	—	3.9	0.38	7.40	-102.2	200	6.23	6.45
1314	17.03	2.588	—	3.9	0.38	7.35	-106.6	200	5.02	6.45
1319	16.79	2.625	—	3.5	0.35	7.31	-110.2	200	4.66	6.45
1324	16.86	2.640	—	3.0	0.29	7.27	-111.5	200	5.01	6.45
1329	16.82	2.648	—	3.1	0.29	7.26	-111.9	200	4.71	6.45
Total Depth of Well:	14.62									
Depth To Water Before Purging:				6.38						
Depth To Water After Purging:				6.45						

ARCADIS

Water Sampling Log

2 (KB) 8-6-18

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: MW-84 | Replicate No.: — | Code No.: —

Weather: 83°F PARTLY CLOUDY | Sampling Time: Begin 1135 End 1210

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	12.55
Depth to Water (ft bmp)	5.06
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	7.49
Casing Diameter/Type	2" PVC
Gallons in Well	1.20
Gallons Pumped/Bailed Prior to Sampling	1.85
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1135 end 1210
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.04
SpC (mS/cm)	2.630
CND (mS/cm)	—
Dissolved Oxygen (%)	1.1
Dissolved Oxygen (mg/L)	0.10
pH (s.u.)	7.46
ORP (mV)	-103.2
Turbidity (NTU)	4.62
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL
SEE COC			

Sampling Personnel: KALAN BRIGGS

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

2 (KM) 8-6-18

WELL : MW-84 PROJ #: MI001454.0004.00001

DATE : 8-6-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1135	19.13	1.238	-	58.8	5.07	7.79	-70.4	200	36.0	5.06
1140	18.40	1.879	-	4.3	0.40	7.59	-83.9	200	34.1	5.11
1145	18.34	2.292	-	2.8	0.26	7.52	-88.5	200	17.9	5.11
1150	18.30	2.386	-	2.0	0.19	7.52	-96.4	200	12.4	5.11
1155	18.29	2.482	-	1.7	0.16	7.51	-99.3	200	9.11	5.11
1200	18.27	2.554	-	1.7	0.16	7.48	-97.6	200	7.38	5.11
1205	18.12	2.618	-	1.2	0.11	7.47	-102.6	200	5.41	5.11
1210	18.04	2.630	-	1.1	0.10	7.46	-103.2	200	4.62	5.11
Total Depth of Well:		12.55								
Depth To Water Before Purging:				5.06						
Depth To Water After Purging:				5.11						

ARCADIS

Water Sampling Log

2 (KB) 8-6-18

Project: Ford LTP | Project No.: MI001454.0004.00001 | Page: 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: MW-77 | Replicate No.: — | Code No.: —

Weather: 82°F CLOUDY | Sampling Time: Begin 1024 End 1109

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	13.76
Depth to Water (ft bmp)	6.08
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	7.62
Casing Diameter/Type	2" PVC
Gallons in Well	1.22
Gallons Pumped/Bailed Prior to Sampling	2.38
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1024 end 1109
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.95
SpC (mS/cm)	0.439
CND (mS/cm)	—
Dissolved Oxygen (%)	2.4
Dissolved Oxygen (mg/L)	0.23
pH (s.u.)	7.71
ORP (mV)	-102.1
Turbidity (NTU)	0.21
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	MS/MSD COLLECTED

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs	40mL voa	3	HCL

VARIOUS

SEE COC

Sampling Personnel: KALAN BRIGGS

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-77 PROJ #: MI001454.0004.00002 (KRS) 8-6-18

DATE : 08-06-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1024	19.68	0.845	–	91.2	7.88	8.06	-74.7	200	2.10	6.08
1029	19.04	0.823	–	5.6	0.52	7.91	-87.8	200	0.63	5.78
1034	19.08	0.843	–	8.1	0.76	7.82	-84.3	200	0.69	5.78
1039	19.08	0.883	–	8.6	0.80	7.75	-82.5	200	0.61	5.78
1044	19.02	0.910	–	6.6	0.66	7.72	-83.6	200	0.53	5.78
1049	19.04	0.914	–	5.3	0.48	7.71	-84.7	200	0.51	5.78
1054	19.00	0.924	–	4.1	0.38	7.71	-88.6	200	0.50	5.78
1059	19.15	0.926	–	3.3	0.31	7.72	-94.8	200	0.36	5.78
1104	19.31	0.933	–	2.8	0.26	7.70	-96.0	200	0.28	5.78
1109	18.95	0.939	–	2.4	0.23	7.71	-102.1	200	0.21	5.78
Total Depth of Well:		13.70								
Depth To Water Before Purging:				6.08						
Depth To Water After Purging:				5.78						

ARCADIS

Water Sampling Log

(KM) 8-6-18

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page 1 of 2

Location: Livonia, MI | Date: 8-6-18

Site/Well No.: MW-86 | Replicate No.: — | Code No.: —

Weather: 81°F Cloudy | Sampling Time: Begin 935 End 1005

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	16.60
Depth to Water (ft bmp)	7.90
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	8.7
Casing Diameter/Type	2" PVC
Gallons in Well	1.39
Gallons Pumped/Bailed Prior to Sampling	1.59
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 935 end 1005
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	15.98
SpC (mS/cm)	1.595
CND (mS/cm)	—
Dissolved Oxygen (%)	2.9
Dissolved Oxygen (mg/L)	0.28
pH (s.u.)	7.42
ORP (mV)	-64.4
Turbidity (NTU)	2.96
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	DUP-01-080618 COLLECTED

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
VOCs (VARIOUS)	40mL voa	3	HCL
SEE COC			

Sampling Personnel: KACAN BRIGGS

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-86 PROJ #: MI001454.0004.00002 8-6-18

DATE : 8-6-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
935	16.31	1.237	–	20.4	1.89	8.06	-59.0	200	8.58	7.90
940	16.12	1.237	–	5.1	0.50	7.97	-64.5	200	7.85	7.95
945	16.06	1.273	–	3.4	0.33	7.77	-62.7	200	6.81	7.96
950	16.00	1.361	–	3.7	0.36	7.66	-62.8	200	4.02	7.96
955	15.91	1.488	–	3.6	0.36	7.53	-63.6	200	3.61	7.96
1000	16.11	1.544	–	3.1	0.32	7.46	-64.0	200	2.85	7.96
1005	15.98	1.595	–	2.9	0.28	7.42	-66.4	200	2.96	7.96
Total Depth of Well:		16.60								
Depth To Water Before Purging:				7.90						
Depth To Water After Purging:				7.96						

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page 1 of 2

Location: Livonia, MI | Date: 08-08-2018

Site/Well No.: MW-825 | Replicate No.: — | Code No.: —

Weather: 80°F, SUNNY | Sampling Time: Begin 1805 End 1810

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	13.35
Depth to Water (ft bmp)	~~8.04~~ CORRECTED 8.18
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	5.17
Casing Diameter/Type	2" PVC
Gallons in Well	0.8272
Gallons Pumped/Bailed Prior to Sampling	2.378
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1725 end 1805
Pumping Rate (ml/min)	225
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.68
SpC (mS/cm)	1.077
CND (mS/cm)	0.947
Dissolved Oxygen (%)	3.7
Dissolved Oxygen (mg/L)	0.35
pH (s.u.)	7.32
ORP (mV)	0.0
Turbidity (NTU)	0.42
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
1,1-DCE; cis-1,2-DCE; trans-1,2-DCE; PCE; TCE; VC	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-825 PROJ #: MI001454.0004.00002

DATE : 08-08-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1725	18.52	1.084	0.972	8.1	0.71	7.66	0.0	225	4.17	8.18
1730	18.46	1.064	0.930	7.0	0.65	7.43	0.0	225	1.24	8.55
1735	18.51	1.039	0.910	5.3	0.49	7.40	0.0	225	0.92	8.67
1740	18.67	1.038	0.913	8.4	0.78	7.38	0.0	225	0.66	8.77
1745	18.71	1.042	0.917	7.7	0.72	7.36	0.0	225	0.54	8.83
1750	18.72	1.049	0.923	6.1	0.56	7.32	0.0	225	0.81	8.83
1755	18.56	1.069	0.937	4.6	0.43	7.34	0.0	225	0.61	8.83
1800	18.66	1.069	0.940	4.1	0.38	7.32	0.0	225	0.42	8.83
1805	18.68	1.077	0.947	3.7	0.35	7.32	0.0	225	0.42	8.83
Total Depth of Well:		13.35								
Depth To Water Before Purging:			8.18							
Depth To Water After Purging:			8.83							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page: 1 of 2

Location: Livonia, MI | Date: 08-08-2013

Site/Well No.: MW-82D | Replicate No.: — | Code No.: —

Weather: 80°F, SUNNY | Sampling Time: Begin 1655 End 1700

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	23.72
Depth to Water (ft bmp)	8.41
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	15.31
Casing Diameter/Type	2" PVC
Gallons in Well	2.4496
Gallons Pumped/Bailed Prior to Sampling	2.6420
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1605 end 1655
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.87
SpC (mS/cm)	1.672
CND (mS/cm)	1.510
Dissolved Oxygen (%)	2.3
Dissolved Oxygen (mg/L)	0.20
pH (s.u.)	7.92
ORP (mV)	0.0
Turbidity (NTU)	2.68
Color	CLEAR
Odor	SLIGHT ODOR
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
1,1-DCE; cis-1,2-DCE; trans-1,2-DCE; TCE; PCE; VC	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-82D PROJ #: MI001454.0004.00002

DATE : 08-08-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1605	19.24	1.668	1.484	11.8	1.07	8.30	16.4	200	6.03	8.41
1610	19.23	1.665	1.481	4.1	0.35	8.14	18.1	200	4.24	8.44
1615	19.80	1.659	1.495	2.0	0.19	8.09	1.3	200	4.52	8.45
1620	19.66	1.665	1.495	5.2	0.46	8.07	0.0	200	3.47	8.45
1625	19.68	1.667	1.497	3.4	0.32	8.05	0.0	200	2.81	8.45
1630	19.66	1.667	1.497	3.6	0.35	8.01	0.0	200	2.58	8.45
1635	20.00	1.667	1.508	1.4	0.06	7.97	0.0	200	2.66	8.45
1640	19.72	1.670	1.502	0.0	0.0	7.96	0.0	200	2.26	8.45
1645	20.10	1.670	1.514	2.8	0.25	7.94	0.0	200	2.94	8.45
1650	20.06	1.671	1.513	2.5	0.23	7.92	0.0	200	2.79	8.45
1655	19.87	1.672	1.510	2.3	0.20	7.92	0.0	200	2.68	8.45
Total Depth of Well:		23.72								
Depth To Water Before Purging:			8.41							
Depth To Water After Purging:			8.45							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page: 1 of 2

Location: Livonia, MI | Date: 08-08-2018

Site/Well No.: MW-83 | Replicate No.: — | Code No.: —

Weather: 80°F, CLOUDY | Sampling Time: Begin 1355 End 1400

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	12.39
Depth to Water (ft bmp)	7.59
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	4.80
Casing Diameter/Type	2" PVC
Gallons in Well	0.7680
Gallons Pumped/Bailed Prior to Sampling	1.5852
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1325 end 1355
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.93
SpC (mS/cm)	3.262
CND (mS/cm)	2.383
Dissolved Oxygen (%)	2.7
Dissolved Oxygen (mg/L)	0.25
pH (s.u.)	7.62
ORP (mV)	42.8
Turbidity (NTU)	1.41
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
1,1-DCE; cis-1,2-DCE; trans-1,2-DCE; PCE; TCE; VC	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-83 PROJ #: MI001454.0004.00002

DATE : 08-08-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1325	18.70	3.289	2.895	14.0	1.26	7.93	51.4	200	2.48	7.59
1330	18.69	3.295	2.899	7.8	0.72	7.75	55.9	200	1.54	7.61
1335	19.65	3.262	2.933	1.8	0.15	7.73	49.1	200	1.15	7.61
1340	20.41	3.264	2.978	3.6	0.32	7.70	46.5	200	0.99	7.61
1345	20.85	3.269	3.009	3.1	0.27	7.66	45.9	200	1.62	7.61
1350	19.96	3.286	2.961	2.9	0.26	7.62	44.9	200	1.52	7.61
1355	18.93	3.262	2.883	2.7	0.25	7.62	42.8	200	1.41	7.61
Total Depth of Well:		12.39								
Depth To Water Before Purging:			7.59							
Depth To Water After Purging:			7.61							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page: 1 of 2

Location: Livonia, MI | Date: 08-08-2018

Site/Well No.: MW-85 | Replicate No.: — | Code No.: —

Weather: 80°F, CLOUDY | Sampling Time: Begin 1235 | End ~~1235~~ 1240 CO 8/13/18

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	12.66
Depth to Water (ft bmp)	6.01
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	6.65
Casing Diameter/Type	2" PVC
Gallons in Well	1.064
Gallons Pumped/Bailed Prior to Sampling	3.1704
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1135 end 1235
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	20.42
SpC (mS/cm)	2.827
CND (mS/cm)	2.579
Dissolved Oxygen (%)	5.2
Dissolved Oxygen (mg/L)	0.46
pH (s.u.)	7.35
ORP (mV)	23.9
Turbidity (NTU)	3.75
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
1,1-DCE; cis-1,2-DCE; trans-1,2-DCE; PCE; TCE; VC	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.				
0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-85 PROJ #: MI001454.0004.00002

DATE : 08-08-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1135	21.12	3.162	2.925	15.9	1.39	7.79	80.7	200	23.04	6.01
1140	21.13	3.168	2.933	16.3	1.43	7.82	82.4	200	21.57	6.05
1145	20.63	3.105	2.845	10.1	0.90	7.58	80.1	200	19.74	6.06
1150	20.51	3.077	2.813	10.0	0.89	7.48	76.0	200	14.65	6.06
1155	20.56	3.042	2.783	8.6	0.76	7.48	70.0	200	12.07	6.06
1200	20.49	3.012	2.752	8.4	0.75	7.44	63.9	200	7.94	6.06
1205	20.45	2.993	2.732	8.0	0.73	7.41	59.3	200	6.95	6.06
1210	20.56	2.951	2.700	7.2	0.63	7.39	52.5	200	5.47	6.06
1215	20.63	2.920	2.675	6.4	0.57	7.38	46.8	200	4.77	6.06
1220	20.61	2.890	2.646	5.8	0.51	7.36	41.7	200	3.94	6.06
1225	20.87	2.878	2.650	2.5	0.23	7.38	32.9	200	3.68	6.06
1230	20.64	2.851	2.610	4.8	0.44	7.39	26.9	200	3.65	6.06
1235	20.42	2.827	2.579	5.2	0.46	7.35	23.9	200	3.75	6.06
Total Depth of Well:		12.66								
Depth To Water Before Purging:			6.01							
Depth To Water After Purging:			6.06							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page 1 of 2

Location: Livonia, MI | Date: 08-09-2018

Site/Well No.: MW-81 | Replicate No.: — | Code No.: —

Weather: 70°F, CLOUDY | Sampling Time: Begin 0950 End 0955

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	12.63
Depth to Water (ft bmp)	7.16
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	5.47
Casing Diameter/Type	2" PVC
Gallons in Well	0.8752
Gallons Pumped/Bailed Prior to Sampling	3.1704
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 0850 end 0950
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.37
SpC (mS/cm)	1.325
CND (mS/cm)	1.132
Dissolved Oxygen (%)	1.4
Dissolved Oxygen (mg/L)	0.14
pH (s.u.)	7.41
ORP (mV)	127.1
Turbidity (NTU)	1.59
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
1,1-DCE; cis-1,2-DCE; trans-1,2-DCE; PCE; TCE; VC	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-81 PROJ #: MI001454.0004.00002

DATE : 08-09-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
0850	17.14	1.173	0.997	13.3	1.26	7.39	140.4	200	4.78	7.16
0855	17.24	1.105	0.941	8.1	0.77	7.44	131.8	200	3.12	7.82
0900	17.22	1.095	0.932	9.9	0.94	7.43	131.6	200	2.86	7.91
0905	17.15	1.098	0.933	9.1	0.92	7.34	133.6	200	2.99	8.07
0910	17.13	1.146	0.974	7.1	0.68	7.29	135.1	200	6.05	8.14
0915	17.20	1.176	1.001	5.7	0.54	7.26	134.8	200	4.61	8.19
0920	17.19	1.226	1.043	4.2	0.41	7.28	132.9	200	4.00	8.24
0925	17.17	1.258	1.070	3.2	0.30	7.30	132.4	200	2.52	8.26
0930	17.24	1.276	1.087	2.6	0.26	7.32	131.3	200	2.14	8.29
0935	17.19	1.310	1.115	2.0	0.19	7.35	130.1	200	1.92	8.29
0940	17.14	1.316	1.118	1.6	0.15	7.34	130.2	200	1.86	8.32
0945	17.33	1.318	1.125	2.3	0.22	7.37	128.9	200	1.96	8.32
0950	17.37	1.325	1.132	1.4	0.14	7.41	127.1	200	1.59	8.32
Total Depth of Well:		12.63								
Depth To Water Before Purging:			7.16							
Depth To Water After Purging:			8.32							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page: 1 of 2

Location: Livonia, MI | Date: 08-09-2018

Site/Well No.: MW-76 | Replicate No.: — | Code No.: —

Weather: 80°F, SUNNY | Sampling Time: Begin 1130 End 1135

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.63
Depth to Water (ft bmp)	9.47
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.16
Casing Diameter/Type	2" PVC
Gallons in Well	1.6256
Gallons Pumped/Bailed Prior to Sampling	3.4875
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1030 end 1130
Pumping Rate (ml/min)	220
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.88
SpC (mS/cm)	8.577
CND (mS/cm)	7.739
Dissolved Oxygen (%)	0.9
Dissolved Oxygen (mg/L)	0.08
pH (s.u.)	7.65
ORP (mV)	96.2
Turbidity (NTU)	1.76
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
1,1-DCE; cis-1,2-DCE; trans-1,2-DCE; PCE; TCE; VC	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-76 PROJ #: MI001454.0004.00002

DATE : 08-09-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1030	18.52	9.946	8.708	13.4	1.18	7.64	149.7	220	3.59	9.47
1035	18.68	9.370	8.232	6.2	0.55	7.56	151.8	220	2.44	9.54
1040	18.41	8.763	7.657	0.5	0.04	7.61	146.6	220	1.59	9.54
1045	18.46	8.548	7.483	2.7	0.25	7.60	139.3	220	1.47	9.54
1050	18.80	8.531	7.522	2.5	0.23	7.65	133.8	220	1.57	9.54
1055	18.72	8.527	7.506	1.6	0.15	7.61	129.3	220	1.38	9.54
1100	19.10	8.516	7.558	1.5	0.13	7.65	122.9	220	1.70	9.54
1105	19.29	8.528	7.600	1.5	0.13	7.67	119.0	220	1.19	9.54
1110	19.54	8.534	7.645	0.8	0.07	7.67	115.1	220	1.70	9.54
1115	19.55	8.544	7.656	0.7	0.06	7.67	110.1	220	1.25	9.54
1120	19.53	8.565	7.670	0.6	0.05	7.67	107.5	220	1.90	9.54
1125	19.66	8.564	7.690	0.9	0.08	7.64	101.1	220	1.21	9.54
1130	19.88	8.577	7.739	0.9	0.08	7.65	96.2	220	1.76	9.54
Total Depth of Well:		19.63								
Depth To Water Before Purging:			9.47							
Depth To Water After Purging:			9.54							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page 1 of 2

Location: Livonia, MI | Date: 08-09-2018

Site/Well No.: 80°F, PARTLY CLOUDY | Replicate No.: — | Code No.: —

Weather: MW-75S | Sampling Time: Begin 1350 End 1355

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	9.67
Depth to Water (ft bmp)	5.73
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	3.94
Casing Diameter/Type	2" PVC
Gallons in Well	0.6304
Gallons Pumped/Bailed Prior to Sampling	2.9062
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1300 end 1350
Pumping Rate (ml/min)	220
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	21.20
SpC (mS/cm)	1.758
CND (mS/cm)	1.631
Dissolved Oxygen (%)	0.7
Dissolved Oxygen (mg/L)	0.06
pH (s.u.)	7.51
ORP (mV)	47.6
Turbidity (NTU)	5.43
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
1,1-DCE; cis-1,2-DCE; trans-1,2-DCE; PCE; TCE; VC	40mL voa	3	HCL

Sampling Personnel: C. O'NEIL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-755 PROJ #: MI001454.0004.00002

DATE : 08-09-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1300	21.28	1.935	1.795	6.2	0.54	7.87	45.2	220	2.76	5.73
1305	21.12	1.849	1.711	2.6	0.23	7.71	46.7	220	2.16	5.77
1310	21.06	1.832	1.694	1.8	0.16	7.64	47.6	220	2.11	5.77
1315	21.22	1.805	1.674	1.6	0.14	7.58	47.8	220	2.68	5.77
1320	21.29	1.790	1.663	2.2	0.20	7.53	49.5	220	1.80	5.77
1325	21.15	1.772	1.640	9.0	0.79	7.49	51.5	220	2.25	5.77
1330	21.09	1.768	1.636	2.9	0.25	7.42	55.1	220	2.12	5.77
1335	21.18	1.762	1.633	1.4	0.13	7.46	51.9	220	4.00	5.77
1340	21.20	1.760	1.632	0.9	0.08	7.49	49.8	220	5.12	5.77
1345	21.20	1.758	1.630	0.6	0.05	7.50	48.7	220	5.20	5.77
1350	21.20	1.758	1.631	0.7	0.06	7.51	47.6	220	5.43	5.77
Total Depth of Well:		9.67								
Depth To Water Before Purging:			5.73							
Depth To Water After Purging:			5.77							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page: 1 of 2

Location: Livonia, MI | Date: 08-09-2018

Site/Well No.: MW-75D | Replicate No.: — | Code No.: —

Weather: 80°F, PARTLY CLOUDY | Sampling Time: Begin 1520 End 1525

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	16.77
Depth to Water (ft bmp)	5.81
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.96
Casing Diameter/Type	2" PVC
Gallons in Well	1.7536
Gallons Pumped/Bailed Prior to Sampling	3.1704
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1420 end 1520
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	18.35
SpC (mS/cm)	5.160
CND (mS/cm)	4.504
Dissolved Oxygen (%)	0.4
Dissolved Oxygen (mg/L)	0.03
pH (s.u.)	8.20
ORP (mV)	0.0
Turbidity (NTU)	31.47
Color	CLEAR-CLOUDY
Odor	NONE
Appearance	TURBID
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
1,1-DCE; cis-1,2-DCE; trans-1,2-DCE; PCE; TCE; VC	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-75D PROJ #: MI001454.0004.00002

DATE : 08-09-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1420	18.18	5.424	4.719	2.6	0.24	8.18	54.8	200	102.21	5.81
1425	18.27	5.439	4.741	2.1	0.20	8.23	45.3	200	90.27	5.92
1430	18.30	5.456	4.757	1.5	0.14	8.23	28.2	200	45.00	5.92
1435	18.28	5.440	4.741	1.2	0.11	8.22	13.2	200	70.33	5.92
1440	18.28	5.388	4.697	1.0	0.12	8.21	0.0	200	58.44	5.93
1445	18.37	5.368	4.686	0.7	0.06	8.19	0.0	200	59.66	5.93
1450	18.35	5.362	4.680	0.8	0.07	8.18	0.0	200	54.21	5.93
1455	18.46	5.329	4.663	0.7	0.06	8.21	0.0	200	50.61	5.93
1500	18.53	5.281	4.629	0.5	0.05	8.31	0.0	200	48.39	5.93
1505	18.45	5.248	4.591	0.6	0.06	8.32	0.0	200	40.64	5.93
1510	18.36	5.222	4.558	0.4	0.04	8.29	0.0	200	40.79	5.93
1515	18.31	5.196	4.532	0.4	0.03	8.26	0.0	200	37.95	5.93
1520	18.35	5.160	4.504	0.4	0.03	8.20	0.0	200	31.47	5.93
Total Depth of Well:		16.77								
Depth To Water Before Purging:			5.81							
Depth To Water After Purging:			5.93							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page 1 of 2

Location: Livonia, MI | Date: 08-09-18

Site/Well No.: MW-74 | Replicate No.: — | Code No.: —

Weather: 80°F, CLOUDY | Sampling Time: Begin 1640 End 1645

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	18.77
Depth to Water (ft bmp)	7.30
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	11.47
Casing Diameter/Type	2" PVC
Gallons in Well	1.8352
Gallons Pumped/Bailed Prior to Sampling	2.1136
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1600 end 1640
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.79
SpC (mS/cm)	4.909
CND (mS/cm)	4.419
Dissolved Oxygen (%)	1.0
Dissolved Oxygen (mg/L)	0.09
pH (s.u.)	7.65
ORP (mV)	0.0
Turbidity (NTU)	2.59
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
1,1-DCE; cis-1,2-DCE; trans-1,2-DCE; PCE; TCE; VC	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-74 PROJ #: MI001454.0004.00002

DATE : 08-09-18 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1600	19.17	4.371	3.890	10.1	0.89	8.15	0.0	200	6.71	7.30
1605	19.62	4.466	4.010	3.8	0.34	7.76	0.0	200	6.29	7.35
1610	19.47	4.737	4.234	2.4	0.22	7.66	0.0	200	4.90	7.35
1615	19.11	4.780	4.244	2.1	0.20	7.64	0.0	200	4.20	7.35
1620	19.64	4.790	4.302	1.8	0.16	7.62	0.0	200	3.89	7.35
1625	20.02	4.837	4.376	1.9	0.17	7.69	0.0	200	4.69	7.35
1630	19.97	4.888	4.419	1.2	0.10	7.65	0.0	200	3.14	7.35
1635	20.04	4.906	4.441	1.0	0.09	7.65	0.0	200	2.79	7.35
1640	19.79	4.909	4.419	1.0	0.09	7.65	0.0	200	2.59	7.35
Total Depth of Well:		18.77								
Depth To Water Before Purging:			7.30							
Depth To Water After Purging:			7.35							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page 1 of 2

Location: Livonia, MI | Date: 08-10-2018

Site/Well No.: MW-735 | Replicate No.: — | Code No.: —

Weather: 75°F, PARTLY CLOUDY | Sampling Time: Begin 0920 End 0925

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	11.55
Depth to Water (ft bmp)	6.19
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	5.36
Casing Diameter/Type	2" PVC
Gallons in Well	0.8576
Gallons Pumped/Bailed Prior to Sampling	2.3778
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 0835 end 0920
Pumping Rate (ml/min)	208
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	20.91
SpC (mS/cm)	5.762
CND (mS/cm)	5.312
Dissolved Oxygen (%)	2.1
Dissolved Oxygen (mg/L)	0.19
pH (s.u.)	6.70
ORP (mV)	45.9
Turbidity (NTU)	0.92
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
1,1-DCE; cis-1,2-DCE; trans-1,2-DCE; PCE; TCE; VC	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-735 PROJ #: MI001454.0004.00002

DATE : 08-10-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
0835	20.58	5.329	4.884	5.8	0.50	6.70	89.8	200	8.91	6.19
0840	20.53	5.530	5.058	5.0	0.44	6.63	82.9	200	4.05	6.22
0845	20.57	5.613	5.139	4.3	0.38	6.62	76.9	200	2.77	6.23
0850	20.61	5.654	5.180	3.9	0.34	6.64	69.3	200	2.04	6.23
0855	20.58	5.690	5.210	3.3	0.29	6.64	64.1	200	1.44	6.23
0900	20.65	5.750	5.272	2.8	0.25	6.65	60.1	200	1.06	6.23
0905	20.67	5.746	5.271	3.5	0.31	6.66	55.1	200	1.04	6.23
0910	20.68	5.754	5.280	2.8	0.25	6.67	52.0	200	0.89	6.23
0915	20.87	5.756	5.302	2.3	0.20	6.70	48.0	200	0.98	6.23
0920	20.91	5.762	5.312	2.1	0.19	6.70	45.9	200	~~1.88~~ 0.92	6.23
~~0925~~ (3 flasks)										
Total Depth of Well:		11.55								
Depth To Water Before Purging:			6.19							
Depth To Water After Purging:			6.23							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page: 1 of 2

Location: Livonia, MI | Date: 08-10-2018

Site/Well No.: MW-73D | Replicate No.: — | Code No.: —

Weather: 75°F, PARTLY CLOUDY | Sampling Time: Begin 1040 End 1045

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	17.36
Depth to Water (ft bmp)	6.39
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.97
Casing Diameter/Type	2" PVC
Gallons in Well	1.7552
Gallons Pumped/Bailed Prior to Sampling	3.3289
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 0940 end 1040
Pumping Rate (ml/min)	210
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	19.51
SpC (mS/cm)	5.065
CND (mS/cm)	4.533
Dissolved Oxygen (%)	0.9
Dissolved Oxygen (mg/L)	0.08
pH (s.u.)	7.47
ORP (mV)	0.0
Turbidity (NTU)	3.19
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
1,1-DCE; cis-1,2-DCE; trans-1,2-DCE; PCE; TCE; VC	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-73D PROJ #: MI001454.0004.00002

DATE : 08-10-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
0940	19.09	4.735	4.195	15.1	1.35	7.22	28.3	210	17.61	6.39
0945	18.85	4.699	4.148	3.6	0.36	7.40	12.6	210	9.57	6.50
0950	18.89	4.838	4.276	2.8	0.26	7.42	0.0	210	6.55	6.56
0955	18.99	4.860	4.303	2.3	0.21	7.46	0.0	210	5.48	6.56
1000	19.32	4.923	4.390	1.7	0.16	7.51	0.0	210	5.51	6.56
1005	19.39	4.950	4.421	1.6	0.15	7.48	0.0	210	4.51	6.56
1010	19.36	4.956	4.423	1.9	0.18	7.48	0.0	210	5.07	6.56
1015	19.45	4.997	4.468	2.0	0.22	7.47	0.0	210	3.88	6.56
1020	19.76	5.007	4.504	2.1	0.18	7.51	0.0	210	5.47	6.56
1025	19.74	5.014	4.510	1.1	0.10	7.54	0.0	210	4.82	6.56
1030	19.66	5.032	4.520	1.0	0.09	7.52	0.0	210	4.91	6.56
1035	19.64	5.063	4.545	0.9	0.08	7.51	0.0	210	5.46	6.56
1040	19.51	5.065	4.533	0.9	0.08	7.47	0.0	210	3.19	6.56
Total Depth of Well:		17.36								
Depth To Water Before Purging:			6.39							
Depth To Water After Purging:			6.56							

ARCADIS

Water Sampling Log

Project: Ford LTP | Project No.: MI001454.0004.00002 | Page 1 of 2

Location: Livonia, MI | Date: 08-10-2018

Site/Well No.: MW-72 | Replicate No.: — | Code No.: —

Weather: 80°F, SUNNY | Sampling Time: Begin 1215 End 1220

Evacuation Data

Measuring Point	TOC
MP Elevation (ft)	NA
Land Surface Elevation (ft)	NA
Sounded Well Depth (ft bmp)	19.63
Depth to Water (ft bmp)	8.67
Water-Level Elevation (ft)	NA
Water Column in Well (ft)	10.96
Casing Diameter/Type	2" PVC
Gallons in Well	1.7536
Gallons Pumped/Bailed Prior to Sampling	1.8494
Sample Pump Intake Setting (ft bmp)	—
Purge Time	begin 1140 end 1215
Pumping Rate (ml/min)	200
Evacuation Method	Peristaltic Pump

Field Parameters

Temperature (°C)	17.66
SpC (mS/cm)	6.543
CND (mS/cm)	5.626
Dissolved Oxygen (%)	1.4
Dissolved Oxygen (mg/L)	0.13
pH (s.u.)	7.50
ORP (mV)	0.0
Turbidity (NTU)	0.76
Color	CLEAR
Odor	NONE
Appearance	NORMAL
Sampling Method	Low Flow
Remarks	—

Constituents Sampled	Container Description	Number	Preservative
1,4-dioxane	40mL voa	3	HCL
1,1-DCE; cis-1,2-DCE; trans-1,2-DCE; PCE; TCE; VC	40mL voa	3	HCL

Sampling Personnel: C. O'NEILL

Well Casing Volumes

Gal./Ft.					
	0.5" = 0.01	1-¼" = 0.06	2" = 0.16	3" = 0.37	4" = 0.65
	1" = 0.04	1-½" = 0.09	2-½" = 0.26	3-½" = 0.50	6" = 1.47

bmp	Below measuring point	mL	Milliliter	NTU	Nephelometric turbidity units
°C	Degrees Celsius	mS/cm	Millisiemens per centimeter	PVC	Polyvinyl chloride
ft	Feet	msl	Mean sea level	s.u.	Standard units
gpm	Gallons per minute	N/A	Not applicable	umhos/cm	Micromhos per centimeter
mg/L	Milligrams per liter	NR	Not recorded	VOC	Volatile organic compounds

ARCADIS

YSI/LOW FLOW SAMPLING LOG

WELL : MW-72 PROJ #: MI001454.0004.00002

DATE : 08-10-2018 LOC: Ford LTP, Livonia, MI

Time	Temp Degree C	SpC mS/cm	CND mS/cm	DO%	DO mg/L	pH	ORP mV	Flow Rate mL/min	Turbidity NTU	DTW
1140	17.78	6.452	5.563	6.9	0.64	8.04	0.0	200	1.73	8.67
1145	17.78	6.388	5.507	3.4	0.31	7.82	0.0	200	1.13	8.69
1150	17.90	6.366	5.503	2.5	0.23	~~1.39~~ 7.71	0.0	200	1.39	8.69
1155	17.96	6.431	5.567	2.0	0.18	7.66	0.0	200	0.99	8.69
1200	17.81	6.490	5.599	1.8	0.16	7.58	0.0	200	1.43	8.69
1205	17.66	6.524	5.609	1.5	0.14	7.56	0.0	200	0.96	8.69
1210	17.67	6.538	5.623	1.5	0.14	7.52	0.0	200	0.85	8.69
1215	17.66	6.543	5.626	1.4	0.13	7.50	0.0	200	0.76	8.69
Total Depth of Well:		19.63								
Depth To Water Before Purging:			8.67							
Depth To Water After Purging:			8.69							

APPENDIX C

Off-Site Soil Gas Field Sampling Logs

Soil Vapor Collection Log Sheet

ARCADIS

Office Name & Address (Reporting Information): **ARCADIS of Michigan, LLC, 28550 Cabot Drive, Suite 500, Novi, MI 48377**	Project Name: **Ford LTP - Residential VI Sampling**
	Project Number: **MI001454.0004.00003**
Project Manager: **Kris Hinskey** Task Manager: **Angela DeGrandis**	Site Address: **36200 Plymouth Road, Livonia, MI**
Phone: **248-994-2240** Fax: **248-994-2241** Special Instructions	
Email Address for Result Reporting: Kristoffer.Hinskey@arcadis.com	Sampler Name, Phone Number: **Ashley Reibel – (m: 586-792-9639); Kalan Briggs – (m: 248-635-4576);** CAITLIN O'NEILL – (m: 248-722-2411)
Helium Detector Used: GEOTECH GASCHECK #3065 Helium Leak Test Method: **Bucket shroud**	Summa Canister Size (1L, 2.7 L, 6L): **1 L with a 20-minute flow controller** Lab: **Eurofins**

Sample ID	Sample Location Description	Date	Leak/Tracer Test (completed prior to sample collection)							Canister No.	Time Collected Start	Initial Canister Pressure (in Hg)	Time Collected End	Final Canister Pressure (in Hg)	Flow Controller No.	Notes
			Shut In Test Pass/Fail?	Initial Purge Reading (ppm)	Shroud Helium Concentration (%)	End Purge Reading (ppm)	Helium Test Pass/Fail?	Purge Volume (mL)	Purge Rate (mL/min)							
SVMP-22-3(091817)	1234 Plymouth Road	12/1/17	Pass	0	30	5	Pass	120	120	2595	0835	-30	0841	-5	10002434	Debris noted under steel cap and in annular space around vapor pin. Cleaned out prior to sampling.
~~SVMP-01S-3.5(082118)~~	~~34965 STANDISH~~	~~8-21-18~~	~~PASS~~	~~0~~	~~30~~	—	—	~~200~~	~~60~~	~~IL3112~~	—	—	—	—	~~23337~~	
SVMP-26-4(082318)	11895 BELDEN CT.	08-23-18	PASS	0	30	5	PASS	200	120	IL3301	1024	-30	1055	-5	23558	
SVMP-27-4.5(082318)	11873 BELDEN CT.	08-23-18	PASS	0	30	5	PASS	200	120	20773	1125	-29	1149	-5	23733	
SVMP-28-3(082318)	11771 BELDEN CT.	08-23-18	PASS	0	30	5	PASS	200	120	IL2797	1301	-27	1327	-5	23291	
DUP-02(082318)	11771 BELDEN CT.	08-23-18	PASS	0	30	5	PASS	200	120	IL2682	1301	-29.5	1333	-5	23742	
SVMP-12-3.5(082318)	12070 BOSTON POST ST.	08-23-18	PASS	0	30	5	PASS	200	120	IL2360	1453	-30	1522	-5	23106	

Meteorological Data

Date	Time	Temp. (°F) Indoor	Temp. (°F) Outdoor	% Humidity	Barometric Pressure (in.)
Example - 12/1/2017	0800	73	22	38	30.10
08/23/2018	1130	—	76	47	30.10
08/23/2018	1500	—	81	33	30.07

General Notes or Observations

Air Parameters (completed after sample collection)

Location ID	CO2 %	O2 %
SVMP-22-3(091817)	0.3	15.6
SVMP-28	15.3	2.2
SVMP-27	2.5	17.7
SVMP-28	4.6	11.3
DUP-02	4.7	11.2
SVMP-12	1.6	18.5

Soil Vapor Collection Log Sheet

Office Name & Address (Reporting Information): **ARCADIS of Michigan, LLC, 28550 Cabot Drive, Suite 500, Novi, MI 48377**	Project Name: **Ford LTP - Residential VI Sampling**
	Project Number: **MI001454.0004.00003**
Project Manager: **Kris Hinskey** Task Manager: **Angela DeGrandis**	Site Address **36200 Plymouth Road** **Livonia, MI**
Phone: **248-994-2240** Fax: **248-994-2241** Special Instructions	Sampler Name, Phone Number: **Ashley Reibel – (m: 586-792-9639); Kalan Briggs – (m: 248-635-4576).**
Email Address for Result Reporting: Kristoffer.Hinskey@arcadis.com	
Helium Detector Used Helium Leak Test Method: **Bucket shroud**	Summa Canister Size (1L, 2.7 L, 6L) **1 L with a 20-minute flow controller** Lab **Eurofins**

Sample ID	Sample Location Description	Date	Leak/Tracer Test (completed prior to sample collection)							Canister No.	Time Collected Start	Initial Canister Pressure (in Hg)	Time Collected End	Final Canister Pressure (in Hg)	Flow Controller No.	Notes
			Shut In Test Pass/Fail?	Initial Purge Reading (ppm)	Shroud Helium Concentration (%)	End Purge Reading (ppm)	Helium Test Pass/Fail?	Purge Volume (mL)	Purge Rate (mL/min)							
SVMP-22-3(091817)	1234 Plymouth Road	12/1/17	Pass	0	30	5	Pass	120	120	2595	0835	-30	0841	-5	10002434	Debris noted under steel cap and in annular space around vapor pin. Cleaned out prior to sampling.
SVMP-01D-7(082218)	34965 STANDISH	08-22-18	PASS	0	30	0	PASS	180	~~180~~ 60 (8/22/18)	1L3112	1350	-30	1419	-5	23337	
SVMP-01S-3.5(082218)	34965 STANDISH	08-22-18	PASS	0	30	0	PASS	180	60	1L2809	1435	-30	1504	-5	23826	
SVMP-02S-4.5(082218)	34963 STANDISH	08-22-18	PASS	0	30	0	PASS	180	60	1L3100	1527	-29	~~1527~~ 1517 (8/22/18)	-5	23116	
SVMP-02D-8.5(082218)	34963 STANDISH	08-22-18	PASS	0	30	0	PASS	180	60	1L2344	1527	-28.5	~~1527~~ 1552 (8/22/18)	-5	24227	
SVMP-03S-3.5(082218)	34851 STANDISH	08-22-18	PASS	0	30	0	PASS	180	120	1L2917	1613	-29	1644	-5	23766	
SVMP-03D-7(082218)	34851 STANDISH	08-22-18	PASS	0	30	0	PASS	180	120	1L3111	1613	-30	1646	-5	23313	
SVMP-25S-3(082318)	12555 BELDEN CT.	08-23-18	PASS	0	30	0	PASS	180	120	1L2823	840	-30	902	-5	23739	
SVMP-25D-6(082318)	12555 BELDEN CT.	08-23-18	PASS	0	30	0	PASS	180	120	1L1786	843	-26	911	-5	23177	

Meteorological Data

Date	Time	Temp. (°F) Indoor	Temp. (°F) Outdoor	% Humidity	Barometric Pressure (in.)
Example - 12/1/2017	0800	73	22	38	30.10
08-22-18	1530	-	74	35	29.99
08-22-18	1620	—	75	32	29.99

General Notes or Observations

DATE	TIME	TEMP (°F) INDOOR	TEMP (°F) OUTDOOR	% HUMIDITY	BAROMETRIC PRESSURE (in.)
8-23-18	850	—	63	35	30.129

Air Parameters (completed after sample collection)

Location ID	CO2 %	O2 %
SVMP-22-3(091817)	0.3	15.6
SVMP-01D	3.1	16.2
SVMP-01S	3.2	17.3
SVMP-02S	3.7	17.4
SVMP-02D	4.5	16.7
SVMP-03S	1.0	19.0
SVMP-03D	1.0	18.8
SVMP-25S	3.5	17.9
SVMP-25D	4.0	17.2

ARCADIS

Soil Vapor Collection Log Sheet

Office Name & Address (Reporting Information): **ARCADIS of Michigan, LLC, 28550 Cabot Drive, Suite 500, Novi, MI 48377**	Project Name: **Ford LTP - Residential VI Sampling**
	Project Number: **MI001454.0004.00003**
Project Manager: **Kris Hinskey** Task Manager: **Angela DeGrandis**	Site Address **36200 Plymouth Road** **Livonia, MI**
Phone: **248-994-2240** Fax: **248-994-2241** Special Instructions	
Email Address for Result Reporting: Kristoffer.Hinskey@arcadis.com	Sampler Name, Phone Number: **Ashley Reibel – (m: 586-792-9639); Kalan Briggs – (m: 248-635-4576).**
Helium Detector Used / Helium Leak Test Method: **Bucket shroud**	Summa Canister Size (1L, 2.7 L, 6L): **1 L with a 20-minute flow controller** / Lab: **Eurofins**

Sample ID	Sample Location Description	Date	Leak/Tracer Test (completed prior to sample collection)							Canister No.	Time Collected Start	Initial Canister Pressure (in Hg)	Time Collected End	Final Canister Pressure (in Hg)	Flow Controller No.	Notes
			Shut In Test Pass/Fail?	Initial Purge Reading (ppm)	Shroud Helium Concentration (%)	End Purge Reading (ppm)	Helium Test Pass/Fail?	Purge Volume (mL)	Purge Rate (mL/min)							
SVMP-22-3(091817)	1234 Plymouth Road	12/1/17	Pass	0	30	5	Pass	120	120	2595	0835	-30	0841	-5	10002434	Debris noted under steel cap and in annular space around vapor pin. Cleaned out prior to sampling.
SVMP-7-3.5(082318)	34965 Wadsworth	8/23/18	Pass	0	32.3	0	Pass	200	60	2683	0846	-30	0912	-4	23705	
SVMP-6-4.5(082318)	34935 Wadsworth	8/23/18	Pass	0	32.1	0	Pass	200	60	2378	0956	-28	1030	-5	23587	
DUP-01 SVMP-5-4.5(082318)	Wadsworth	8/23/18	Pass	0	30.6	0	Pass	200	60	3110 / 2675	1055	-30/-29	1120	-5	/	SVMP-5 / DUP-01, Sand filled vault ants may have compromised
SVMP-4-3.5(082318)	11845 Beacon	8/23/18	Pass	0	32.1	1750	Pass	200	60	3850	1152	-29.5	1215	-5	23708	points due to Gem Reading
SVMP-8-3.5(082318)	Beacon	8/23/18	Pass	0	33.6	0	Pass	200	60	2436	1255	-26.5	1322	-5	23608	
SVMP-9-4(082318)	Beacon	8/23/18	Pass	0	38.2	0	Pass	200	60	2378	1404	-30	1435	-5	23683	
SVMP-10-3(082318)	Beacon	8/23/18	Pass	0	32.1	0	Pass	200	60	1951	1505	-30	1535	-5	23610	
SVMP-21-2(082418)	Capitol / Brewster	8/24/18	Pass	0	32.6	0	Pass	200	60	1561	0845	-30	0912	-5	23784	
SVMP-14-2(082418)	Beacon	8/24/18	Pass	0	33.7	0	Pass	200	60	2856	0952	-30	1016	-5	23612	
SVMP-13-2(082418)	Beacon / Brewster	8/24/18	Pass	0	38.2	0	Pass	200	60	2607	1035	-28	1053	-5	24234	Vault full of water.

Meteorological Data

Date	Time	Temp. (°F) Indoor	Temp. (°F) Outdoor	% Humidity	Barometric Pressure (in.)
Example - 12/1/2017	0800	73	22	38	30.10
8/23/18	858	~~38~~	63	82%	30.09

General Notes or Observations

Air Parameters (completed after sample collection)

Location ID	CO2 %	O2 %
SVMP-22-3(091817)	0.3	15.6
SVMP-7	4.0	18.5
SVMP-6	3.8	17.6
SVMP-5	1.0	20.1
SVMP-4	2.3	19.0
SVMP-8	2.6	18.9
SVMP-9	3.2	17.8
SVMP-10	2.2	18.9
SVMP-21	3.0	19.8
SVMP-14	4.2	16.9
SVMP-13	3.8	17.5

ARCADIS

Soil Vapor Collection Log Sheet

Office Name & Address (Reporting Information): **ARCADIS of Michigan, LLC, 28550 Cabot Drive, Suite 500, Novi, MI 48377**	Project Name: **Ford LTP - Residential VI Sampling** Project Number: **MI001454.0004.00003**
Project Manager: **Kris Hinskey** Task Manager: **Angela DeGrandis**	Site Address **36200 Plymouth Road** **Livonia, MI**
Phone: **248-994-2240** Fax: **248-994-2241** Special Instructions	Sampler Name, Phone Number: **Ashley Reibel – (m: 586-792-9639); Kalan Briggs – (m: 248-635-4576).**
Email Address for Result Reporting: Kristoffer.Hinskey@arcadis.com	
Helium Detector Used Helium Leak Test Method: **Bucket shroud**	Summa Canister Size (1L, 2.7 L, 6L): **1 L with a 20-minute flow controller** Lab: **Eurofins**

Sample ID	Sample Location Description	Date	Leak/Tracer Test (completed prior to sample collection)							Canister No.	Time Collected Start	Initial Canister Pressure (in Hg)	Time Collected End	Final Canister Pressure (in Hg)	Flow Controller No.	Notes
			Shut In Test Pass/Fail?	Initial Purge Reading (ppm)	Shroud Helium Concentration (%)	End Purge Reading (ppm)	Helium Test Pass/Fail?	Purge Volume (mL)	Purge Rate (mL/min)							
SVMP-22-3(091817)	1234 Plymouth Road	12/1/17	Pass	0	30	5	Pass	120	120	2595	0835	-30	0841	-5	10002434	Debris noted under steel cap and in annular space around vapor pin. Cleaned out prior to sampling.
SVMP-22-3(082118)	Rosati	8/21/18	Pass	0	30.1	0	Pass	200	60	3039	-30	1034	1059	-5	24316	
SVMP-23-3(082218)	"	8/22/18	Pass	0	31.2	0	Pass	200	60	1029	-30	1242	1312	-5	23706	
SVMP-24-4(082218)	"	"	Pass	0	30.6	0	Pass	200	60	2926	-30	1340	1410	-5	24324	
SVMP-18-3(082218)	34367 Capitol	"	Pass	0	32.8	0	Pass	200	60	1808	-28	1448	1510	-5	23772	
SVMP-19-3(082218)	Capitol + Brewster	"	Pass	0	30.1	0	pass	200	60	2559	-30	1535	1610	-5	23242	
SVMP-20-3(082218)	12088 Brewster	"	Pass	0	31.2	0	Pass	200	60	2188	-30	1639	1710	-5	23298	
SVMP-15-2(082418)	Beacon	8/24/18	Pass	0	32.6	0	Pass	200	60	2976	-30	1150	1220	-5	23312	
SVMP-16-2(082418)	Beacon	8/24/18	Pass	0	31.0	0	Pass	200	60	2340	-30	1353	1416	-5	23407	
SVMP-17-2(082418)	Beacon	8/24/18	Pass	0	32.6	0	Pass	200	60	2687	-30	1435	1450	-5	24212	

Meteorological Data

Date	Time	Temp. (°F)		% Humidity	Barometric Pressure (in.)
		Indoor	Outdoor		
Example - 12/1/2017	0800	73	22	38	30.10
8/21/18	1035	—	73	—	—
8/22/18	0955	—	62	88	29.95

General Notes or Observations

Air Parameters (completed after sample collection)

Location ID	CO2 %	O2 %
SVMP-22-3(091817)	0.3	15.6
SVMP-22	9.2	11.2
SVMP-23	9.7	11.1
SVMP-24	9.6	10.9
SVMP-18	6.3	12.4
SVMP-19	10.3	10.60
SVMP-20	10.3	7.9
SVMP-15	11.2	6.1
SVMP-16		
SVMP-17		

APPENDIX D

Stability Analysis

Trend Analysis Methodology

The Mann-Kendall trend test is a non-parametric test that determines trends based on ranked data. As such, it is relatively insensitive to small data sets, outlier values and non-detect concentrations and does not require the data to fit a specific model. The basic Mann-Kendall trend test is performed by listing the concentrations of the constituent of interest in temporal order and computing the differences between a given measurement and earlier measurements (Gilbert 1987; USEPA 2009). Based on USEPA guidance (USEPA 2009), non-detect values are set to a single value less than that of any detections, and laboratory qualified concentrations are set equal to the laboratory reporting limit.

The Mann-Kendall test statistic (sum of trend [S]) is the difference between the number of strictly positive differences and the number of strictly negative differences. If S is positive, an increasing trend is indicated; if S is negative, a decreasing trend is indicated; and if S is near zero, no trend is apparent. Trends with positive or negative S-statistics were accepted as statistically significant for p-values less than or equal to 0.1 (90% confidence level). The coefficient of variation (CV) is a quantitative measure that can be used to evaluate if concentrations are stable in cases where a statistically significant trend is not apparent. The CV is calculated as the standard deviation of concentrations of each COC measured over time at a monitoring well divided by the mean (average) concentration over the same time period. CV values near or greater than 1 indicate variability in concentrations over time or suggest an underlying trend that is not statistically significant. Lower CV values indicate that concentrations are stable over time. Where no significant trend was found, the trend determination presented was based on the sign and magnitude of the S-statistic, the CV value, and visual examination of the pattern in concentrations over time.

References

Gilbert, R.O. 1987. *Statistical Methods for Environmental Pollution Monitoring*. John Wiley and Sons, Inc. New York. Hazen, T.C. 2010. Cometabolic Bioremediation. Handbook of Hydrocarbon and Lipid Microbiology. 2505-2514.

USEPA. 2009. Statistical Analysis of Groundwater Monitoring Data at RCRA Facilities. Office of Resource Conservation and Recovery. Unified Guidance. EPA 530-R-09-007.

Summary Statistics and Mann-Kendall Results Ford Motor Company, Livonia Transmission Plant Livonia, Michigan

Monitoring Well	Constituent	Start Date	End Date	Minimum Concentration	Maximum Concentration	Most Recent Concentration	n	% detections	CV	S-Statistic	p-value	Trend Determination
MW-02	TCE	5/12/2016	8/10/2018	<25	27	<140	7	14	NA	NA	NA	NA
MW-02	Total DCE	5/12/2016	8/10/2018	550	2810	2810	7	100	0.5	19	0.001	Statistically Significant Increasing
MW-02	VC	5/12/2016	8/10/2018	140	210	170	7	100	0.1	-6	0.236	Stable to Decreasing
MW-05	TCE	5/13/2016	8/7/2018	0.65 J	<1	<1	6	17	NA	NA	NA	NA
MW-05	Total DCE	5/13/2016	8/7/2018	0.58 J	1	<1	6	33	NA	NA	NA	NA
MW-05	VC	5/13/2016	8/7/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-09	TCE	5/12/2016	8/14/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-09	Total DCE	5/12/2016	8/14/2018	0.29 J	<1	<1	6	5	NA	NA	NA	NA
MW-09	VC	5/12/2016	8/14/2018	1.7	7.6	1.7	6	100	0.5	-13	0.008	Statistically Significant Decreasing
MW-10	TCE	5/13/2016	8/9/2018	<25	<200	<140	7	0	NA	NA	NA	NA
MW-10	Total DCE	5/13/2016	8/9/2018	<25	<200	<140	7	0	NA	NA	NA	NA
MW-10	VC	5/13/2016	8/9/2018	1200	3100	2300	7	100	0.3	11	0.068	Statistically Significant Increasing
MW-22	TCE	5/12/2016	8/10/2018	<50	<140	<50	7	0	NA	NA	NA	NA
MW-22	Total DCE	5/12/2016	8/10/2018	25 J	310	310	7	100	0.6	9	0.119	Potentially Increasing
MW-22	VC	5/12/2016	8/10/2018	1300	2400	1300	7	100	0.2	-8	0.155	Potentially Decreasing
MW-23	TCE	5/10/2016	8/6/2018	1000	25000	12000	6	100	0.8	1	0.500	variable
MW-23	Total DCE	5/10/2016	8/6/2018	2580	82100	45300	6	100	0.7	1	0.500	variable
MW-23	VC	5/10/2016	8/6/2018	77 J	< 2500	< 2500	6	83	0.7	-11	0.028	Statistically Significant Decreasing
MW-34	TCE	5/10/2016	8/10/2018	<1	<1	<1	7	0	NA	NA	NA	NA
MW-34	Total DCE	5/10/2016	8/10/2018	0.29 J	<1	0.33 J	7	57	0.6	--	--	Less than screening criteria
MW-34	VC	5/10/2016	8/10/2018	0.52 J	2	1.1	7	100	0.5	6	0.236	stable
MW-35	TCE	5/10/2016	8/10/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-35	Total DCE	5/10/2016	8/10/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-35	VC	5/10/2016	8/10/2018	2.4	7.2	3	6	100	0.4	-1	0.500	stable
MW-40	TCE	5/10/2016	8/10/2018	<1	<1	<1	5	0	NA	NA	NA	NA
MW-40	Total DCE	5/10/2016	8/10/2018	2.64	4.24	2.77	5	100	0.2	--	--	Less than screening criteria
MW-40	VC	5/10/2016	8/10/2018	0.54 J	1.8	0.54 J	5	80	0.5	2	0.408	stable
MW-41	TCE	5/11/2016	8/10/2018	<1	<1	<1	7	0	NA	NA	NA	NA
MW-41	Total DCE	5/11/2016	8/10/2018	0.77 J	2.84	2.84	7	100	0.3	--	--	Less than screening criteria
MW-41	VC	5/11/2016	8/10/2018	1.9	5.3	3.0	7	100	0.4	6	0.236	stable
MW-43	TCE	5/11/2016	8/10/2018	<1	<1	<1	7	0	NA	NA	NA	NA
MW-43	Total DCE	5/11/2016	8/10/2018	<1	<1	<1	7	0	NA	NA	NA	NA
MW-43	VC	5/11/2016	8/10/2018	1	17	1	7	100	0.8	-13	0.035	Statistically Significant Decreasing
MW-46	TCE	5/12/2016	8/9/2018	<1	<5	<1	7	0	NA	NA	NA	NA
MW-46	Total DCE	5/12/2016	8/9/2018	6.86	25.6	12.2	7	100	0.4	--	--	Less than screening criteria
MW-46	VC	5/12/2016	8/9/2018	13	150	66	7	100	0.7	-5	0.281	Potentially Decreasing
MW-49	TCE	5/12/2016	8/14/2018	<500	<2000	<500	6	0	NA	NA	NA	NA
MW-49	Total DCE	5/12/2016	8/14/2018	15110	43000	15110	6	100	0.4	-11	0.028	Statistically Significant Decreasing
MW-49	VC	5/12/2016	8/14/2018	4900	10000	4900	6	100	0.2	-7	0.136	Potentially Decreasing
MW-50	TCE	5/11/2016	8/6/2018	<1	<5	<1	7	0	NA	NA	NA	NA
MW-50	Total DCE	5/11/2016	8/6/2018	12	23	17.57	7	100	0.3	--	--	Less than screening criteria
MW-50	VC	5/11/2016	8/6/2018	48	150	97	7	100	0.4	4	0.334	stable
MW-52	TCE	5/11/2016	8/10/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-52	Total DCE	5/11/2016	8/10/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-52	VC	5/11/2016	8/10/2018	4	9.1	4.5	6	100	0.3	-5	0.235	stable
MW-54	TCE	7/27/2017	8/13/2018	<1	<1	<1	5	0	NA	NA	NA	NA
MW-54	Total DCE	7/27/2017	8/13/2018	<1	<1	<1	5	0	NA	NA	NA	NA
MW-54	VC	7/27/2017	8/13/2018	0.34 J	1.5	0.34 J	5	100	0.4	-4	0.242	Stable to Decreasing
MW-64	TCE	4/24/2017	8/13/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-64	Total DCE	4/24/2017	8/13/2018	0.29	<1	0.29	6	67	0.7	--	--	Less than screening criteria
MW-64	VC	4/24/2017	8/13/2018	1.3	7	5.9	6	100	0.5	1	0.500	stable
MW-65	TCE	4/25/2017	8/8/2018	<1	<4	<1	6	0	NA	NA	NA	NA
MW-65	Total DCE	4/25/2017	8/8/2018	3.3	6.2	6.2	6	100	0.3	--	--	Less than screening criteria
MW-65	VC	4/25/2017	8/8/2018	35	61	35	6	100	0.2	-13	0.008	Statistically Significant Decreasing
MW-66	TCE	4/25/2017	8/8/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-66	Total DCE	4/25/2017	8/8/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-66	VC	4/25/2017	8/8/2018	2.4	5.6	3.2	6	100	0.4	-9	0.068	Statistically Significant Decreasing
MW-68	TCE	4/24/2017	8/9/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-68	Total DCE	4/24/2017	8/9/2018	11.4	21.9	14.7	6	100	0.2	--	--	Less than screening criteria
MW-68	VC	4/24/2017	8/9/2018	2.1	18	2.2	6	100	1.1	-4	0.298	Potentially Decreasing
MW-69	TCE	4/25/2017	8/13/2018	<1	<1	<1	5	0	NA	NA	NA	NA
MW-69	Total DCE	4/25/2017	8/13/2018	<1	<1	<1	5	0	NA	NA	NA	NA
MW-69	VC	4/25/2017	8/13/2018	<1	3.3	2.7	5	60	0.6	1	0.500	stable
MW-71	TCE	4/24/2017	8/9/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-71	Total DCE	4/24/2017	8/9/2018	0.34	<1	0.34	6	67	0.6	--	--	Less than screening criteria
MW-71	VC	4/24/2017	8/9/2018	0.59	<1	<1	6	67	0.2	--	--	Less than screening criteria
MW-72	TCE	5/22/2017	8/10/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-72	Total DCE	5/22/2017	8/10/2018	<1	<1	<1	5	0	NA	NA	NA	NA
MW-72	VC	5/22/2017	8/10/2018	1.2	3.9	1.2	6	100	0.5	-13	0.008	Statistically Significant Decreasing
MW-73D	TCE	5/22/2017	8/10/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-73D	Total DCE	5/22/2017	8/10/2018	0.35 J	0.56 J	0.56 J	5	100	0.2	--	--	Less than screening criteria
MW-73D	VC	5/22/2017	8/10/2018	0.75 J	1.3	0.75 J	6	100	0.2	--	--	Less than screening criteria
MW-73S	TCE	5/22/2017	8/10/2018	0.33 J	0.51 J	0.51 J	6	100	0.2	--	--	Less than screening criteria
MW-73S	Total DCE	5/22/2017	8/10/2018	1.3	1.9	1.5	5	100	0.2	--	--	Less than screening criteria
MW-73S	VC	5/22/2017	8/10/2018	0.62 J	1.9	0.62 J	6	100	0.3	-9	0.068	Statistically Significant Decreasing
MW-74	TCE	5/23/2017	8/9/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-74	Total DCE	5/23/2017	8/9/2018	<1	0.96	0.41	5	60	1.1	--	--	Less than screening criteria
MW-74	VC	5/23/2017	8/9/2018	0.7 J	2.8	2.8	6	83	0.4	3	0.360	stable
MW-75D	TCE	5/23/2017	8/9/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-75D	Total DCE	5/23/2017	8/9/2018	<1	<1	<1	5	0	NA	NA	NA	NA
MW-75D	VC	5/23/2017	8/9/2018	1.8	6.4	1.8	6	100	0.5	-11	0.028	Statistically Significant Decreasing
MW-79D	TCE	5/24/2017	8/6/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-79D	Total DCE	5/24/2017	8/6/2018	<1	<1	<1	5	0	NA	NA	NA	NA
MW-79D	VC	5/24/2017	8/6/2018	1.9	4.1	2.8	6	100	0.2	-5	0.235	stable
MW-80S	TCE	5/24/2017	8/6/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-80S	Total DCE	5/24/2017	8/6/2018	<1	<1	<1	5	0	NA	NA	NA	NA
MW-80S	VC	5/24/2017	8/6/2018	2.9	7.6	6.2	6	100	0.3	-1	0.500	stable
MW-85	TCE	5/25/2017	8/8/2018	<1	<1	<1	6	0	NA	NA	NA	NA
MW-85	Total DCE	5/25/2017	8/8/2018	<1	<1	<1	5	0	NA	NA	NA	NA
MW-85	VC	5/25/2017	8/8/2018	5.5	8.6	7.2	6	100	0.1	-6	0.186	stable
TW-16-02	TCE	4/25/2017	8/6/2018	<250	<1000	<250	6	0	NA	NA	NA	NA
TW-16-02	Total DCE	4/25/2017	8/6/2018	3100	6000	4156	6	100	0.2	-1	0.500	stable
TW-16-02	VC	4/25/2017	8/6/2018	7300	15000	7300	6	100	0.3	-13	0.008	Statistically Significant Decreasing
TW-16-04	TCE	4/25/2017	8/8/2018	<1	<6.7	<1	6	0	NA	NA	NA	NA
TW-16-04	Total DCE	4/25/2017	8/8/2018	18	25	21	6	100	0.1	--	--	Less than screening criteria
TW-16-04	VC	4/25/2017	8/8/2018	63	150	63	6	100	0.4	-15	0.001	Statistically Significant Decreasing

Notes:
TCE = trichloroethene
Total DCE = sum of cis-1,2-DCE, trans-1,2-DCE, and 1,1-DCE. Non-detect concentrations taken as zero.
VC = vinyl chloride
< = less than the posted reporting limit
n = number of samples included in analysis
% = percent
CV = coefficient of variation; low values indicate stable concentrations. Values near or greater than 1 suggest variability and/or a temporal trend.
NA = not applicable due to elevated proportion of non-detect concentrations
-- = Trend analysis not conducted because each detected concentration is below the applicable screening level.
S-Statistic: positive values suggest increasing trend, negative values suggest decreasing trend, values near zero indicate stability or variability.
p-value: values less than 0.1 indicate a statistically significant trend at 90% confidence.

CITY: Novi DIV: ENV DB: MG PIC: R_ELLIS PM: K_HINSKEY PROJECT NUMBER: MI001322.0001 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
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ON-SITE AREA

OFF-SITE AREA

LIVONIA TRANSMISSION PLANT

TEST TRACK

ATNPC BUILDING

MW-54
MW-72
MW-85
MW-52
MW-43
MW-73S
MW-73D
MW-79D
MW-80S
MW-35
MW-74
MW-34
MW-41
MW-75D
MW-40
MW-69
MW-71
MW-68
MW-64
MW-65
MW-66
MW-50
TW-16-04
MW-22
MW-46
MW-49
TW-16-02
MW-23
MW-09
MW-02
MW-05
MW-10

VAULT V-ESD-1
VAULT V-ESD-2
VAULT V-ESD-3
VAULT V-ESD-4
VAULT V-ESD-5

ROSATI AVE
CONCORD ST
CAPITOL ST
BREWSTER ST
BELDEN CT
BOSTON POST ST
STARK RD
WADSWORTH ST
STANDISH ST
PRISCILLA LN
LEVAN RD
PLYMOUTH RD
YALE ST
YALE AVE
ELMIRA ST
WAYNE RD
LAUREL ST

N

0 400 800
SCALE IN FEET

LEGEND

TRICHLOROETHENE TRENDS

- NO SIGNIFICANT TREND
- CONSTITUENT BELOW LABORATORY REPORTING LIMIT OR APPLICABLE SCREENING LEVEL
- AREA OF CONCERN
- FORD PROPERTY BOUNDARY
- VAULT (2 FT x 2 FT)
- VAULT (4 FT x 6 FT)
- WELL SCREEN (4-INCH SDR-11 HDPE, CUSTOM SLOTTED)
- WELL BLANK CASING (4-INCH SDR-11 HDPE)
- WELL BLANK CASING (6-INCH SDR-11 HDPE)
- COMMERCIAL/RESIDENTIAL PROPERTY BOUNDARY

NOTES:

ATNPC - AUTOMATIC TRANSMISSION NEW PRODUCT CENTER

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

MANN-KENDALL STATISTICAL TRICHLOROETHENE TREND RESULTS

ARCADIS Design & Consultancy for natural and built assets

FIGURE
1

CITY: Novi DIV: ENV DB: MG PIC: R_ELLIS PM: K_HINSKEY PROJECT NUMBER: MI001322.0001 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
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ON-SITE AREA

OFF-SITE AREA

LIVONIA TRANSMISSION PLANT

TEST TRACK

ATNPC BUILDING

MW-54
MW-72
MW-52
MW-85
ROSATI AVE
CONCORD ST
TW-16-04
MW-50
MW-43
MW-73D
MW-73S
MW-79D
MW-80S
CAPITOL ST
MW-35
MW-74
MW-65
MW-64
BREWSTER ST
MW-66
MW-34
BELDEN CT
MW-68
MW-41
MW-75D
BOSTON POST ST
WADSWORTH ST
MW-22
MW-46
MW-69
STARK RD
MW-05
MW-02
MW-10
MW-49
TW-16-02
MW-71
STANDISH ST
PRISCILLA LN
MW-23
MW-40
MW-09
PLYMOUTH RD
YALE ST
ELMIRA ST
LAUREL ST
YALE AVE
WAYNE RD
LEVAN RD

VAULT V-ESD-1
VAULT V-ESD-2
VAULT V-ESD-3
VAULT V-ESD-4
VAULT V-ESD-5

LEGEND

TOTAL DICHLOROETHENE TRENDS

- INCREASING TREND
- DECREASING TREND
- NO SIGNIFICANT TREND
- CONSTITUENT BELOW LABORATORY REPORTING LIMIT OR APPLICABLE SCREENING LEVEL
- AREA OF CONCERN
- FORD PROPERTY BOUNDARY
- VAULT (2 FT x 2 FT)
- VAULT (4 FT x 6 FT)
- WELL SCREEN (4-INCH SDR-11 HDPE, CUSTOM SLOTTED)
- WELL BLANK CASING (4-INCH SDR-11 HDPE)
- WELL BLANK CASING (6-INCH SDR-11 HDPE)
- COMMERCIAL/RESIDENTIAL PROPERTY BOUNDARY

0 400 800
SCALE IN FEET

NOTES:

ATNPC - AUTOMATIC TRANSMISSION NEW PRODUCT CENTER

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LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

MANN-KENDALL STATISTICAL TOTAL DICHLOROETHENE TREND RESULTS

ARCADIS Design & Consultancy for natural and built assets

FIGURE
2

CITY: Novi DIV: ENV DB: MG PIC: R_ELLIS PM: K_HINSKEY PROJECT NUMBER: MI001322.0001 COORDINATE SYSTEM: NAD 1983 StatePlane Michigan South FIPS 2113 Feet
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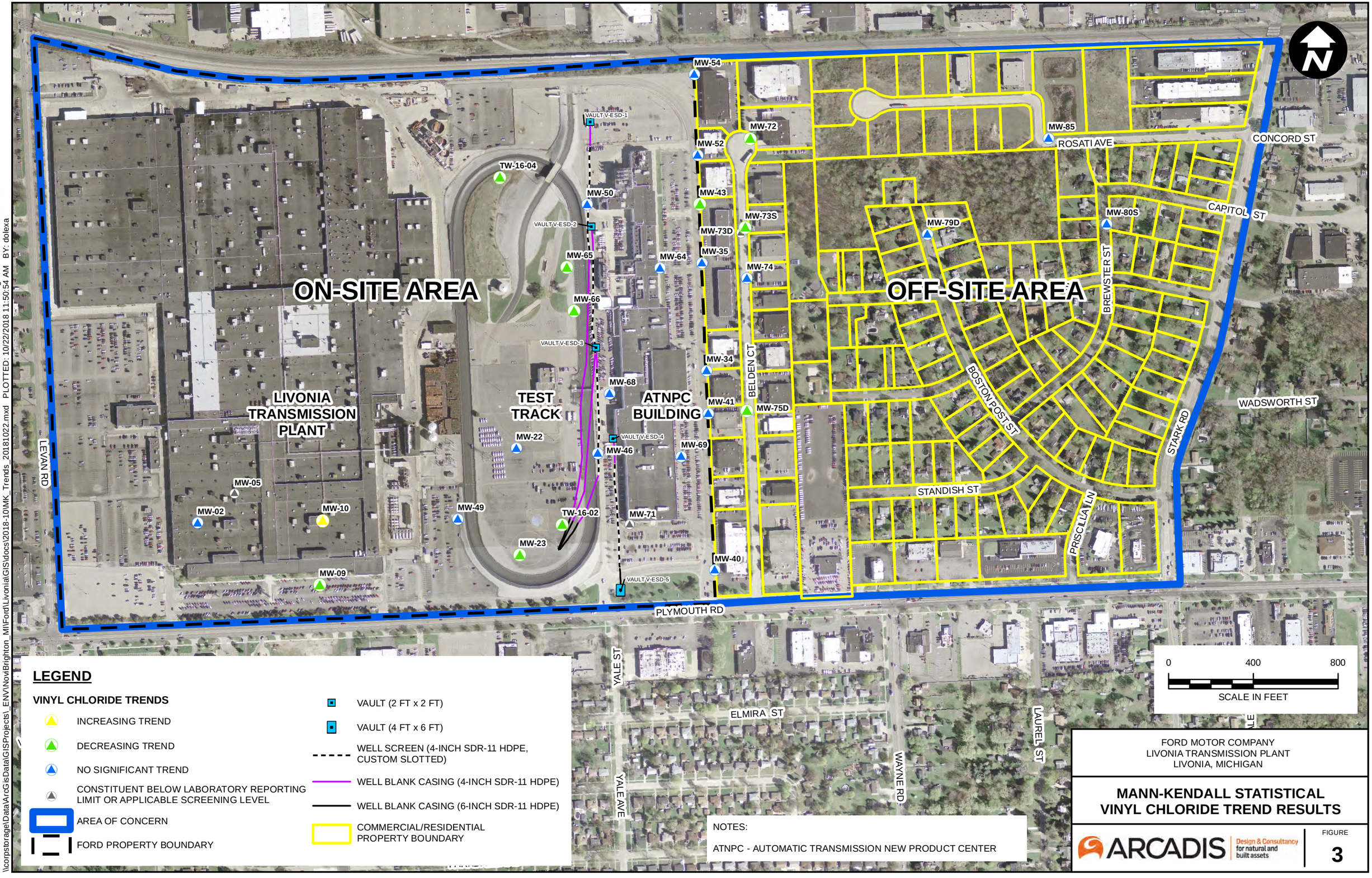


LEGEND

VINYL CHLORIDE TRENDS

- INCREASING TREND
- DECREASING TREND
- NO SIGNIFICANT TREND
- CONSTITUENT BELOW LABORATORY REPORTING LIMIT OR APPLICABLE SCREENING LEVEL
- AREA OF CONCERN
- FORD PROPERTY BOUNDARY
- VAULT (2 FT x 2 FT)
- VAULT (4 FT x 6 FT)
- WELL SCREEN (4-INCH SDR-11 HDPE, CUSTOM SLOTTED)
- WELL BLANK CASING (4-INCH SDR-11 HDPE)
- WELL BLANK CASING (6-INCH SDR-11 HDPE)
- COMMERCIAL/RESIDENTIAL PROPERTY BOUNDARY

NOTES:

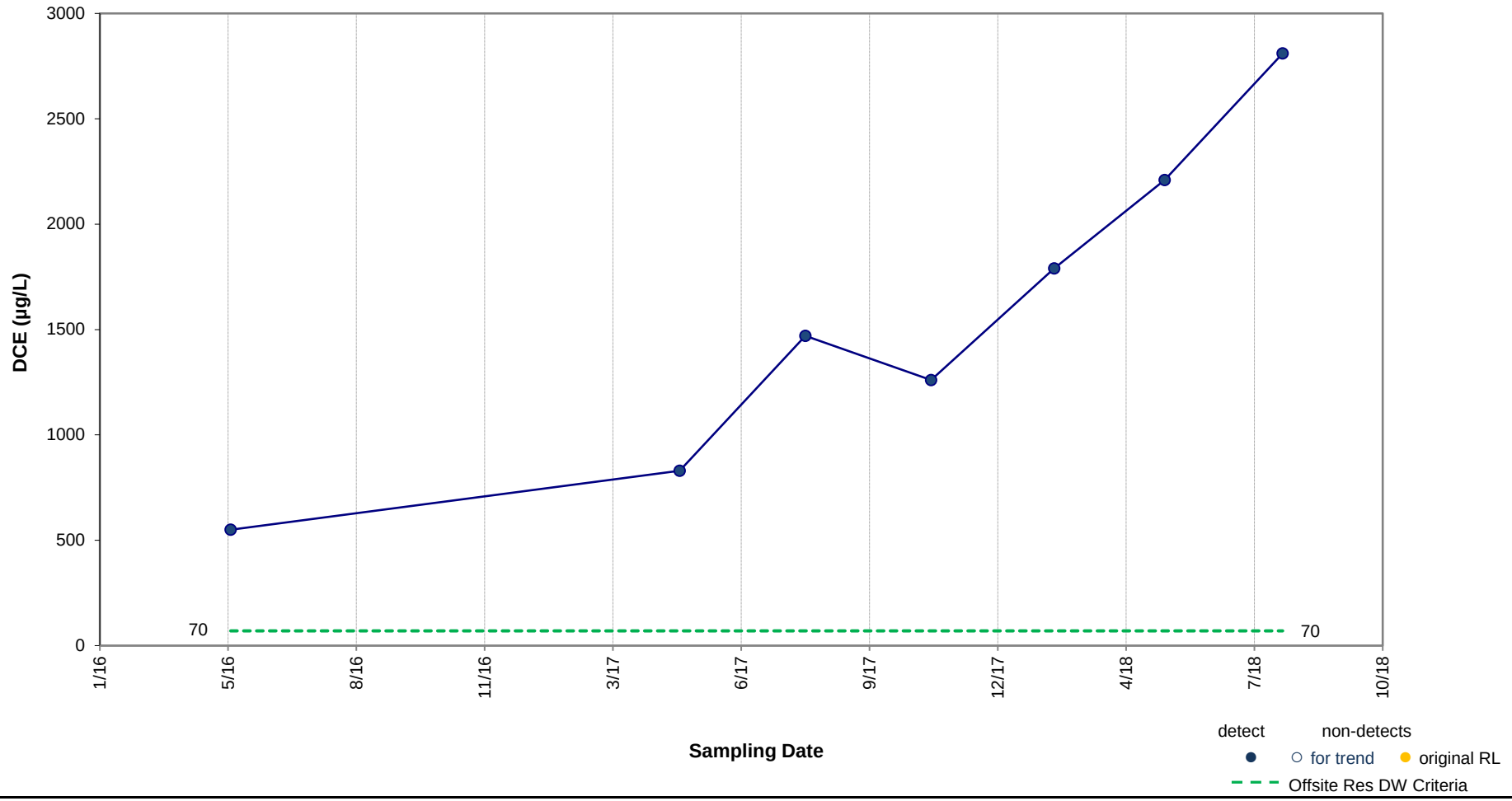
ATNPC - AUTOMATIC TRANSMISSION NEW PRODUCT CENTER

FORD MOTOR COMPANY
LIVONIA TRANSMISSION PLANT
LIVONIA, MICHIGAN

MANN-KENDALL STATISTICAL VINYL CHLORIDE TREND RESULTS

ARCADIS Design & Consultancy for natural and built assets

FIGURE 3



Results of Mann-Kendall Test for Trend: **INCREASING TREND**

p value = 0.001 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **INCREASING TREND**

Median Slope Estimate = 3.3E+00 µg/L Per Day

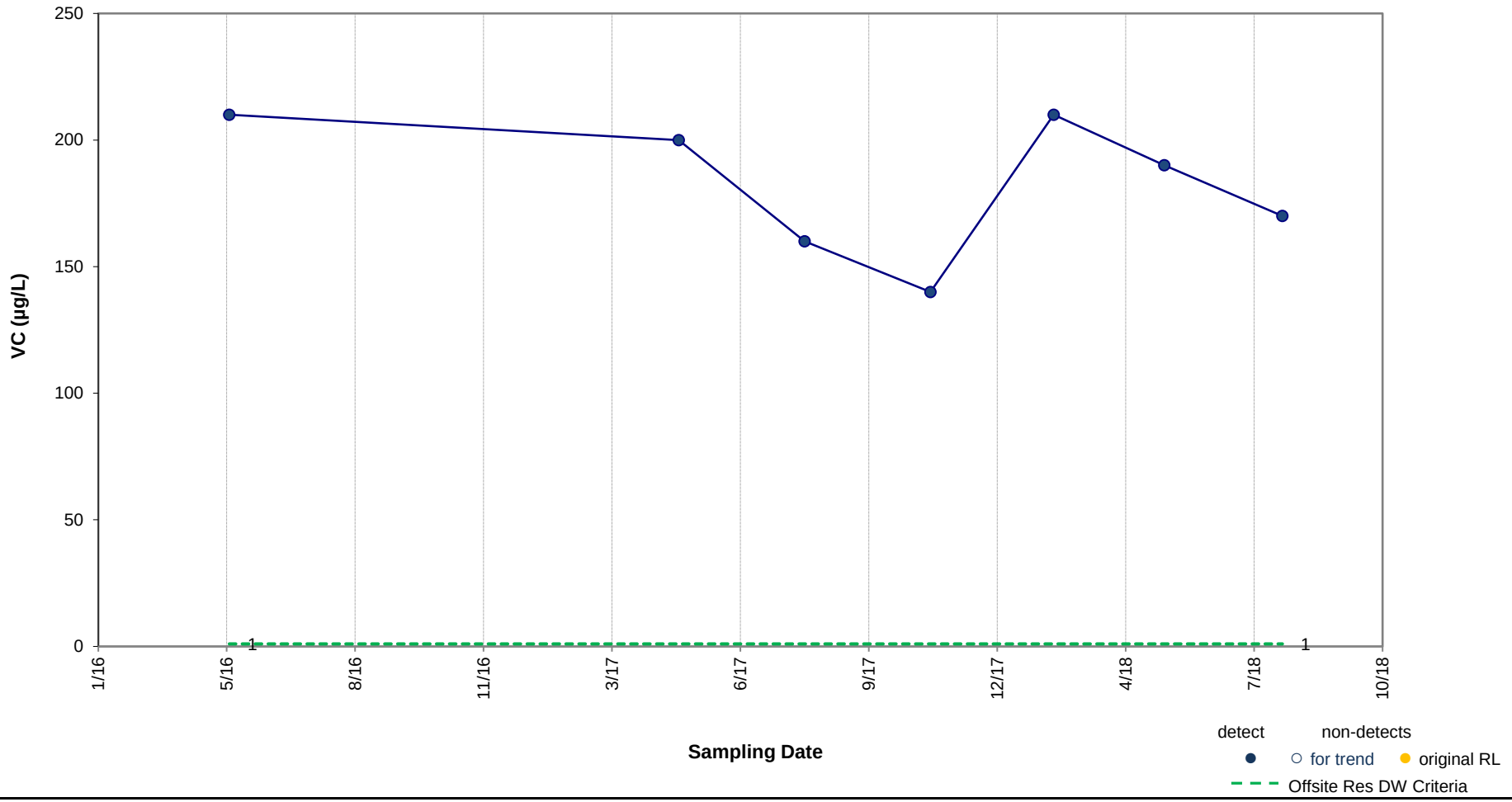
90% Confidence Interval = 1.9E+00 to 5.2E+00 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – DCE in MW-2

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.236 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = -2.9E-02 µg/L Per Day

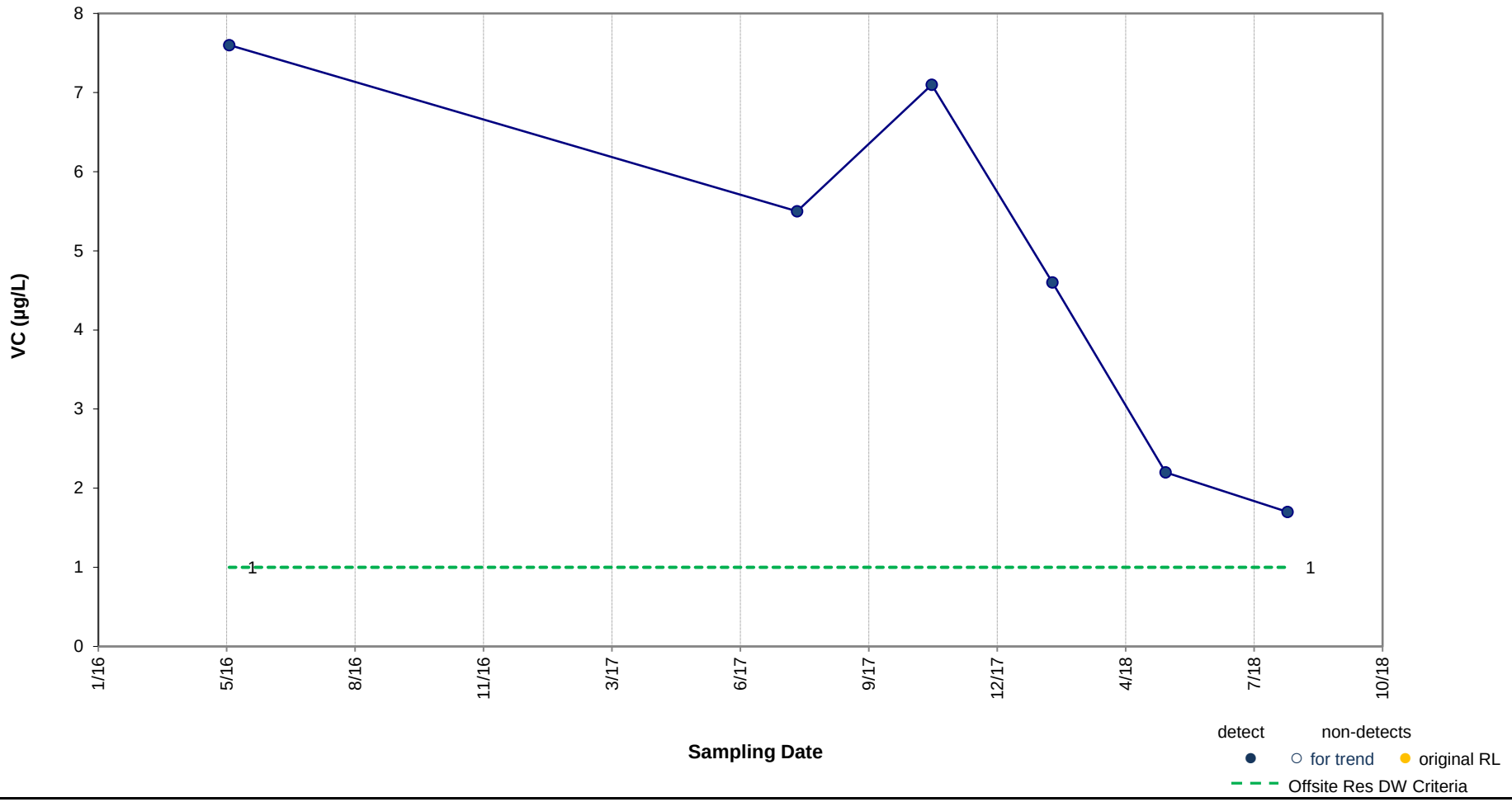
90% Confidence Interval = -2.2E-01 to 3.4E-02 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-2

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **DECREASING TREND**

p value = 0.008 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **DECREASING TREND**

Median Slope Estimate = -7.4E-03 µg/L Per Day

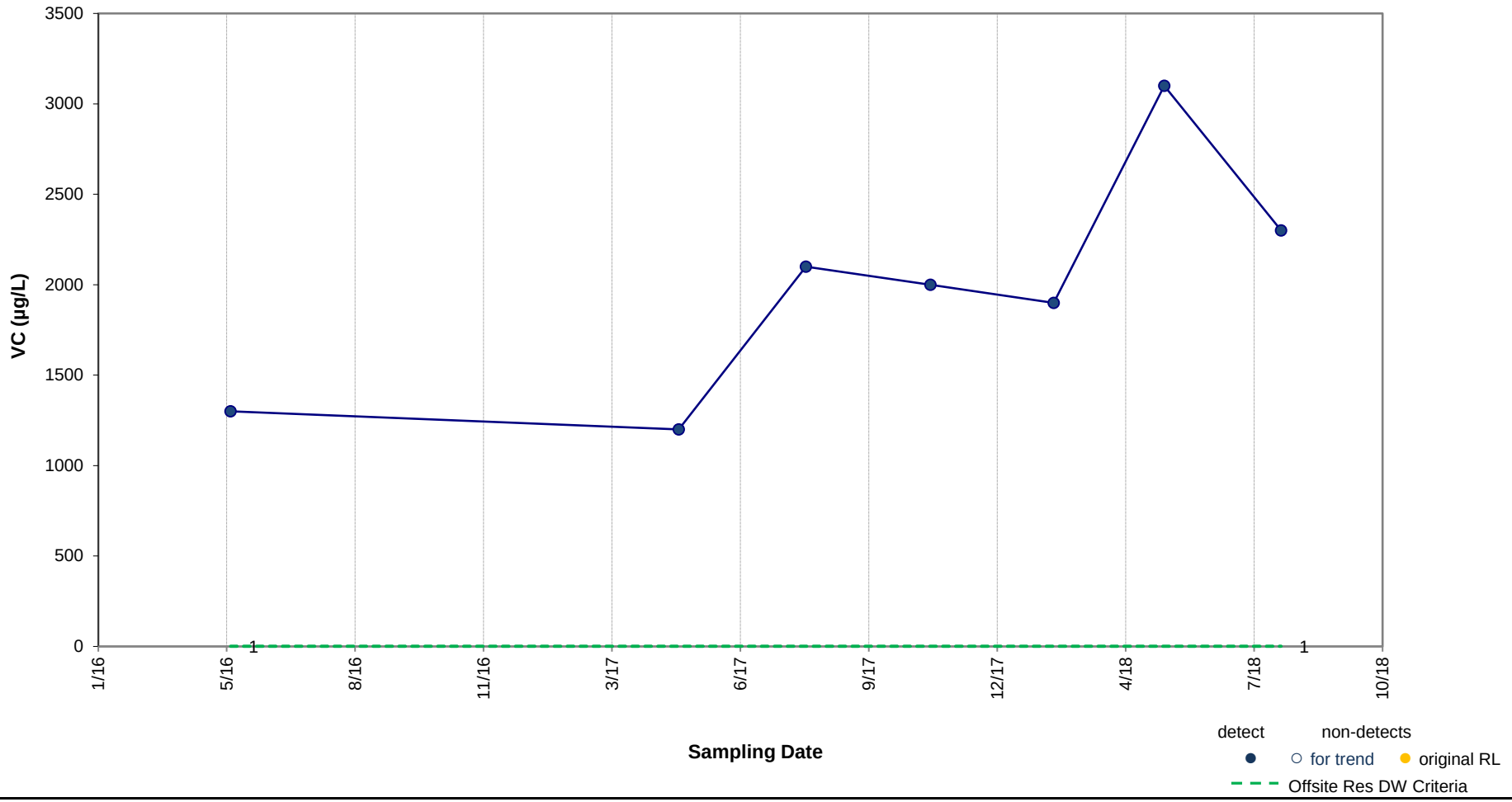
90% Confidence Interval = -2.6E-02 to -4.7E-03 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-9

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **INCREASING TREND**

p value = 0.068 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = 1.8E+00 µg/L Per Day

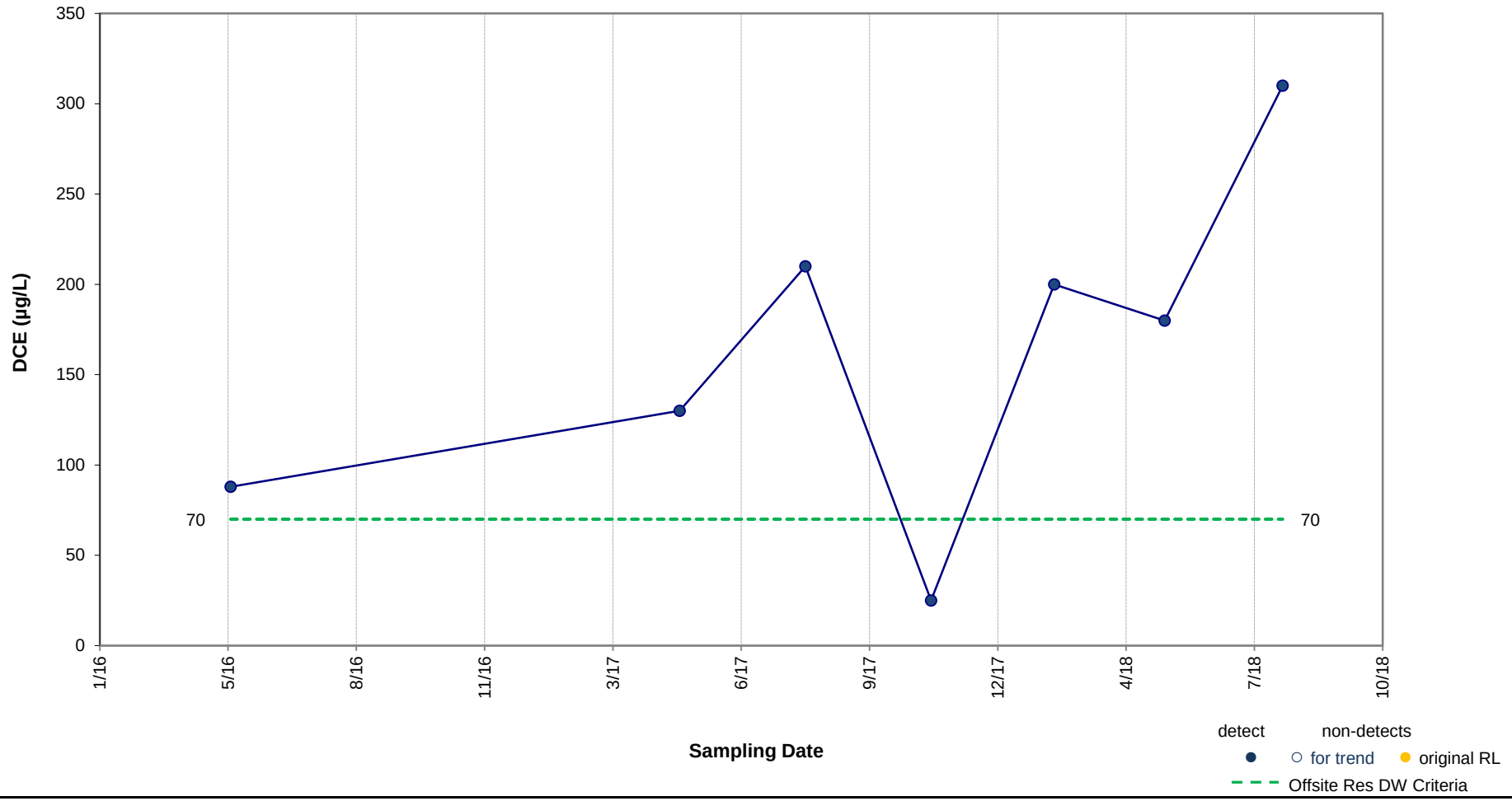
90% Confidence Interval = -2.7E-01 to 3.6E+00 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-10

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.119 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = 2.4E-01 µg/L Per Day

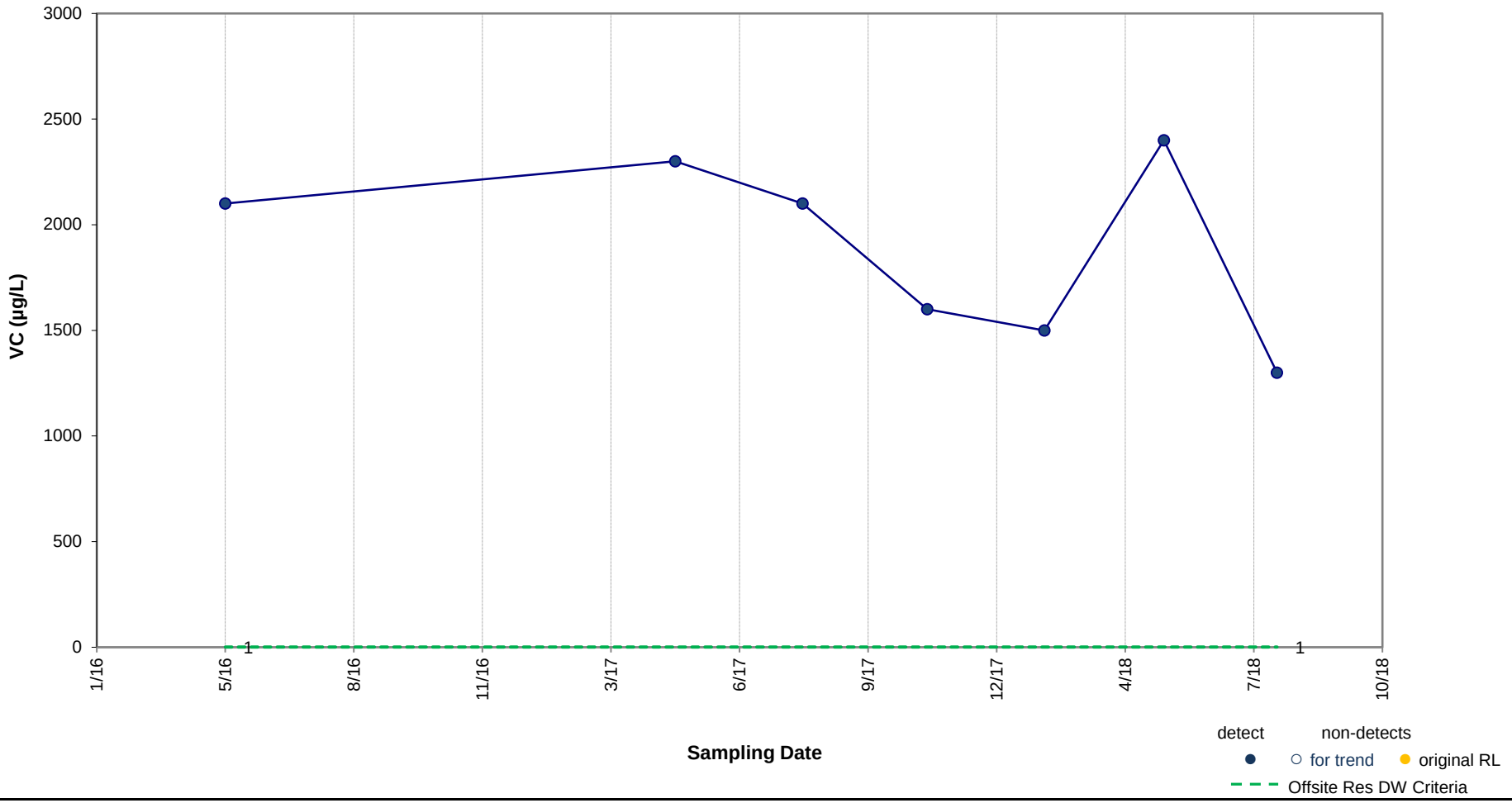
90% Confidence Interval = -1.1E-01 to 6.1E-01 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – DCE in MW-22

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.155 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = -1.1E+00 µg/L Per Day

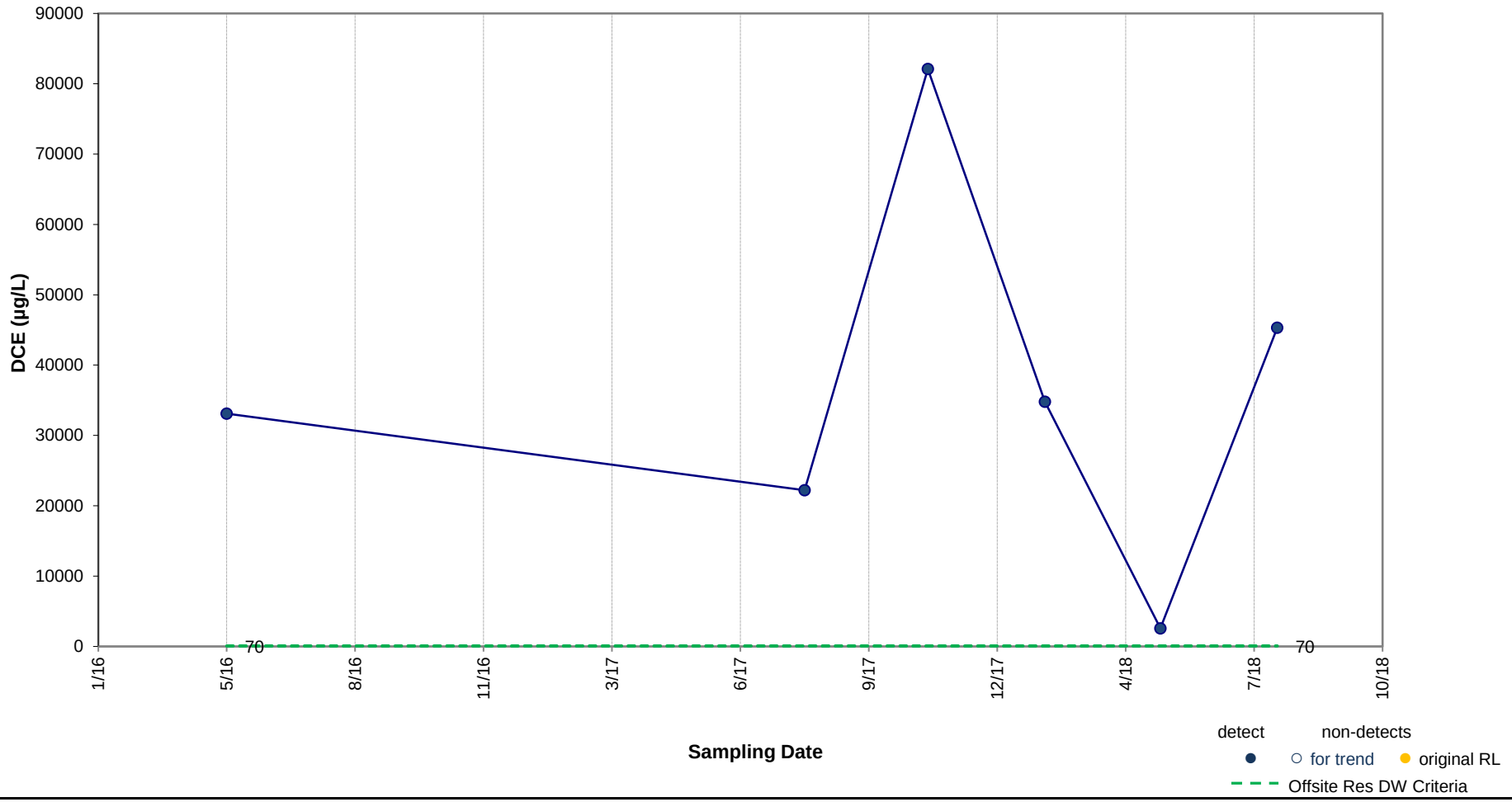
90% Confidence Interval = -2.7E+00 to 2.4E-01 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-22

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.500 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = 2.7E+00 µg/L Per Day

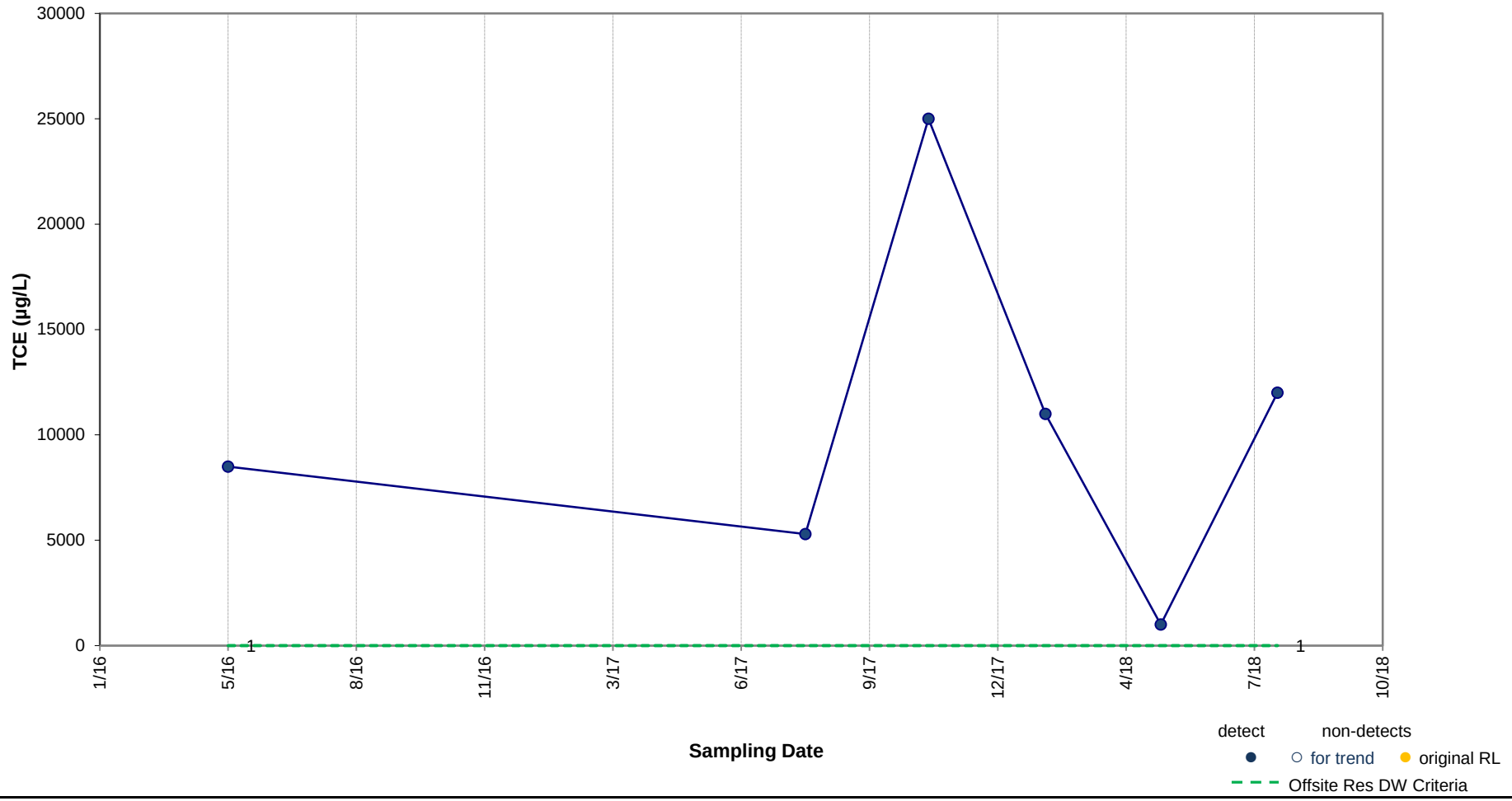
90% Confidence Interval = -3.3E+02 to 6.7E+01 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – DCE in MW-23

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.500 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = 3.9E+00 µg/L Per Day

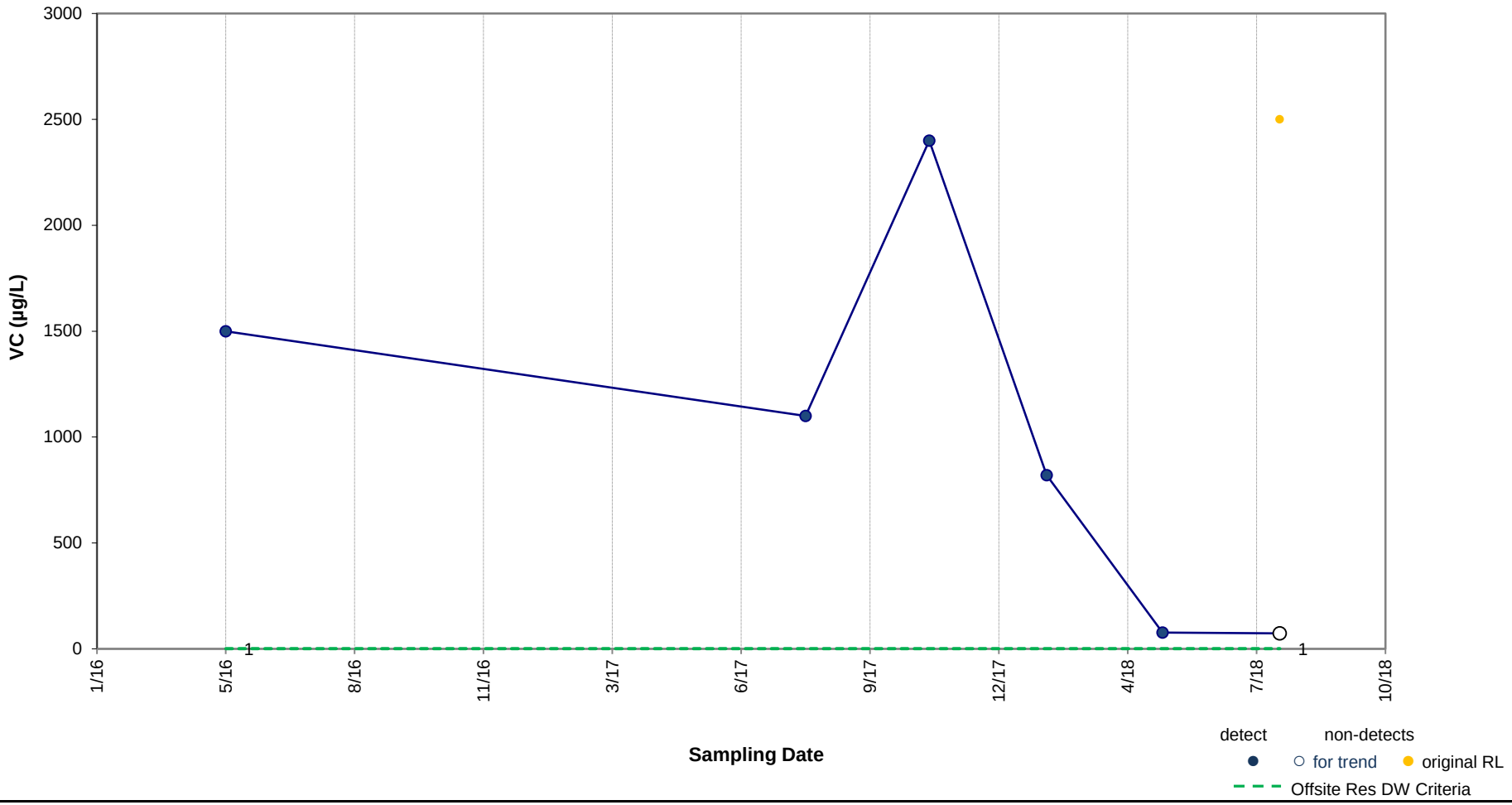
90% Confidence Interval = -1.0E+02 to 2.9E+01 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – TCE in MW-23

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **DECREASING TREND**

p value = 0.028 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **DECREASING TREND**

Median Slope Estimate = -2.0E+00 µg/L Per Day

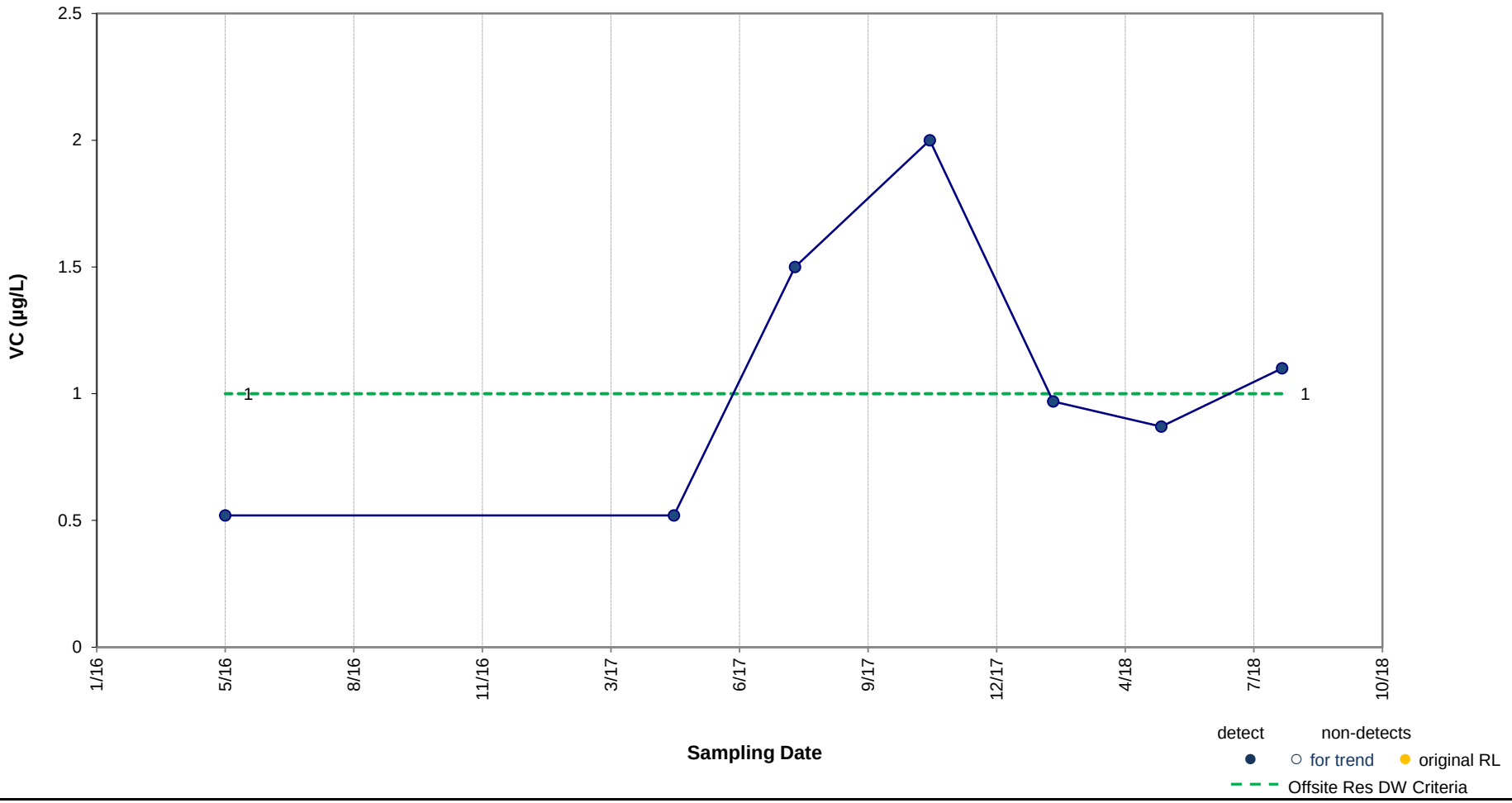
90% Confidence Interval = -8.5E+00 to -9.1E-01 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-23

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.236 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = 7.1E-04 µg/L Per Day

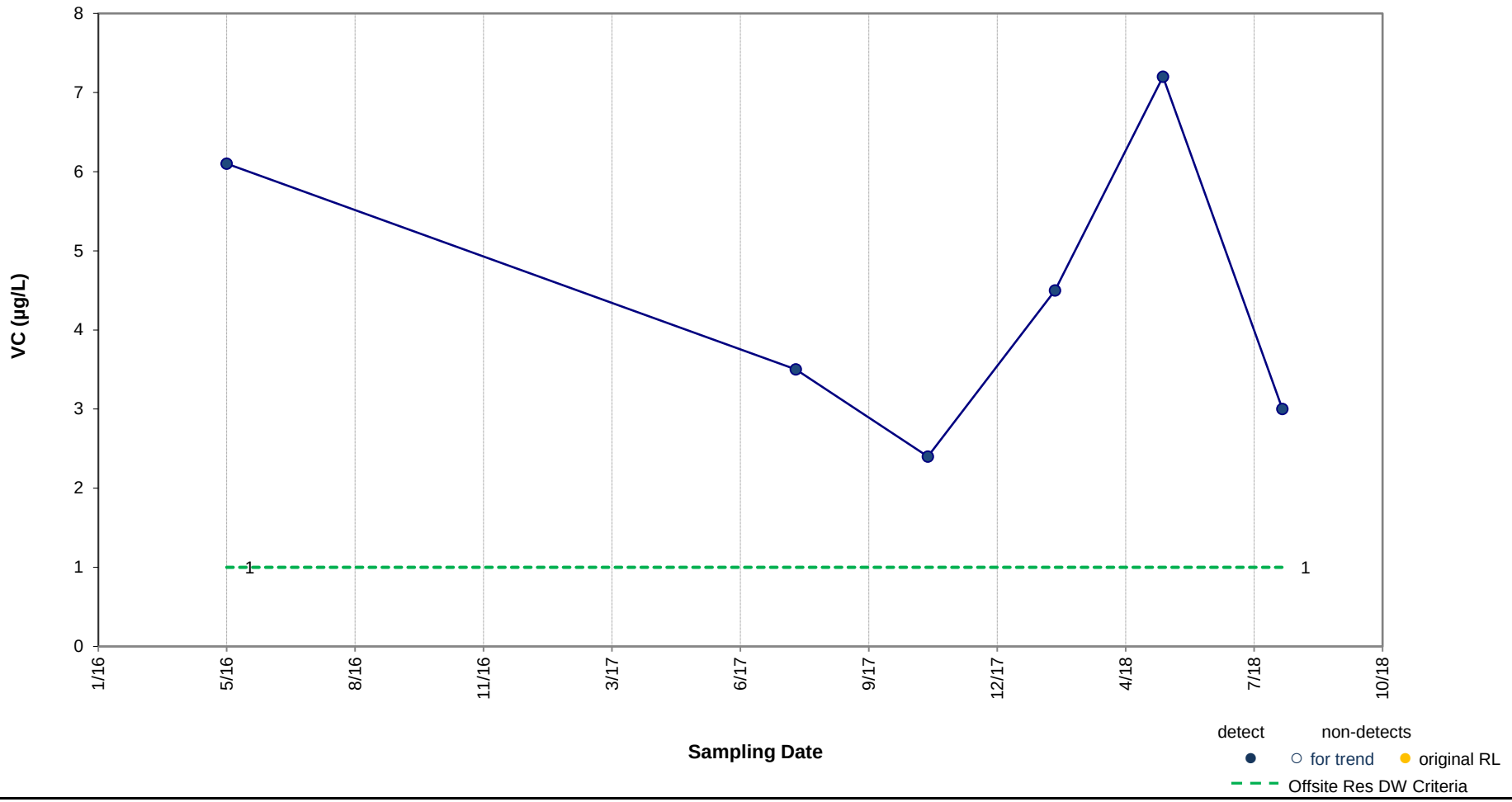
90% Confidence Interval = -2.1E-03 to 2.2E-03 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-34

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.500 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = -1.3E-03 µg/L Per Day

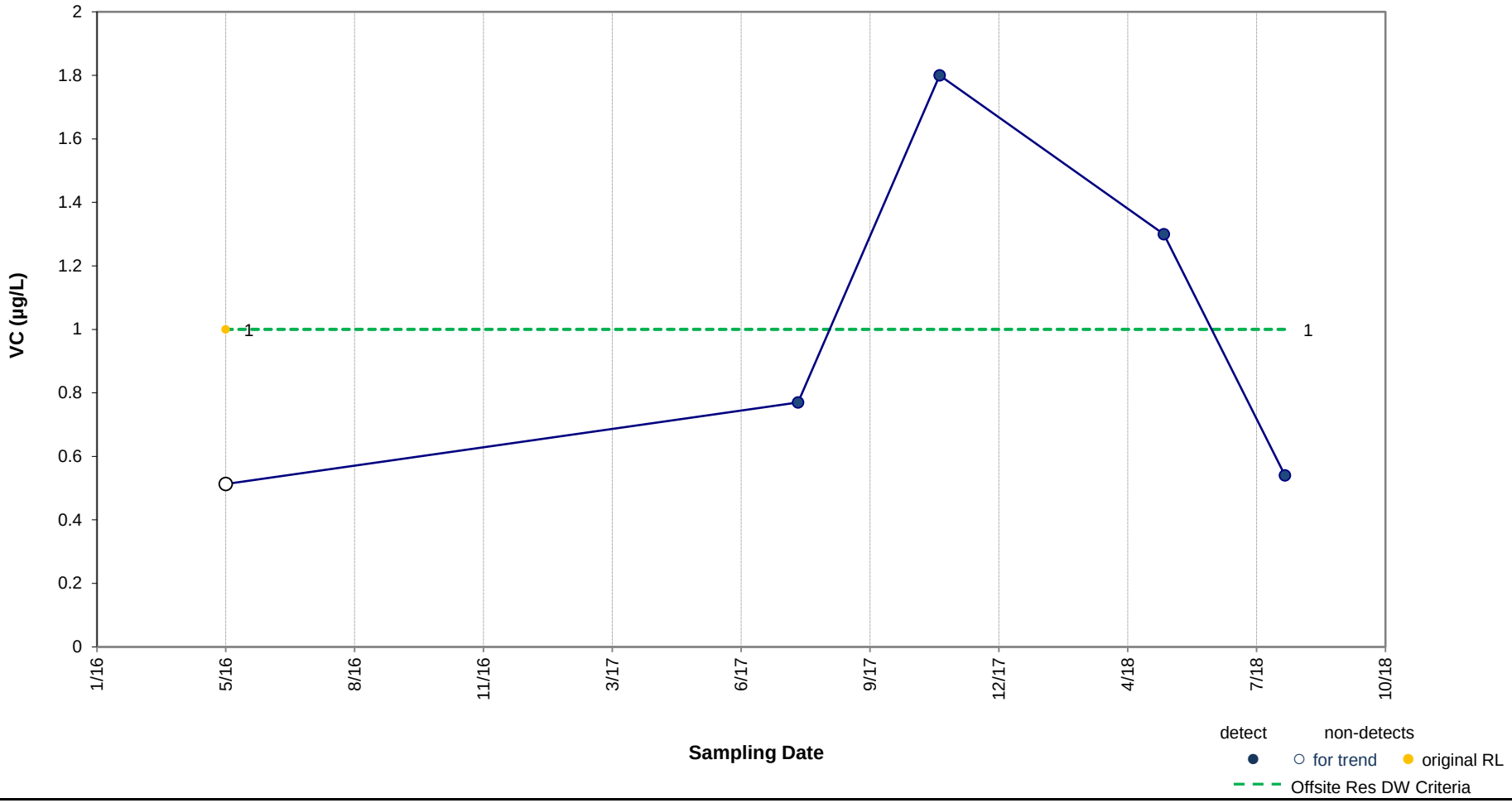
90% Confidence Interval = -8.3E-03 to 1.2E-02 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-35

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.408 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = 3.1E-04 µg/L Per Day

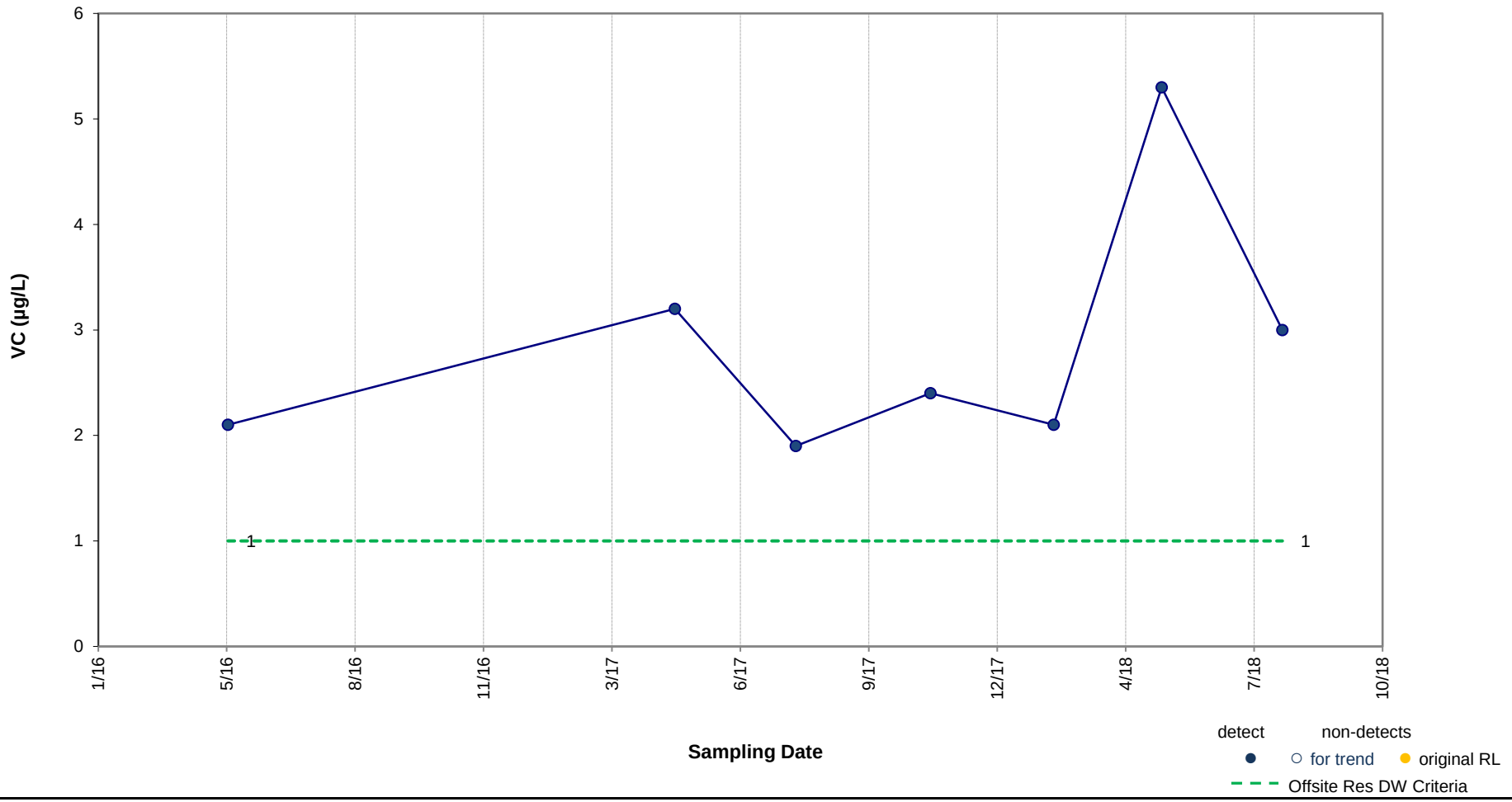
90% Confidence Interval = -5.9E-03 to 2.0E-03 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-40

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.236 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = 1.1E-03 µg/L Per Day

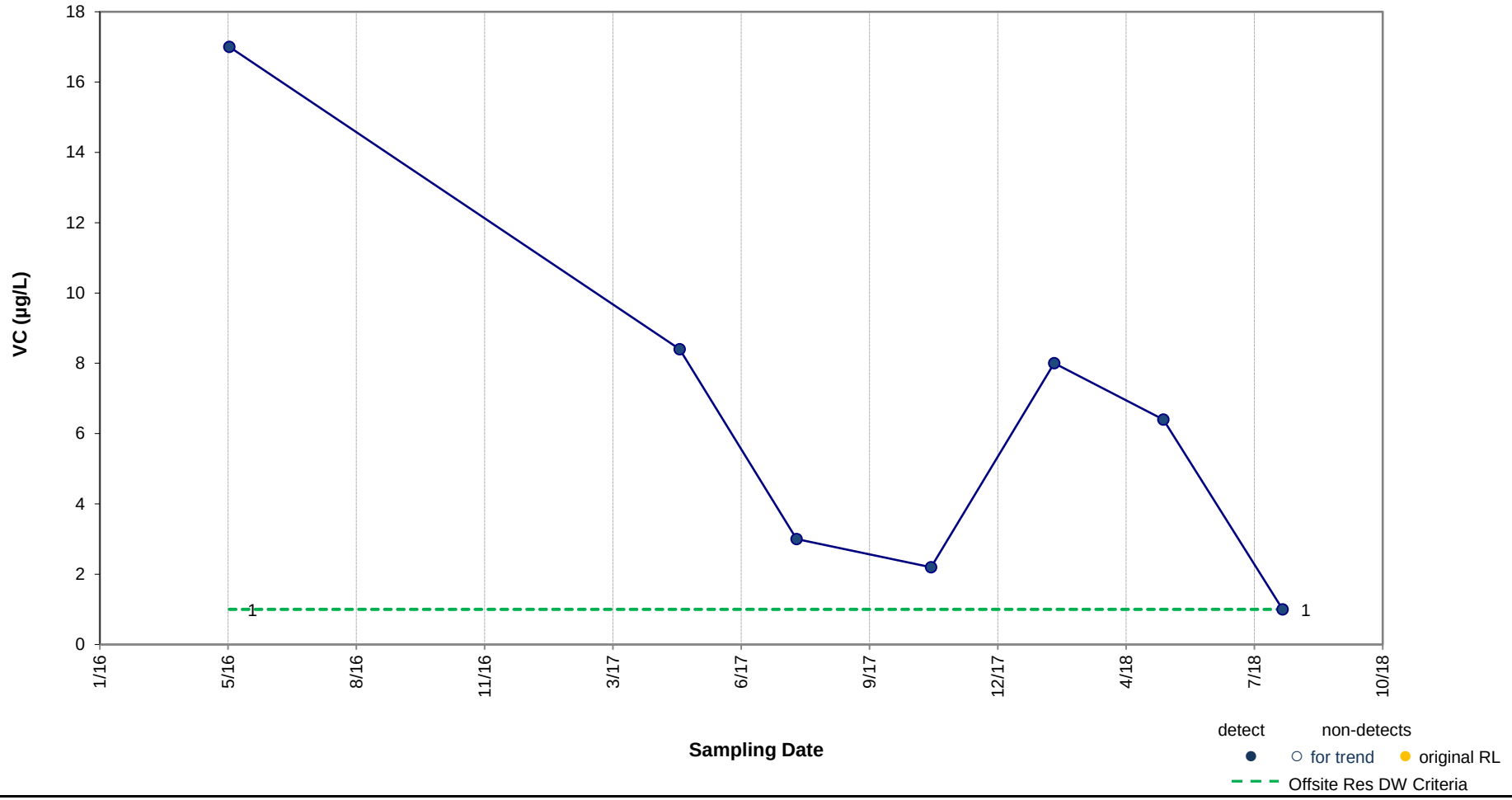
90% Confidence Interval = -2.9E-03 to 4.7E-03 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-41

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **DECREASING TREND**

p value = 0.035 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **DECREASING TREND**

Median Slope Estimate = -1.5E-02 µg/L Per Day

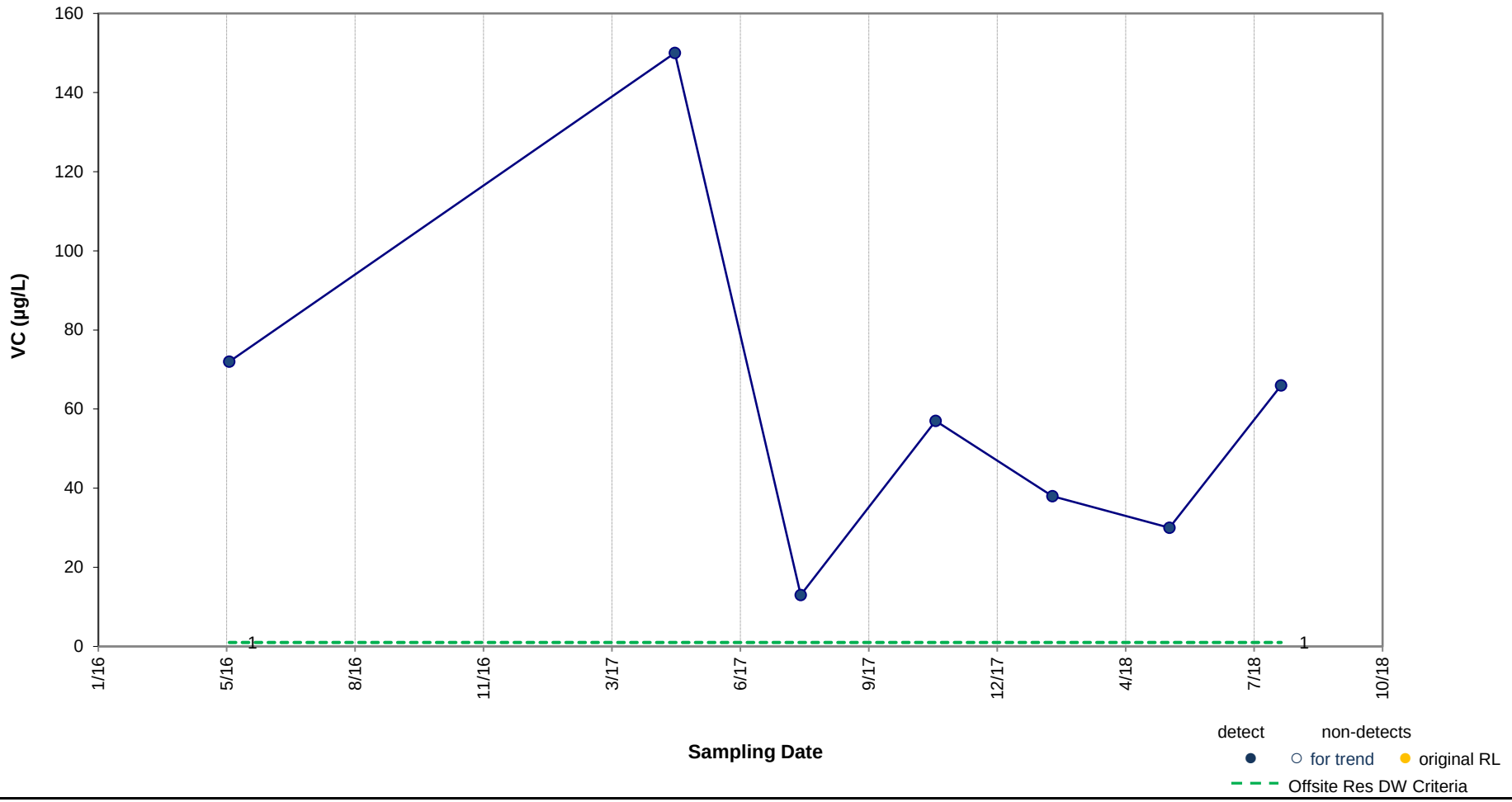
90% Confidence Interval = -3.2E-02 to -4.4E-03 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-43

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.281 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = -5.3E-02 µg/L Per Day

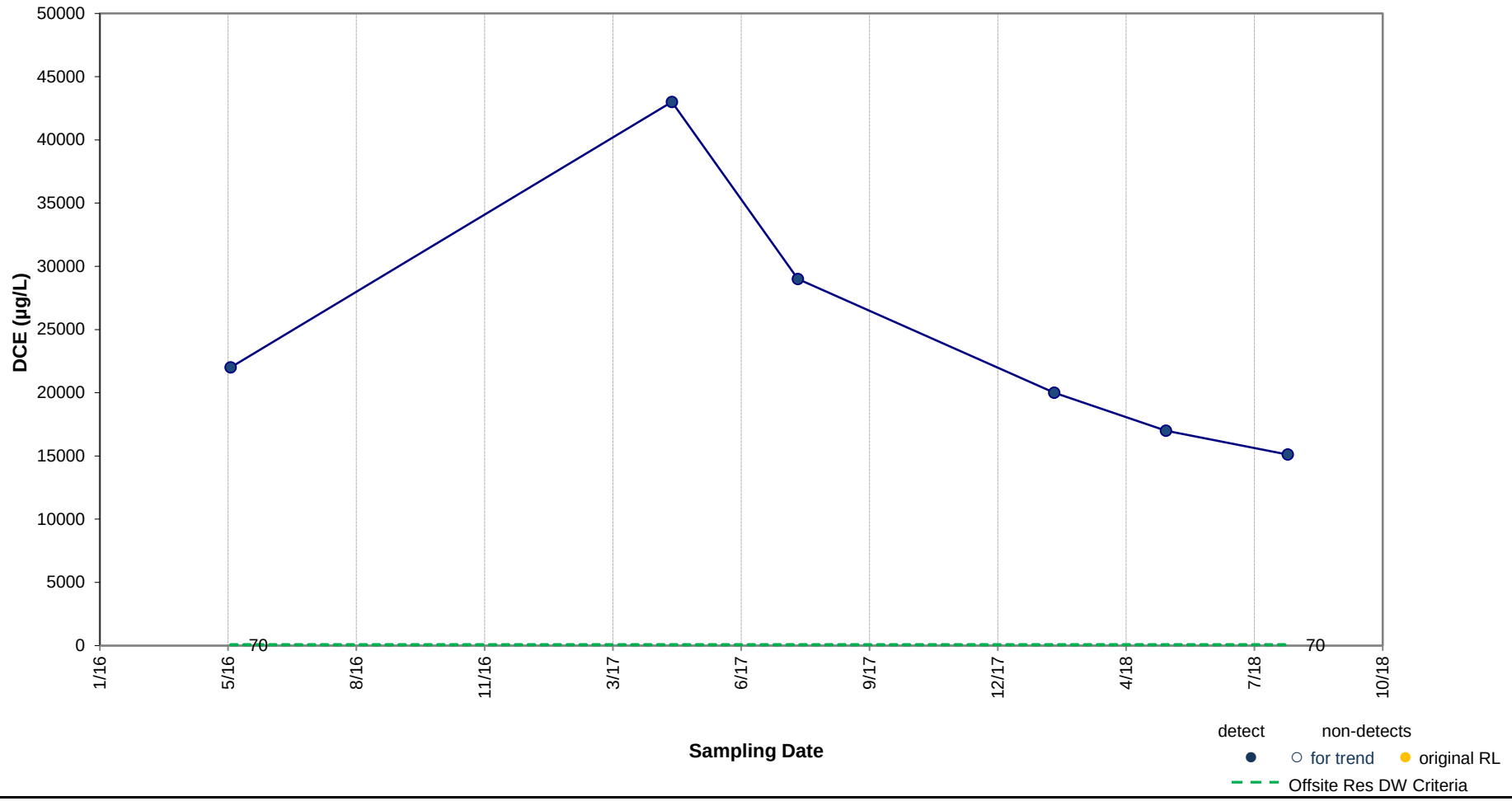
90% Confidence Interval = -2.1E-01 to 1.3E-01 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-46

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **DECREASING TREND**

p value = 0.028 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **DECREASING TREND**

Median Slope Estimate = -3.4E+01 µg/L Per Day

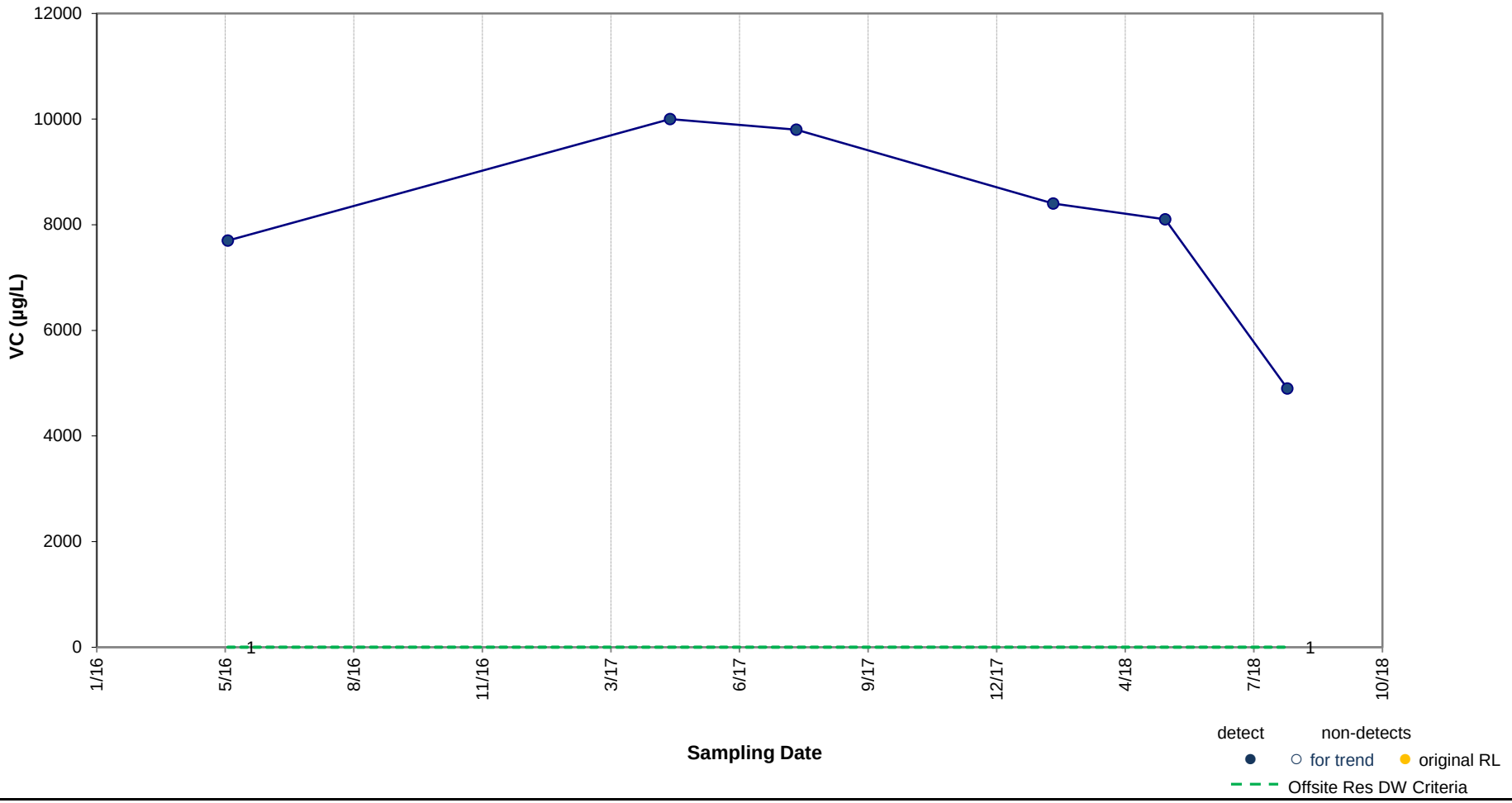
90% Confidence Interval = -6.6E+01 to -7.0E+00 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – DCE in MW-49

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.136 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = -4.9E+00 µg/L Per Day

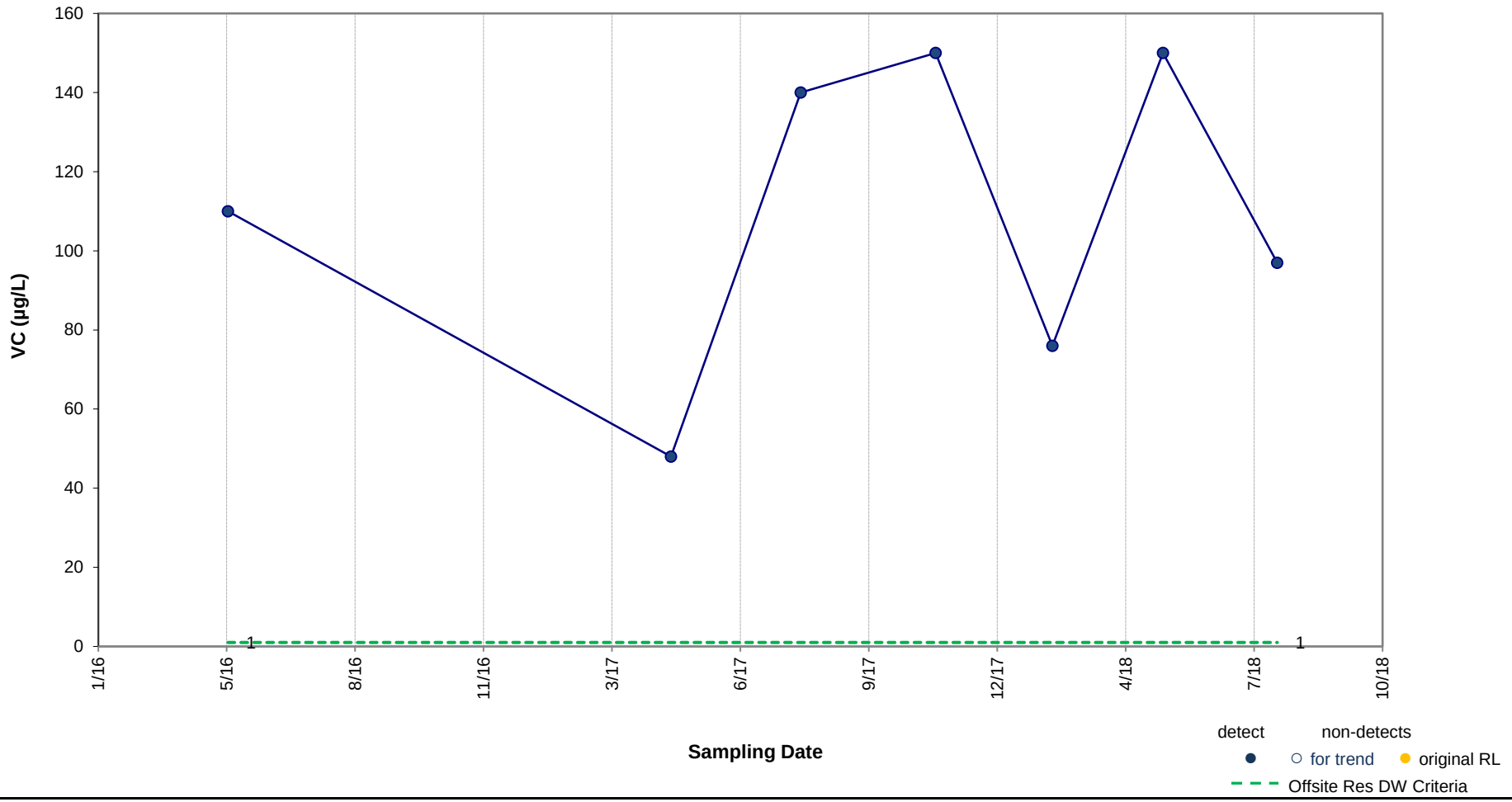
90% Confidence Interval = -1.3E+01 to 2.3E-01 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-49

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.334 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = 5.5E-02 µg/L Per Day

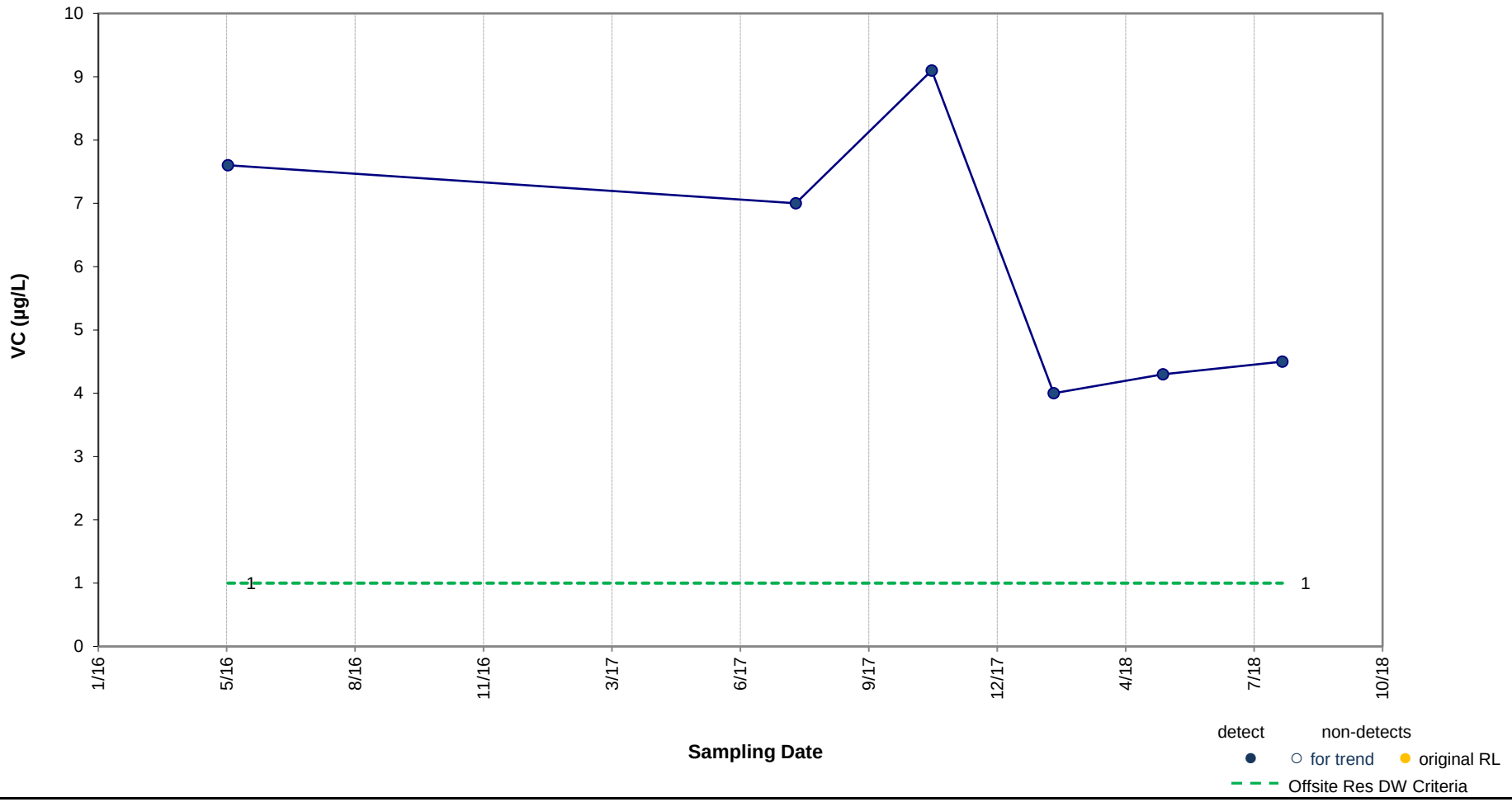
90% Confidence Interval = -1.7E-01 to 1.0E-01 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-50

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.235 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = -4.5E-03 µg/L Per Day

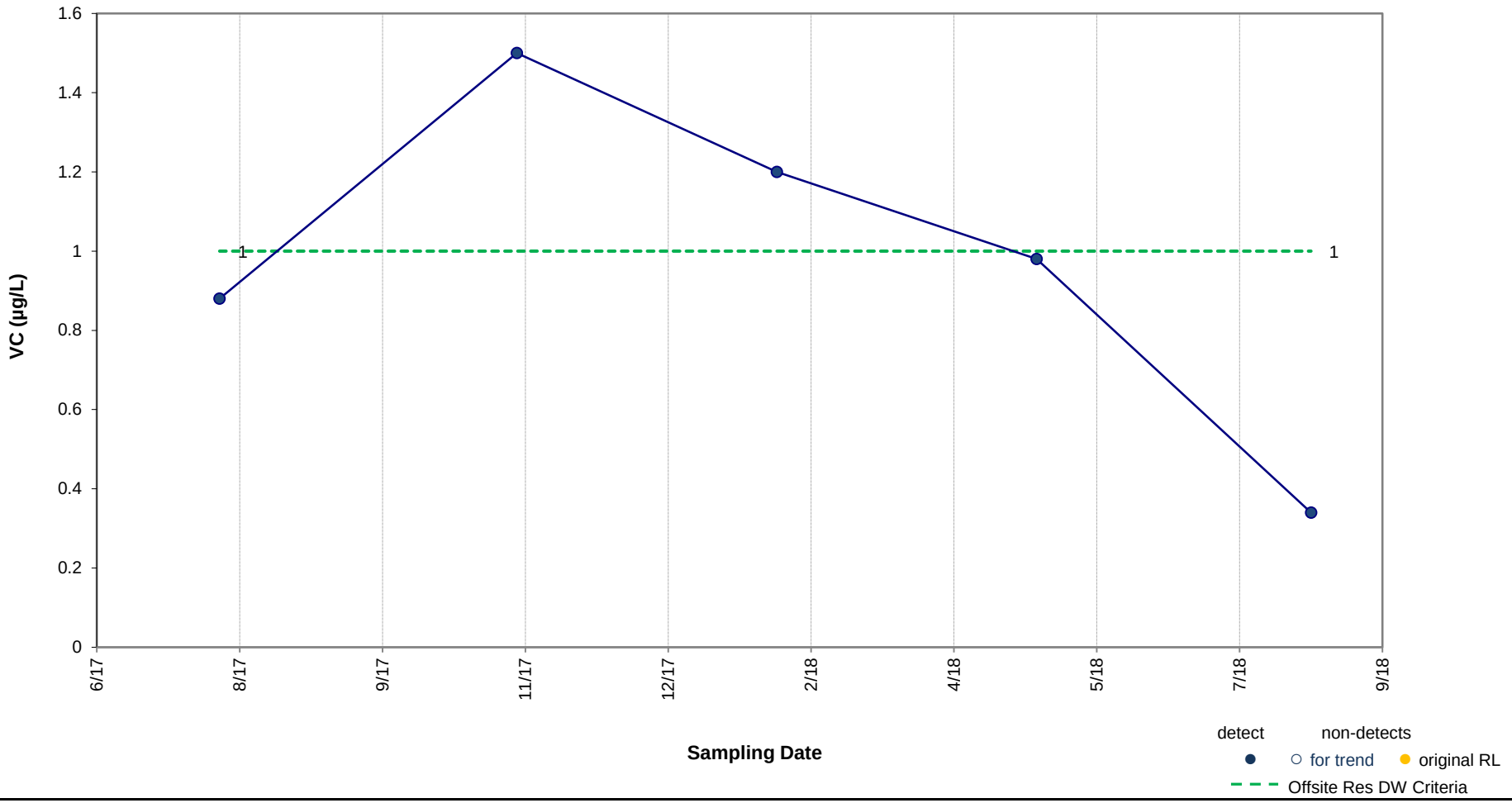
90% Confidence Interval = -1.7E-02 to 2.7E-03 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-52

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.242 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = -2.6E-03 µg/L Per Day

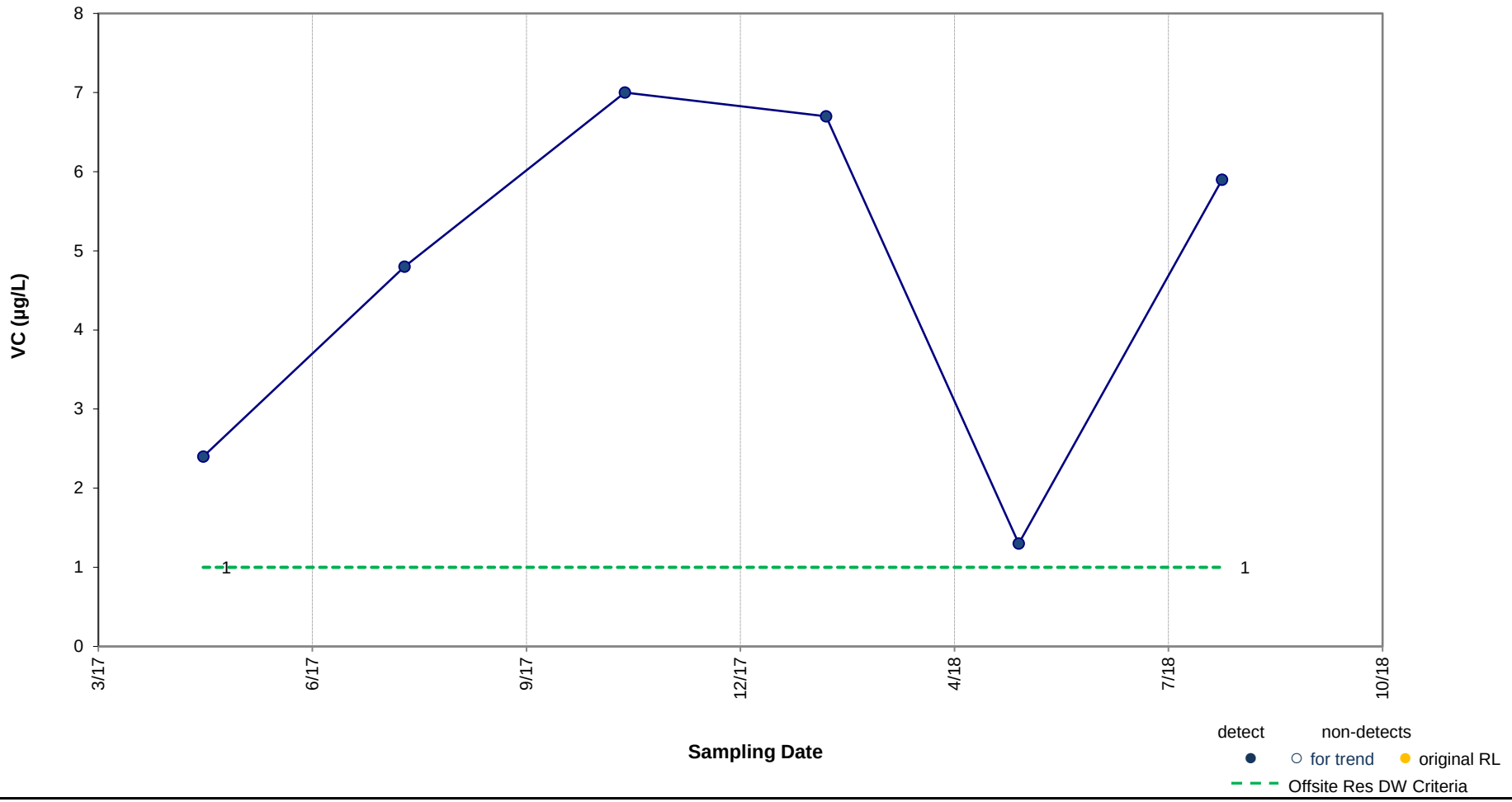
90% Confidence Interval = -5.3E-03 to 8.1E-04 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-54

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.500 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = 2.9E-03 µg/L Per Day

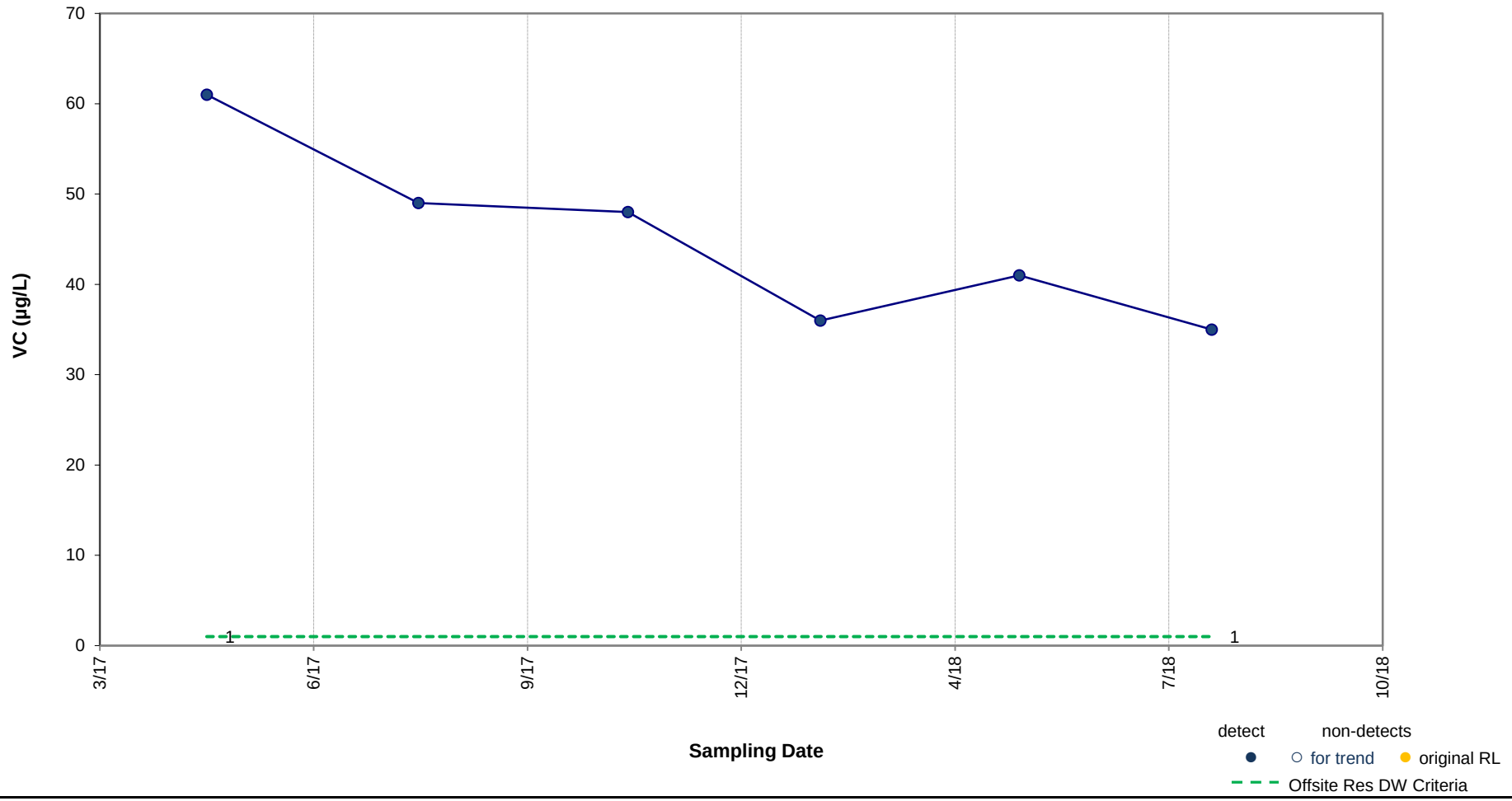
90% Confidence Interval = -1.1E-02 to 2.1E-02 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-64

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **DECREASING TREND**

p value = 0.008 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **DECREASING TREND**

Median Slope Estimate = -5.3E-02 µg/L Per Day

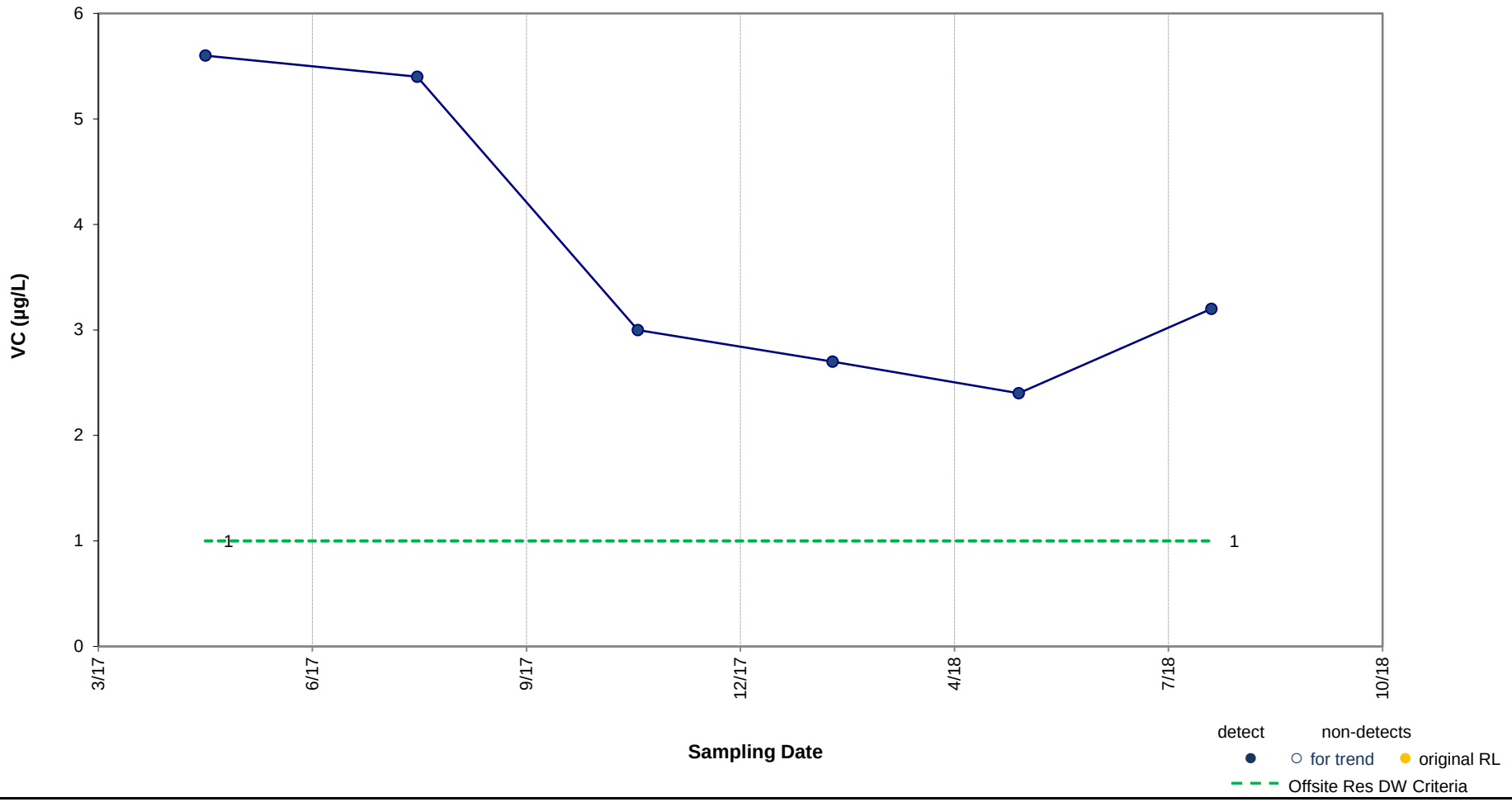
90% Confidence Interval = -8.5E-02 to -3.0E-02 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-65

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **DECREASING TREND**

p value = 0.068 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **DECREASING TREND**

Median Slope Estimate = -5.1E-03 µg/L Per Day

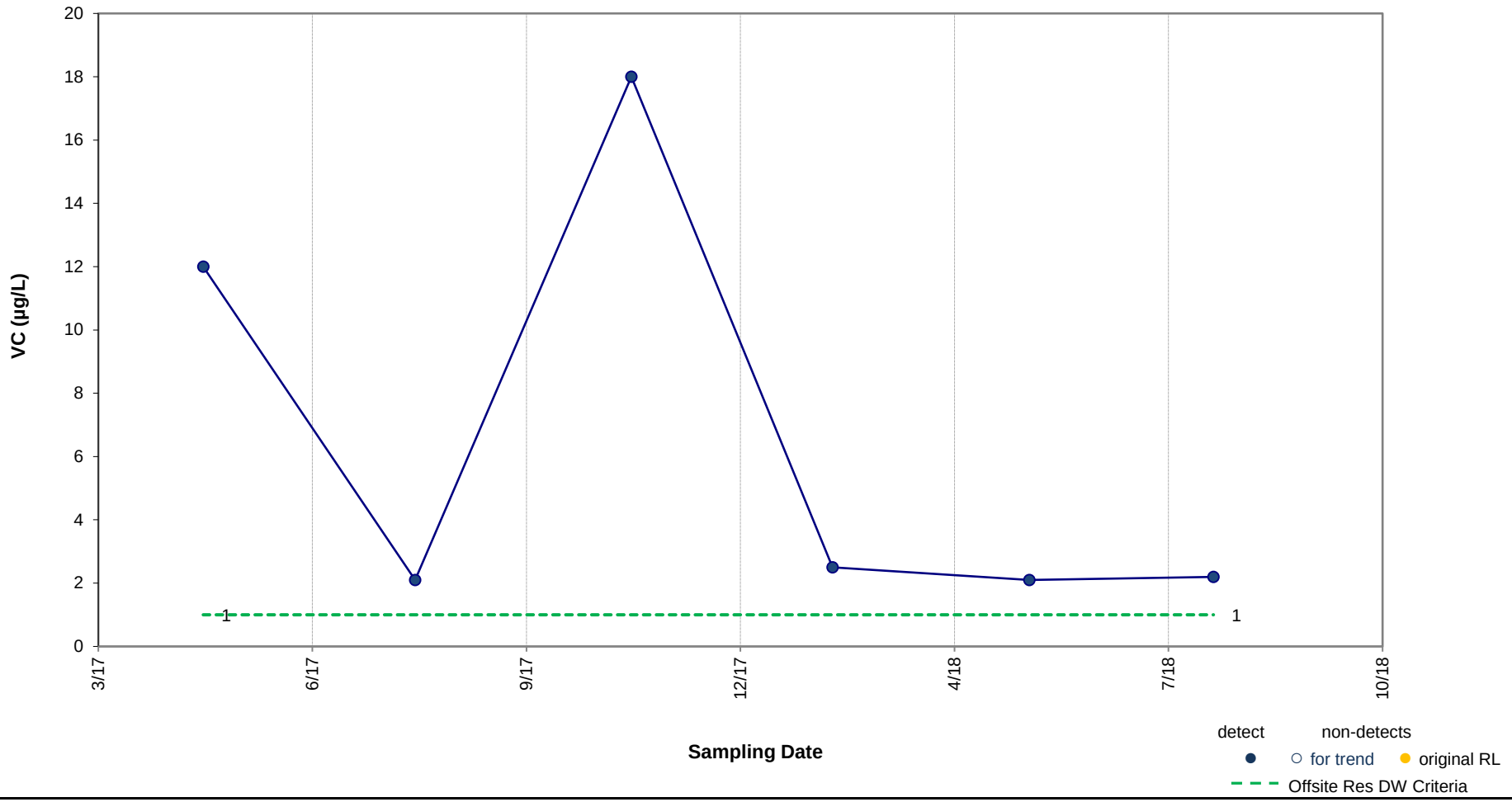
90% Confidence Interval = -1.3E-02 to -2.2E-03 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-66

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.298 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = -4.3E-03 µg/L Per Day

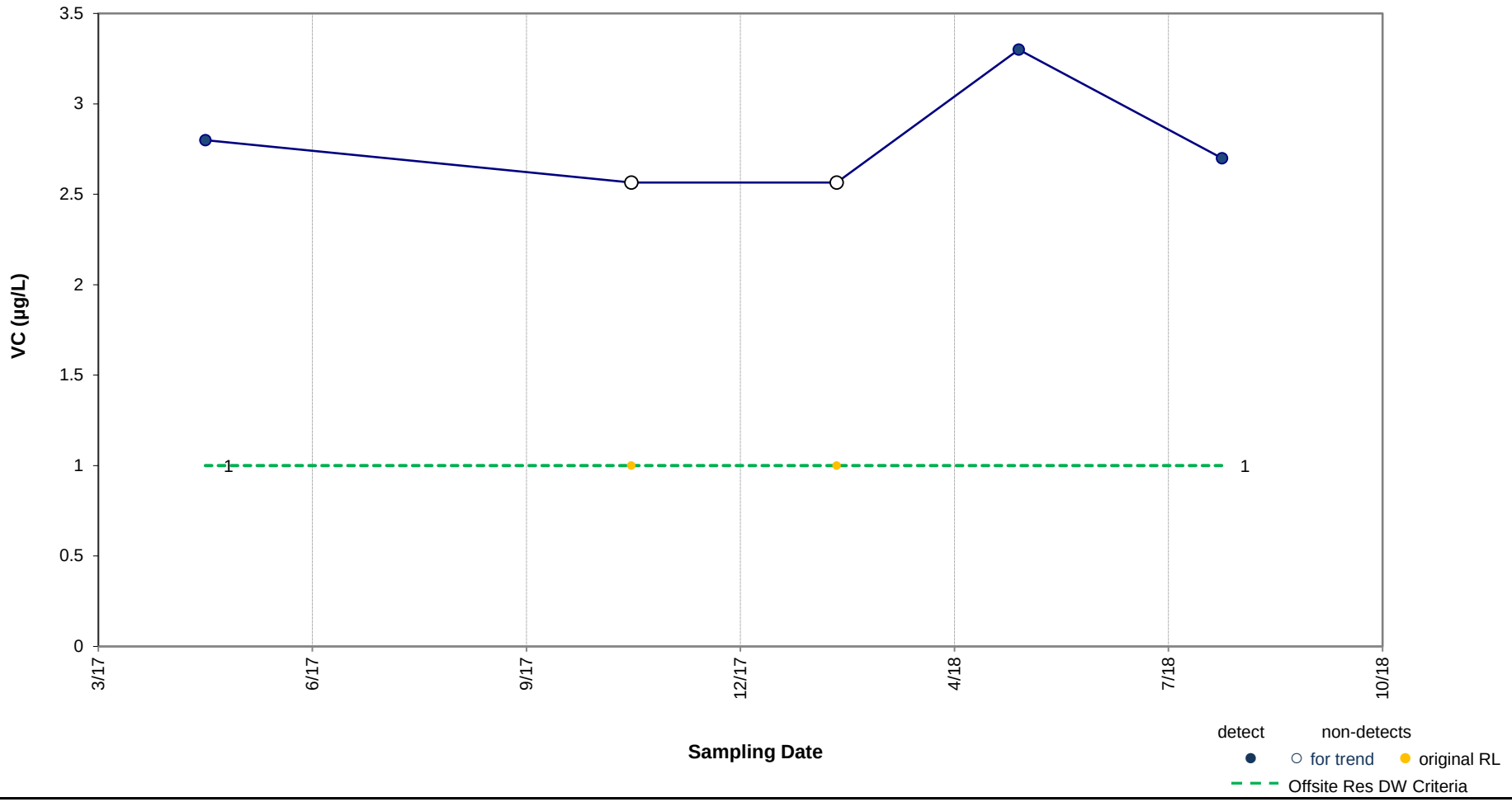
90% Confidence Interval = -8.0E-02 to 9.8E-04 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-68

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.500 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = 2.4E-04 µg/L Per Day

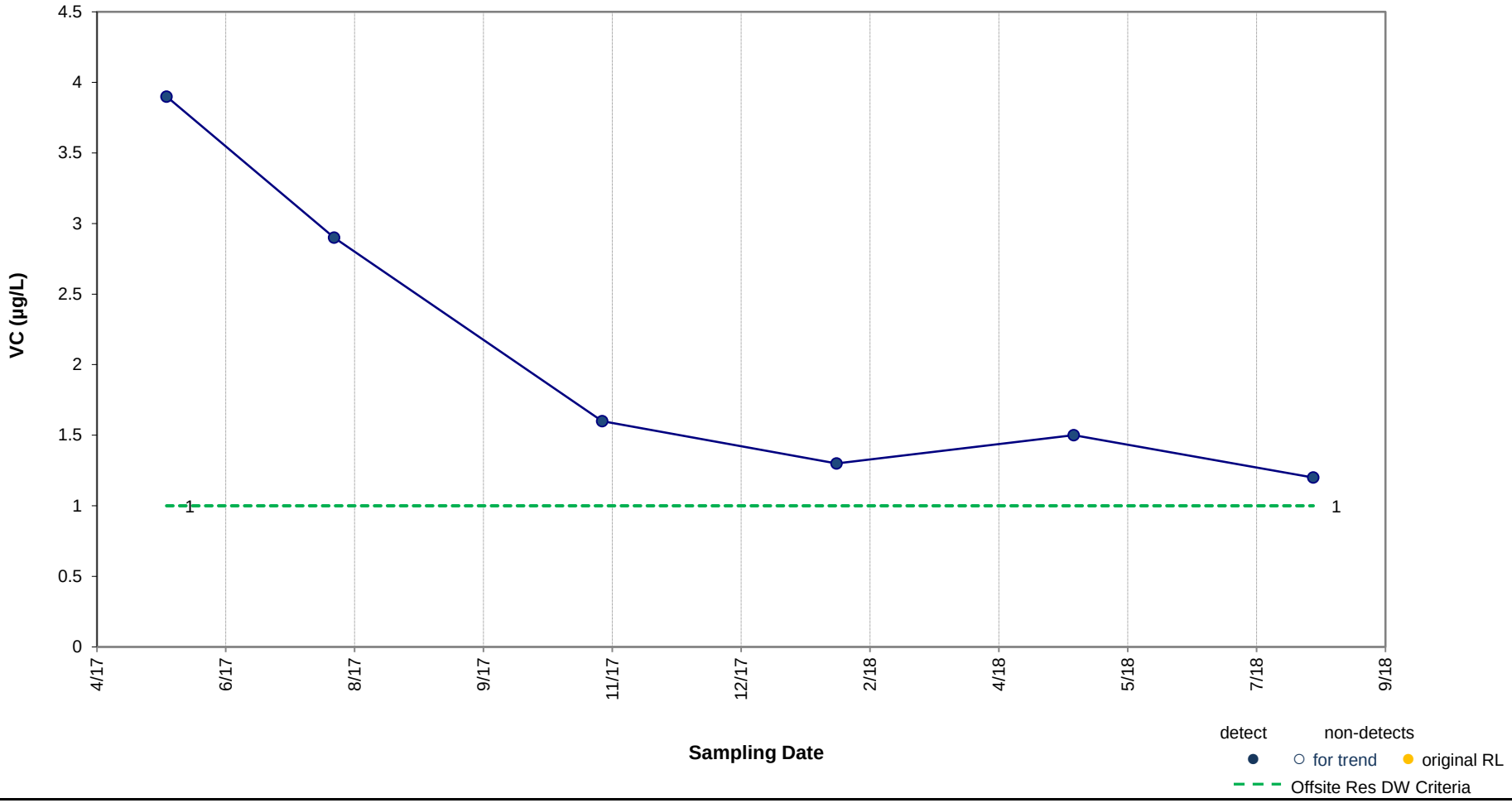
90% Confidence Interval = -2.5E-03 to 2.0E-03 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-69

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **DECREASING TREND**

p value = 0.008 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **DECREASING TREND**

Median Slope Estimate = -4.9E-03 µg/L Per Day

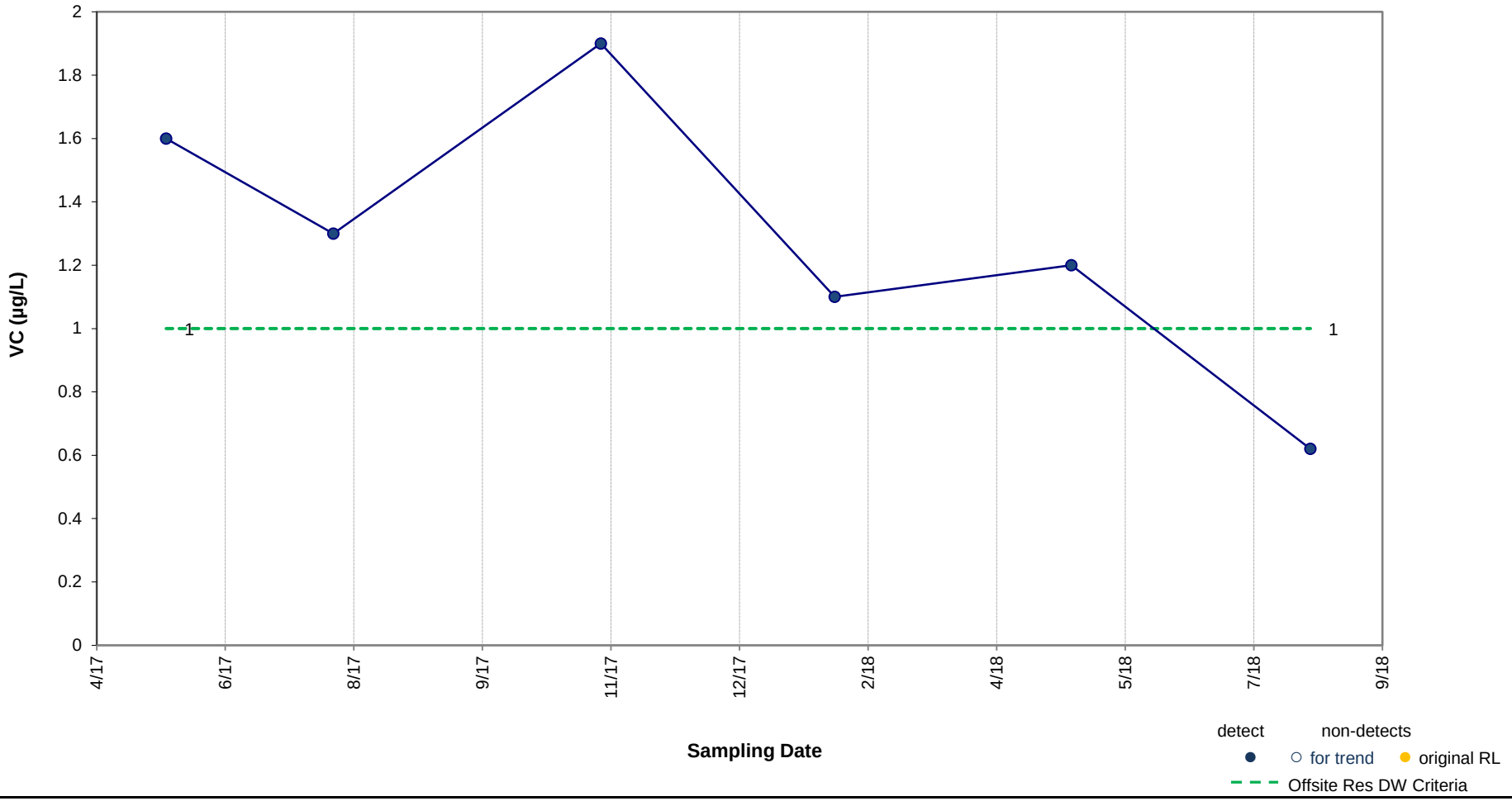
90% Confidence Interval = -1.2E-02 to -1.7E-03 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-72

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **DECREASING TREND**

p value = 0.068 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **DECREASING TREND**

Median Slope Estimate = -1.9E-03 µg/L Per Day

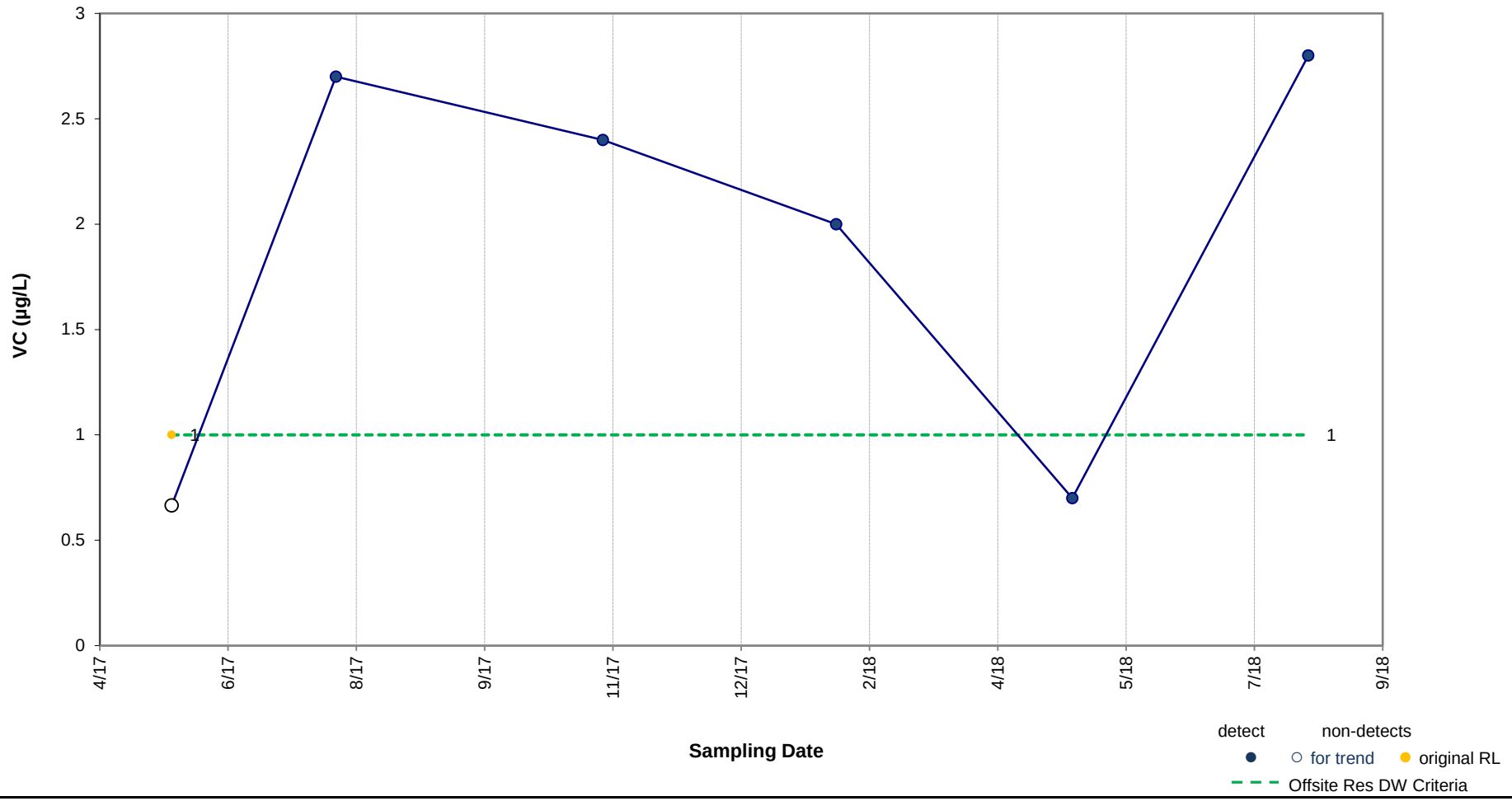
90% Confidence Interval = -4.6E-03 to -4.3E-04 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-73S

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.360 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = 2.6E-04 µg/L Per Day

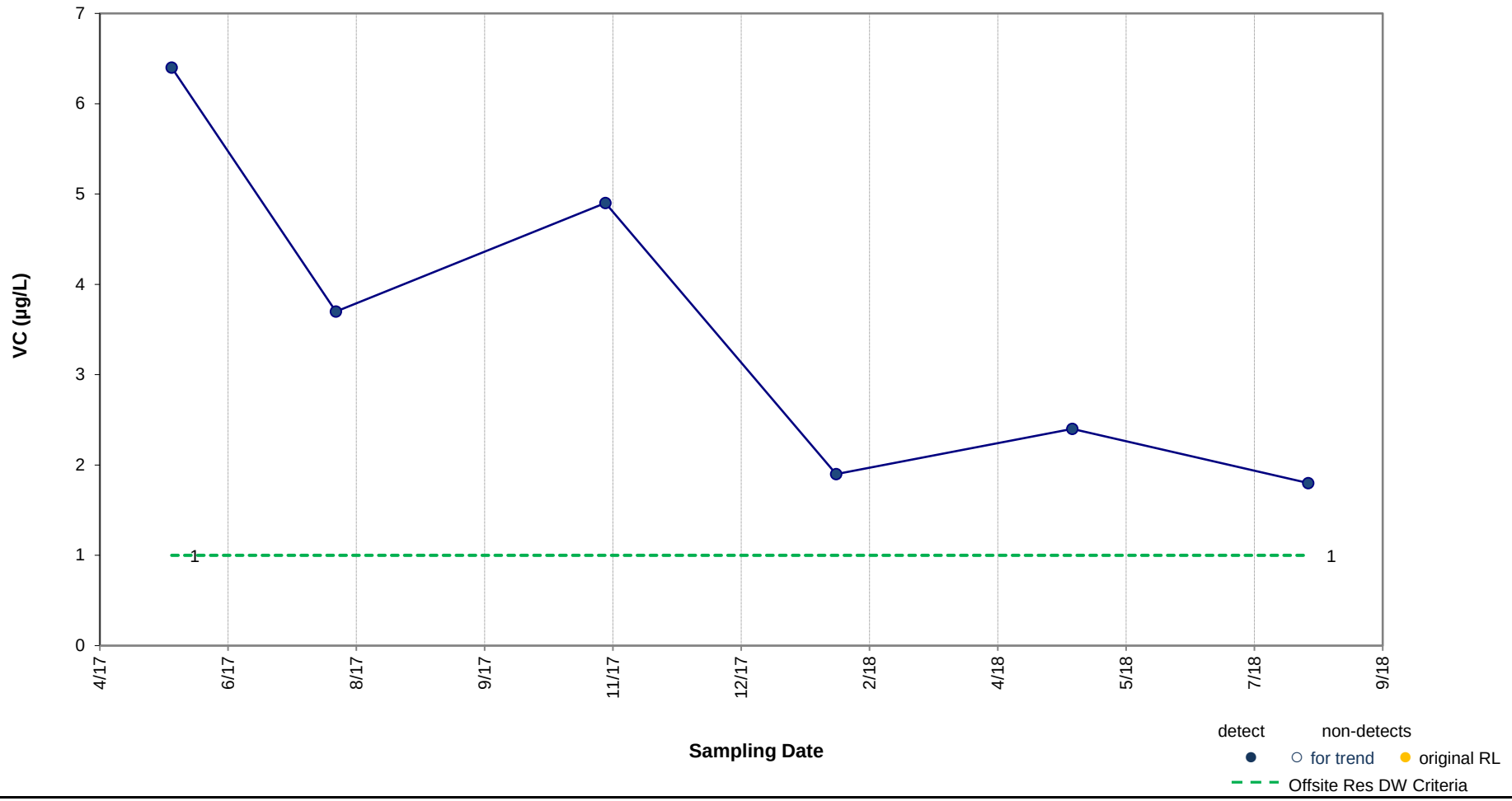
90% Confidence Interval = -6.7E-03 to 5.1E-03 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-74

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **DECREASING TREND**

p value = 0.028 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **DECREASING TREND**

Median Slope Estimate = -9.2E-03 µg/L Per Day

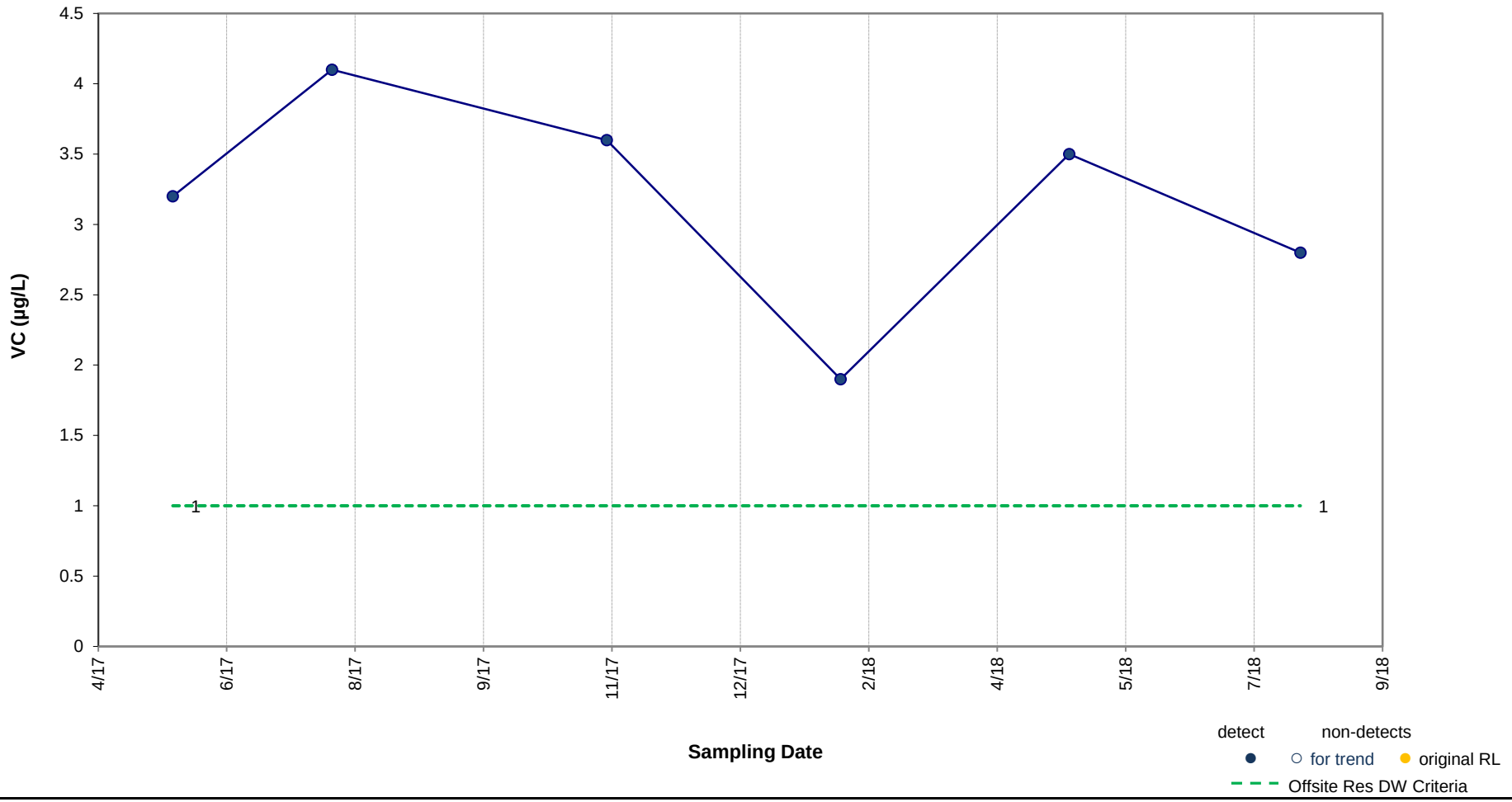
90% Confidence Interval = -1.7E-02 to -4.6E-03 µg/L Per Day

ARCADIS

Concentration vs. Time Plot – VC in MW-75D

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.235 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = -2.1E-03 µg/L Per Day

90% Confidence Interval = -7.4E-03 to 2.2E-03 µg/L Per Day

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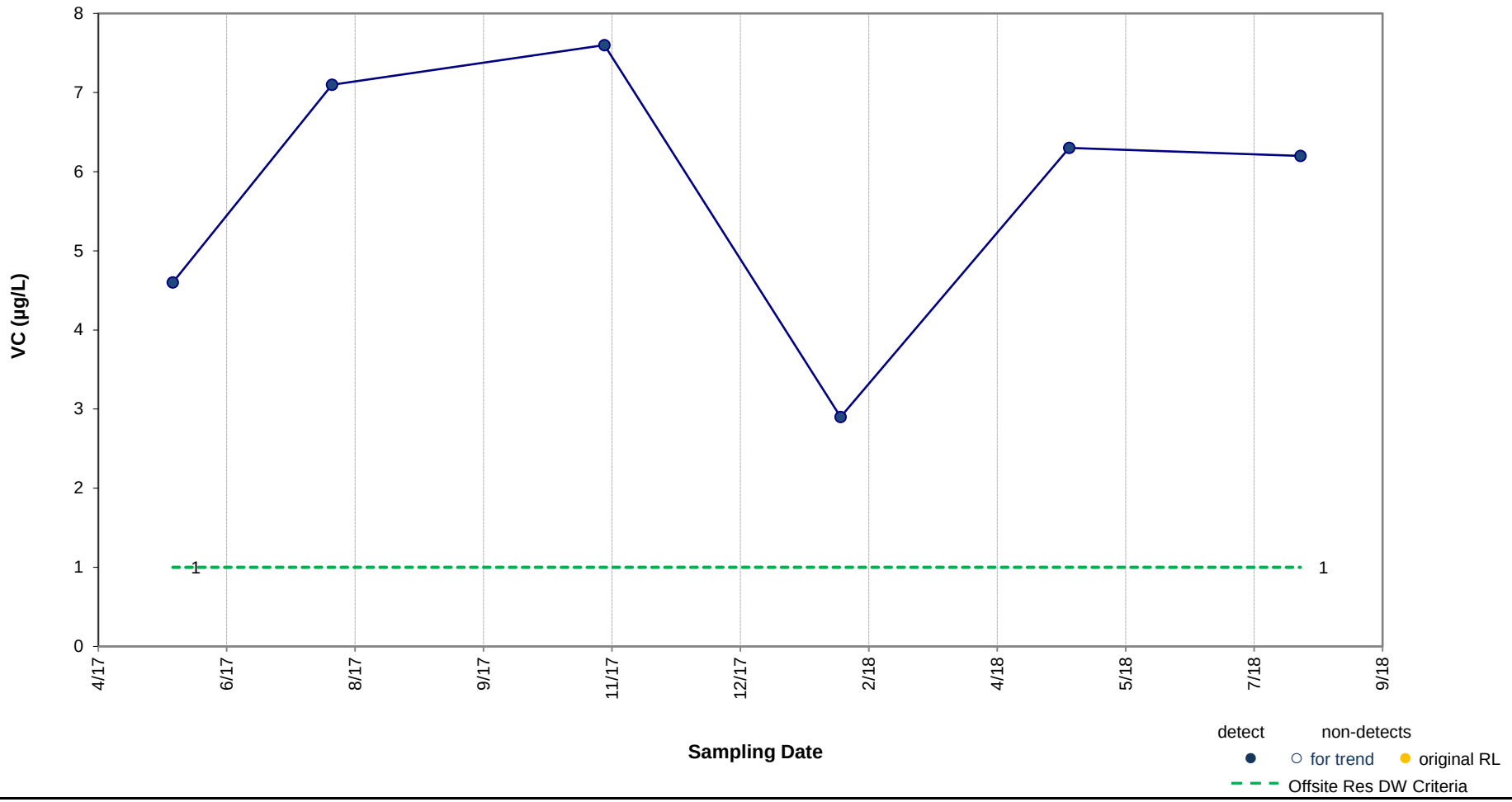
Concentration vs. Time Plot – VC in MW-79D

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.500 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = -1.1E-03 µg/L Per Day

90% Confidence Interval = -7.1E-03 to 1.6E-02 µg/L Per Day

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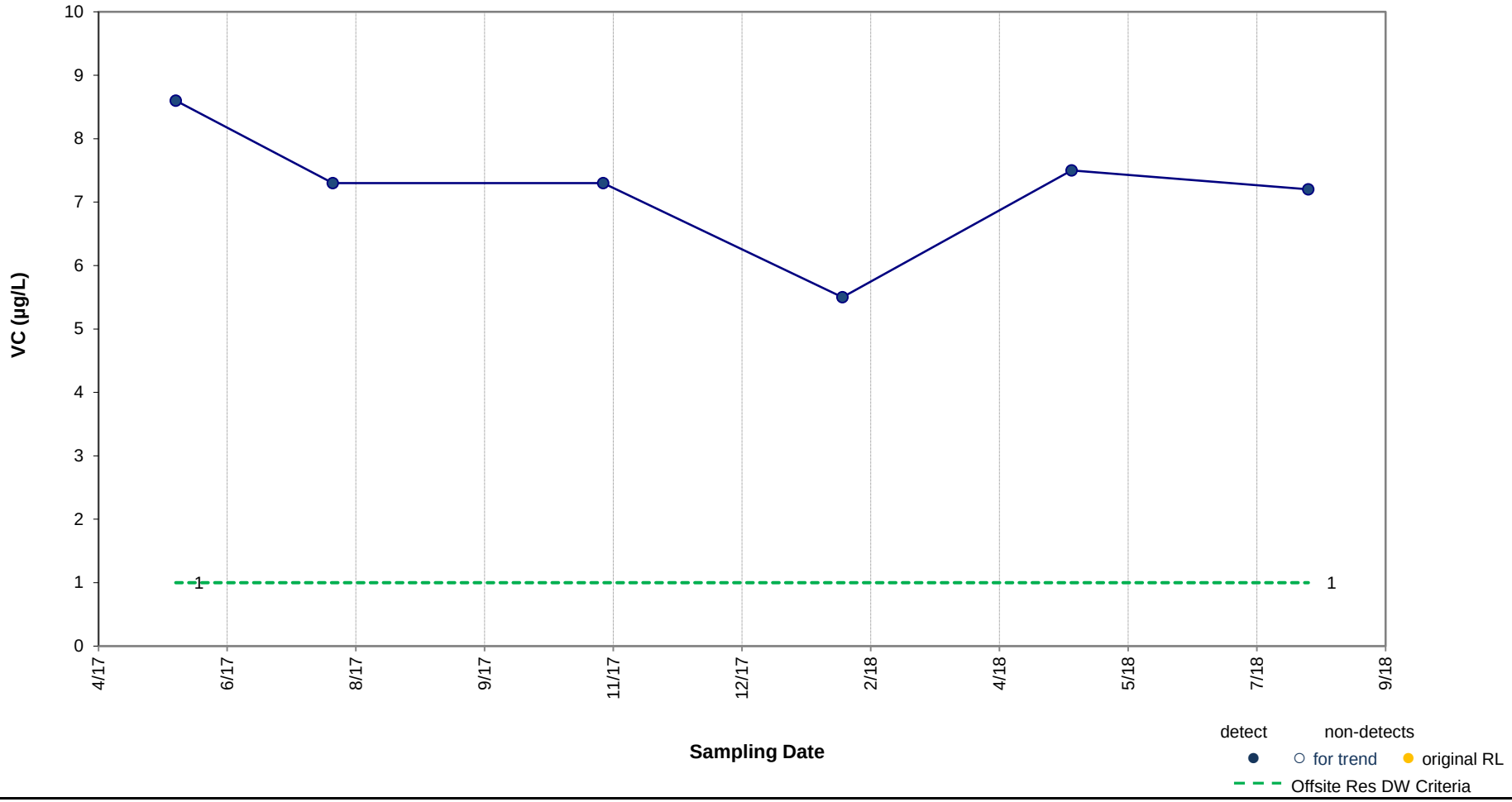
Concentration vs. Time Plot – VC in MW-80S

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.186 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = -3.2E-03 µg/L Per Day

90% Confidence Interval = -1.1E-02 to 5.6E-04 µg/L Per Day

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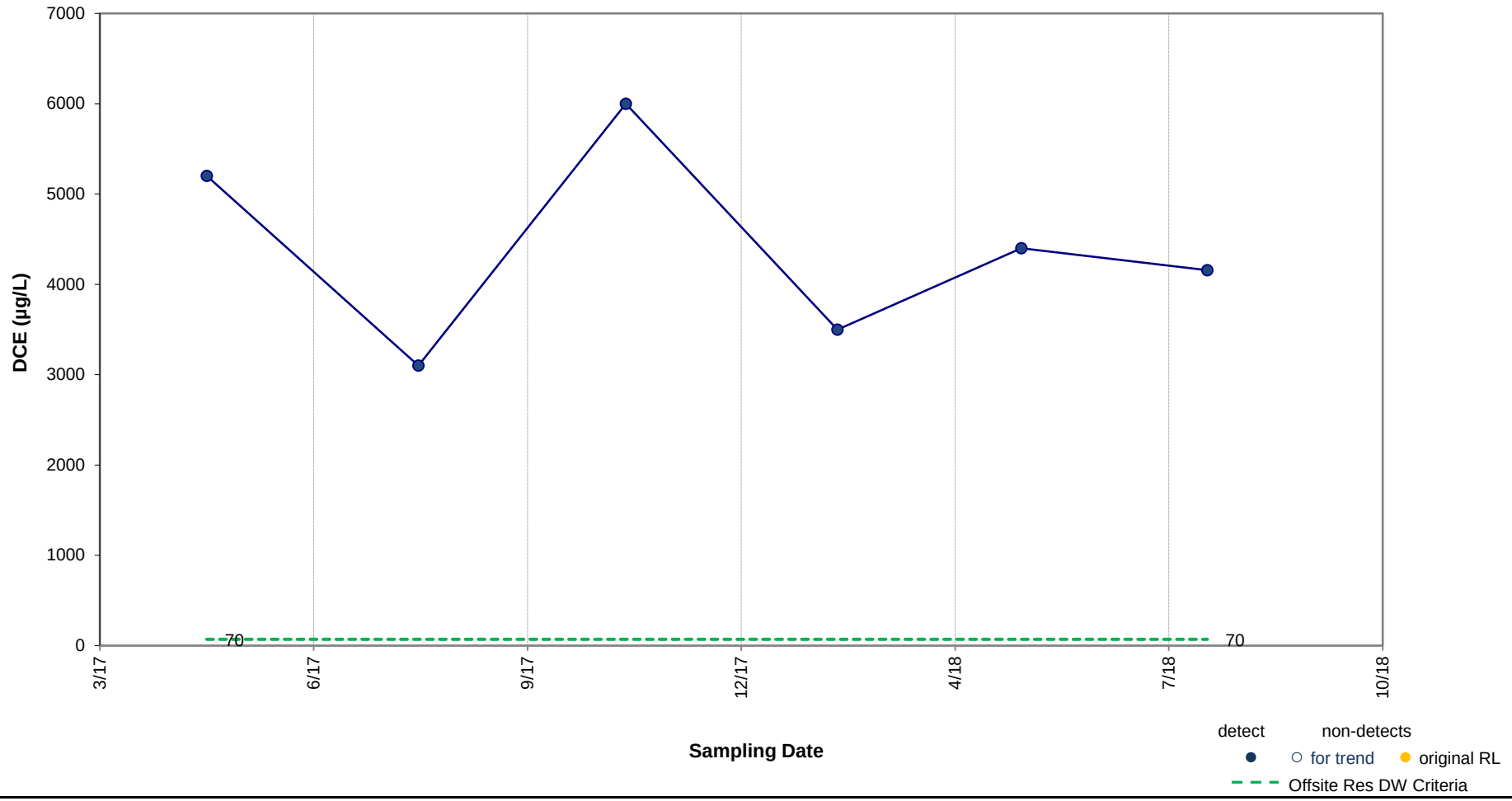
Concentration vs. Time Plot – VC in MW-85

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **No Significant Trend**

p value = 0.500 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **No Significant Trend**

Median Slope Estimate = -2.1E+00 µg/L Per Day

90% Confidence Interval = -8.4E+00 to 4.0E+00 µg/L Per Day

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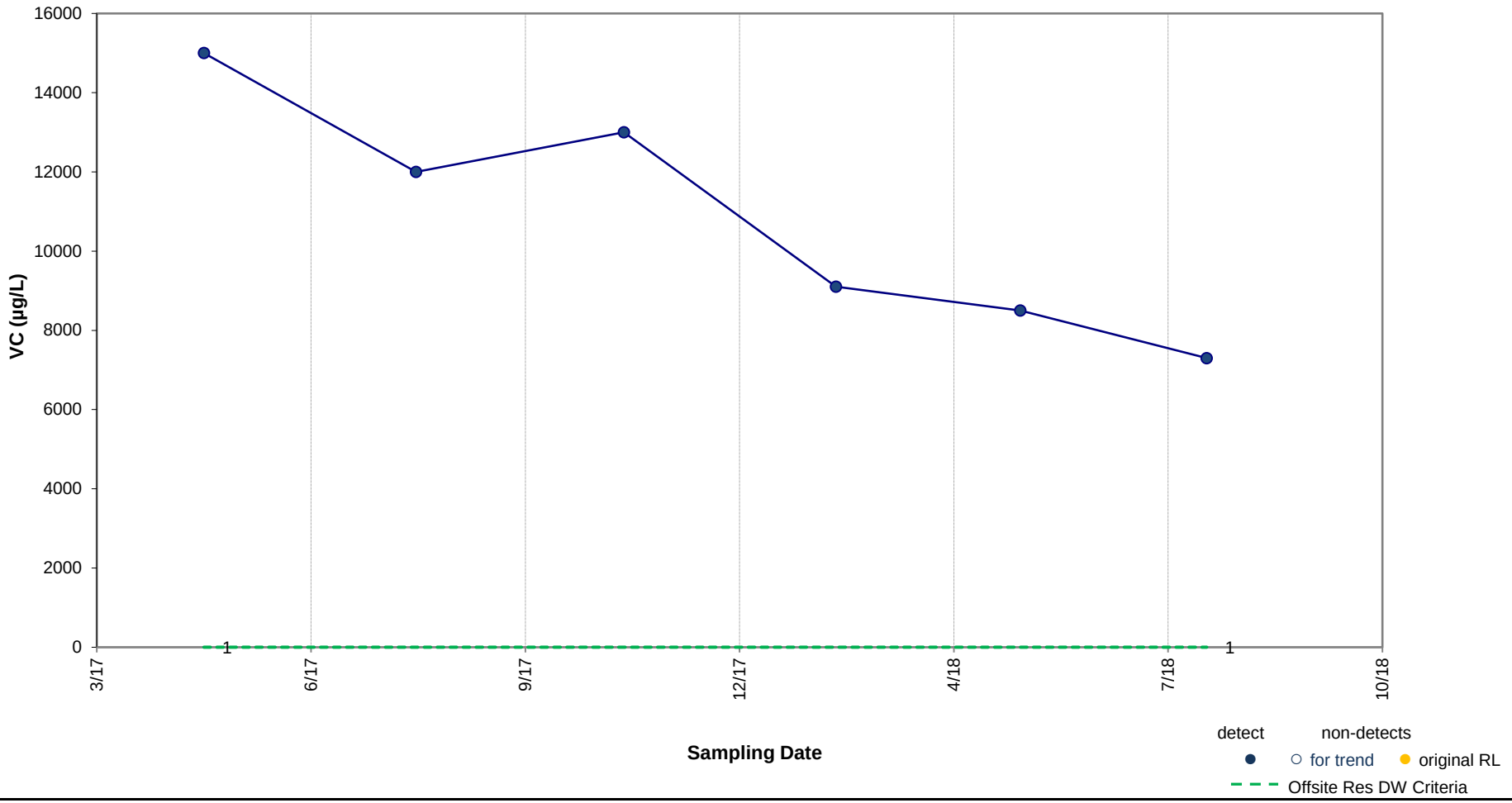
Concentration vs. Time Plot – DCE in TW-16-02

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **DECREASING TREND**

p value = 0.008 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **DECREASING TREND**

Median Slope Estimate = -1.5E+01 µg/L Per Day

90% Confidence Interval = -2.4E+01 to -1.1E+01 µg/L Per Day

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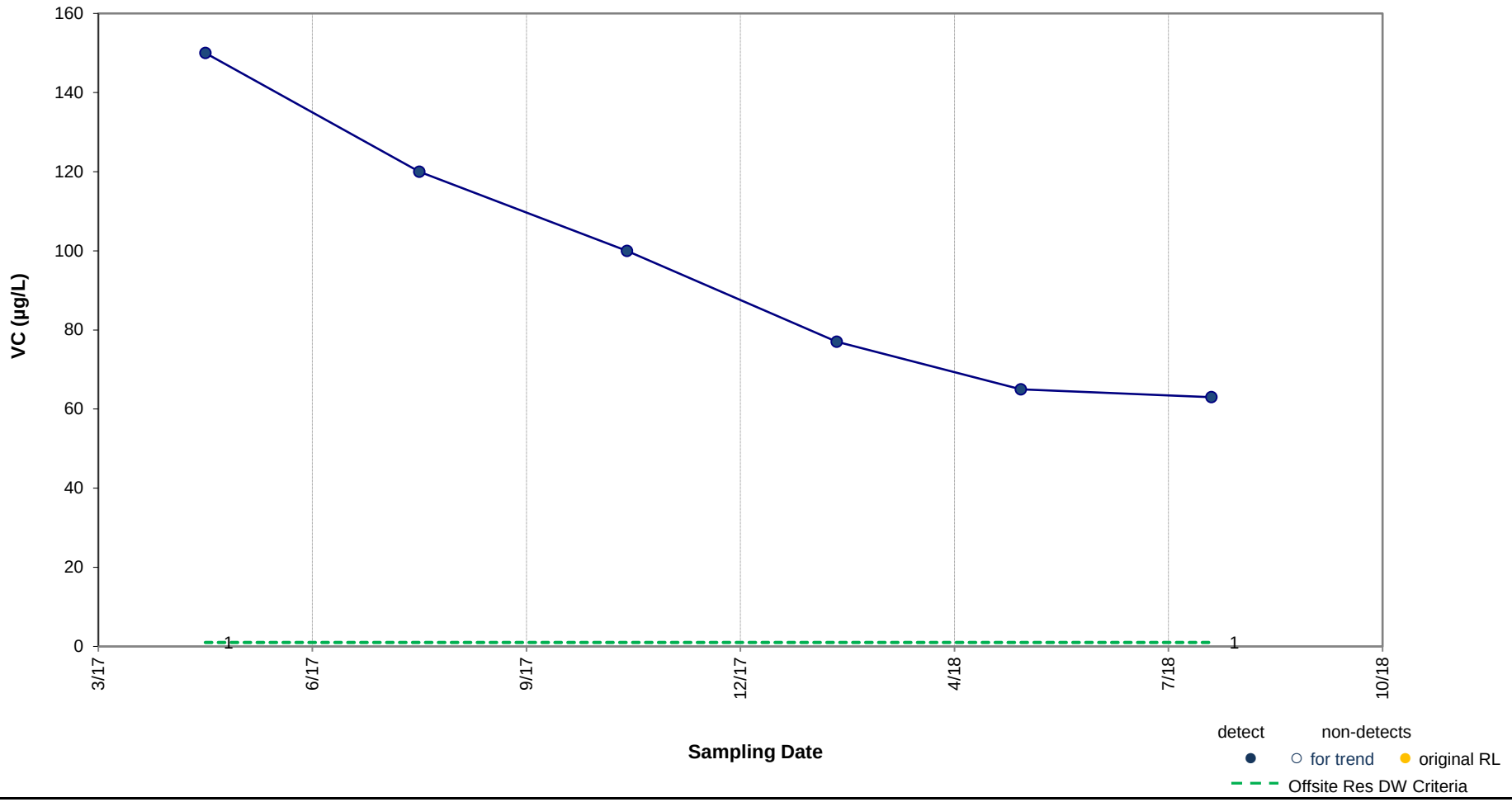
Concentration vs. Time Plot – VC in TW-16-02

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __



Results of Mann-Kendall Test for Trend: **DECREASING TREND**

p value = 0.001 Note: p value < 0.1 indicates a statistically significant trend (90% confidence level).

Results of Sen's Estimator of Slope: **DECREASING TREND**

Median Slope Estimate = -2.0E-01 µg/L Per Day

90% Confidence Interval = -2.5E-01 to -1.4E-01 µg/L Per Day

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Concentration vs. Time Plot – VC in TW-16-04

Ford Motor Company, Livonia Transmission Plant, Livonia, Michigan

Figure __

Arcadis of Michigan, LLC

28550 Cabot Drive

Suite 500

Novi, Michigan 48377

Tel 248 994 2240

Fax 248 994 2241

www.arcadis.com