34-11 BEACH CHANNEL DRIVE SITE

34-11 BEACH CHANNEL DRIVE, FAR ROCKAWAY, NEW YORK 11691

CORRECTIVE MEASURES REPORT

NYSDEC BCP Number: C-241141

Prepared For:

Rockaway Seagirt Limited Partnership
15 Verbena Avenue, Suite 100
Floral Park, NY 11001

Prepared For:

New York State Department of
Environmental Conservation

Prepared by:

AMC Engineering PLLC
18-36 42nd Street
Astoria, NY 11105

DECEMBER 2024

34-11 Beach Channel Drive,
Queens, NY 11691
NYSDEC Site Number: C241141

Corrective Measures Report

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Mr. Christopher H. Allan
New York State Department of Environmental Conservation (NYSDEC)
Division of Environmental Remediation
47-40 21st Street
Long Island City, NY 11101

Ref.: NYSDEC BCP# C241141
34-11 Beach Channel Drive
Queens, NY 11418
Staten Island, NY 10305
Corrective Measures Report

Dear Mr. Allan:

This Corrective Measures Report (CMR) has been prepared for NYSDEC BCP Project # C241141, to describe the actions performed following the approval of our Corrective Measures Work Plan (CWMP) dated April 17, 2024.

All corrective measures identified in the CMWP have been implemented, and the results of this investigation can be found in this report.

Please feel free to contact me with any questions or concerns.

Sincerely,

STATE OF NEW YORK
ARIEL CZEMERINSKI
076508
LICENSED PROFESSIONAL ENGINEER

Ariel Czemerinski, PE
AMC Engineering, PLLC

1. Background Information and Remedial Summary

The Site underwent remedial activities under NYSDEC BCP Project# C241141 from 2015 to 2016. A Final Engineering Report (FER) and Site Management Plan were issued at the end of 2016 and describe the scope of the remedy, which included groundwater dewatering, in-situ chemical injections, excavation activities, and the implementation of Institutional and Engineering Controls (ICs/ECs) at the site.

In the Periodic Review Report (PRR) for the period 4/20/2020-4/20/2021 by AMC Engineering, PLLC (AMC), the report concluded with requests to discontinue groundwater monitoring and terminate the sub-slab depressurization system (SSDS), upon approval by the Department. The Department did not approve either request, due to concerns and uncertainties below the site pertaining to clay/confining layers, the presence of multiple aquifers, and the screen interval of the onsite monitoring wells.

Between July 2021 and January 2024, AMC and the Department had multiple conference calls to identify the onsite concerns and strategize for the optimal remedies. During this timeframe, a Groundwater Investigation Work Plan was submitted. In addition, PRR's were prepared for the 4/20/2021-5/25/2022 and 5/25/2022-5/25/2023 reporting periods.

Based on the discussions from 2021 to 2023, the Department issued a formal rejection to our 2022-2023 PRR, in the "Site Management (SM) Periodic Review Report (PRR) Response Letter" (dated January 17, 2024). This letter required that a Corrective Measures Work Plan (CMWP) be submitted to investigate the subsurface conditions of the site. A copy of this rejection letter can be found in **Appendix G**.

2. Proposed Corrective Measures

As per the approved Corrective Measures Work Plan (CMWP) [Version #2], dated April 2024, the following corrective measures were proposed:

1. Installation of three (3) new cluster wells on the job site, as shown in **Figure 2**. Each cluster consists of three wells (screened for the 11-16' interval, 19-24' interval, and 35-40' interval [shallow, intermediate, deep, respectively]), for a total of nine (9) wells.
2. Installation of data loggers in all nine newly proposed wells, to determine the effect of tidal influence and other factors that may influence the groundwater flow direction.
3. Surveying the top of casing of all new monitoring wells at the site.
4. Collection of groundwater samples from cluster well #1 (24MW-1S, 24MW-1I, and 24MW-1D), the cluster well closest to "RIB-2", to establish groundwater quality in the 13-15', 20-22', and 37-39' intervals.
5. Decommissioning (abandonment) of existing monitoring wells: 15MW1, 15MW2, and 15MW3.

These corrective measures were proposed to address concerns that the existing groundwater monitoring wells (15MW1, 15MW2, and 15MW3) may not be properly depicting the groundwater conditions. The groundwater table starts 4-5 feet below grade, and soil CVOCs contamination were found in "RIB-2 soil boring" at 13-15', 20-22', and 37-39' below grade. The existing monitoring wells were installed to a termination depth of 30' below grade and consist of a 15' screen and 15' riser.

The main concerns with the existing monitoring wells were: a) the wells do not extend down to determine whether the 37-39' contamination has been addressed, and b) the wells penetrate the clay layer (20-25' below grade) and they are screened within the two aquifers, which may have different groundwater flow directions (as per Remedial Investigation Report by FPM Group, dated February 2015, and Remedial Investigation Report by TRC, dated August 2015 for the adjacent site).

These correctives measures were implemented to:

- Determine the groundwater flow direction in the shallow aquifer;
- Determine the groundwater flow direction in the deep aquifer;
- Establish groundwater quality in the 13-15', 20-22', and 37-39' intervals; and
- Eliminate 15MW1, 15MW2, and 15MW3, which no longer serve any practical purpose onsite.

A copy of the approved CMWP can be found in **Appendix H**.

3. Field Activities and Site Mobilizations

Multiple field mobilization events were necessary to implement all corrective actions. A summary of each field mobilization event, between June 2024 to November 2024, can be found below. A copy of the Daily Status Reports (DSRs) can be found in **Appendix E**.

June 17, 2024

AMC Engineering, PLLC (AMC) and Coastal Environmental Solutions Inc. (Coastal) mobilized onsite to begin the cluster well installation as per the approved CMWP. At each cluster well location, one soil boring was advanced to 40' below grade using a direct-push drilling machine (Geoprobe model 7822DT). These soil borings were advanced to confirm the clay layer intervals at each location, to ensure that the well screens were installed within the sandy strata and not within the clay layer. A copy of the soil boring logs can be found in **Appendix A**.

June 18, 2024

AMC and Coastal mobilized onsite for the cluster well installation. Due to the thickness of the concrete slab (16") and presence of a rebar layer 2-3" below grade, a core drill was needed to cut out holes at the location of each well. No drilling was performed on this day. Ground-penetrating radar (GPR) was used to mark-out unmarked utilities prior to utilizing the core drill.

June 20, 2024

During the installation of the first cluster well, a second layer of rebar was found in the field at 12-14" below grade. This rebar layer was not shown in the plans available to us, and the Geoprobe was unable to penetrate the second rebar layer. Work activities were halted, and a stronger machine was necessary to continue installation activities.

September 16, 2024

AMC and Coastal mobilized onsite with a Sonic drill rig (Fraste/CRS xL 140 Duo) to resume the installation of the cluster wells. Although the sonic drill rig was able to clear the second layer of rebar, additional concrete was found below the lower rebar layer. The sonic rig was not able to breach the concrete layer, and another re-mobilization was necessary. To minimize the need for additional remobilizations in the future, a decision was made to hire a separate, concrete coring company to pre-core the well locations so that the subbase and soil layer would be exposed.

October 7, 2024

AMC mobilized onsite with Americore Drilling & Cutting, Inc. (Americore) to begin the coring at the cluster well locations. A total of five (5) concrete cores were created at locations:

24MW-3S, 24MW-3I, 24MW-3D, 24MW-2I, and 24MW-2D.

October 8, 2024

AMC mobilized onsite with Americore. A total of one (1) concrete core was created at location: 24MW-2S.

October 10, 2024

AMC mobilized onsite with Americore. The remaining three (3) concrete cores were created at locations: 24MW-1S, 24MW-1I, and 24MW-1D. At this time, all nine (9) concrete cores have been opened, and cluster well installation can proceed.

October 30, 2024

AMC and Coastal mobilized onsite with the sonic drill rig and installed six (6) monitoring wells: 24MW-1S, 24MW-1I, 24MW-1D, 24MW-2S, 24MW-2I, and 24MW-2D.

October 31, 2024

AMC and Coastal mobilized onsite with the sonic drill rig and installed the remaining three (3) monitoring wells: 24MW-3S, 24MW-3I, and 24MW-3D. All nine newly installed monitoring wells were purged and developed. In addition, the original monitoring wells (15MW1, 15MW2, and 15MW3) were abandoned/removed as per NYSDEC CP-43: Groundwater Monitoring Well Decommissioning Policy. A copy of the monitoring well construction logs can be found in **Appendix B**.

November 13, 2024

AMC mobilized onsite to install dataloggers (Level Troll series by In-Situ Inc.) in all nine monitoring wells to begin the continuous monitoring of groundwater elevation over a period of one week.

November 22, 2024

AMC mobilized onsite to retrieve the dataloggers from all nine monitoring wells. In addition, an on-site survey was conducted and depth-to-water readings were collected to determine baseline conditions for the groundwater data. Groundwater samples were collected from 24MW-1S, 24MW-1I, and 24MW-1D via low-flow sampling method. A copy of the groundwater purge logs from each monitoring well can be found in **Appendix C**.

Groundwater samples were collected from the above-referenced monitoring wells, and immediately labeled and stored in laboratory-supplied containers. Samples were brought back to the AMC office, located in Astoria NY, and placed into a laboratory-supplied refrigerator until they were picked up by a laboratory courier from Phoenix Environmental Laboratories, Inc. on November 22, 2024. A duplicate sample and trip blank were also

collected and submitted to the laboratory. All samples were submitted for testing of Volatile Organic Compounds (VOCs) [EPA Method 8260], which follows the groundwater monitoring requirements under the approved Site Management Plan and PRRs.

Field Activities Summary

All corrective measures identified in the CMWP were implemented. The shallow well screens were installed in the 11-16' interval, immediately above the shallow clay layer. The intermediate well screens were installed in the 19-24' interval, immediately below the shallow clay layer. The deep well screens were installed in the 35-40' interval, immediately above the deep clay layer.

Dataloggers were installed in all nine (9) wells, for a period of one week. An on-site survey was conducted, and depth-to-water readings were collected. Samples were collected and analyzed for VOCs (see above) and analyzed by an ELAP-certified lab.

Monitoring wells 15MW1, 15MW2, and 15MW3 were removed/abandoned.

4. Results and Conclusions

This section discusses the results of the groundwater sampling event and the condition of the groundwater within the underground aquifers.

Groundwater Sampling Results

All sample results were compared to the NYSDEC's Division of Water Technical and Operational Guidance Series (TOGS 1.1.1) Groundwater classification (Class GA). All sample results were found at non-detect levels or below the Class GA limits, except for the following:

24MW-1I

- Cis-1,2-dichloroethene (cis-1,2-DCE) was found at 8.6 ug/L (Class GA limit is 5 ug/L);
- Vinyl chloride was found at 9.2 ug/L (Class GA limit is 2 ug/L);

24MW-1D

- Cis-1,2-dichloroethene (cis-1,2-DCE) was found at 160 ug/L (Class GA limit is 5 ug/L);
- Vinyl chloride was found at 92 ug/L (Class GA limit is 2 ug/L);

A copy of the laboratory results can be found in **Appendix F** and **Table 1**.

For comparison, cis-1,2-DCE was found between 430 ug/L and 6000 ug/L prior to the 2016 chemical injection event. Vinyl chloride was found between 150 ug/L and 4900 ug/L prior to the injections. A copy of the pre-injection results (Table 14 of the Final Engineering Report) can be found in **Appendix D**.

Datalogger Results and Groundwater Flow Direction

A total of nine (9) dataloggers were set up during the afternoon of November 13, 2024, and retrieved during the morning of November 22, 2024. A total of four (4) graphs have been created to provide visual clarity on this data, over the monitoring period:

Graph 1 – Monitoring Data of all Nine Wells
Graph 2 – Monitoring Data of Shallow Wells Only
Graph 3 – Monitoring Data of Intermediate Wells Only
Graph 4 – Monitoring Data of Deep Wells Only

Shallow Wells

Based on the recorded groundwater readings, the groundwater flow direction in the shallow wells was found to be in the North-Easterly direction throughout the monitoring period. This is different from the shallow groundwater flow direction reported in the February 2015 Remedial Investigation Report (RIR), which was generally to the South/South-West direction.

Figures 1 through 5 show the triangulated GW elevation and flow at five random times while the surveying was occurring.

Notwithstanding the above, a look at the groundwater elevation of the shallow wells in time (Graph 2) clearly seems to indicate that the groundwater within each monitoring well is not in hydraulic communication, judging from the fact that while MW-3S shows strong evidence of tidal influence, MW-2S shows a much lesser tidal influence, and MW-1S shows not tidal influence at all. It is therefore our opinion that groundwater flow direction cannot be established accurately by simply triangulating these three wells.

Intermediate Wells

Based on the recorded groundwater readings, the groundwater flow direction in the intermediate wells was found to fluctuate between the Northerly and Easterly direction throughout the monitoring period. The 2015 RIR did not have data on groundwater flow direction immediately below the shallow clay layer.

Figures 6 through 10 show the triangulated GW elevation and flow measured at the same five times as indicated above while the surveying was occurring.

Unlike the shallow aquifer, this groundwater elevation survey (Graph 3) shows hydraulic communication within the monitoring wells which demonstrate a somewhat consistent groundwater flow direction (the sine-wave curves rarely cross).

Deep Wells

Based on the recorded groundwater readings, the groundwater flow direction in the deep wells was found to fluctuate between the Southerly and Westerly direction throughout the monitoring period, which is consistent with the groundwater flow direction reported in the 2015 RIR.

Figures 11 through 15 show the triangulated GW elevation and flow measured at the same five times as indicated above while the surveying was occurring.

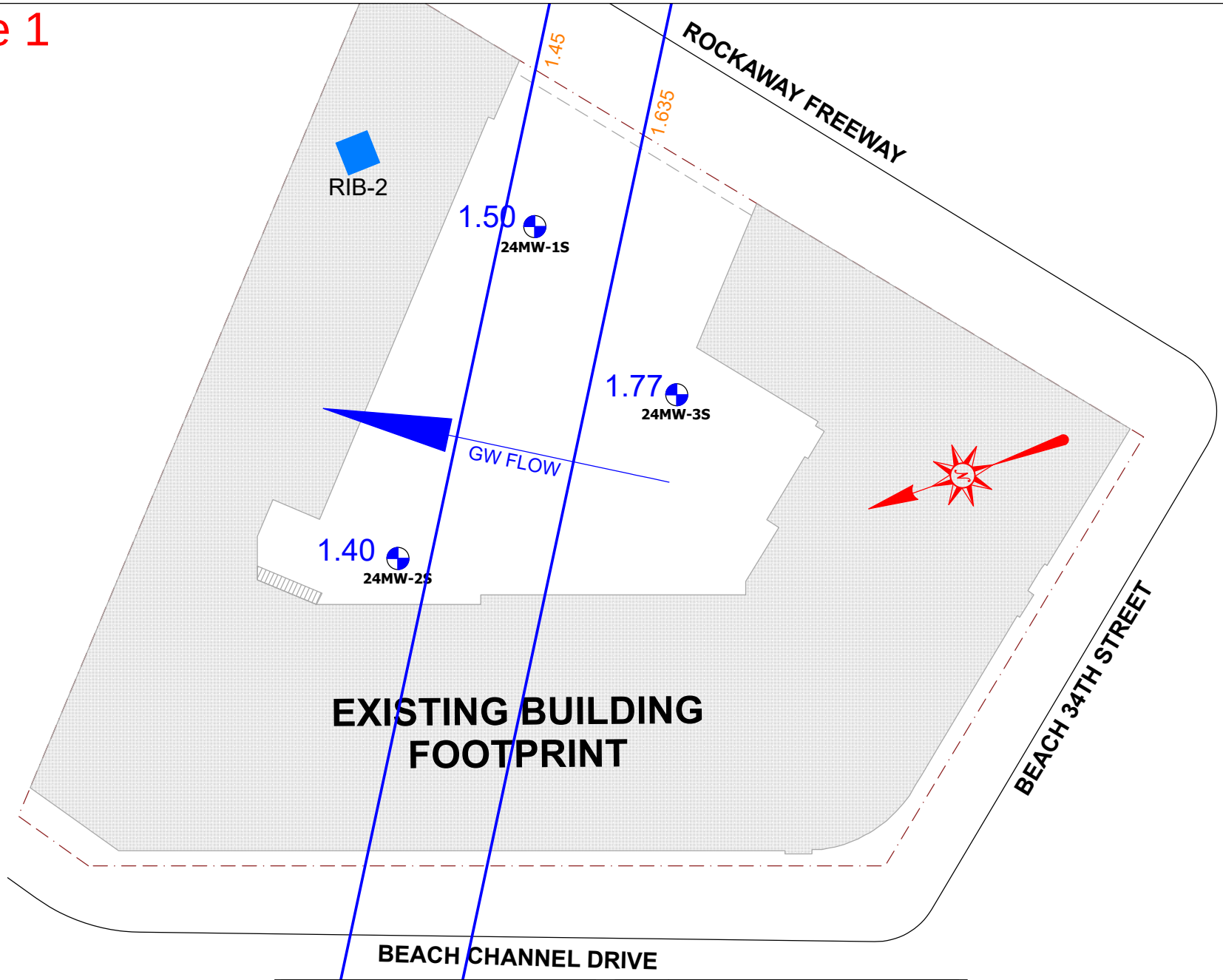
A closer look at Graph 4 demonstrates that largely the groundwater flow direction remains fairly constant during the different tides, except that at certain peaks MW-3D grows higher than MW-1D which signifies a shift in the GW flow direction.

Additional Note:

During the last three days of monitoring, there were two significant rain events, which can be seen in Graphs 1-4 as the lines trend upward, although MW-1S shows very little change in slope.

FIGURES

Figure 1



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PROJECT
NYSDEC BCP #C-241141
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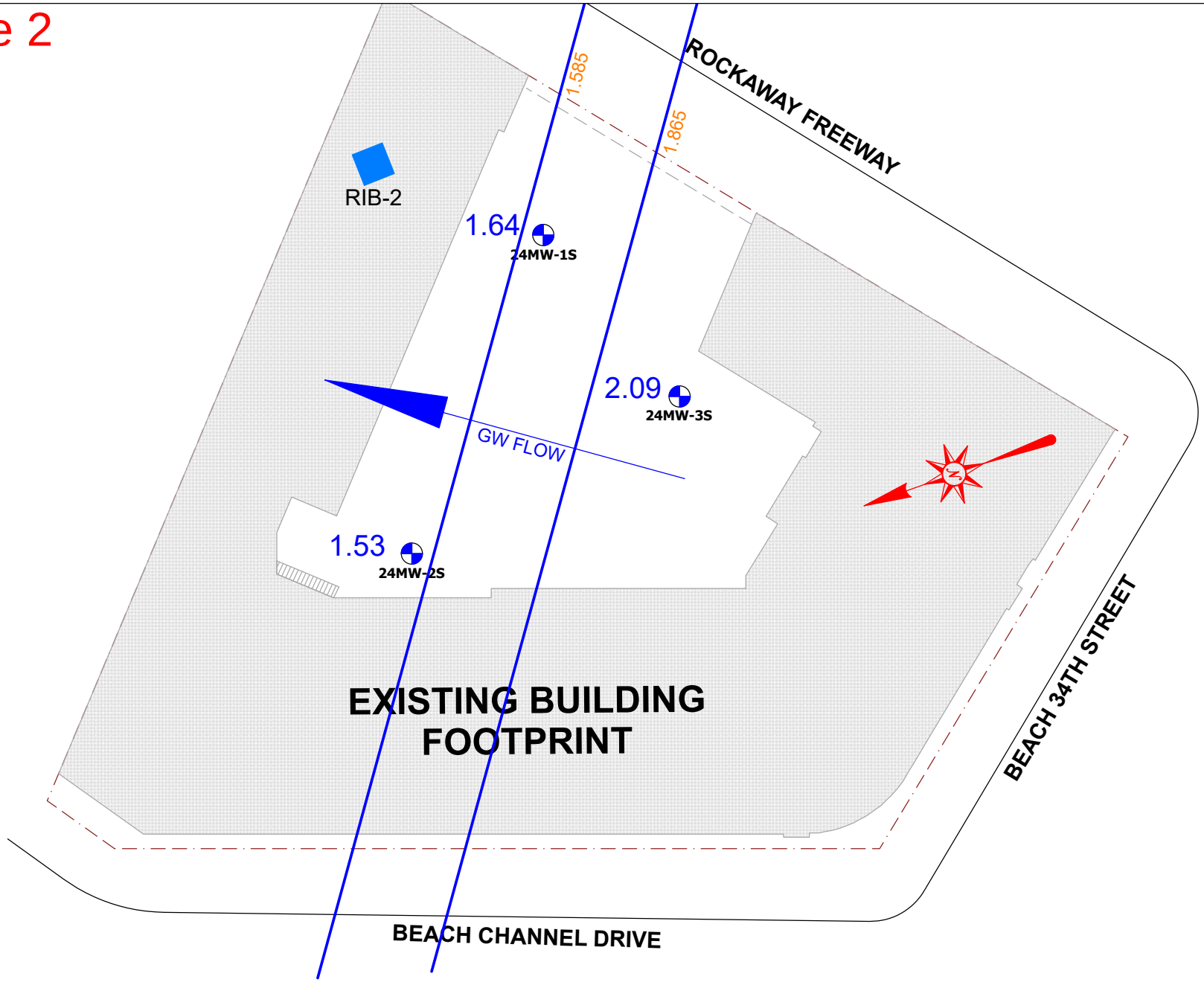
DATE: DEC 9, 2024 | DRAWING BY: AS

TITLE: Shallow Cluster Wells
(11/13/24; 8:02 PM)

Figure 2



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DATE: DEC 9, 2024 | DRAWING BY: AS

TITLE: Shallow Cluster Wells
(11/15/24; 9:42 PM)

Figure 3

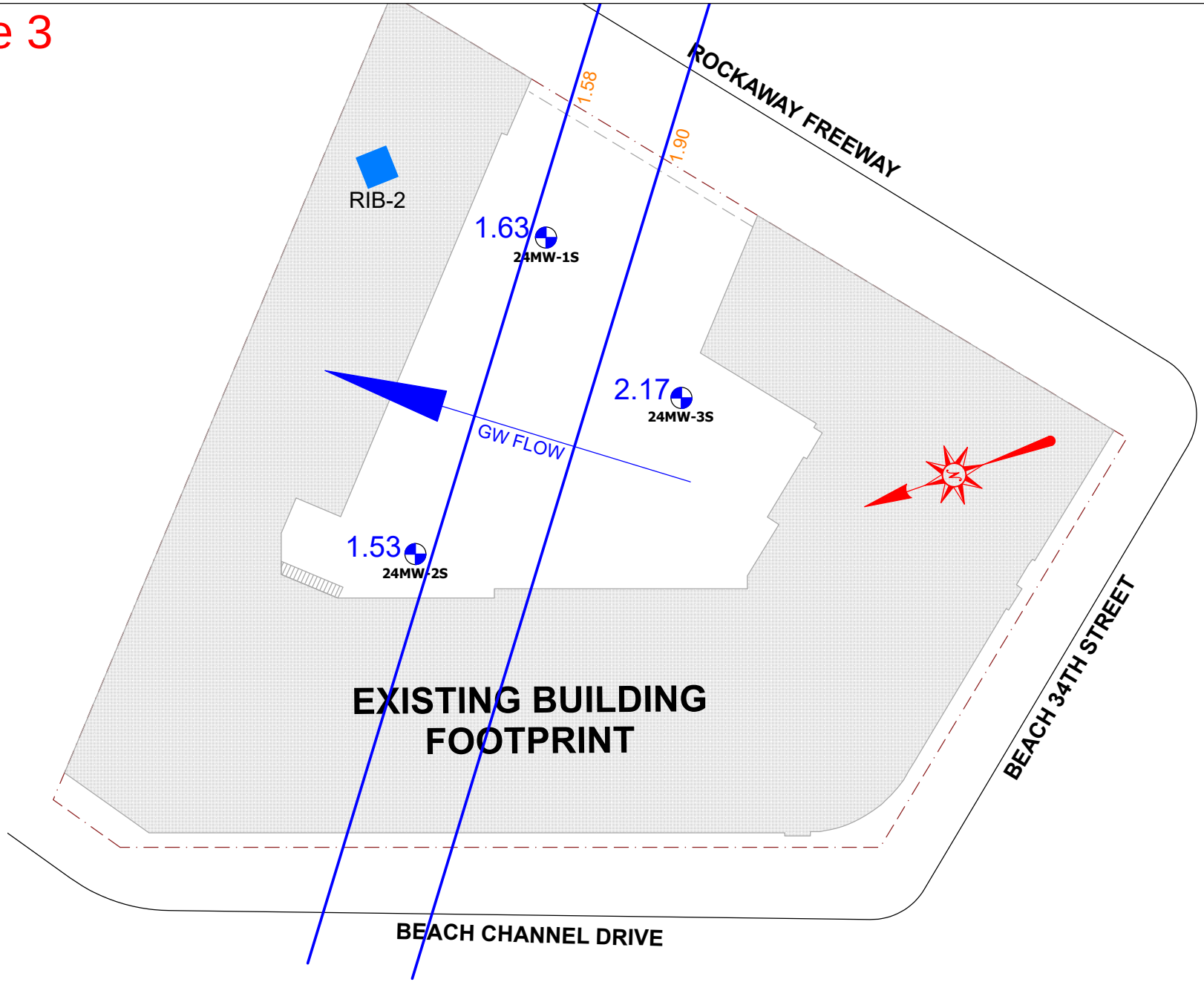

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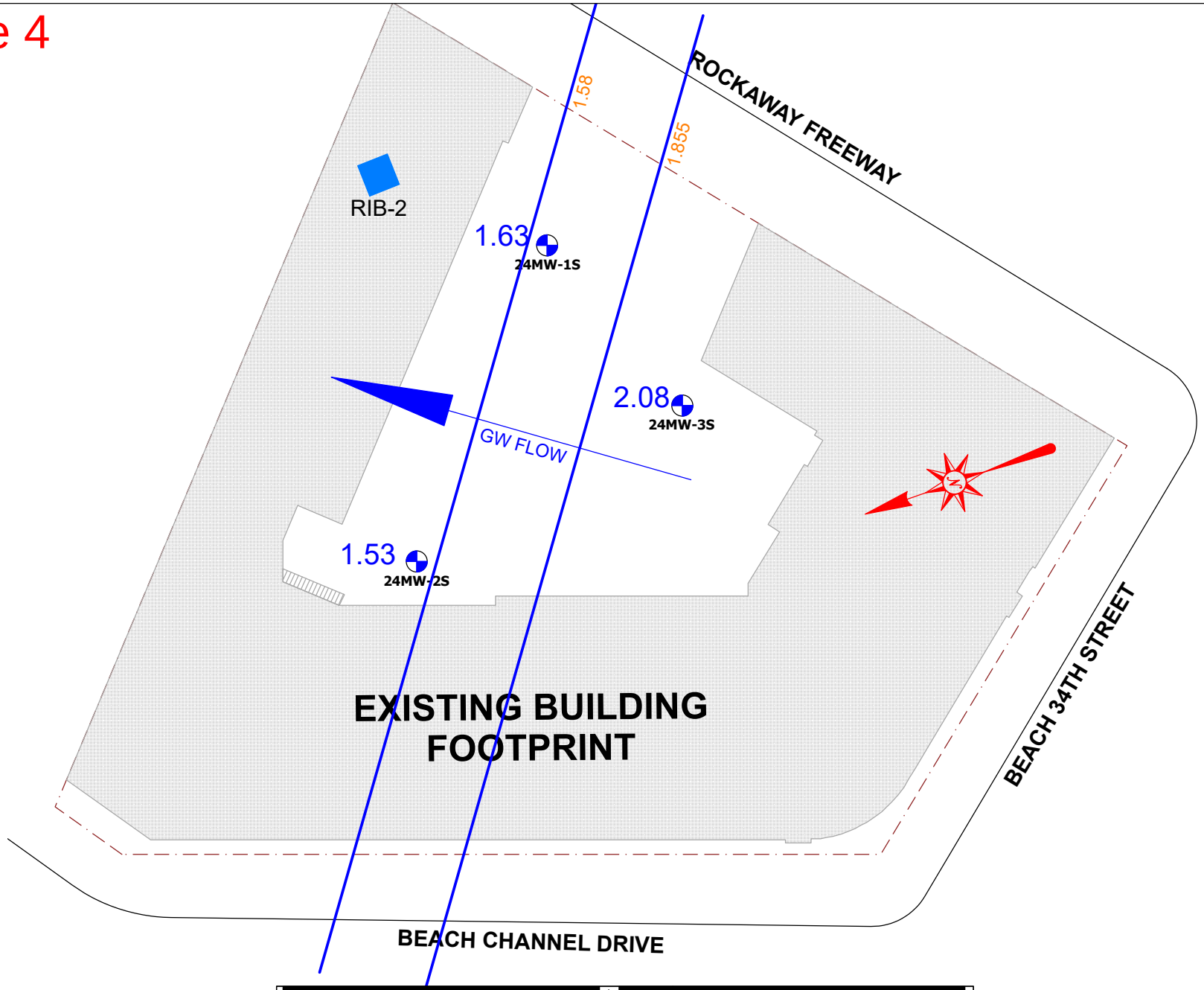
Figure 4



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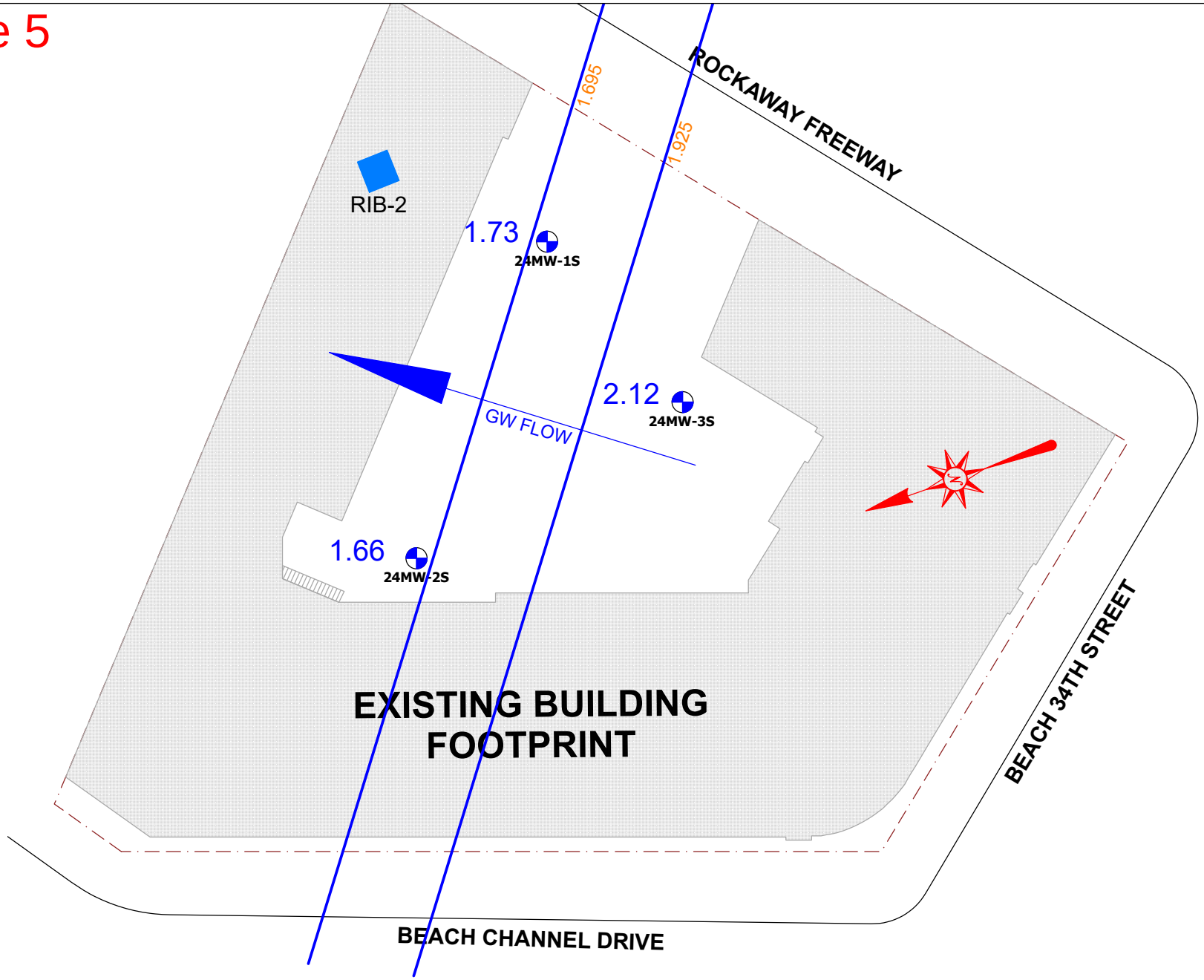
(11/20/24; 1:16 PM)

Figure 5



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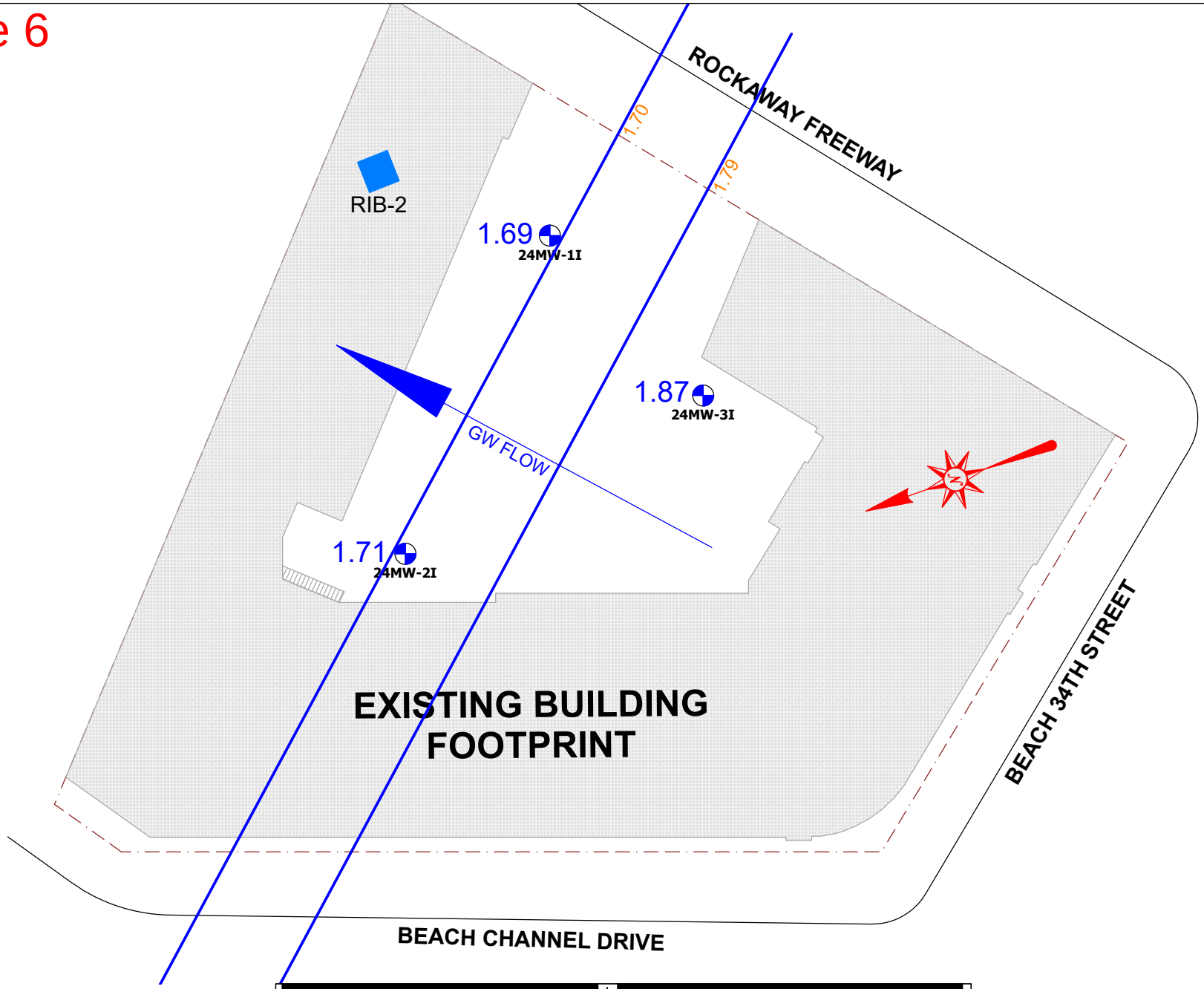
(11/22/24; 2:22 AM)

Figure 6



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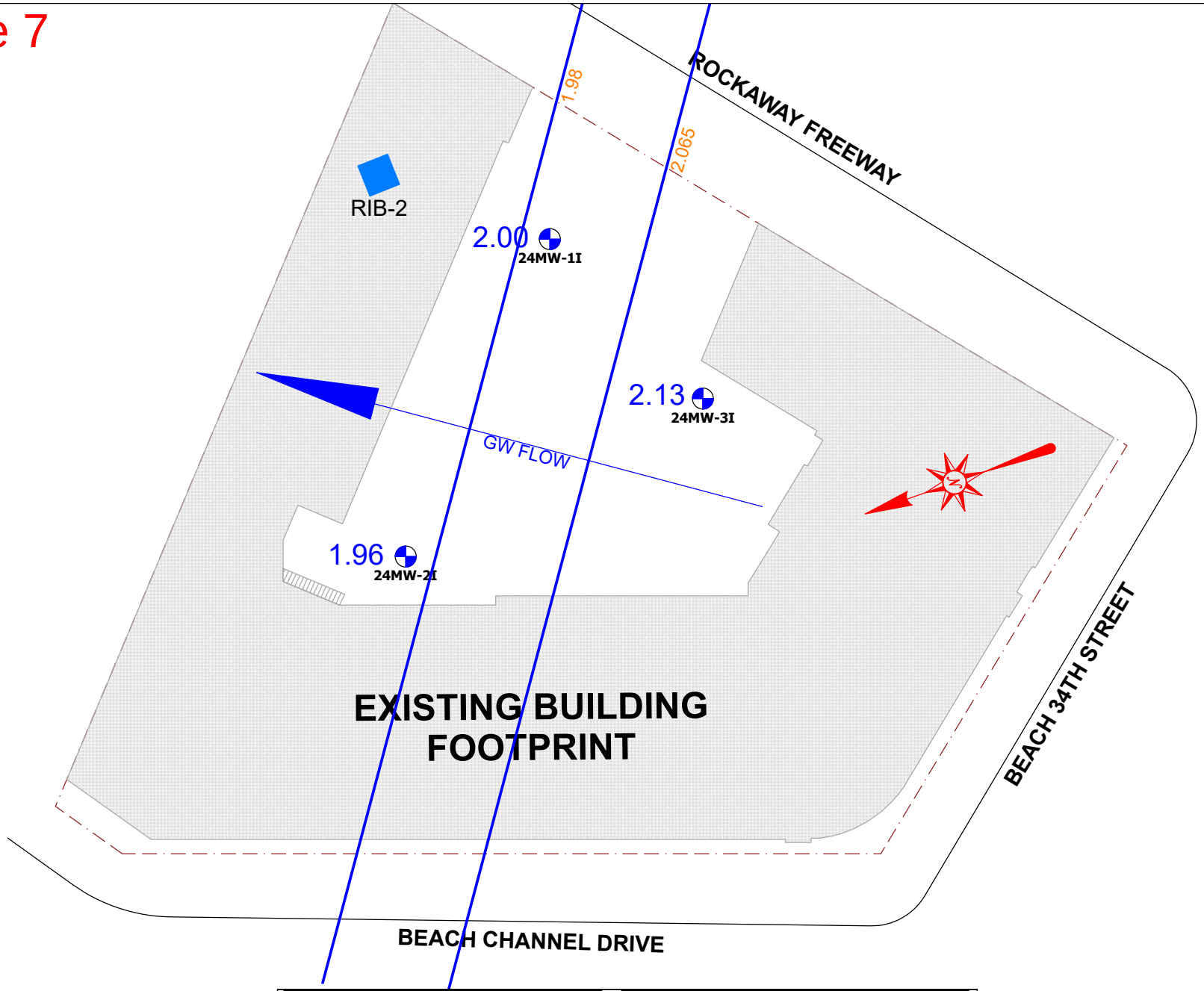
TITLE: Intermediate Cluster Wells
(11/13/24; 8:02 PM)

Figure 7



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(11/15/24; 9:42 PM)

Figure 8

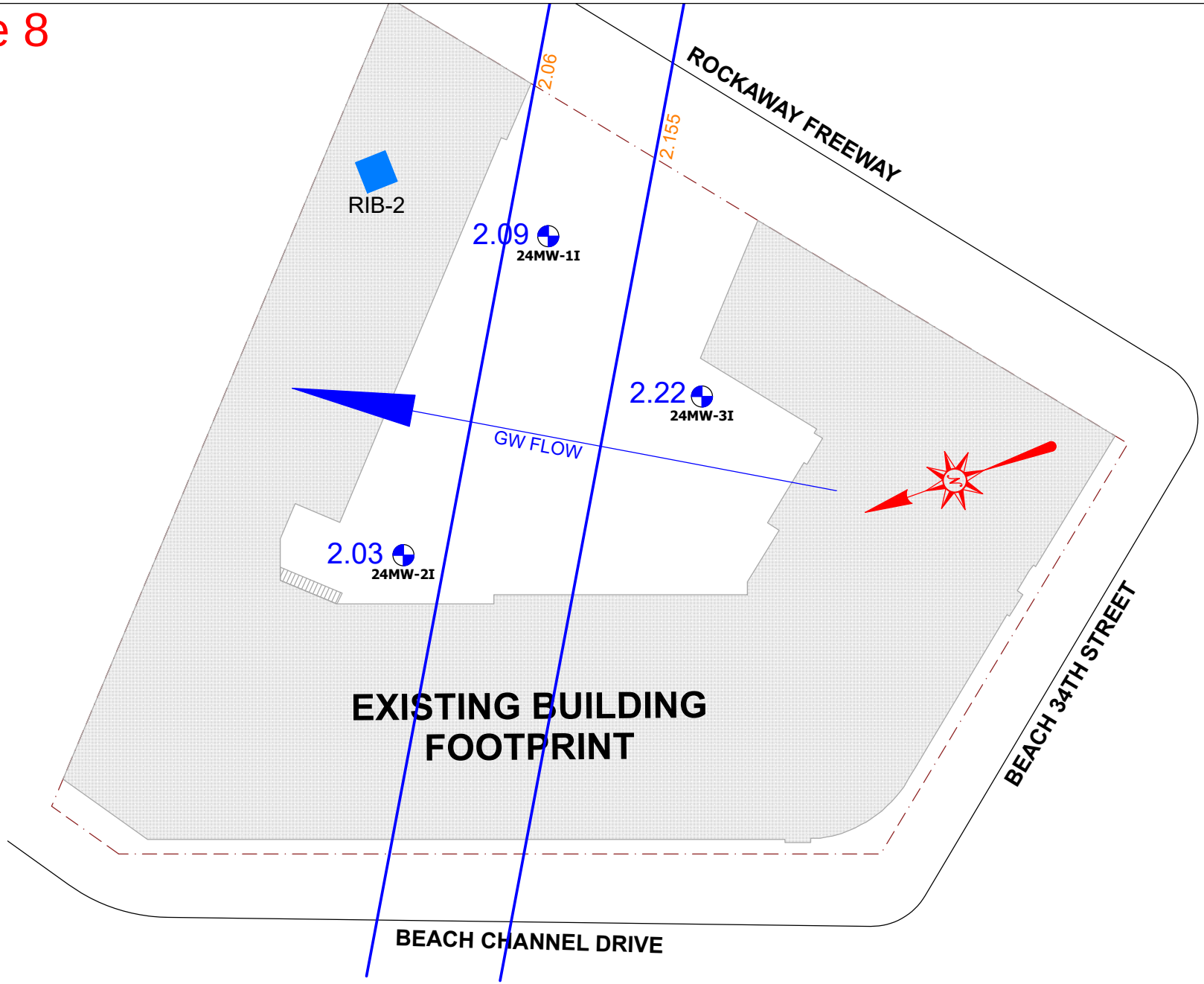

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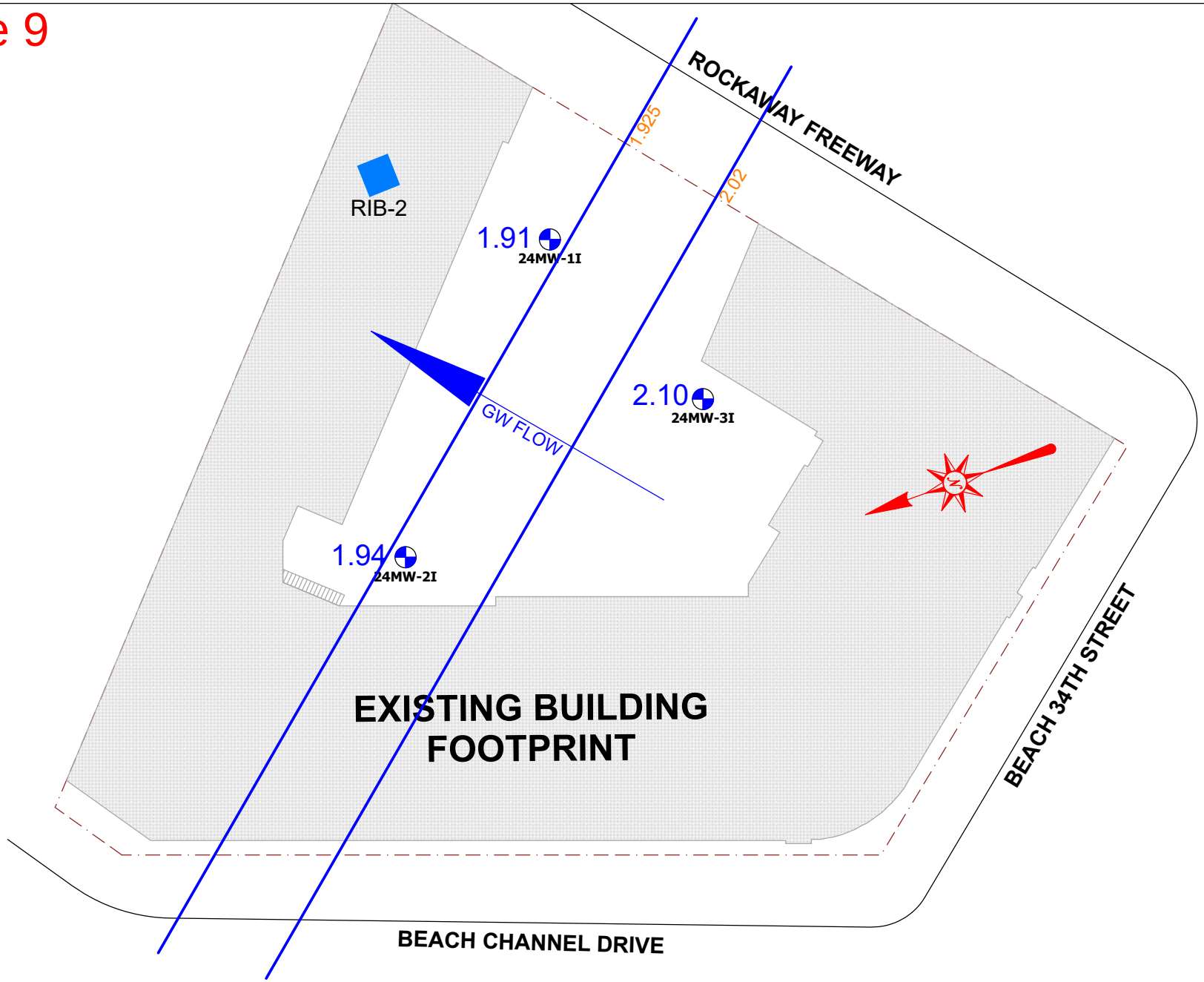
Figure 9



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TITLE: Intermediate Cluster Wells
(11/20/24; 1:16 PM)

Figure 10

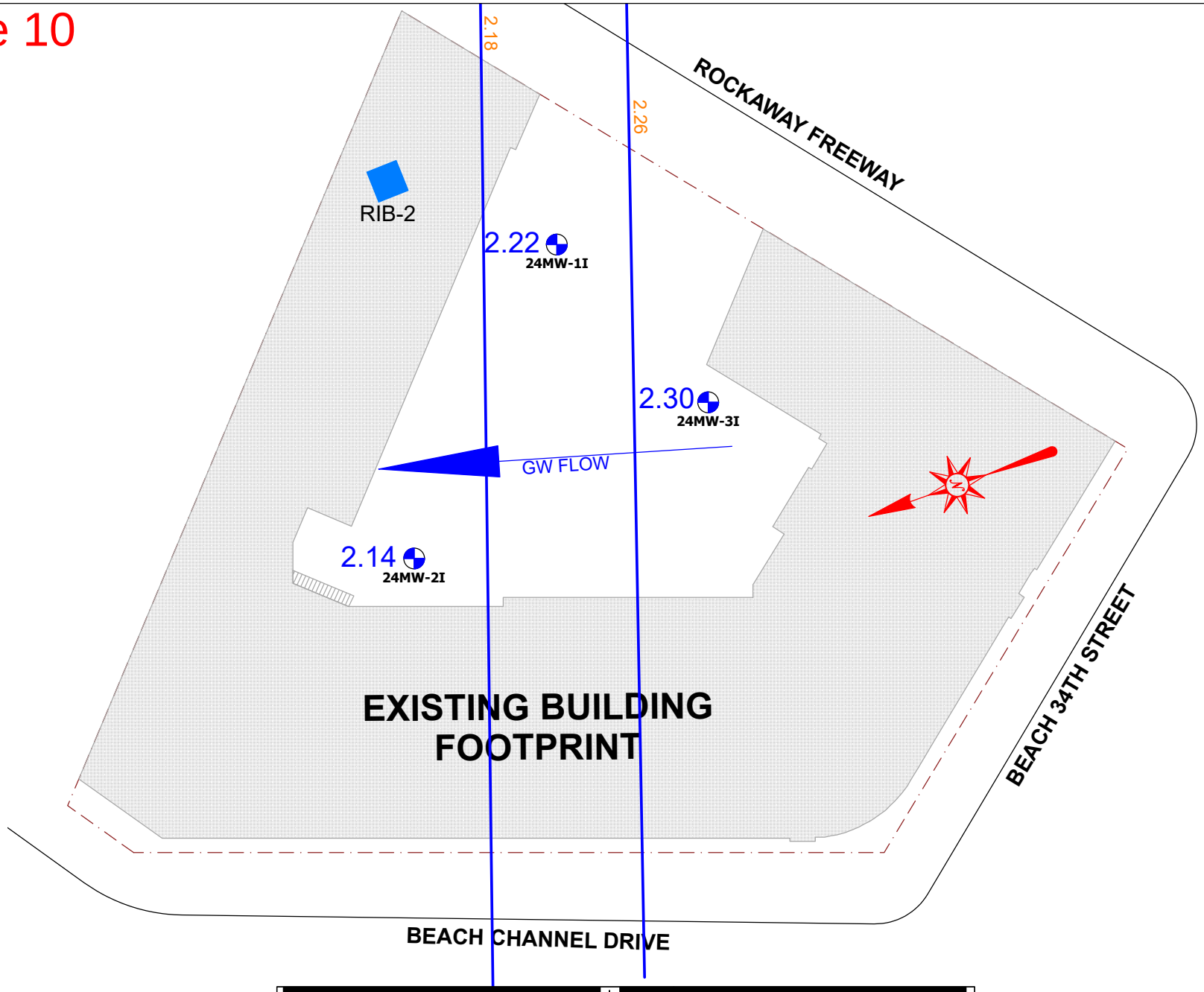

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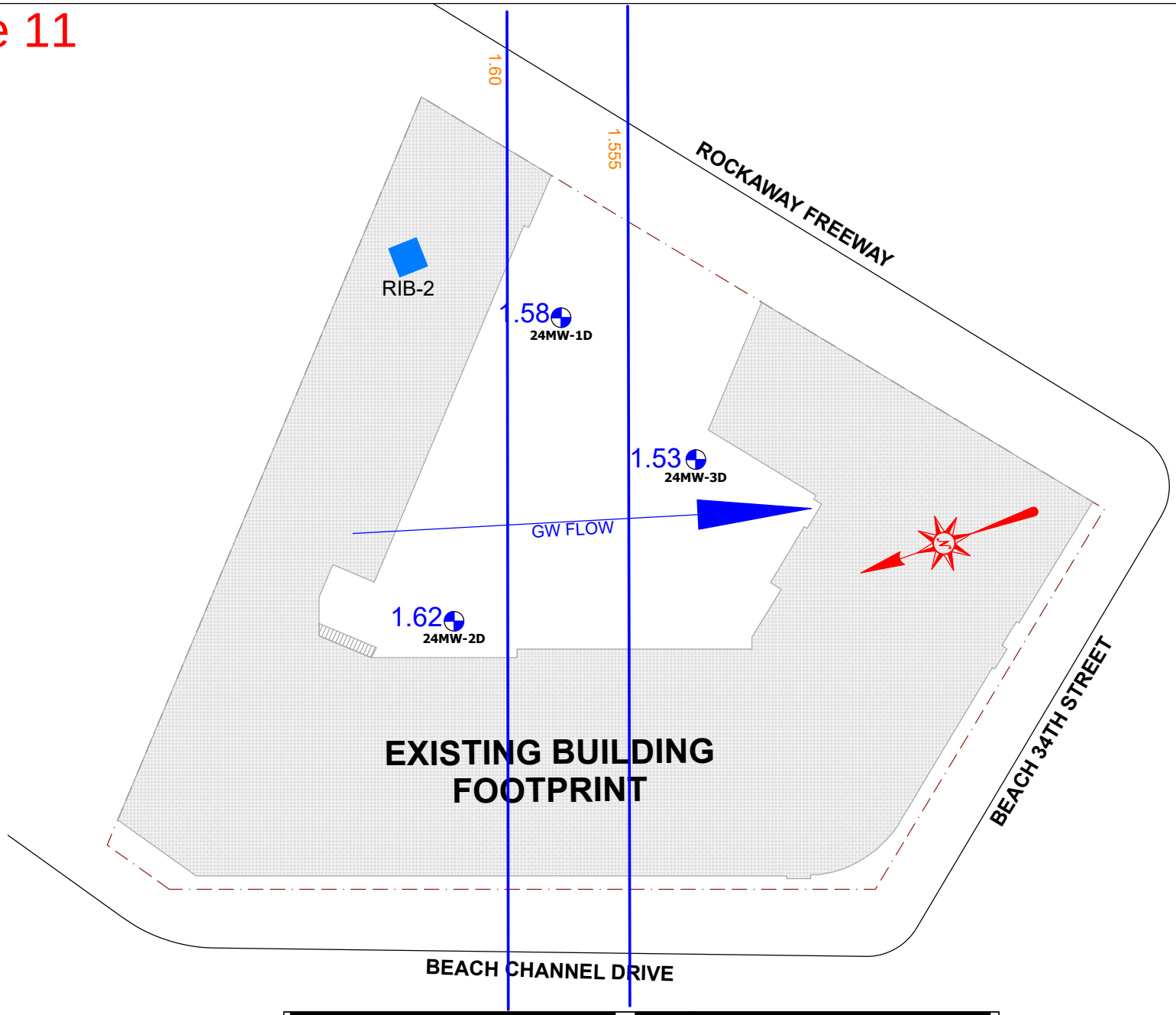
Figure 11



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DATE: DEC 9, 2024 | DRAWING BY: AS

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(11/13/24; 8:02 PM)

Figure 12

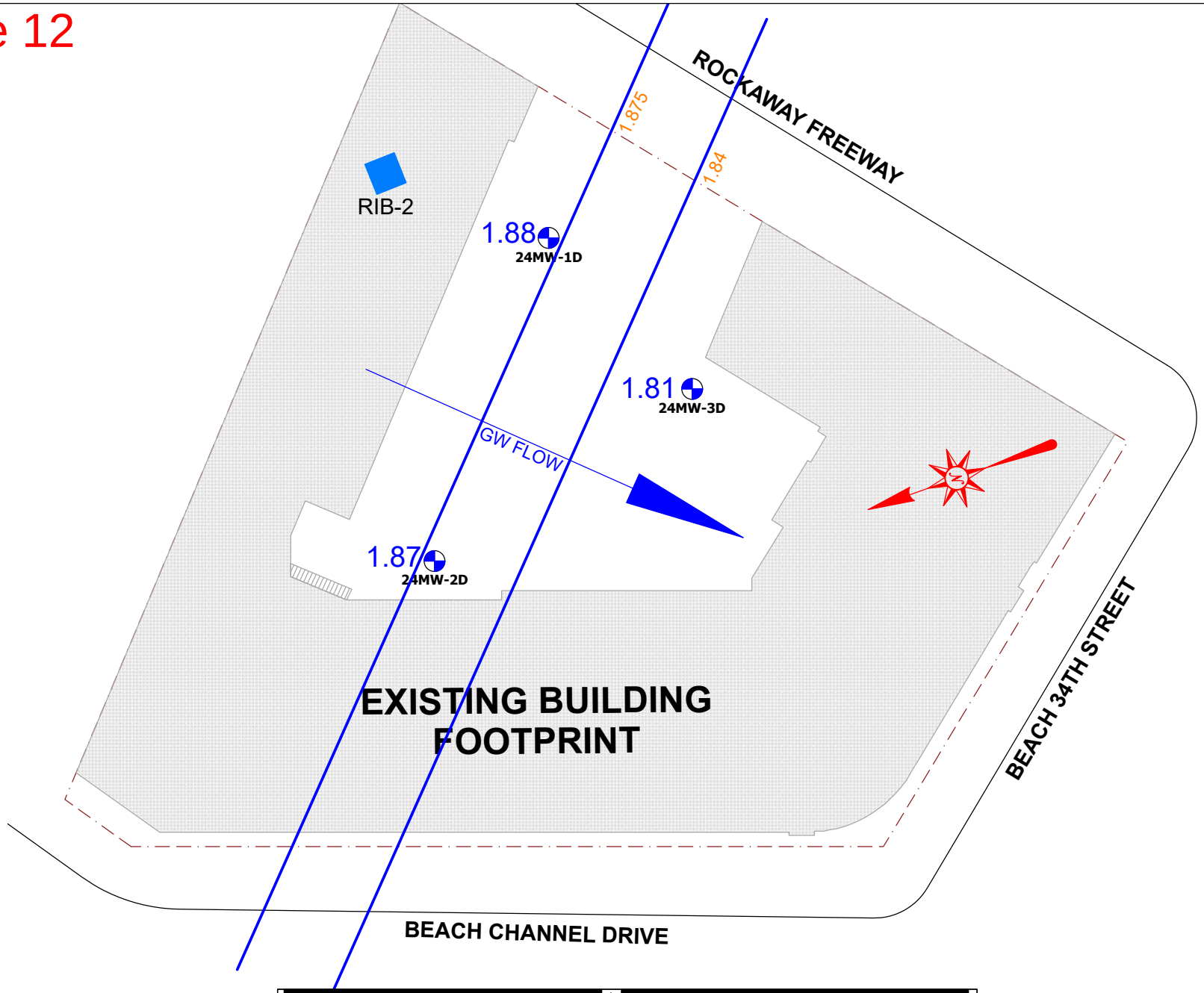

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Figure 13

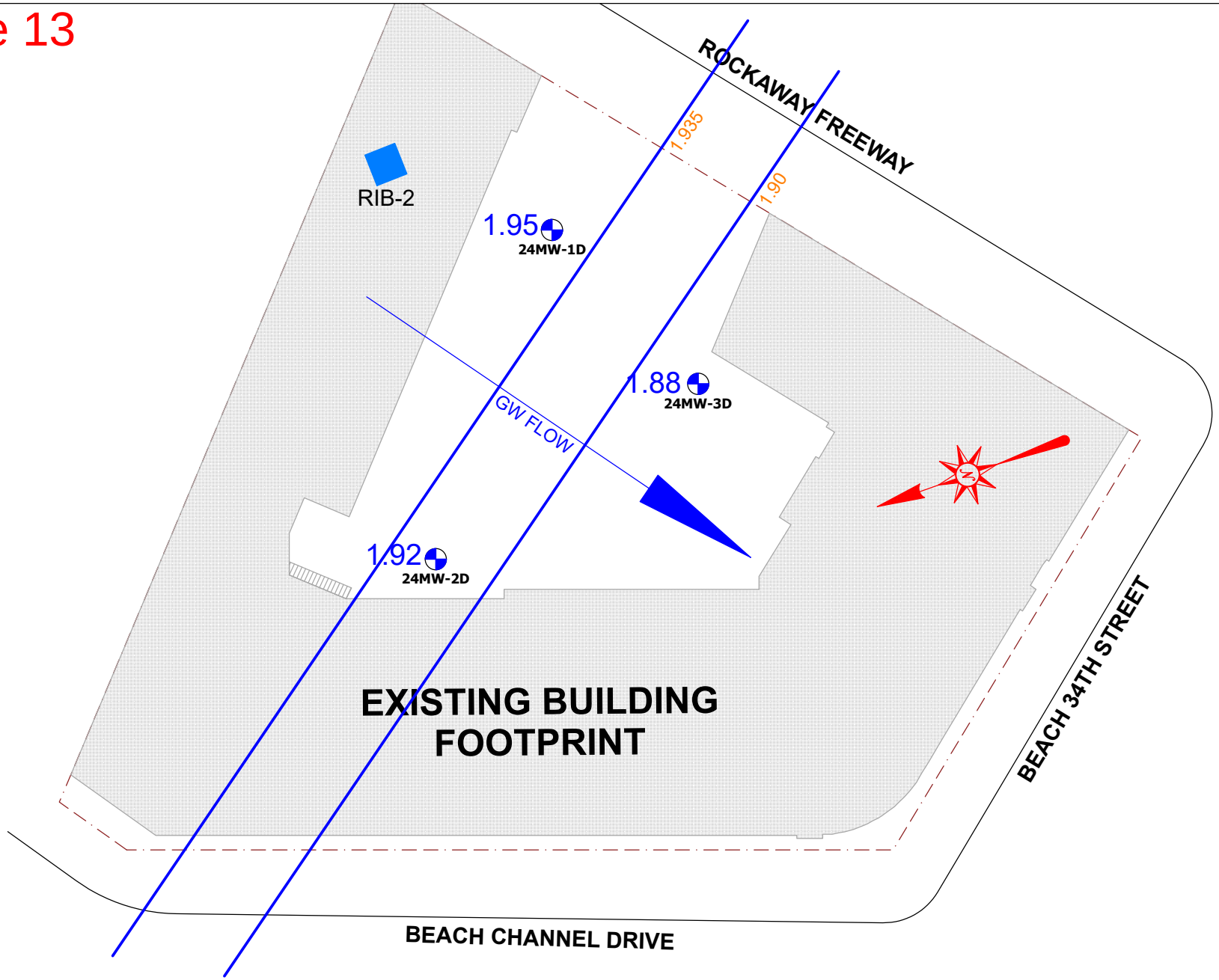

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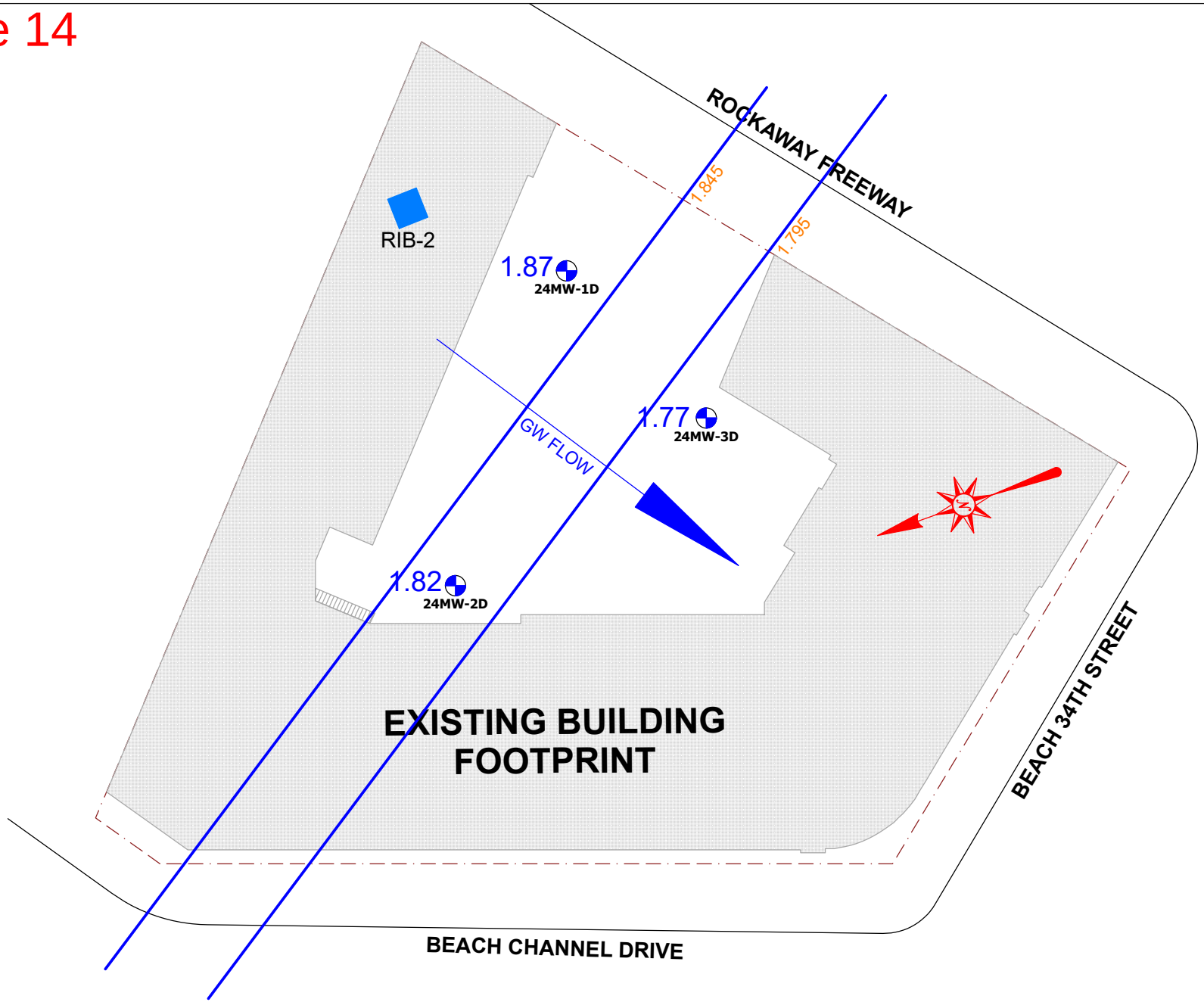
Figure 14



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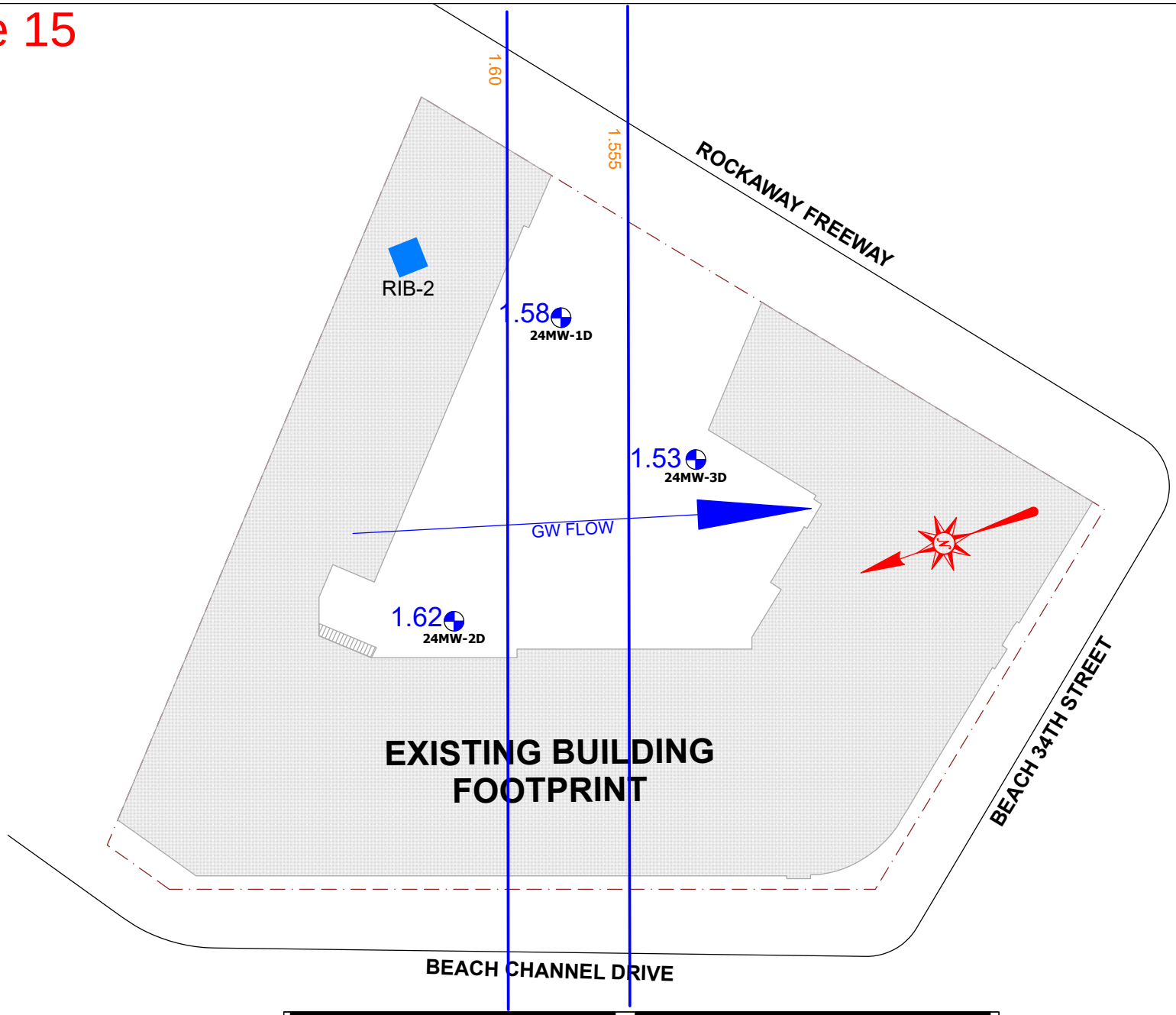

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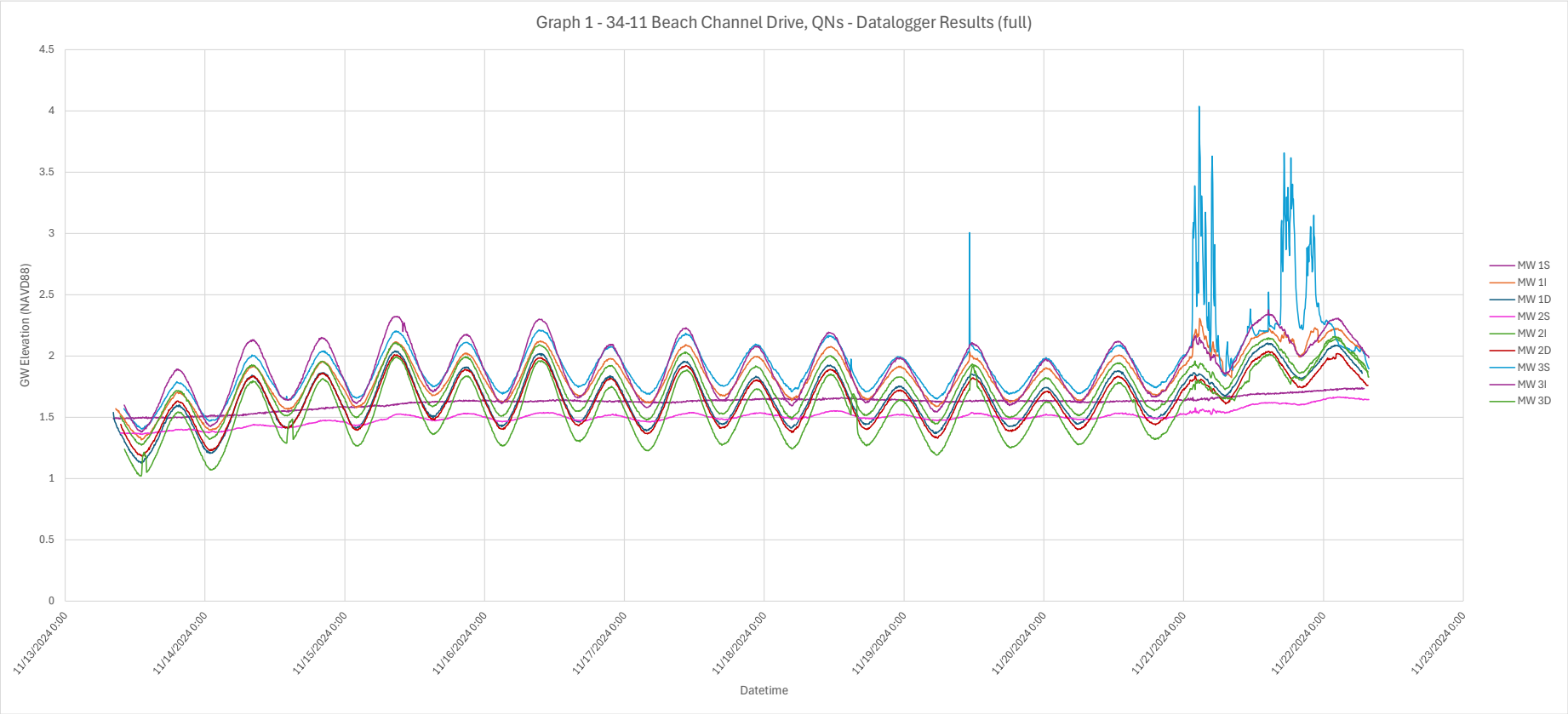
GRAPHS


Graph 1 - 34-11 Beach Channel Drive, QNs - Datalogger Results (full)
GW Elevation (NAVD88)
4.5
4
3.5
3
2.5
2
1.5
1
0.5
0
11/13/2024 0:00
11/14/2024 0:00
11/15/2024 0:00
11/16/2024 0:00
11/17/2024 0:00
11/18/2024 0:00
11/19/2024 0:00
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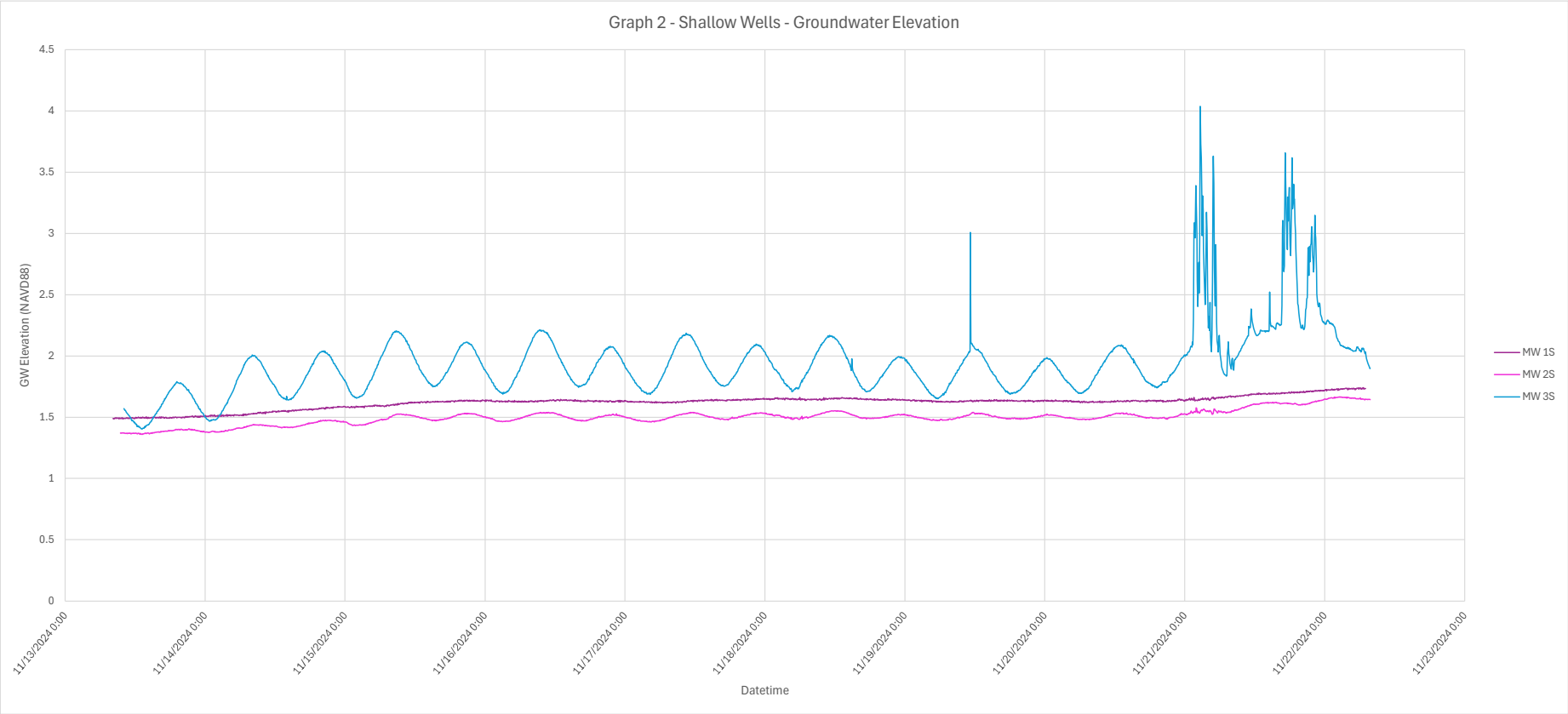
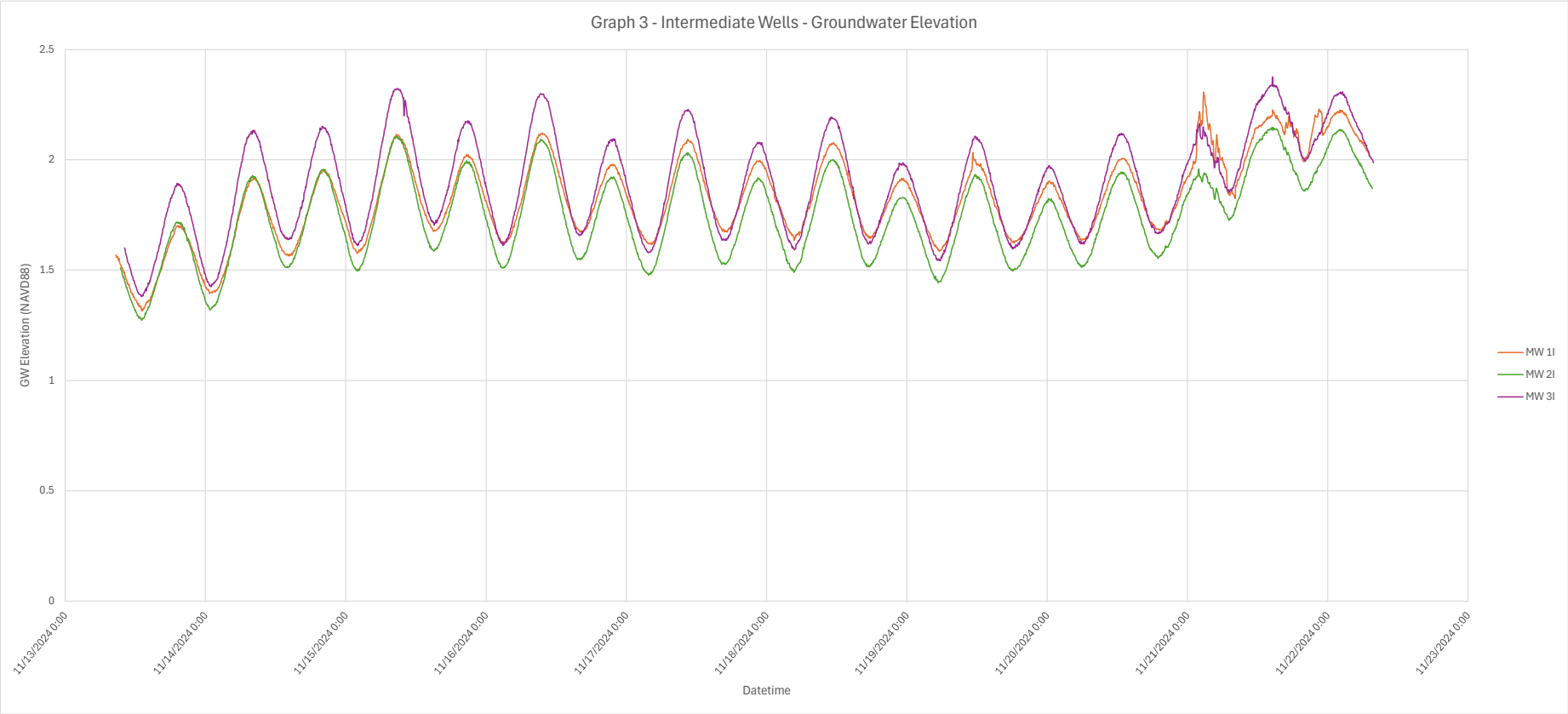
11/21/2024 0:00
11/22/2024 0:00
11/23/2024 0:00
Datetime
MW 1S
MW 1I
MW 1D
MW 2S
MW 2I
MW 2D
MW 3S
MW 3I
MW 3D


Graph 2 - Shallow Wells - Groundwater Elevation
GW Elevation (NAVD88)
4.5
4
3.5
3
2.5
2
1.5
1
0.5
0
11/13/2024 0:00
11/14/2024 0:00
11/15/2024 0:00
11/16/2024 0:00
11/17/2024 0:00
11/18/2024 0:00
11/19/2024 0:00
11/20/2024 0:00
11/21/2024 0:00
11/22/2024 0:00
11/23/2024 0:00
Datetime
MW 1S
MW 2S
MW 3S


Graph 3 - Intermediate Wells - Groundwater Elevation
GW Elevation (NAVD88)
2.5
2
1.5
1
0.5
0
11/13/2024 0:00
11/14/2024 0:00
11/15/2024 0:00
11/16/2024 0:00
11/17/2024 0:00
11/18/2024 0:00
11/19/2024 0:00
11/20/2024 0:00
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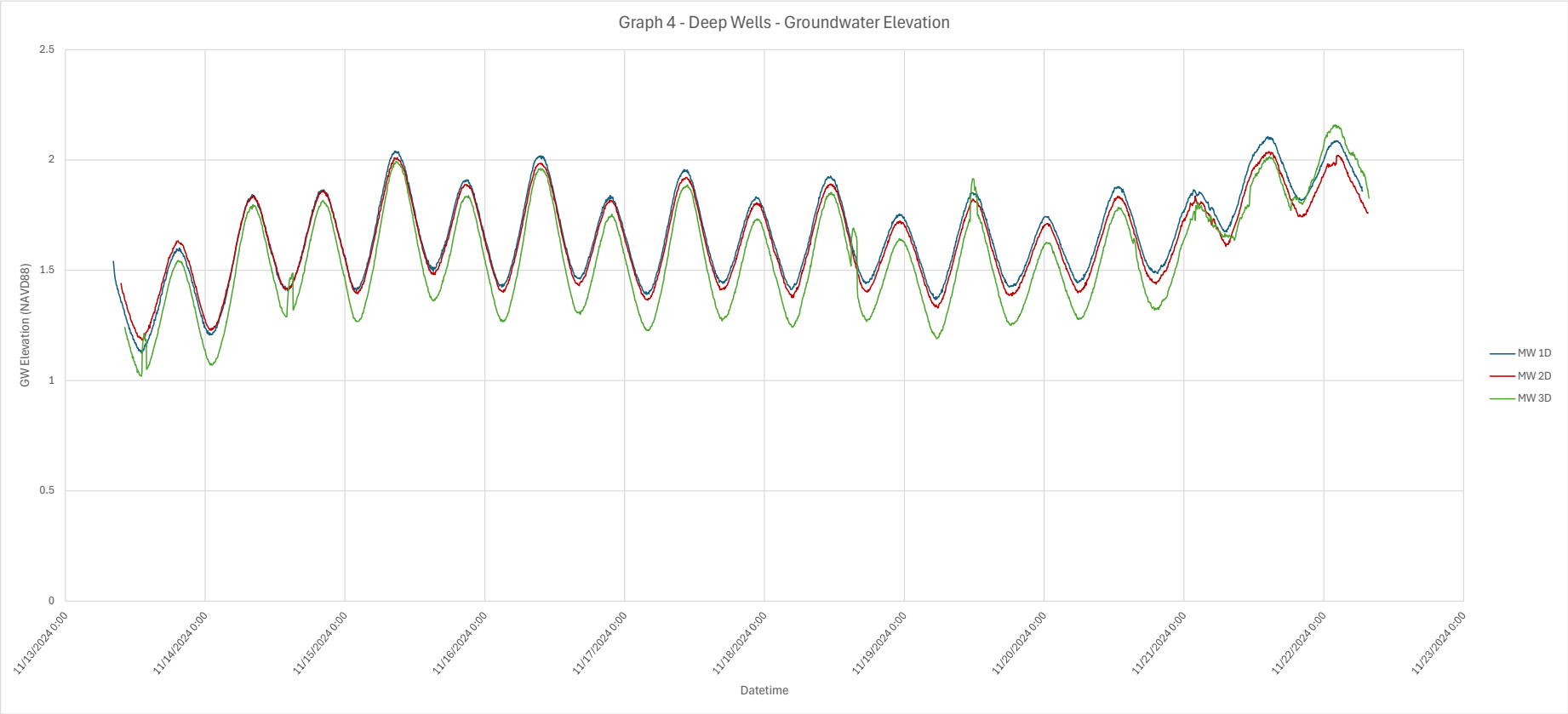
11/22/2024 0:00
11/23/2024 0:00
Datetime
MW 1I
MW 2I
MW 3I


Graph 4 - Deep Wells - Groundwater Elevation
GW Elevation (NAVD88)
2.5
2
1.5
1
0.5
0
11/13/2024 0:00
11/14/2024 0:00
11/15/2024 0:00
11/16/2024 0:00
11/17/2024 0:00
11/18/2024 0:00
11/19/2024 0:00
11/20/2024 0:00
11/21/2024 0:00
11/22/2024 0:00
11/23/2024 0:00
Datetime
MW 1D
MW 2D
MW 3D

TABLES

Table 1. Tabulated Analytical Results

Phoenix Environmental Laboratories, Inc.																							
587 East Middle Turnpike																							
P.O. Box 370	Lab Sample Id		TOGS 1.1.1 WQ/GA	CS15371				CS15372				CS15373				CS15374				CS15375			
Manchester, CT 06040	Collection Date			11/22/2024				11/22/2024				11/22/2024				11/22/2024				11/22/2024			
(860) 645-1102	Client Id			24MW-1S				24MW-1I				24MW-1D				DUPLICATE				TRIP BLANK			
	Matrix			Ground Water				Ground Water				Ground Water				Ground Water				Water			
Project Id : 34-11 BEACH CHANNEL DRIVE QNS																							
	CAS	Units		Result	RL	Qual	MDL	Result	RL	Qual	MDL	Result	RL	Qual	MDL	Result	RL	Qual	MDL	Result	RL	Qual	MDL
Volatiles By SW8260D																							
1,1,1,2-Tetrachloroethane	630-20-6	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,1,1-Trichloroethane	71-55-6	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,1,2,2-Tetrachloroethane	79-34-5	ug/L	5	< 0.50	0.50	U	0.25	< 0.50	0.50	U	0.25	< 0.50	0.50	U	0.25	< 0.50	0.50	U	0.25	< 0.50	0.50	U	0.25
1,1,2-Trichloroethane	79-00-5	ug/L	1	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,1-Dichloroethane	75-34-3	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,1-Dichloroethene	75-35-4	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	0.42	1.0	J	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,1-Dichloropropene	563-58-6	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,2,3-Trichlorobenzene	87-61-6	ug/L		< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,2,3-Trichloropropane	96-18-4	ug/L	0.04	< 0.25	0.25	U	0.25	< 0.25	0.25	U	0.25	< 0.25	0.25	U	0.25	< 0.25	0.25	U	0.25	< 0.25	0.25	U	0.25
1,2,4-Trichlorobenzene	120-82-1	ug/L		< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,2-Dibromo-3-chloropropane	96-12-8	ug/L	0.04	< 0.50	0.50	U	0.50	< 0.50	0.50	U	0.50	< 0.50	0.50	U	0.50	< 0.50	0.50	U	0.50	< 0.50	0.50	U	0.50
1,2-Dibromoethane	106-93-4	ug/L	0.0006	< 0.25	0.25	U	0.25	< 0.25	0.25	U	0.25	< 0.25	0.25	U	0.25	< 0.25	0.25	U	0.25	< 0.25	0.25	U	0.25
1,2-Dichlorobenzene	95-50-1	ug/L		< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,2-Dichloroethane	107-06-2	ug/L	0.6	< 0.60	0.60	U	0.25	< 0.60	0.60	U	0.25	< 0.60	0.60	U	0.25	< 0.60	0.60	U	0.25	< 0.60	0.60	U	0.25
1,2-Dichloropropane	78-87-5	ug/L	1	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,3-Dichlorobenzene	541-73-1	ug/L	3	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,3-Dichloropropane	142-28-9	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,4-Dichlorobenzene	106-46-7	ug/L		< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
2,2-Dichloropropane	594-20-7	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
2-Chlorotoluene	95-49-8	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
2-Hexanone	591-78-6	ug/L	50	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5
2-Isopropyltoluene	527-84-4	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
4-Chlorotoluene	106-43-4	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
4-Methyl-2-pentanone	108-10-1	ug/L		< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5
Acetone	67-64-1	ug/L	50	< 25	25	U	2.5	< 25	25	U	2.5	2.9	25	JS	2.5	< 25	25	U	2.5	< 25	25	U	2.5
Acrylonitrile	107-13-1	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Benzene	71-43-2	ug/L	1	0.26	0.70	J	0.25	< 0.70	0.70	U	0.25	0.26	0.70	J	0.25	0.25	0.70	J	0.25	< 0.70	0.70	U	0.25
Bromobenzene	108-86-1	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Bromochloromethane	74-97-5	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Bromodichloromethane	75-27-4	ug/L	50	< 0.50	0.50	U	0.25	< 0.50	0.50	U	0.25	< 0.50	0.50	U	0.25	< 0.50	0.50	U	0.25	< 0.50	0.50	U	0.25
Bromoform	75-25-2	ug/L	50	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Bromomethane	74-83-9	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Carbon Disulfide	75-15-0	ug/L		4.5	5.0	J	0.25	2.9	5.0	J	0.25	2.1	5.0	J	0.25	2.4	5.0	J	0.25	< 5.0	5.0	U	0.25
Carbon tetrachloride	56-23-5	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Chlorobenzene	108-90-7	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Chloroethane	75-00-3	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Chloroform	67-66-3	ug/L	7	0.36	1.0	J	0.25	< 1.0	1.0	U	0.25	0.98	1.0	J	0.25	0.42	1.0	J	0.25	< 1.0	1.0	U	0.25
Chloromethane	74-87-3	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
cis-1,2-Dichloroethene	156-59-2	ug/L	5	0.61	1.0	J	0.25	8.6	1.0		0.25	160	5.0		1.3	0.96	1.0	J	0.25	< 1.0	1.0	U	0.25
cis-1,3-Dichloropropene	10061-01-5	ug/L	0.4	< 0.40	0.40	U	0.25	< 0.40	0.40	U	0.25	< 0.40	0.40	U	0.25	< 0.40	0.40	U	0.25	< 0.40	0.40	U	0.25
Dibromochloromethane	124-48-1	ug/L	50	< 0.50	0.50	U	0.25	< 0.50	0.50	U	0.25	< 0.50	0.50	U	0.25	< 0.50	0.50	U	0.25	< 0.50	0.50	U	0.25
Dibromomethane	74-95-3	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Dichlorodifluoromethane	75-71-8	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Ethylbenzene	100-41-4	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Hexachlorobutadiene	87-68-3	ug/L	0.5	< 0.40	0.40	U	0.25	< 0.40	0.40	U	0.25	< 0.40	0.40	U	0.25	< 0.40	0.40	U	0.25	< 0.40	0.40	U	0.25
Isopropylbenzene	98-82-8	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
m&p-Xylene	179601-23-1	ug/L		< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Methyl ethyl ketone	78-93-3	ug/L	50	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5
Methyl t-butyl ether (MTBE)	1634-04-4	ug/L		< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Methylene chloride	75-09-2	ug/L	5	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0
Naphthalene	91-20-3	ug/L	10	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0
n-Butylbenzene	104-51-8	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	1.0	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	1.0
n-Propylbenzene	103-65-1	ug/L	5	< 1.0	1.0	U	1.0	< 1.0	1.0	U	0.25	< 1.0	1.0	U	1.0	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
o-Xylene	95-47-6	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
p-Isopropyltoluene	99-87-6	ug/L	5	< 1.0	1.0	U	1.0	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	1.0
sec-Butylbenzene	135-98-8	ug/L	5	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	0.25	< 1.0	1.0	U	1.0	< 1.0	1.0	U	0.25
Styrene	100-42-5	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
tert-Butylbenzene	98-06-6	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	1.0	< 1.0	1.0	U	0.25
Tetrachloroethene	127-18-4	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Tetrahydrofuran (THF)	109-99-9	ug/L	50	< 2.5	2.5	U	2.5	< 2.5	2.5	U	2.5	< 2.5	2.5	U	2.5	< 2.5	2.5	U	2.5	< 2.5	2.5	U	2.5
Toluene	108-88-3	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Total Xylenes	1330-20-7	ug/L	5	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0
trans-1,2-Dichloroethene	156-60-5	ug/L	5	1.1	1.0		0.25	0.44	1.0	J	0.25	2.1	1.0		0.25	1.3	1.0		0.25	< 1.0	1.0	U	0.25
trans-1,3-Dichloropropene	10061-02-6	ug/L	0.4	< 0.40	0.40	U	0.25	< 0.40	0.40	U	0.25	< 0.40	0.40	U	0.25	< 0.40	0.40	U	0.25	< 0.40	0.40	U	0.25
trans-1,4-dichloro-2-butene	110-57-6	ug/L	5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5	< 5.0	5.0	U	2.5
Trichloroethene	79-01-6	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	1.4	1.0		0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Trichlorofluoromethane	75-69-4	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Trichlorotrifluoroethane	76-13-1	ug/L	5	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
Vinyl chloride	75-01-4	ug/L	2	< 1.0	1.0	U	0.25	9.2	1.0		0.25	92	5.0		1.3	< 1.0	1.0	U	0.25	< 1.0	1.0	U	0.25
1,2,4-Trimethylbenzene	95-63-6	ug/L	5	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	0.25
1,3,5-Trimethylbenzene	108-67-8	ug/L	5	< 1.0	1.0	U	1.0	< 1.0	1.0	U	0.25	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0	< 1.0	1.0	U	1.0

Qualifiers	
U	The compound was analyzed for but not detected at or above the MDL.
	The number immediately preceding the "U" represents the PQL reporting level
	corrected for percent solids, weight and/or volume calculations, and dilution factors.
J	The value is estimated. This flag is used
	a) on form 1 when the compound is reported above the MDL, but below the PQL, and
	b) on the Tentatively Identified Compounds (TIC) form for all compounds identified.
N	The concentration is based on the response fo the nearest internal. This flag
	is used on the TIC form for all compounds identified.
S	This compound is a solvent that is used in the laboratory. Laboratory contamination is
	suspected if concentration is less than five times the reporting level.
D	The reported concentration is the result of a diluted analysis.
Q	For TICS, this compound was quantitated using a calibration curve.
(*)	See report for comment.
Result Detected	
RL Exceeds Criteria	
Result Exceeds Criteria	

APPENDIX A

SOIL BORING LOGS

Geologic Boring Log Details

Cluster #1

Location: See attached plan		Depth to Water (ft. from grade.)		Site Elevation Datum
Project Name: 34-11 Beach Channel Drive	Address: 34-11 Beach Channel Drive, Far Rockaway, NY 11691	Date	DTW	Ground Elevation
Drilling Company: Costal Environmental	Method: Geoprobe			Well Specifications
Date Started: 6/17/2024	Date Completed: 6/17/2024	Groundwater depth		None
Completion Depth: 40'	Field Personnel: Ahmed Elbadri			

1D (NTS)	DEPTH (ft below grade)	SAMPLES Reco-very (in.)	Blow per 6 in.	PID (ppm)	SOIL DESCRIPTION
	0 to 5	25	N/A		0-8" Concrete 8-25" Medium gray sand
	5 to 10	42	N/A		0-13" Medium gray sand 13-42" Medium gray sand/ moist
	10 to 15	0	N/A		No recovery, assumed to be sand because clay would've stuck to the sleeve
	15 to 20	61	N/A		0-24" Medium gray sand/ moist 24-26" Clay 26-27" Medium gray sand/ moist 27-44.5" Clay 44.5-45" Medium gray sand/ moist 45-60" Clay
	20 to 25	57.5	N/A		0-25" Medium gray sand/ moist 25-34" Medium brown sand mixed with clay 34-40.5" Medium brown sand with little clay 40.5-47.5" Clay 47.5-49.5 Clay with organics 49.5-57.5 Fine brown sand/ moist
	25 to 30	56.7	N/A		0-9" Clay 9-21" Clay mixed with medium brown sand 21-43" Fine gray sand 43-56.7 Coarse gray sand
	30 to 35	56	N/A		0-5" Fine gray sand 5-45" Medium to coarse gray sand 45-56" Fine gray sand
	35 to 40	57.5	N/A		0-26" Medium gray sand/ moist 26-39" Fine gray sand/ moist 39-57.5 Clay

Geologic Boring Log Details

Cluster #2

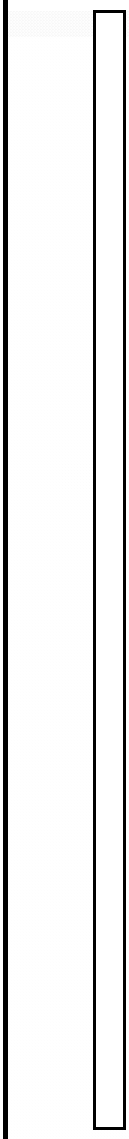
Location: See attached plan		Depth to Water (ft. from grade.)		Site Elevation Datum
Project Name: 34-11 Beach Channel Drive	Address: 34-11 Beach Channel Drive, Far Rockaway, NY 11691	Date	DTW	Ground Elevation
Drilling Company: Costal Environmental	Method: Geoprobe			Well Specifications
Date Started: 6/17/2024	Date Completed: 6/17/2024	Groundwater depth		None
Completion Depth: 40'	Field Personnel: Ahmed Elbadri			

2D (NTS)	DEPTH (ft below grade)	SAMPLES Recovery (in.)	Blow per 6 in.	PID (ppm)	SOIL DESCRIPTION
	0 to 5	18.5	N/A		0-11" Concrete 11-18.5 Medium brown sand
	5 to 10	32	N/A		0-6.5" Medium gray sand/ moist 6.5-14" Clay 14-15.5" Medium gray sand/ moist 15.5-32" Clay
	10 to 15	50	N/A		0-9" Medium gray sand mixed with clay/ mois 9-34" Clay 34-35" Medium gray sand/ moist 35-36" Clay 36-50" Medium gray sand
	15 to 20	56	N/A		0-2" Fine gray sand/ moist 2-3" Clay 3-20" Medium gray sand/ moist 20-21" Clay 21-30.5" Fine gray sand 30.5-56" Clay
	20 to 25	57.8	N/A		0-32" Fine gray sand/ moist 32-48" Clay with organics 48-57.8" Fine gray sand/ moist
	25 to 30	52	N/A		0-41" Fine gray sand/ moist 41-52" Coarse gray sand/pebbles
	30 to 35	57.5	N/A		0-4" Clay 4-21" Medium gray sand/ moist 21-42" Fine gray sand/ moist 42-55" Coarse gray sand/ moist 55-57.5" Fine gray sand/ moist
	35 to 40	56.3	N/A		0-19" Fine gray sand/ moist 19-35" Clay 35-39.5" Coarse gray sand/ moist 39.5-56.5" Clay

Geologic Boring Log Details

Cluster #3

Location: See attached plan		Depth to Water (ft. from grade.)		Site Elevation Datum
Project Name: 34-11 Beach Channel Drive	Address: 34-11 Beach Channel Drive, Far Rockaway, NY 11691	Date	DTW	Ground Elevation
Drilling Company: Costal Environmental	Method: Geoprobe			Well Specifications
Date Started: 6/17/2024	Date Completed: 6/17/2024	Groundwater depth		None
Completion Depth: 40'	Field Personnel: Ahmed Elbadri			

3D (NTS)	DEPTH (ft below grade)	SAMPLES Reco-very (in.)	Blow per 6 in.	PID (ppm)	SOIL DESCRIPTION
	0 to 5	15.5	N/A		0-7" Concrete 7-15.5 Medium brown sand/ some gravel
	5 to 10	35.5	N/A		0-9" Fine gray sand/ moist 9-12" Clay 12-19 Medium gray sand/ moist 19-23" Clay with organics 23-35.5" Clay
	10 to 15	57.7	N/A		0-5" Fine gray sand/ moist 5-15" Clay with organics 15-24" Fine gray sand/ moist 24-57.7" Medium gray sand/ moist
	15 to 20	57.6	N/A		0-47" Medium gray sand/ moist 47-57.6" Clay with organics
	20 to 25	57.6	N/A		0-15" Medium gray sand/ moist 15-21" Clay with orgamics 21-36" Medium gray sand/ moist 36-57.6" Coarse brown sand/ moist
	25 to 30	55.5	N/A		0-11" Medium gray sand/ moist 11-55.5" Coarse gray sand/ moist
	30 to 35	57.6	N/A		0-4" Medium gray sand with little clay/ moist 4-47" Coarse gray sand/ moist 47-57.6" Fine brown sand/ moist
	35 to 40	56.5	N/A		0-41" Coarse gray sand/ moist 41-52" Fine gray sand/ moist 52-56.6" Clay

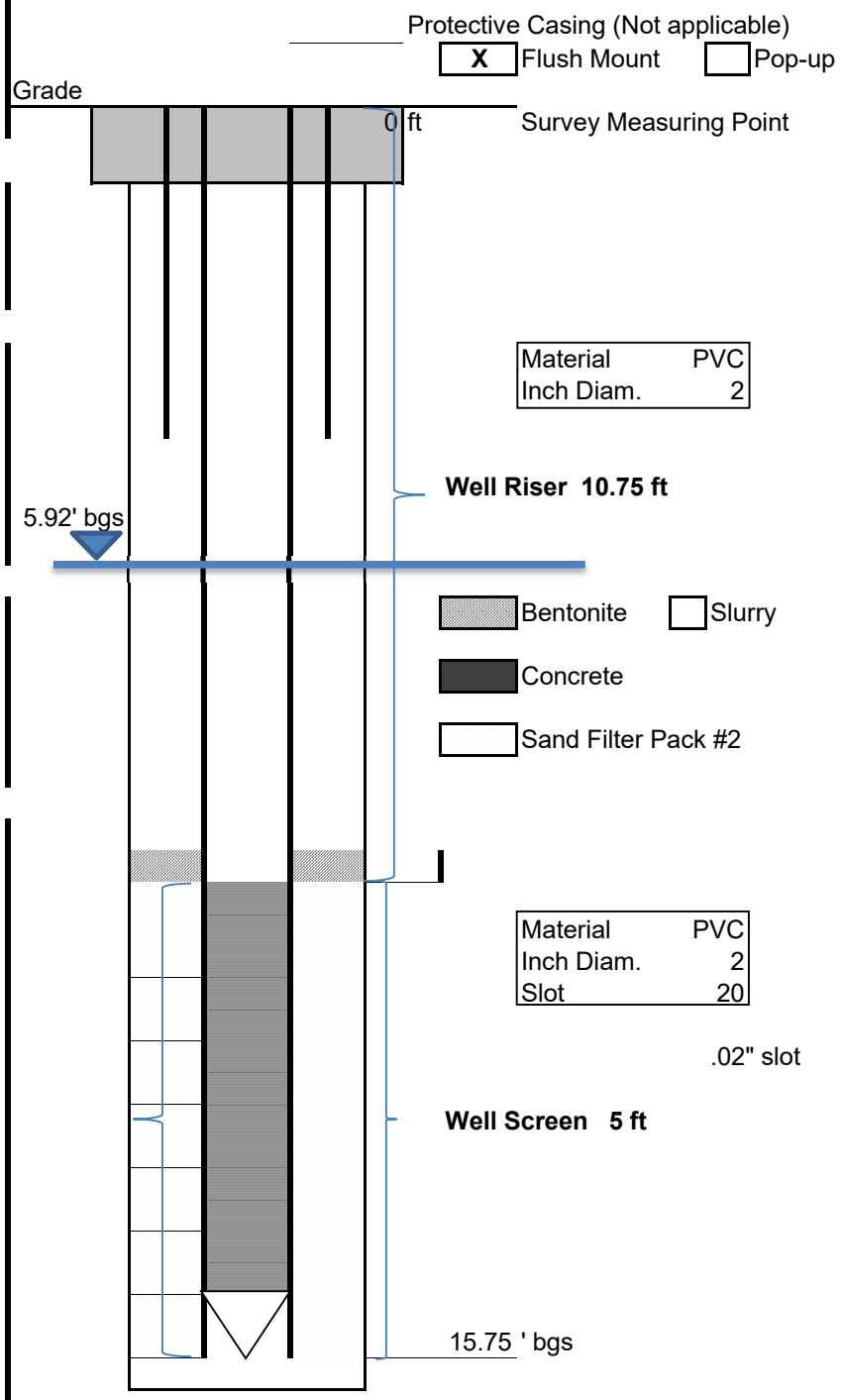
APPENDIX B

MONITORING WELL CONSTRUCTION LOGS

GROUNDWATER MONITORING WELL

AMC Engineering PLLC

CONSTRUCTION LOG MW24-1S



Note: Drawing is not to scale.
Depths are given in feet below land surface.

Monitoring Well No.: 24MW-1S

NYSDEC Permit No. BCP # C241141

Project Name/Location: 34-11 Beach Channel Drive
Queens, NY

Well Location: See attached plan

Depth to Groundwater: 5.92' Date: 10/30/2024
As measured from top of casing

Installation Depth: 15.75' bgs

Survey Point Elevation:

Installation Date: 10/30/2024

Drilling Contractor: Coastal Environmental

Installation Method: Drill Rig (Sonic Rig)

Engineer Ariel Czemerinski, PE

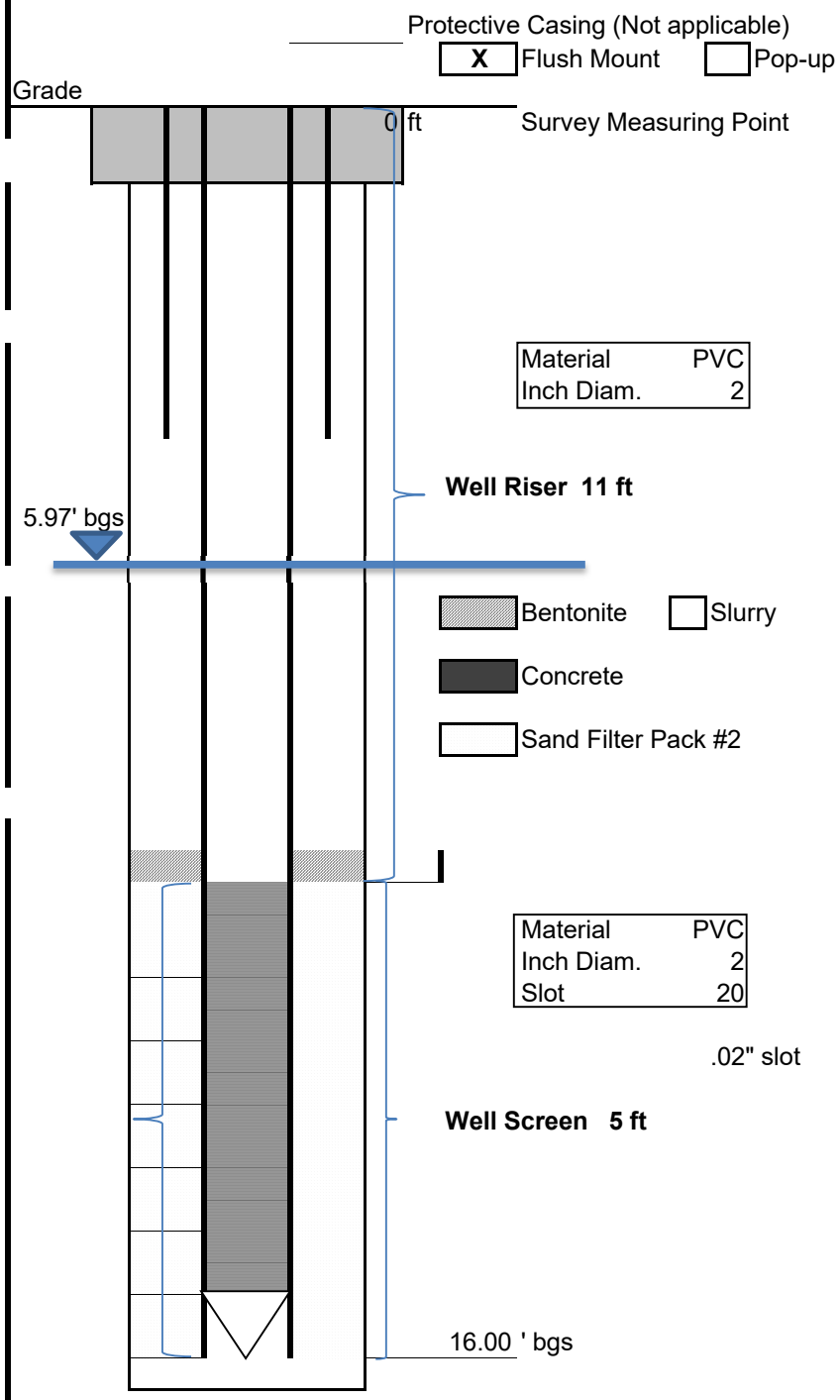
Company Name: AMC Engineering PLLC

Soil Characteristics Not surveyed

GROUNDWATER MONITORING WELL

AMC Engineering PLLC

CONSTRUCTION LOG MW24-2S



Note: Drawing is not to scale.
Depths are given in feet below land surface.

Monitoring Well No.: 24MW-2S

NYSDEC Permit No. BCP # C241141

Project Name/Location: 34-11 Beach Channel Drive
Queens, NY

Well Location: See attached plan

Depth to Groundwater: 5.97' Date: 10/30/2024
As measured from top of casing

Installation Depth: 16' bgs

Survey Point Elevation:

Installation Date: 10/30/2024

Drilling Contractor: Coastal Environmental

Installation Method: Drill Rig (Sonic Rig)

Engineer Ariel Czemerinski, PE

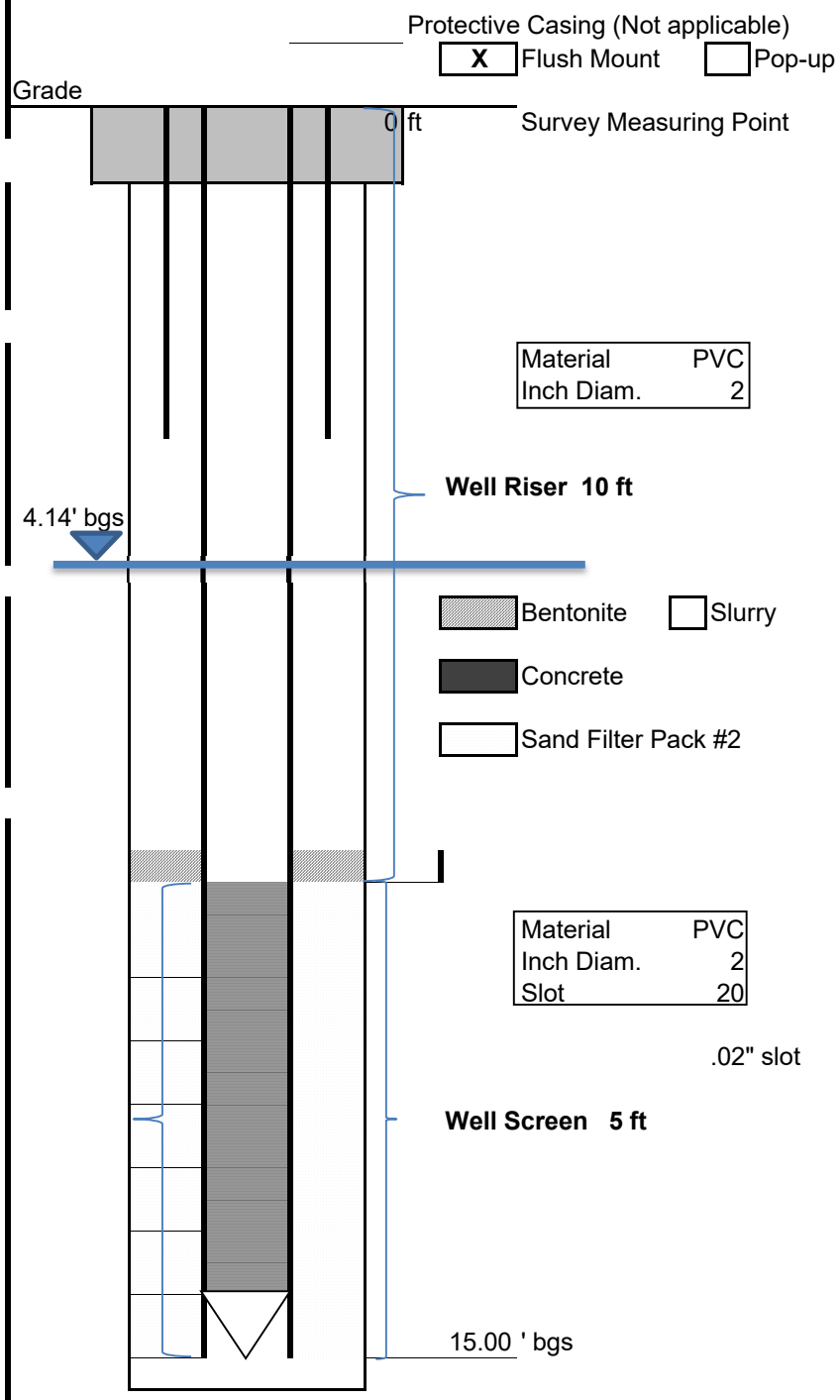
Company Name: AMC Engineering PLLC

Soil Characteristics Not surveyed

GROUNDWATER MONITORING WELL

AMC Engineering PLLC

CONSTRUCTION LOG MW24-3S



Note: Drawing is not to scale.
Depths are given in feet below land surface.

Monitoring Well No.: 24MW-3S

NYSDEC Permit No. BCP # C241141

Project Name/Location: 34-11 Beach Channel Drive
Queens, NY

Well Location: See attached plan

Depth to Groundwater: 4.14' Date: 10/31/2024
As measured from top of casing

Installation Depth: 15' bgs

Survey Point Elevation:

Installation Date: 10/31/2024

Drilling Contractor: Coastal Environmental

Installation Method: Drill Rig (Sonic Rig)

Engineer Ariel Czemerinski, PE

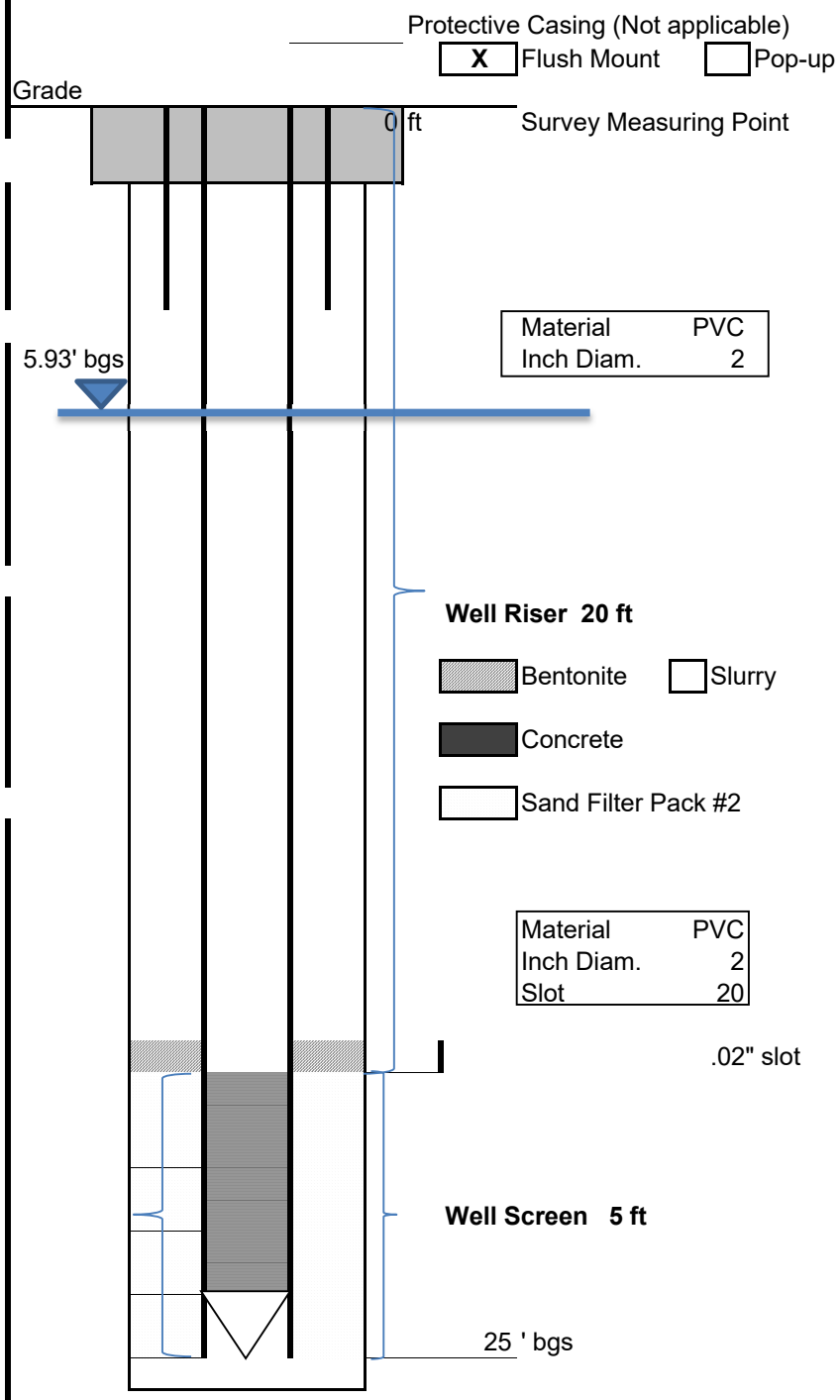
Company Name: AMC Engineering PLLC

Soil Characteristics Not surveyed

GROUNDWATER MONITORING WELL

AMC Engineering PLLC

CONSTRUCTION LOG MW24-1I



Note: Drawing is not to scale.
Depths are given in feet below land surface.

Monitoring Well No.: 24MW-1I

NYSDEC Permit No. BCP # C241141

Project Name/Location: 34-11 Beach Channel Drive
Queens, NY

Well Location: See attached plan

Depth to Groundwater: 5.93' Date: 10/30/2024
As measured from top of casing
Installation Depth: 25' bgs

Survey Point Elevation:

Installation Date: 10/30/2024

Drilling Contractor: Coastal Environmental

Installation Method: Drill Rig (Sonic Rig)

Engineer Ariel Czemerinski, PE

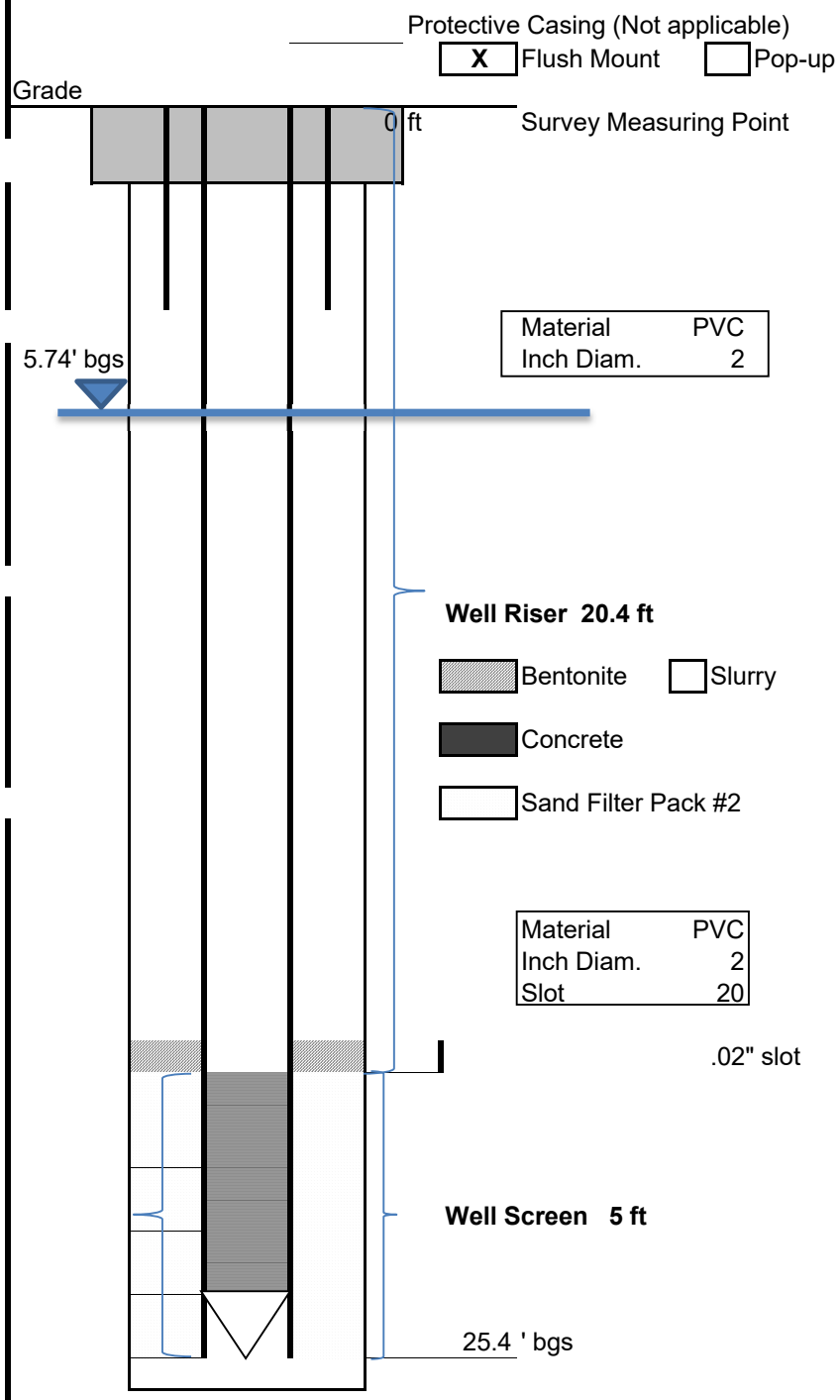
Company Name: AMC Engineering PLLC

Soil Characteristics Not surveyed

GROUNDWATER MONITORING WELL

AMC Engineering PLLC

CONSTRUCTION LOG MW24-2I



Note: Drawing is not to scale.
Depths are given in feet below land surface.

Monitoring Well No.: 24MW-2I

NYSDEC Permit No. BCP # C241141

Project Name/Location: 34-11 Beach Channel Drive
Queens, NY

Well Location: See attached plan

Depth to Groundwater: 5.74' Date: 10/30/2024
As measured from top of casing
Installation Depth: 25.4' bgs

Survey Point Elevation:

Installation Date: 10/30/2024

Drilling Contractor: Coastal Environmental

Installation Method: Drill Rig (Sonic Rig)

Engineer Ariel Czemerinski, PE

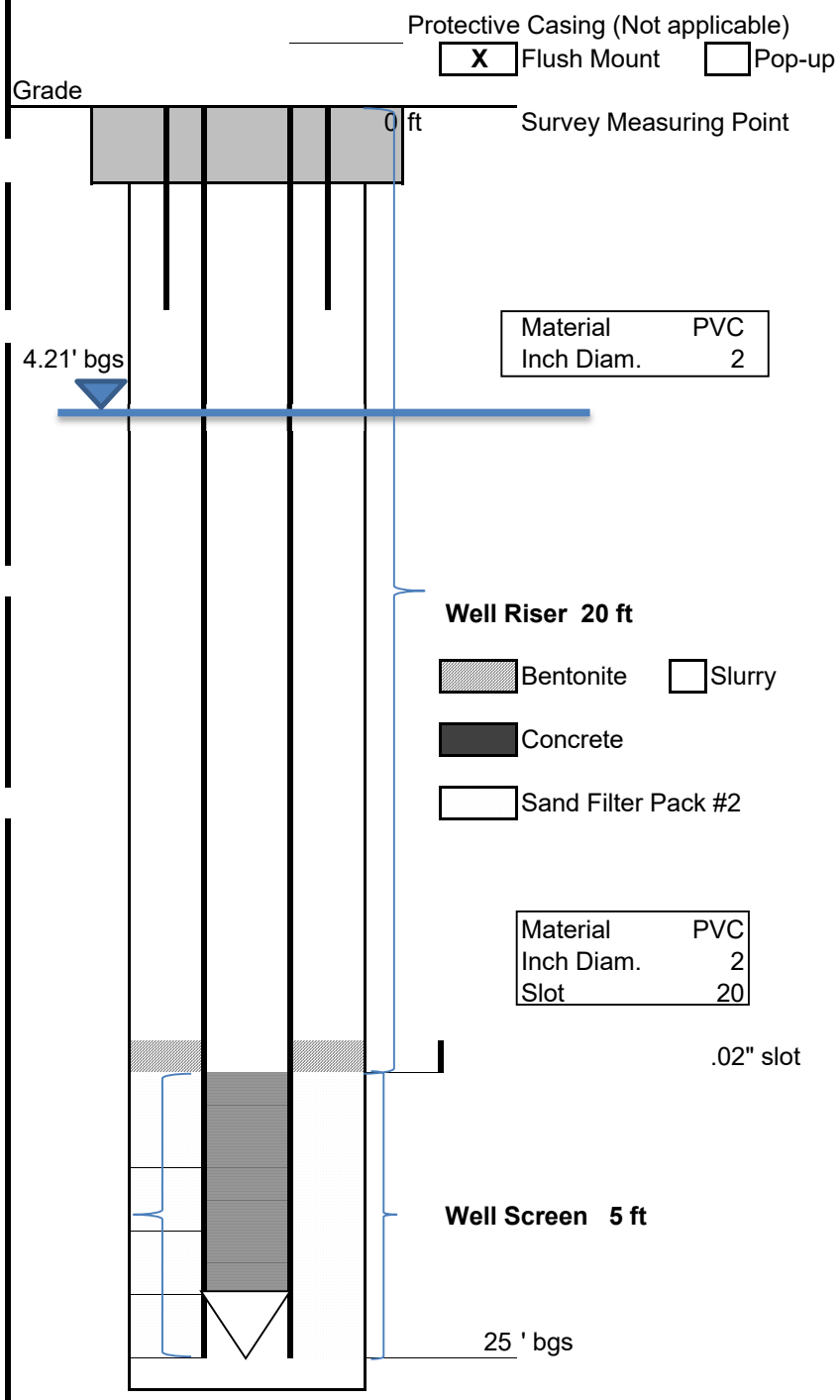
Company Name: AMC Engineering PLLC

Soil Characteristics Not surveyed

GROUNDWATER MONITORING WELL

AMC Engineering PLLC

CONSTRUCTION LOG MW24-3I



Note: Drawing is not to scale.
Depths are given in feet below land surface.

Monitoring Well No.: 24MW-3I

NYSDEC Permit No. BCP # C241141

Project Name/Location: 34-11 Beach Channel Drive
Queens, NY

Well Location: See attached plan

Depth to Groundwater: 4.21' Date: 10/31/2024
As measured from top of casing
Installation Depth: 25' bgs

Survey Point Elevation:

Installation Date: 10/31/2024

Drilling Contractor: Coastal Environmental

Installation Method: Drill Rig (Sonic Rig)

Engineer Ariel Czemerinski, PE

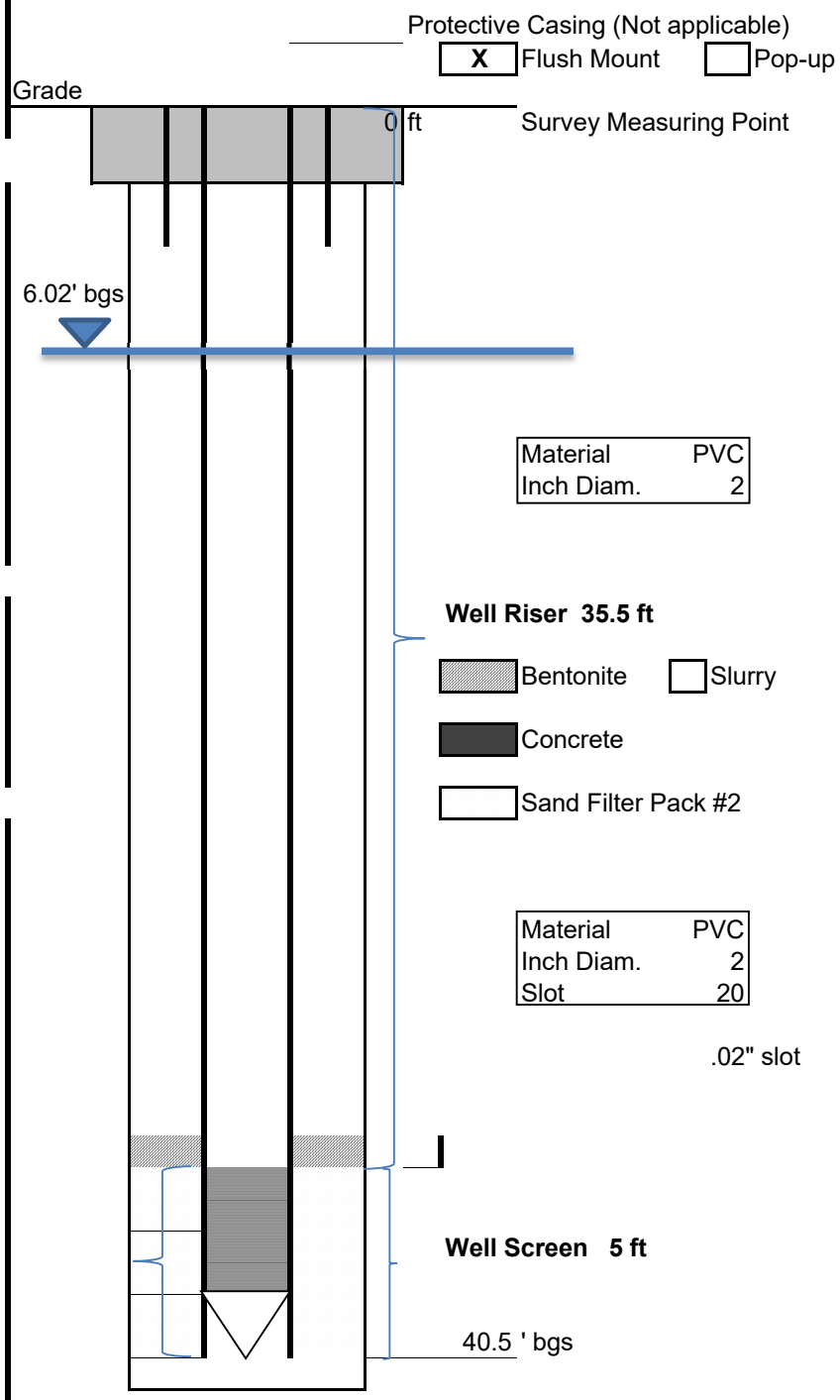
Company Name: AMC Engineering PLLC

Soil Characteristics Not surveyed

GROUNDWATER MONITORING WELL

AMC Engineering PLLC

CONSTRUCTION LOG MW24-1D



Note: Drawing is not to scale.
Depths are given in feet below land surface.

Monitoring Well No.: 24MW-1D

NYSDEC Permit No. BCP # C241141

Project Name/Location: 34-11 Beach Channel Drive
Queens, NY

Well Location: See attached plan

Depth to Groundwater: 6.02' Date: 10/30/2024
As measured from top of casing
Installation Depth: 40.5' bgs

Survey Point Elevation:

Installation Date: 10/30/2024

Drilling Contractor: Coastal Environmental

Installation Method: Drill Rig (Sonic Rig)

Engineer Ariel Czemerinski, PE

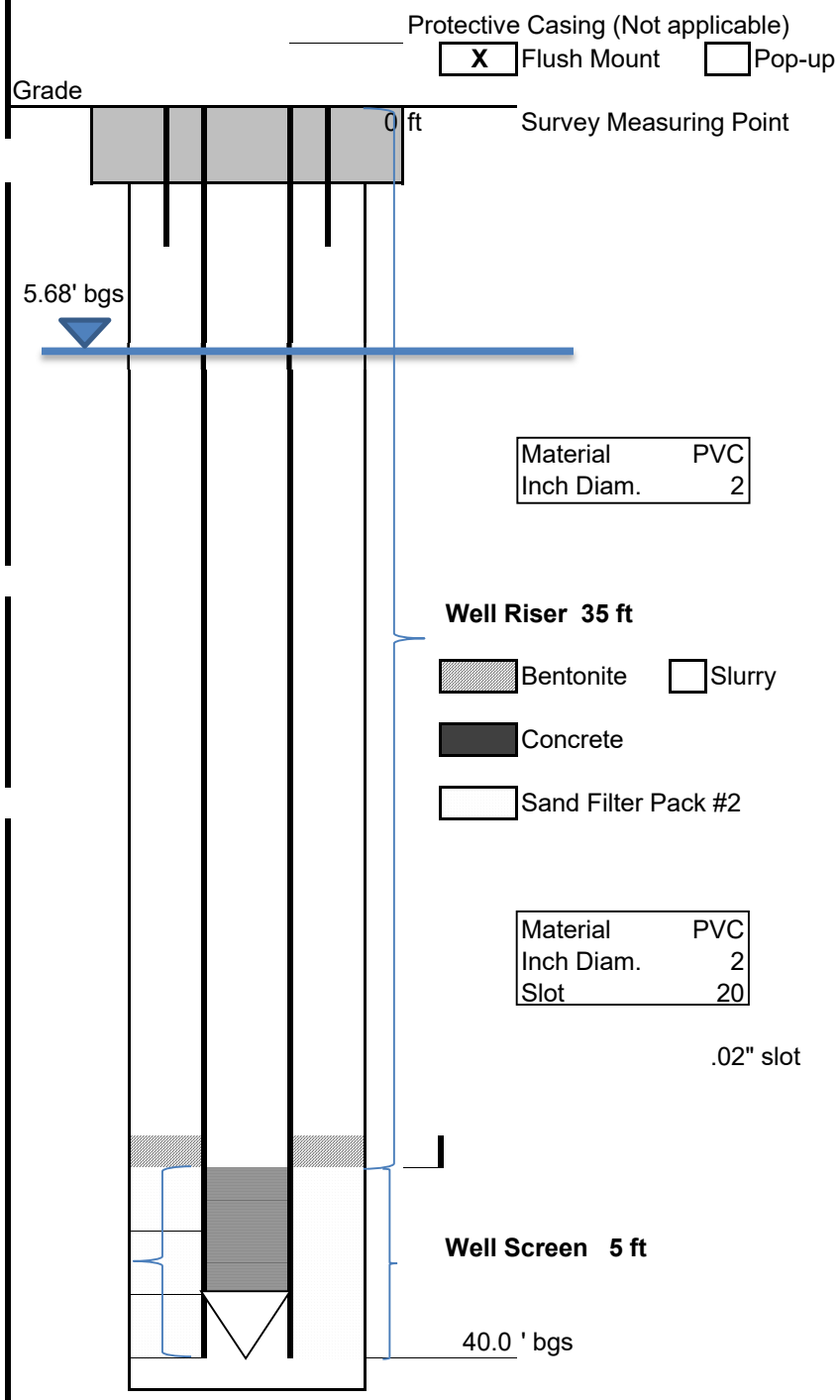
Company Name: AMC Engineering PLLC

Soil Characteristics Not surveyed

GROUNDWATER MONITORING WELL

AMC Engineering PLLC

CONSTRUCTION LOG MW24-2D



Note: Drawing is not to scale.
Depths are given in feet below land surface.

Monitoring Well No.: 24MW-2D

NYSDEC Permit No. BCP # C241141

Project Name/Location: 34-11 Beach Channel Drive
Queens, NY

Well Location: See attached plan

Depth to Groundwater: 5.68' Date: 10/30/2024
As measured from top of casing
Installation Depth: 40' bgs

Survey Point Elevation:

Installation Date: 10/30/2024

Drilling Contractor: Coastal Environmental

Installation Method: Drill Rig (Sonic Rig)

Engineer Ariel Czemerinski, PE

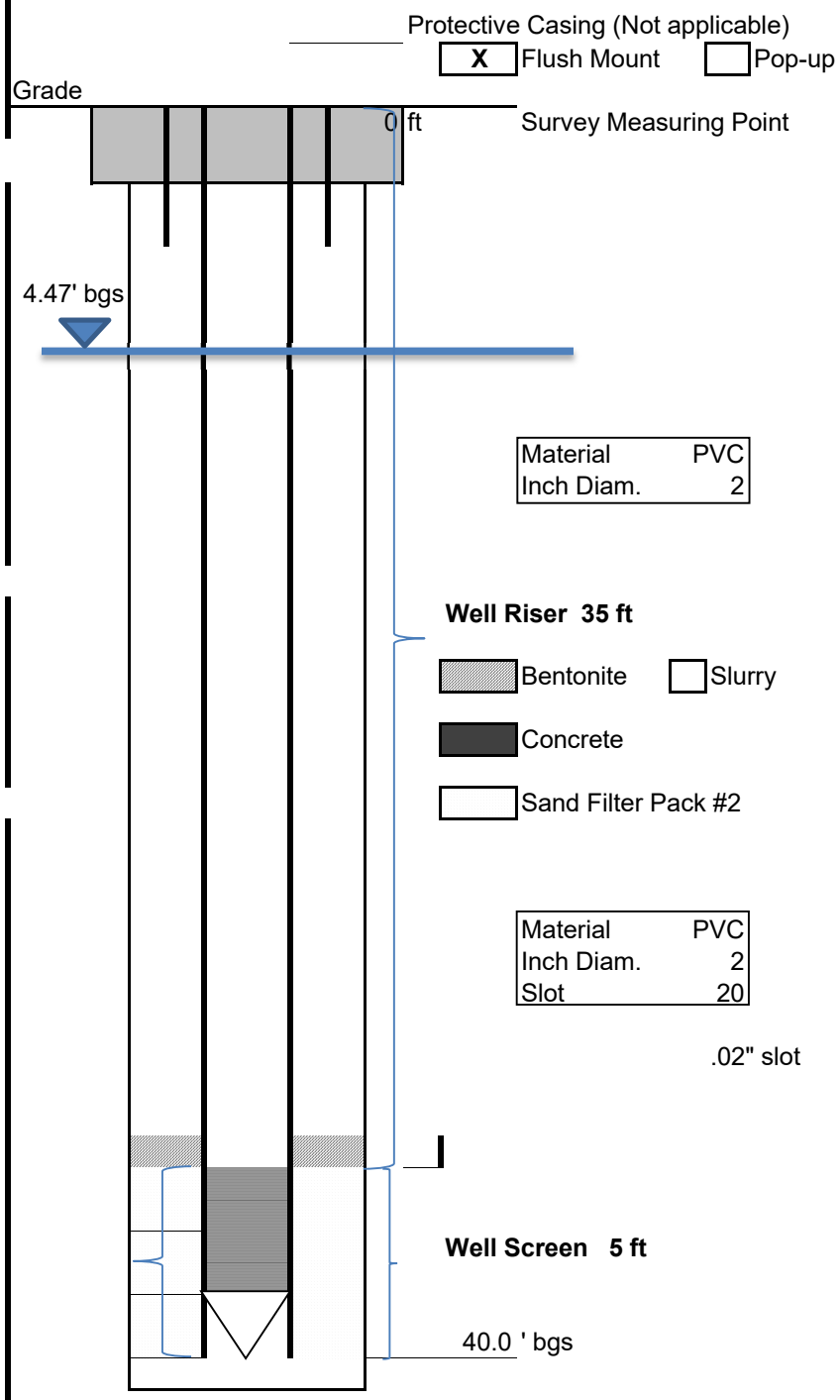
Company Name: AMC Engineering PLLC

Soil Characteristics Not surveyed

GROUNDWATER MONITORING WELL

AMC Engineering PLLC

CONSTRUCTION LOG MW24-3D



Note: Drawing is not to scale.
Depths are given in feet below land surface.

Monitoring Well No.: 24MW-3D

NYSDEC Permit No. BCP # C241141

Project Name/Location: 34-11 Beach Channel Drive
Queens, NY

Well Location: See attached plan

Depth to Groundwater: 4.47' Date: 10/31/2024
As measured from top of casing
Installation Depth: 40' bgs

Survey Point Elevation:

Installation Date: 10/31/2024

Drilling Contractor: Coastal Environmental

Installation Method: Drill Rig (Sonic Rig)

Engineer Ariel Czemerinski, PE

Company Name: AMC Engineering PLLC

Soil Characteristics Not surveyed

APPENDIX C

GROUNDWATER PURGE LOGS

GROUNDWATER PURGE / SAMPLE LOGS

AMC Engineering PLLC

34-11 Beach Channel Drive, Queens

Well I.D.: 24MW-1S

Date: 11/22/2024

Well Depth (from TOC): 16

Equipment: Peristaltic pump, horiba

Static Water Level (from TOC): 5.92

Height of Water in Well: 10.08

Gallons of Water per Well Volume: 1.68

Flow Rate: 250 ml/min

Time	Pump Rate	Gal. Removed	pH	Cond. (mS/cm)	Temp. (deg. C)	DO (mg/L)	ORP (mV)	Turbidity (NTU)	TDS	Comments
10:10 AM	0.07 gal/min	0.07	8.11	4.17	14.76	2.8	355	162	2.67	
10:15 AM	0.07 gal/min	0.3500	8.02	4.06	14.94	1.92	317	147	2.60	
10:20 AM	0.07 gal/min	0.7000	8.01	3.96	15.46	1.41	276	138	2.54	
10:25 AM	0.07 gal/min	1.0500	8.00	3.99	15.49	1.10	245	126	2.55	
10:30 AM	0.07 gal/min	1.4000	7.99	3.99	15.54	0.98	219	121	2.56	
10:35 AM	0.07 gal/min	1.7500	7.99	3.96	15.81	0.86	184	111	2.53	

Note 250 ml = 0.07 gallons

GROUNDWATER PURGE / SAMPLE LOGS

AMC Engineering PLLC

34-11 Beach Channel Drive, Queens

Well I.D.: 24MW-1I

Date: 11/22/2024

Well Depth (from TOC): 25

Equipment: Peristaltic pump, horiba

Static Water Level (from TOC): 5.93

Height of Water in Well: 19.07

Gallons of Water per Well Volume: 3.18

Flow Rate: 250 ml/min

Time	Pump Rate	Gal. Removed	pH	Cond. (mS/cm)	Temp. (deg. C)	DO (mg/L)	ORP (mV)	Turbidity (NTU)	TDS	Comments
11:30 AM	0.07 gal/min	0.07	8.49	8.66	14.06	4.72	-63	515	5.46	
11:35 AM	0.07 gal/min	0.3500	8.15	8.62	14.66	1.59	-79	401	5.43	
11:40 AM	0.07 gal/min	0.7000	8.11	8.71	14.61	1.15	-90	332	5.49	
11:45 AM	0.07 gal/min	1.0500	8.10	8.69	14.67	0.89	-100	295	5.47	
11:50 AM	0.07 gal/min	1.4000	8.10	8.60	14.85	0.94	-109	244	5.42	
11:55 AM	0.07 gal/min	1.7500	8.10	8.48	15.0	0.79	-115	143	5.35	
12:00 PM	0.07 gal/min	2.1000	8.10	8.51	14.95	0.95	-123	144	5.36	

Note 250 ml = 0.07 gallons

GROUNDWATER PURGE / SAMPLE LOGS

AMC Engineering PLLC

34-11 Beach Channel Drive, Queens

Well I.D.: 24MW-1D

Date: 11/22/2024

Well Depth (from TOC): 40

Equipment: Peristaltic pump, horiba

Static Water Level (from TOC): 6.02

Height of Water in Well: 33.98

Gallons of Water per Well Volume: 5.66

Flow Rate: 250 ml/min

Time	Pump Rate	Gal. Removed	pH	Cond. (mS/cm)	Temp. (deg. C)	DO (mg/L)	ORP (mV)	Turbidity (NTU)	TDS	Comments
10:55 AM	0.07 gal/min	0.07	8.72	5.46	13.12	1.59	52	151	3.44	
11:00 AM	0.07 gal/min	0.3500	8.9	5.09	13.47	1.11	5	120	3.21	
11:05 AM	0.07 gal/min	0.7000	8.94	4.94	14.01	0.95	-44	102	3.16	
11:10 AM	0.07 gal/min	1.0500	9	4.60	14	0.95	-88	92.9	2.94	
11:15 AM	0.07 gal/min	1.4000	9.01	4.48	14.23	0.82	-127	85.1	2.87	
11:20 AM	0.07 gal/min	1.7500	9.01	4.47	14.18	0.78	-154	78	2.86	

Note 250 ml = 0.07 gallons

APPENDIX D

PRE-INJECTION RESULTS (from FER)

34-11 Beach Channel Drive Site
34-11 Beach Channel Drive, Far Rockaway, NY

Table 14
Performance Groundwater Analytical Sample Results
Volatile Organic Compounds (VOCs)

ANALYTES	PRE-INJECTION						POST-INJECTION											
	12/18/2015		12/18/2015		12/18/2015		8/5/2016		8/5/2016		8/5/2016		9/20/2016		9/20/2016		9/20/2016	
	15MW1		15MW2		15MW3		15 MW 1		15 MW 2		15 MW 3		15 MW 1		15 MW 2		15 MW 3	
	Result	RL	Result	RL	Result	RL	Result	RL	Result	RL	Result	RL	Result	RL	Result	RL	Result	RL
1,1,1,2-Tetrachloroethane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,1,1-Trichloroethane	ND	100	ND	100	ND	25	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0
1,1,2,2-Tetrachloroethane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,1,2-Trichloroethane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,1-Dichloroethane	ND	100	ND	100	ND	25	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0
1,1-Dichloroethene	8.2	20	ND	20	ND	5.0	1.1	1.0	ND	1.0	ND	1.0	0.78	1.0	ND	1.0	ND	1.0
1,1-Dichloropropene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,2,3-Trichlorobenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,2,3-Trichloropropane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,2,4-Trichlorobenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,2,4-Trimethylbenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,2-Dibromo-3-chloropropane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,2-Dibromoethane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,2-Dichlorobenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,2-Dichloroethane	ND	12	ND	12	ND	3.0	ND	0.60	ND	0.60	ND	0.60	ND	0.60	ND	0.60	ND	0.60
1,2-Dichloropropane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,3,5-Trimethylbenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,3-Dichlorobenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,3-Dichloropropane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
1,4-Dichlorobenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
2,2-Dichloropropane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
2-Chlorotoluene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
2-Hexanone	ND	50	ND	50	ND	13	ND	2.5	ND	2.5	ND	2.5	ND	2.5	ND	2.5	ND	2.5
2-Isopropyltoluene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
4-Chlorotoluene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
4-Methyl-2-pentanone	ND	50	ND	50	ND	13	ND	2.5	ND	2.5	ND	2.5	ND	2.5	ND	2.5	ND	2.5
Acetone	ND	100	ND	100	15	25	3.5	5.0	ND	5.0	ND	5.0	4.3	5.0	ND	5.0	2.7	5.0
Acrolein	ND	100	ND	100	ND	25	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0
Acrylonitrile	ND	100	ND	100	ND	25	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0
Benzene	ND	14	ND	14	7.5	3.5	1.1	0.70	1.1	0.70	0.49	0.70	0.84	0.70	0.8	0.70	0.75	0.70
Bromobenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Bromochloromethane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Bromodichloromethane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Bromoform	ND	100	ND	100	ND	25	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0
Bromomethane	ND	100	ND	100	ND	25	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0
Carbon Disulfide	ND	20	ND	20	2.3	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Carbon tetrachloride	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Chlorobenzene	ND	100	ND	100	ND	25	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0
Chloroethane	ND	100	ND	100	20	25	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0
Chloroform	ND	100	ND	100	ND	25	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0
Chloromethane	ND	100	ND	100	ND	25	ND	5.0	ND	5.0	0.3	5.0	0.74	5.0	ND	5.0	ND	5.0
cis-1,2-Dichloroethene	6,000	400	1,400	20	430	20	300	20	25	1.0	72	10	230	10	18	1.0	24	1.0
cis-1,3-Dichloropropene	ND	8.0	ND	8.0	ND	2.0	ND	0.40	ND	0.40	ND	0.40	ND	0.40	ND	0.40	ND	0.40
Dibromochloromethane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Dibromomethane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Dichlorodifluoromethane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Ethylbenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Hexachlorobutadiene	ND	10	ND	10	ND	2.5	ND	0.50	ND	0.50	ND	0.50	ND	0.50	ND	0.50	ND	0.50
Isopropylbenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
m&p-Xylene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Methyl ethyl ketone	ND	50	ND	50	ND	13	ND	2.5	ND	2.5	ND	2.5	ND	2.5	ND	2.5	ND	2.5
Methyl t-butyl ether (MTBE)	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Methylene chloride	ND	60	ND	60	ND	15	ND	3.0	ND	3.0	ND	3.0	ND	3.0	ND	3.0	ND	3.0
Naphthalene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
n-Butylbenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
n-Propylbenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
o-Xylene	ND	20	ND	20	ND	5.0	ND	1.0	0.86	1.0	ND	1.0	ND	1.0	0.71	1.0	ND	1.0
p-Isopropyltoluene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
sec-Butylbenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Styrene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
tert-Butylbenzene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Tetrachloroethene	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Tetrahydrofuran (THF)	ND	100	ND	100	ND	25	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0	ND	5.0
Toluene	ND	20	ND	20	2.5	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
trans-1,2-Dichloroethene	220	100	14	100	11	25	22	5.0	5.5	5.0	1	5.0	9.7	5.0	4.6	5.0	0.96	5.0
trans-1,3-Dichloropropene	ND	8.0	ND	8.0	ND	2.0	ND	0.40	ND	0.40	ND	0.40	ND	0.40	ND	0.40	ND	0.40
trans-1,4-dichloro-2-butene	ND	50	ND	50	ND	13	ND	2.5	ND	2.5	ND	2.5	ND	2.5	ND	2.5	ND	2.5
Trichloroethene	11	20	14	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	0.3	1.0	ND	1.0	ND	1.0
Trichlorofluoromethane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Trichlorotrifluoroethane	ND	20	ND	20	ND	5.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0	ND	1.0
Vinyl chloride	4,900	400	570	20	150	20	420	20	240	20	49	10	130	10	160	10	18	1.0

Highlighted - indicated values above non-detect levels

APPENDIX E

DAILY STATUS REPORTS

DAILY STATUS REPORT

Prepared By: Ahmed Elbadri

WEATHER	Snow		Rain		Overcast		Partly Cloudy		Bright Sun	X
TEMP.	< 32		32-50		50-70		70-85	X	>85	

Project Name:	34-11 Beach Channel Drive	Date:	**6/17/2024**

Consultant:	Safety Officer:
AMC Engineering, PLLC	**Ahmed Elbadri (AMC)**
General Contractor:	Site Manager/ Supervisor:
Arker Companies	**Howard (Super)**

Work Activities Performed:

Mobilized onsite to begin well cluster installation, as per NYSDEC approved corrective measures work plan. Coastal Environmental was onsite to perform drilling operations. A large Geoprobe (7822DT) was used to advance one soil boring to 40 ft in each cluster location. Soil borings were characterized to determine the final depths for each well depending on the intermediate and deep clay layers.

Samples Collected:

None.

Problems Encountered:

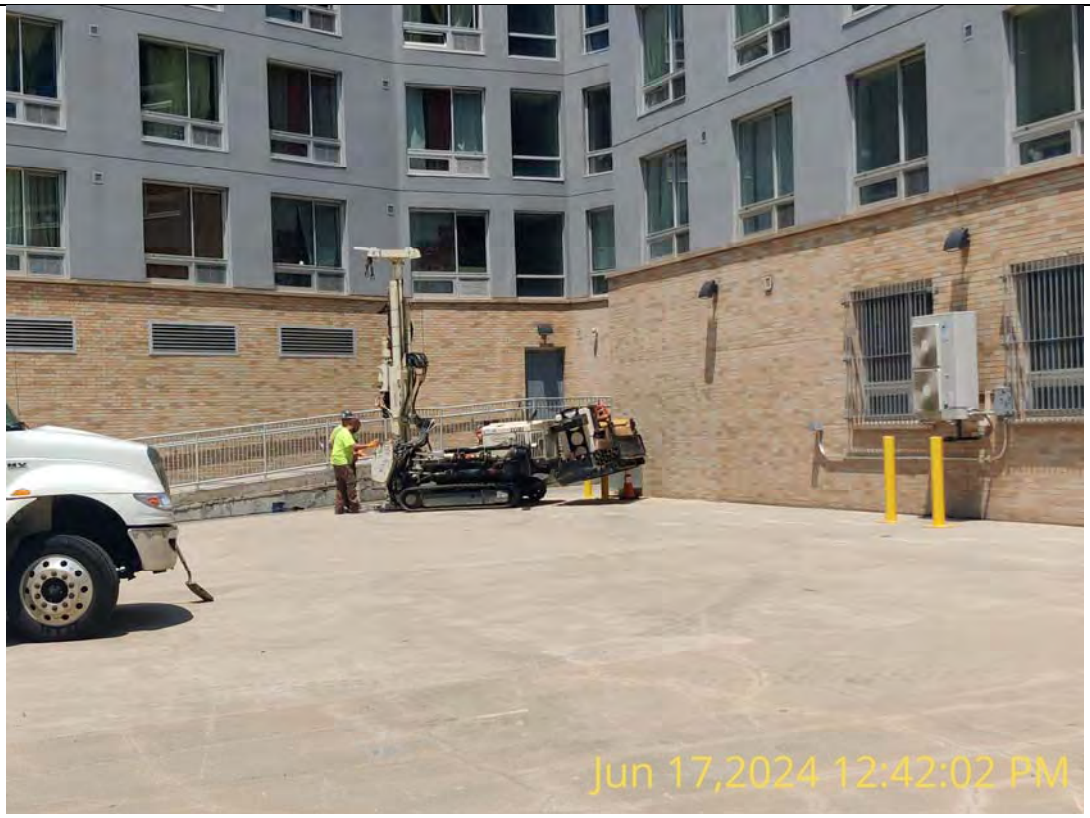
None.

Planned Field Activities for the Next Day/ Week:

Begin cluster well installation.

Photo Log

Photo 1 – Geoprobe Drilling to retrieve soil borings to 40ft Cluster location 24MW-1	
Photo 2 – Soil boring characterization At 24MW-3D	

Photo 3 – Soil boring retrieval at cluster location 24MW-2	

DAILY STATUS REPORT

Prepared By: Ahmed Elbadri

WEATHER	Snow		Rain		Overcast		Partly Cloudy		Bright Sun	X
TEMP.	< 32		32-50		50-70		70-85	X	>85	

Project Name:	34-11 Beach Channel Drive	Date:	**6/18/2024**

Consultant: **AMC Engineering, PLLC**	Safety Officer: **Ahmed Elbadri (AMC)**
General Contractor: **Arker Companies**	Site Manager/ Supervisor: **Howard (Super)**

Work Activities Performed:

Mobilized onsite to continue well cluster installation, as per NYSDEC approved corrective measures work plan. Coastal Environmental was onsite to perform drilling operations. A large Geoprobe (7822DT) was to be used to install the cluster wells. A core drill was used to create 12" openings in the concrete. GPR was used to create utility markups.

Samples Collected:

None.

Problems Encountered:

The concrete slap was 16" thick, thus core drilling took a large amount of time. No wells were installed yet.

Planned Field Activities for the Next Day/ Week:

Begin cluster well installation.

Photo Log

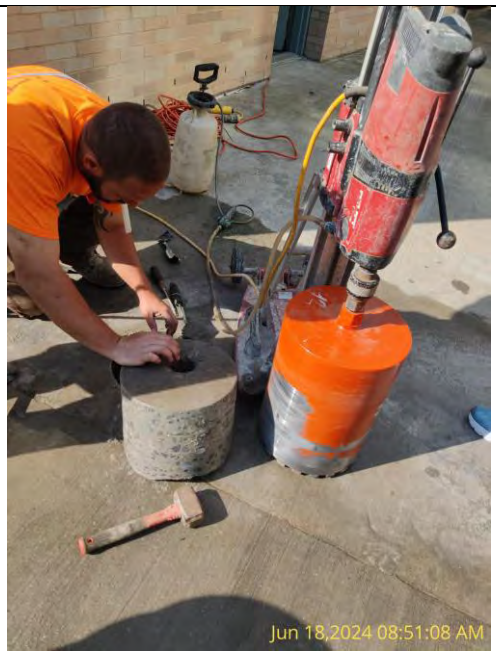
Photo 1 – Core drilling	
Photo 2 – Thickness of slab	

Photo 3 – GPR markups	

DAILY STATUS REPORT

Prepared By: Ahmed Elbadri

WEATHER	Snow		Rain		Overcast		Partly Cloudy		Bright Sun	X
TEMP.	< 32		32-50		50-70		70-85	X	>85	

Project Name:	34-11 Beach Channel Drive	Date:	**6/20/2024**

Consultant: **AMC Engineering, PLLC**	Safety Officer: **Ahmed Elbadri (AMC)**
General Contractor: **Arker Companies**	Site Manager/ Supervisor: **Howard (Super)**

Work Activities Performed:

Mobilized onsite to continue well cluster installation, as per NYSDEC approved corrective measures work plan. Coastal Environmental was onsite to perform drilling operations. A core drill was to be used to create 12" openings in the concrete. Used the geoprobe to break the concrete to examine the cause of the core drill being stuck.

Samples Collected:

None.

Problems Encountered:

The core drill could not bypass an additional rebar layer which was not represented on the blueprint

Planned Field Activities for the Next Day/ Week:

Halt field operations to further evaluate the site.

Photo Log

Photo 1 – Breaking the concrete	
Photo 2 – Rebar layer	

DAILY STATUS REPORT

Prepared By: Ahmed Elbadri

WEATHER	Snow		Rain		Overcast		Partly Cloudy		Bright Sun	X
TEMP.	< 32		32-50		50-70		70-85	X	>85	

Project Name:	34-11 Beach Channel Drive	Date:	**9/16/2024**

Consultant:	Safety Officer:
AMC Engineering, PLLC	**Ahmed Elbadri (AMC)**
General Contractor:	Site Manager/ Supervisor:
Arker Companies	**Howard (Super)**

Work Activities Performed:

Mobilized onsite to continue well cluster installation, as per NYSDEC's updated and approved corrective measures work plan. Coastal Environmental was onsite to perform drilling operations. A Sonic drill rig (Fraste/ CRS xL 140 Duo) was to be used to install the cluster wells.

Samples Collected:

None.

Problems Encountered:

The slab was thicker than expected in the newly marked locations. The sonic drill rig could not penetrate the slab and coastal determined that core drilling was needed.

Planned Field Activities for the Next Day/ Week:

Oversee coring activities.

Photo Log

Photo 1 – Sonic drill rig	

Photo 2 – Newly marked locations for Cluster 24MW-3	

DAILY STATUS REPORT

Prepared By: Ahmed Elbadri

WEATHER	Snow		Rain		Overcast		Partly Cloudy		Bright Sun	X
TEMP.	< 32		32-50		50-70	X	70-85		>85	

Project Name:	34-11 Beach Channel Drive	Date:	**10/7/2024**

Consultant:	Safety Officer:
AMC Engineering, PLLC	**Ahmed Elbadri (AMC)**
General Contractor:	Site Manager/ Supervisor:
Arker Companies	**Howard (Super)**

Work Activities Performed:

Mobilized onsite to continue well cluster installation, as per NYSDEC's updated and approved corrective measures work plan. Americore was onsite to perform core drilling operations. Three holes were drilled at 24MW-3 and two holes were drilled at 24MW-2.

Samples Collected:

None.

Problems Encountered:

Could not break the core at 24MW-2S.

Planned Field Activities for the Next Day/ Week:

Continue core drilling activities.

Photo Log

Photo 1 – Americore performing core drilling at location 24MW-3I	
Photo 2 – Thickness of slab at 24MW-3I = 33” (left) 24MW-3S = 12” (right)	

Photo 3 – **Drilled holes at location 24MW-2D and 24MW-2I but could not break and retrieve the core at the third location 24MW-2S**	

DAILY STATUS REPORT

Prepared By: Ahmed Elbadri

WEATHER	Snow		Rain		Overcast		Partly Cloudy		Bright Sun	X
TEMP.	< 32		32-50		50-70	X	70-85		>85	

Project Name:	34-11 Beach Channel Drive	Date:	**10/8/2024**

Consultant: **AMC Engineering, PLLC**	Safety Officer: **Ahmed Elbadri (AMC)**
General Contractor: **Arker Companies**	Site Manager/ Supervisor: **Howard (Super)**

Work Activities Performed:

Mobilized onsite to continue well cluster installation, as per NYSDEC's updated and approved corrective measures work plan. Americore was onsite to perform core drilling operations. One hole was drilled at 24MW-2 and three holes were attempted but not completed.

Samples Collected:

None.

Problems Encountered:

Could not break the core at 24MW-2S and therefore the location of the hole was moved between two already drilled holes. At 24MW-1, the core bit got stuck in the concrete and the concrete could not be penetrated at 27' deep. The attempted holes at this location could not be completed.

Planned Field Activities for the Next Day/ Week:

Continue core drilling activities.

Photo Log

Photo 1 – Americore performing core drilling at location 24MW-2S	
Photo 2 – Could not break through 24MW-2S due to upward facing rebar so the location was moved	

Photo 3 – **At 24MW-1, the core bit got stuck in the concrete and the concrete could not be penetrated at 27' deep.**	

DAILY STATUS REPORT

Prepared By: Ahmed Elbadri

WEATHER	Snow		Rain		Overcast		Partly Cloudy		Bright Sun	X
TEMP.	< 32		32-50		50-70	X	70-85		>85	

Project Name:	34-11 Beach Channel Drive	Date:	**10/10/2024**

Consultant: **AMC Engineering, PLLC**	Safety Officer: **Ahmed Elbadri (AMC)**
General Contractor: **Arker Companies**	Site Manager/ Supervisor: **Howard (Super)**

Work Activities Performed:

Mobilized onsite to continue well cluster installation, as per NYSDEC's updated and approved corrective measures work plan. Americore was onsite to perform core drilling operations. Retrieved the stuck core bit from the ground and moved 5 ft away from the original locations of cluster 24MW-1 to drill three holes.

Samples Collected:

None.

Problems Encountered:

Experienced power issues with the drill.

Planned Field Activities for the Next Day/ Week:

Continue well installation when scheduled.

Photo Log

Photo 1 – Americore removed the stuck core bit but could not continue with the same hole, so the new hole was moved 5ft away.	
Photo 2 – The three newly drilled holes at 24MW-1	

DAILY STATUS REPORT

Prepared By: Ahmed Elbadri

WEATHER	Snow		Rain		Overcast		Partly Cloudy		Bright Sun	X
TEMP.	< 32		32-50		50-70	X	70-85		>85	

Project Name:	34-11 Beach Channel Drive	Date:	**10/30/2024**

Consultant: **AMC Engineering, PLLC**	Safety Officer: **Ahmed Elbadri (AMC)**
General Contractor: **Arker Companies**	Site Manager/ Supervisor: **Howard (Super)** **Patrick (Coastal)** **Paul (Coastal)**
Work Activities Performed: **Mobilized onsite to continue well cluster installation, as per NYSDEC's updated and approved corrective measures work plan. Coastal Environmental was onsite to install the cluster wells. A Sonic drill rig (Fraste/CRS xL 140 Duo) was used for drilling.**	

Samples Collected: **None.**
Problems Encountered: **None.**
Planned Field Activities for the Next Day/ Week: **Continue well installation and abandon the old monitoring wells on site.**

Photo Log

Photo 1 – Site overview	
Photo 2 – Installation of 24MW-2S Via Sonic drill	

Photo 3 – Completed the installation of 24MW-2S, 24MW-2I, and 24MW-2D	
24MW-1S, 24MW-1I, and 24MW-1D	

DAILY STATUS REPORT

Prepared By: Ahmed Elbadri

WEATHER	Snow		Rain		Overcast		Partly Cloudy		Bright Sun	X
TEMP.	< 32		32-50		50-70	X	70-85		>85	

Project Name:	34-11 Beach Channel Drive	Date:	**10/31/2024**

Consultant:	Safety Officer:
AMC Engineering, PLLC	**Ahmed Elbadri (AMC)**
General Contractor:	Site Manager/ Supervisor:
Arker Companies	**Howard (Super)** **Patrick (Coastal)** **Paul (Coastal)**

Work Activities Performed:

Mobilized onsite to continue well cluster installation, as per NYSDEC's updated and approved corrective measures work plan. Coastal Environmental was onsite to install the cluster wells and abandon the three old monitoring wells on site. A Sonic drill rig (Fraste/CRS xL 140 Duo) was used for drilling.

Samples Collected:

None.

Problems Encountered:

None.

Planned Field Activities for the Next Day/ Week:

Install data loggers to collect data for a week and take ground water samples.

Photo Log

Photo 1 – Abandonment of the three old wells at the site	
Photo 2 – Installation of 24MW-3S Via Sonic drill	

Photo 3 – Completed the installation of 24MW-2S, 24MW-2I, and 24MW-2D	
24MW-1S, 24MW-1I, and 24MW-1D	

24MW-3S, 24MW-3I, and 24MW-3D	

DAILY STATUS REPORT

Prepared By: Ahmed Elbadri

WEATHER	Snow		Rain		Overcast		Partly Cloudy		Bright Sun	X
TEMP.	< 32		32-50	X	50-70		70-85		>85	

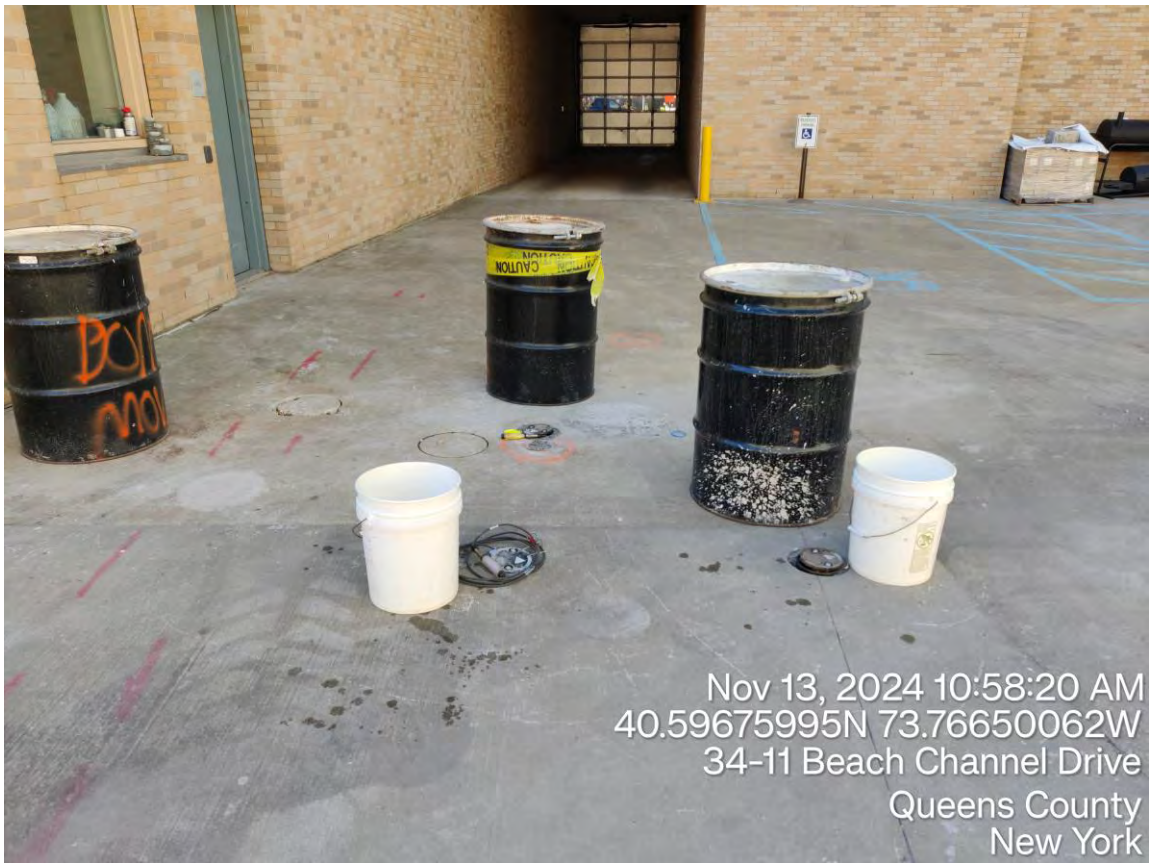
Project Name:	34-11 Beach Channel Drive	Date:	**11/13/2024**

Consultant: **AMC Engineering, PLLC**	Safety Officer: **Ahmed Elbadri (AMC)**
General Contractor: **Arker Companies**	Site Manager/ Supervisor: **Manuel (Super)**
Work Activities Performed: **Mobilized onsite to place data loggers in all the newly installed wells, as per NYSDEC's updated and approved corrective measures work plan. The data loggers were to be placed in the wells for a week in order to monitor ground water elevations.**	

Samples Collected: **None.**
Problems Encountered: **None.**
Planned Field Activities for the Next Day/ Week: **Retrieve data loggers after a week and take ground water samples.**

Photo Log

Photo 1 – Taking depth to water before and after data logger installation	
Photo 3 – Data loggers placed in 24MW-2S, 24MW-2I, and 24MW-2D	

24MW-1S, 24MW-1I, and 24MW-1D	
24MW-3S, 24MW-3I, and 24MW-3D	

DAILY STATUS REPORT

Prepared By: Ahmed Elbadri

WEATHER	Snow		Rain		Overcast	X	Partly Cloudy		Bright Sun	
TEMP.	< 32		32-50	X	50-70		70-85		>85	

Project Name:	34-11 Beach Channel Drive	Date:	**11/22/2024**

Consultant:	Safety Officer:
AMC Engineering, PLLC	**Ahmed Elbadri (AMC)** **Andrew Sung (AMC)**
General Contractor:	Site Manager/ Supervisor:
Arker Companies	**Manuel (Super)**

Work Activities Performed:

Mobilized onsite to retrieve the data loggers from each well, survey the top of casing for all the wells, and collect a ground water sample from Cluster 24MW-1, as per NYSDEC's updated and approved corrective measures work plan.

Samples Collected:

A total of three ground water samples were collected from the wells in cluster 24MW-1, (24MW-1S, 24MW-1I, 24MW-1D), in addition to a duplicate, MS, and MSD sample. The samples were collected, using a peristaltic pump and HORIBA, in three 40 mL VOAs with HCL preservative to be analyzed for VOCs. The samples were sent to Pheonix Environmental Labs.

Problems Encountered:

None.

Planned Field Activities for the Next Day/ Week:

None.

Photo Log

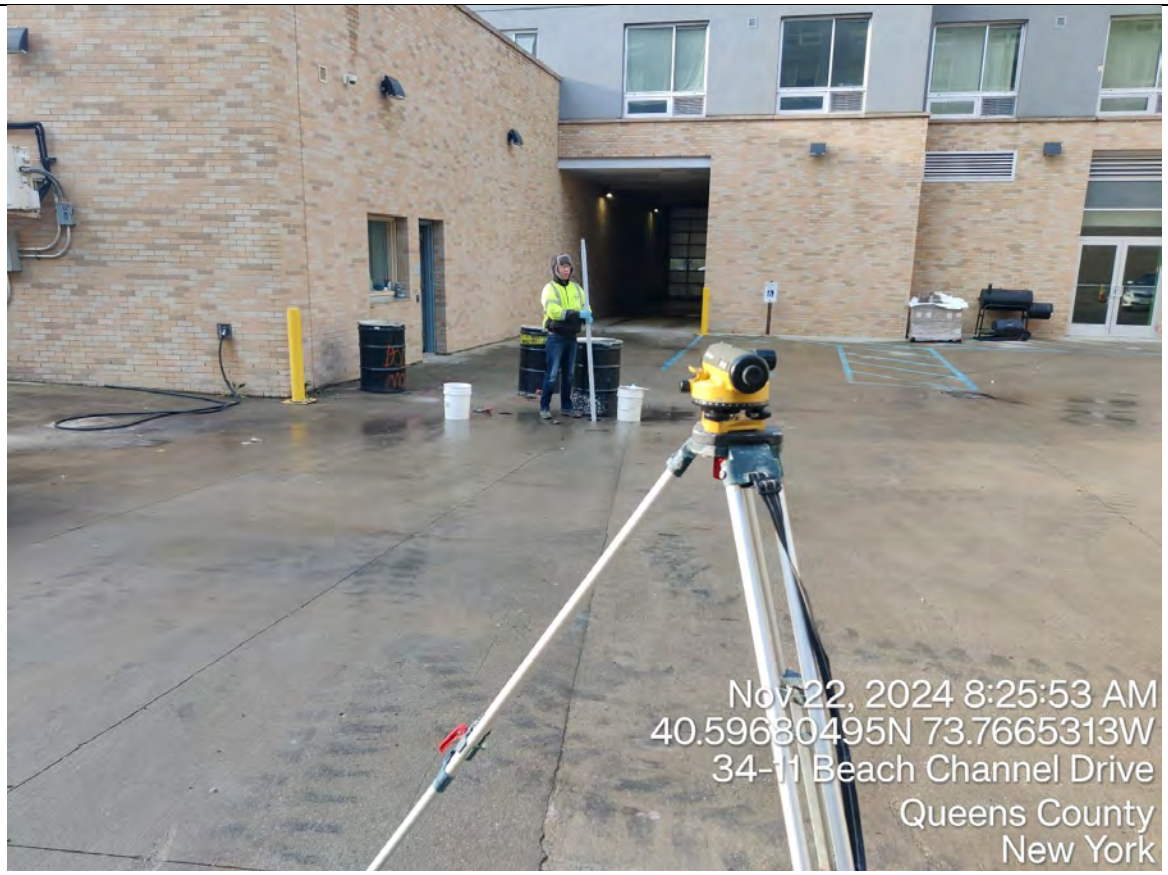
Photo 1 – Site overview	
Photo 2 – Top of casing well survey	

Photo 3 – Ground water sampling 24MW-1S, 24MW-1I, and 24MW-1D	
Photo 4 – Sample HORIBA reading	

APPENDIX F

LABORATORY RESULTS

PHOENIX
Environmental Laboratories, Inc.

Tuesday, December 03, 2024

Attn: Ariel Czemerinski
AMC Engineering PLLC
18-36 42nd Street
Astoria, NY 11105

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
SDG ID: GCS15371
Sample ID#s: CS15371 - CS15375

This laboratory is in compliance with the NELAC requirements of procedures used except where indicated.

This report contains results for the parameters tested, under the sampling conditions described on the Chain Of Custody, as received by the laboratory. This report is incomplete unless all pages indicated in the pagination at the bottom of the page are included.

A scanned version of the COC form accompanies the analytical report and is an exact duplicate of the original.

The contents of this report cannot be discussed with anyone other than the client listed above without their written consent.

Sincerely yours,

Phyllis Shiller
Laboratory Director

NELAC - #NY11301
CT Lab Registration #PH-0618
MA Lab Registration #M-CT007
ME Lab Registration #CT-007
NH Lab Registration #213693-A,B
NJ Lab Registration #CT-003
NY Lab Registration #11301
PA Lab Registration #68-03530
RI Lab Registration #63
VT Lab Registration #VT11301

Environmental Laboratories, Inc.
587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
Tel. (860) 645-1102 Fax (860) 645-0823

NY # 11301

SDG Comments

December 03, 2024

SDG I.D.: GCS15371

8260 Volatile Organics:
1,2-Dibromoethane, 1,2,3 Trichloropropane, and 1,2-Dibromo-3-chloropropane do not meet NY TOGS GA criteria, these compounds are analyzed by GC/ECD method 504 or 8011 to achieve this criteria.

Any compound that is not detected above the MDL/LOD is reported as ND on the report and is reported in the electronic deliverables (EDD) as <RL or U at the RL per state and EPA guidance.

Version 1: Analysis results minus raw data.

Version 2: Complete report with raw data.

Environmental Laboratories, Inc.
587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
Tel. (860) 645-1102 Fax (860) 645-0823

NY # 11301

Sample Id Cross Reference

December 03, 2024

SDG I.D.: GCS15371

Project ID: 34-11 BEACH CHANNEL DRIVE QNS

Client Id	Lab Id	Matrix
24MW-1S	CS15371	GROUND WATER
24MW-1I	CS15372	GROUND WATER
24MW-1D	CS15373	GROUND WATER
DUPLICATE	CS15374	GROUND WATER
TRIP BLANK	CS15375	WATER

PHOENIX
Environmental Laboratories, Inc.
587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
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ACCREDITED IN ACCORDANCE WITH nelac NY # 11301

Analysis Report

December 03, 2024

FOR: Attn: Ariel Czemerinski
AMC Engineering PLLC
18-36 42nd Street
Astoria, NY 11105

Sample Information		Custody Information		Date	Time
Matrix:	GROUND WATER	Collected by:		11/22/24	10:20
Location Code:	AMC-ENG	Received by:	B	11/25/24	18:35
Rush Request:	Standard	Analyzed by:	see "By" below		
P.O.#:					

Laboratory Data

SDG ID: GCS15371
Phoenix ID: CS15371

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: 24MW-1S

Parameter	Result	RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference	
Client MS/MSD	Completed					11/26/24			
Volatiles									
1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,1-Trichloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,2,2-Tetrachloroethane	ND	0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,2-Trichloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloroethene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloropropene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,3-Trichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,3-Trichloropropane	ND	0.25	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,4-Trichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,4-Trimethylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dibromo-3-chloropropane	ND	0.50	0.50	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dibromoethane	ND	0.25	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichloroethane	ND	0.60	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichloropropane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3,5-Trimethylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3-Dichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3-Dichloropropane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,4-Dichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2,2-Dichloropropane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2-Chlorotoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2-Hexanone	ND	5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
2-Isopropyltoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	1
4-Chlorotoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: 24MW-1S

Phoenix I.D.: CS15371

Parameter	Result		RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference	
4-Methyl-2-pentanone	ND		5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
Acetone	ND		25	2.5	ug/L	1	11/26/24	MH	SW8260D	
Acrylonitrile	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Benzene	0.26	J	0.70	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromochloromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromodichloromethane	ND		0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromoform	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromomethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Carbon Disulfide	4.5	J	5.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Carbon tetrachloride	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chlorobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloroethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloroform	0.36	J	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
cis-1,2-Dichloroethene	0.61	J	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
cis-1,3-Dichloropropene	ND		0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dibromochloromethane	ND		0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dibromomethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dichlorodifluoromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Ethylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Hexachlorobutadiene	ND		0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
Isopropylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
m&p-Xylene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Methyl ethyl ketone	ND		5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
Methyl t-butyl ether (MTBE)	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Methylene chloride	ND		1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
Naphthalene	ND		1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
n-Butylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
n-Propylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
o-Xylene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
p-Isopropyltoluene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
sec-Butylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Styrene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
tert-Butylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Tetrachloroethene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Tetrahydrofuran (THF)	ND		2.5	2.5	ug/L	1	11/26/24	MH	SW8260D	1
Toluene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Total Xylenes	ND		1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
trans-1,2-Dichloroethene	1.1		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
trans-1,3-Dichloropropene	ND		0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
trans-1,4-dichloro-2-butene	ND		5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
Trichloroethene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Trichlorofluoromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Trichlorotrifluoroethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Vinyl chloride	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
QA/QC Surrogates										
% 1,2-dichlorobenzene-d4	100				%	1	11/26/24	MH	70 - 130 %	
% Bromofluorobenzene	93				%	1	11/26/24	MH	70 - 130 %	

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: 24MW-1S

Phoenix I.D.: CS15371

Parameter	Result	RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference
% Dibromofluoromethane	99			%	1	11/26/24	MH	70 - 130 %
% Toluene-d8	95			%	1	11/26/24	MH	70 - 130 %
Volatiles								
1,2,4-Trimethylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
1,3,5-Trimethylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
n-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
n-Propylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
p-Isopropyltoluene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
sec-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
tert-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
QA/QC Surrogates								
% 1,2-dichlorobenzene-d4	100			%	1	11/26/24	MH	70 - 130 %
% Bromofluorobenzene	93			%	1	11/26/24	MH	70 - 130 %
% Dibromofluoromethane	99			%	1	11/26/24	MH	70 - 130 %
% Toluene-d8	95			%	1	11/26/24	MH	70 - 130 %

1 = This parameter is not certified by the primary accrediting authority (NY NELAC) for this matrix. NY NELAC does not offer certification for all parameters at this time.

RL/PQL=Reporting/Practical Quantitation Level (Equivalent to NELAC LOQ, Limit of Quantitation) ND=Not Detected BRL=Below Reporting Level L=Biased Low J=Estimated Below RL LOD=Limit of Detection MDL=Method Detection Limit1
QA/QC Surrogates: Surrogates are compounds (preceeded with a %) added by the lab to determine analysis efficiency. Surrogate results(%) listed in the report are not "detected" compounds.

Comments:

Volatile Comment:
To achieve client's objectives, where the lowest calibration standard or LOD justifies lowering the RL/PQL, the RL/PQL of some compounds have been lowered to meet criteria.

If you are the client above and have any questions concerning this testing, please do not hesitate to contact Phoenix Client Services at ext.200.
The contents of this report cannot be discussed with anyone other than the client listed above without their written consent.

Phyllis Shiller, Laboratory Director
December 03, 2024
Reviewed and Released by: Rashmi Makol, Project Manager

PHOENIX
Environmental Laboratories, Inc.
587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
Tel. (860) 645-1102

ACCREDITED IN ACCORDANCE WITH nelac NY # 11301

Analysis Report

December 03, 2024

FOR: Attn: Ariel Czemerinski
AMC Engineering PLLC
18-36 42nd Street
Astoria, NY 11105

Sample Information		Custody Information		Date	Time
Matrix:	GROUND WATER	Collected by:		11/22/24	11:30
Location Code:	AMC-ENG	Received by:	B	11/25/24	18:35
Rush Request:	Standard	Analyzed by:	see "By" below		
P.O.#:					

Laboratory Data

SDG ID: GCS15371
Phoenix ID: CS15372

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: 24MW-1I

Parameter	Result	RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference	
Volatiles									
1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,1-Trichloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,2,2-Tetrachloroethane	ND	0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,2-Trichloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloroethene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloropropene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,3-Trichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,3-Trichloropropane	ND	0.25	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,4-Trichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,4-Trimethylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dibromo-3-chloropropane	ND	0.50	0.50	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dibromoethane	ND	0.25	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichloroethane	ND	0.60	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichloropropane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3,5-Trimethylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3-Dichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3-Dichloropropane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,4-Dichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2,2-Dichloropropane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2-Chlorotoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2-Hexanone	ND	5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
2-Isopropyltoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	1
4-Chlorotoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
4-Methyl-2-pentanone	ND	5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: 24MW-1I

Phoenix I.D.: CS15372

Parameter	Result		RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference	
Acetone	ND		25	2.5	ug/L	1	11/26/24	MH	SW8260D	
Acrylonitrile	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Benzene	ND		0.70	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromochloromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromodichloromethane	ND		0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromoform	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromomethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Carbon Disulfide	2.9	J	5.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Carbon tetrachloride	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chlorobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloroethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloroform	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
cis-1,2-Dichloroethene	8.6		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
cis-1,3-Dichloropropene	ND		0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dibromochloromethane	ND		0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dibromomethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dichlorodifluoromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Ethylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Hexachlorobutadiene	ND		0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
Isopropylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
m&p-Xylene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Methyl ethyl ketone	ND		5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
Methyl t-butyl ether (MTBE)	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Methylene chloride	ND		1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
Naphthalene	ND		1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
n-Butylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
n-Propylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
o-Xylene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
p-Isopropyltoluene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
sec-Butylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Styrene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
tert-Butylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Tetrachloroethene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Tetrahydrofuran (THF)	ND		2.5	2.5	ug/L	1	11/26/24	MH	SW8260D	1
Toluene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Total Xylenes	ND		1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
trans-1,2-Dichloroethene	0.44	J	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
trans-1,3-Dichloropropene	ND		0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
trans-1,4-dichloro-2-butene	ND		5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
Trichloroethene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Trichlorofluoromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Trichlorotrifluoroethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Vinyl chloride	9.2		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
QA/QC Surrogates										
% 1,2-dichlorobenzene-d4	102				%	1	11/26/24	MH	70 - 130 %	
% Bromofluorobenzene	91				%	1	11/26/24	MH	70 - 130 %	
% Dibromofluoromethane	100				%	1	11/26/24	MH	70 - 130 %	

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: 24MW-1I

Phoenix I.D.: CS15372

Parameter	Result	RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference
% Toluene-d8	92			%	1	11/26/24	MH	70 - 130 %
Volatiles								
1,2,4-Trimethylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
1,3,5-Trimethylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
n-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
n-Propylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
p-Isopropyltoluene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
sec-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
tert-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
QA/QC Surrogates								
% 1,2-dichlorobenzene-d4	102			%	1	11/26/24	MH	70 - 130 %
% Bromofluorobenzene	91			%	1	11/26/24	MH	70 - 130 %
% Dibromofluoromethane	100			%	1	11/26/24	MH	70 - 130 %
% Toluene-d8	92			%	1	11/26/24	MH	70 - 130 %

1 = This parameter is not certified by the primary accrediting authority (NY NELAC) for this matrix. NY NELAC does not offer certification for all parameters at this time.

RL/PQL=Reporting/Practical Quantitation Level (Equivalent to NELAC LOQ, Limit of Quantitation) ND=Not Detected BRL=Below Reporting Level L=Biased Low J=Estimated Below RL LOD=Limit of Detection MDL=Method Detection Limit1
QA/QC Surrogates: Surrogates are compounds (preceeded with a %) added by the lab to determine analysis efficiency. Surrogate results(%) listed in the report are not "detected" compounds.

Comments:

Volatile Comment:
To achieve client's objectives, where the lowest calibration standard or LOD justifies lowering the RL/PQL, the RL/PQL of some compounds have been lowered to meet criteria.

If you are the client above and have any questions concerning this testing, please do not hesitate to contact Phoenix Client Services at ext.200.
The contents of this report cannot be discussed with anyone other than the client listed above without their written consent.

Phyllis Shiller, Laboratory Director
December 03, 2024
Reviewed and Released by: Rashmi Makol, Project Manager

PHOENIX
Environmental Laboratories, Inc.
587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
Tel. (860) 645-1102

ACCREDITED IN ACCORDANCE WITH nelac NY # 11301

Analysis Report

December 03, 2024

FOR: Attn: Ariel Czemerinski
AMC Engineering PLLC
18-36 42nd Street
Astoria, NY 11105

Sample Information		Custody Information		Date	Time
Matrix:	GROUND WATER	Collected by:		11/22/24	12:20
Location Code:	AMC-ENG	Received by:	B	11/25/24	18:35
Rush Request:	Standard	Analyzed by:	see "By" below		
P.O.#:					

Laboratory Data

SDG ID: GCS15371
Phoenix ID: CS15373

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: 24MW-1D

Parameter	Result		RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference	
Volatiles										
1,1,1,2-Tetrachloroethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,1-Trichloroethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,2,2-Tetrachloroethane	ND		0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,2-Trichloroethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloroethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloroethene	0.42	J	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloropropene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,3-Trichlorobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,3-Trichloropropane	ND		0.25	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,4-Trichlorobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,4-Trimethylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dibromo-3-chloropropane	ND		0.50	0.50	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dibromoethane	ND		0.25	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichlorobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichloroethane	ND		0.60	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichloropropane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3,5-Trimethylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3-Dichlorobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3-Dichloropropane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,4-Dichlorobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2,2-Dichloropropane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2-Chlorotoluene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2-Hexanone	ND		5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
2-Isopropyltoluene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	1
4-Chlorotoluene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
4-Methyl-2-pentanone	ND		5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: 24MW-1D

Phoenix I.D.: CS15373

Parameter	Result		RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference	
Acetone	2.9	JS	25	2.5	ug/L	1	11/26/24	MH	SW8260D	
Acrylonitrile	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Benzene	0.26	J	0.70	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromochloromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromodichloromethane	ND		0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromoform	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromomethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Carbon Disulfide	2.1	J	5.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Carbon tetrachloride	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chlorobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloroethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloroform	0.98	J	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
cis-1,2-Dichloroethene	160		5.0	1.3	ug/L	5	11/27/24	MH	SW8260D	
cis-1,3-Dichloropropene	ND		0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dibromochloromethane	ND		0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dibromomethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dichlorodifluoromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Ethylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Hexachlorobutadiene	ND		0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
Isopropylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
m&p-Xylene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Methyl ethyl ketone	ND		5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
Methyl t-butyl ether (MTBE)	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Methylene chloride	ND		1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
Naphthalene	ND		1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
n-Butylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
n-Propylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
o-Xylene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
p-Isopropyltoluene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
sec-Butylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Styrene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
tert-Butylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Tetrachloroethene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Tetrahydrofuran (THF)	ND		2.5	2.5	ug/L	1	11/26/24	MH	SW8260D	1
Toluene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Total Xylenes	ND		1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
trans-1,2-Dichloroethene	2.1		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
trans-1,3-Dichloropropene	ND		0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
trans-1,4-dichloro-2-butene	ND		5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
Trichloroethene	1.4		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Trichlorofluoromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Trichlorotrifluoroethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Vinyl chloride	92		5.0	1.3	ug/L	5	11/27/24	MH	SW8260D	
QA/QC Surrogates										
% 1,2-dichlorobenzene-d4	101				%	1	11/26/24	MH	70 - 130 %	
% Bromofluorobenzene	89				%	1	11/26/24	MH	70 - 130 %	
% Dibromofluoromethane	105				%	1	11/26/24	MH	70 - 130 %	

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: 24MW-1D

Phoenix I.D.: CS15373

Parameter	Result	RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference
% Toluene-d8	98			%	1	11/26/24	MH	70 - 130 %
% 1,2-dichlorobenzene-d4 (5x)	102			%	5	11/27/24	MH	70 - 130 %
% Bromofluorobenzene (5x)	93			%	5	11/27/24	MH	70 - 130 %
% Dibromofluoromethane (5x)	104			%	5	11/27/24	MH	70 - 130 %
% Toluene-d8 (5x)	90			%	5	11/27/24	MH	70 - 130 %
Volatiles								
1,2,4-Trimethylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
1,3,5-Trimethylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
n-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
n-Propylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
p-Isopropyltoluene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
sec-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
tert-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
QA/QC Surrogates								
% 1,2-dichlorobenzene-d4	101			%	1	11/26/24	MH	70 - 130 %
% Bromofluorobenzene	89			%	1	11/26/24	MH	70 - 130 %
% Dibromofluoromethane	105			%	1	11/26/24	MH	70 - 130 %
% Toluene-d8	98			%	1	11/26/24	MH	70 - 130 %

1 = This parameter is not certified by the primary accrediting authority (NY NELAC) for this matrix. NY NELAC does not offer certification for all parameters at this time.

RL/PQL=Reporting/Practical Quantitation Level (Equivalent to NELAC LOQ, Limit of Quantitation) ND=Not Detected BRL=Below Reporting Level L=Biased Low J=Estimated Below RL LOD=Limit of Detection MDL=Method Detection Limit1
QA/QC Surrogates: Surrogates are compounds (preceeded with a %) added by the lab to determine analysis efficiency. Surrogate results(%) listed in the report are not "detected" compounds.

Comments:

Volatile Comment:
To achieve client's objectives, where the lowest calibration standard or LOD justifies lowering the RL/PQL, the RL/PQL of some compounds have been lowered to meet criteria.

S - Laboratory solvent, contamination is possible.

If you are the client above and have any questions concerning this testing, please do not hesitate to contact Phoenix Client Services at ext.200.
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Phyllis Shiller, Laboratory Director
December 03, 2024
Reviewed and Released by: Rashmi Makol, Project Manager

PHOENIX
Environmental Laboratories, Inc.
587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
Tel. (860) 645-1102

ACCREDITED IN ACCORDANCE WITH nelac NY # 11301

Analysis Report

December 03, 2024

FOR: Attn: Ariel Czemerinski
AMC Engineering PLLC
18-36 42nd Street
Astoria, NY 11105

Sample Information		Custody Information		Date	Time
Matrix:	GROUND WATER	Collected by:		11/22/24	10:29
Location Code:	AMC-ENG	Received by:	B	11/25/24	18:35
Rush Request:	Standard	Analyzed by:	see "By" below		
P.O.#:					

Laboratory Data

SDG ID: GCS15371
Phoenix ID: CS15374

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: DUPLICATE

Parameter	Result	RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference	
Volatiles									
1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,1-Trichloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,2,2-Tetrachloroethane	ND	0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,2-Trichloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloroethene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloropropene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,3-Trichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,3-Trichloropropane	ND	0.25	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,4-Trichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,4-Trimethylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dibromo-3-chloropropane	ND	0.50	0.50	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dibromoethane	ND	0.25	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichloroethane	ND	0.60	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichloropropane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3,5-Trimethylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3-Dichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3-Dichloropropane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,4-Dichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2,2-Dichloropropane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2-Chlorotoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2-Hexanone	ND	5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
2-Isopropyltoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	1
4-Chlorotoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
4-Methyl-2-pentanone	ND	5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: DUPLICATE

Phoenix I.D.: CS15374

Parameter	Result		RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference	
Acetone	ND		25	2.5	ug/L	1	11/26/24	MH	SW8260D	
Acrylonitrile	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Benzene	0.25	J	0.70	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromochloromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromodichloromethane	ND		0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromoform	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromomethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Carbon Disulfide	2.4	J	5.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Carbon tetrachloride	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chlorobenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloroethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloroform	0.42	J	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
cis-1,2-Dichloroethene	0.96	J	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
cis-1,3-Dichloropropene	ND		0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dibromochloromethane	ND		0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dibromomethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dichlorodifluoromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Ethylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Hexachlorobutadiene	ND		0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
Isopropylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
m&p-Xylene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Methyl ethyl ketone	ND		5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
Methyl t-butyl ether (MTBE)	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Methylene chloride	ND		1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
Naphthalene	ND		1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
n-Butylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
n-Propylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
o-Xylene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
p-Isopropyltoluene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
sec-Butylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Styrene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
tert-Butylbenzene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Tetrachloroethene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Tetrahydrofuran (THF)	ND		2.5	2.5	ug/L	1	11/26/24	MH	SW8260D	1
Toluene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Total Xylenes	ND		1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
trans-1,2-Dichloroethene	1.3		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
trans-1,3-Dichloropropene	ND		0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
trans-1,4-dichloro-2-butene	ND		5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
Trichloroethene	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Trichlorofluoromethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Trichlorotrifluoroethane	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Vinyl chloride	ND		1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
QA/QC Surrogates										
% 1,2-dichlorobenzene-d4	100				%	1	11/26/24	MH	70 - 130 %	
% Bromofluorobenzene	93				%	1	11/26/24	MH	70 - 130 %	
% Dibromofluoromethane	111				%	1	11/26/24	MH	70 - 130 %	

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: DUPLICATE

Phoenix I.D.: CS15374

Parameter	Result	RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference
% Toluene-d8	98			%	1	11/26/24	MH	70 - 130 %
Volatiles								
1,2,4-Trimethylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
1,3,5-Trimethylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
n-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
n-Propylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
p-Isopropyltoluene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
sec-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
tert-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
QA/QC Surrogates								
% 1,2-dichlorobenzene-d4	100			%	1	11/26/24	MH	70 - 130 %
% Bromofluorobenzene	93			%	1	11/26/24	MH	70 - 130 %
% Dibromofluoromethane	111			%	1	11/26/24	MH	70 - 130 %
% Toluene-d8	98			%	1	11/26/24	MH	70 - 130 %

1 = This parameter is not certified by the primary accrediting authority (NY NELAC) for this matrix. NY NELAC does not offer certification for all parameters at this time.

RL/PQL=Reporting/Practical Quantitation Level (Equivalent to NELAC LOQ, Limit of Quantitation) ND=Not Detected BRL=Below Reporting Level L=Biased Low J=Estimated Below RL LOD=Limit of Detection MDL=Method Detection Limit1
QA/QC Surrogates: Surrogates are compounds (preceeded with a %) added by the lab to determine analysis efficiency. Surrogate results(%) listed in the report are not "detected" compounds.

Comments:

Volatile Comment:
To achieve client's objectives, where the lowest calibration standard or LOD justifies lowering the RL/PQL, the RL/PQL of some compounds have been lowered to meet criteria.

If you are the client above and have any questions concerning this testing, please do not hesitate to contact Phoenix Client Services at ext.200.
The contents of this report cannot be discussed with anyone other than the client listed above without their written consent.

Phyllis Shiller, Laboratory Director
December 03, 2024
Reviewed and Released by: Rashmi Makol, Project Manager

PHOENIX
Environmental Laboratories, Inc.
587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
Tel. (860) 645-1102

ACCREDITED IN ACCORDANCE WITH nelac NY # 11301

Analysis Report

December 03, 2024

FOR: Attn: Ariel Czemerinski
AMC Engineering PLLC
18-36 42nd Street
Astoria, NY 11105

Sample Information		Custody Information		Date	Time
Matrix:	WATER	Collected by:		11/22/24	
Location Code:	AMC-ENG	Received by:	B	11/25/24	18:35
Rush Request:	Standard	Analyzed by:	see "By" below		
P.O.#:					

Laboratory Data

SDG ID: GCS15371
Phoenix ID: CS15375

Project ID: 34-11 BEACH CHANNEL DRIVE QNS
Client ID: TRIP BLANK

Parameter	Result	RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference	
Volatiles									
1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,1-Trichloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,2,2-Tetrachloroethane	ND	0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1,2-Trichloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloroethene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,1-Dichloropropene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,3-Trichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,3-Trichloropropane	ND	0.25	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,4-Trichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2,4-Trimethylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dibromo-3-chloropropane	ND	0.50	0.50	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dibromoethane	ND	0.25	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichloroethane	ND	0.60	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,2-Dichloropropane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3,5-Trimethylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3-Dichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,3-Dichloropropane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
1,4-Dichlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2,2-Dichloropropane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2-Chlorotoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
2-Hexanone	ND	5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
2-Isopropyltoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	1
4-Chlorotoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
4-Methyl-2-pentanone	ND	5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	

Project ID: 34-11 BEACH CHANNEL DRIVE QNS

Client ID: TRIP BLANK

Phoenix I.D.: CS15375

Parameter	Result	RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference	
Acetone	ND	25	2.5	ug/L	1	11/26/24	MH	SW8260D	
Acrylonitrile	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Benzene	ND	0.70	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromochloromethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromodichloromethane	ND	0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromoform	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Bromomethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Carbon Disulfide	ND	5.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Carbon tetrachloride	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chlorobenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloroform	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Chloromethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
cis-1,2-Dichloroethene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
cis-1,3-Dichloropropene	ND	0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dibromochloromethane	ND	0.50	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dibromomethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Dichlorodifluoromethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Ethylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Hexachlorobutadiene	ND	0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
Isopropylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
m&p-Xylene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Methyl ethyl ketone	ND	5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
Methyl t-butyl ether (MTBE)	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Methylene chloride	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
Naphthalene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
n-Butylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
n-Propylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
o-Xylene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
p-Isopropyltoluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
sec-Butylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Styrene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
tert-Butylbenzene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Tetrachloroethene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Tetrahydrofuran (THF)	ND	2.5	2.5	ug/L	1	11/26/24	MH	SW8260D	1
Toluene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Total Xylenes	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D	
trans-1,2-Dichloroethene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
trans-1,3-Dichloropropene	ND	0.40	0.25	ug/L	1	11/26/24	MH	SW8260D	
trans-1,4-dichloro-2-butene	ND	5.0	2.5	ug/L	1	11/26/24	MH	SW8260D	
Trichloroethene	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Trichlorofluoromethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Trichlorotrifluoroethane	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
Vinyl chloride	ND	1.0	0.25	ug/L	1	11/26/24	MH	SW8260D	
QA/QC Surrogates									
% 1,2-dichlorobenzene-d4	99			%	1	11/26/24	MH	70 - 130 %	
% Bromofluorobenzene	92			%	1	11/26/24	MH	70 - 130 %	
% Dibromofluoromethane	99			%	1	11/26/24	MH	70 - 130 %	

Project ID: 34-11 BEACH CHANNEL DRIVE QNS

Client ID: TRIP BLANK

Phoenix I.D.: CS15375

Parameter	Result	RL/ PQL	LOD/ MDL	Units	Dilution	Date/Time	By	Reference
% Toluene-d8	98			%	1	11/26/24	MH	70 - 130 %
Volatiles								
1,2,4-Trimethylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
1,3,5-Trimethylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
n-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
n-Propylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
p-Isopropyltoluene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
sec-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
tert-Butylbenzene	ND	1.0	1.0	ug/L	1	11/26/24	MH	SW8260D
QA/QC Surrogates								
% 1,2-dichlorobenzene-d4	99			%	1	11/26/24	MH	70 - 130 %
% Bromofluorobenzene	92			%	1	11/26/24	MH	70 - 130 %
% Dibromofluoromethane	99			%	1	11/26/24	MH	70 - 130 %
% Toluene-d8	98			%	1	11/26/24	MH	70 - 130 %

1 = This parameter is not certified by the primary accrediting authority (NY NELAC) for this matrix. NY NELAC does not offer certification for all parameters at this time.

RL/PQL=Reporting/Practical Quantitation Level (Equivalent to NELAC LOQ, Limit of Quantitation) ND=Not Detected BRL=Below Reporting Level L=Biased Low LOD=Limit of Detection MDL=Method Detection Limit1
QA/QC Surrogates: Surrogates are compounds (preceeded with a %) added by the lab to determine analysis efficiency. Surrogate results(%) listed in the report are not "detected" compounds.

Comments:

TRIP BLANK INCLUDED.

Volatile Comment:
To achieve client's objectives, where the lowest calibration standard or LOD justifies lowering the RL/PQL, the RL/PQL of some compounds have been lowered to meet criteria.

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Phyllis Shiller, Laboratory Director

December 03, 2024

Reviewed and Released by: Rashmi Makol, Project Manager

PHOENIX
Environmental Laboratories, Inc.
587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
Tel. (860) 645-1102

ACCREDITED IN ACCORDANCE WITH nelac NY # 11301

QA/QC Report

December 03, 2024

QA/QC Data

SDG I.D.: GCS15371

QA/QC Batch 760224 (ug/L), QC Sample No: CS15371 (CS15371, CS15372, CS15373, CS15374, CS15375)

Volatiles - Ground Water

Parameter	Blank	Blk RL	LCS %	LCSD %	LCS RPD	MS %	MSD %	MS RPD	% Rec Limits	% RPD Limits	
1,1,1,2-Tetrachloroethane	ND	5.0	106	107	0.9	108	107	0.9	70 - 130	30	
1,1,1-Trichloroethane	ND	5.0	97	100	3.0	112	107	4.6	70 - 130	30	
1,1,2,2-Tetrachloroethane	ND	5.0	115	115	0.0	120	117	2.5	70 - 130	30	
1,1,2-Trichloroethane	ND	5.0	103	105	1.9	105	104	1.0	70 - 130	30	
1,1-Dichloroethane	ND	5.0	111	111	0.0	126	121	4.0	70 - 130	30	
1,1-Dichloroethene	ND	5.0	105	105	0.0	122	120	1.7	70 - 130	30	
1,1-Dichloropropene	ND	5.0	107	98	8.8	113	113	0.0	70 - 130	30	
1,2,3-Trichlorobenzene	ND	1.0	119	122	2.5	127	124	2.4	70 - 130	30	
1,2,3-Trichloropropane	ND	5.0	114	126	10.0	145	134	7.9	70 - 130	30	m
1,2,4-Trichlorobenzene	ND	5.0	114	115	0.9	118	116	1.7	70 - 130	30	
1,2,4-Trimethylbenzene	ND	1.0	108	108	0.0	113	111	1.8	70 - 130	30	
1,2-Dibromo-3-chloropropane	ND	5.0	112	113	0.9	122	116	5.0	70 - 130	30	
1,2-Dibromoethane	ND	5.0	107	109	1.9	109	107	1.9	70 - 130	30	
1,2-Dichlorobenzene	ND	1.0	107	108	0.9	109	108	0.9	70 - 130	30	
1,2-Dichloroethane	ND	0.60	109	112	2.7	107	109	1.9	70 - 130	30	
1,2-Dichloropropane	ND	5.0	105	106	0.9	103	105	1.9	70 - 130	30	
1,3,5-Trimethylbenzene	ND	1.0	108	109	0.9	113	110	2.7	70 - 130	30	
1,3-Dichlorobenzene	ND	1.0	104	106	1.9	110	107	2.8	70 - 130	30	
1,3-Dichloropropane	ND	5.0	110	111	0.9	114	109	4.5	70 - 130	30	
1,4-Dichlorobenzene	ND	1.0	105	106	0.9	110	108	1.8	70 - 130	30	
2,2-Dichloropropane	ND	5.0	107	109	1.9	124	115	7.5	70 - 130	30	
2-Chlorotoluene	ND	5.0	105	108	2.8	112	110	1.8	70 - 130	30	
2-Hexanone	ND	5.0	106	108	1.9	120	114	5.1	70 - 130	30	
2-Isopropyltoluene	ND	5.0	109	110	0.9	116	113	2.6	70 - 130	30	
4-Chlorotoluene	ND	5.0	106	107	0.9	111	106	4.6	70 - 130	30	
4-Methyl-2-pentanone	ND	5.0	109	109	0.0	116	116	0.0	70 - 130	30	
Acetone	ND	10	118	115	2.6	143	127	11.9	70 - 130	30	m
Acrylonitrile	ND	5.0	100	101	1.0	114	109	4.5	70 - 130	30	
Benzene	ND	0.70	111	111	0.0	113	103	9.3	70 - 130	30	
Bromobenzene	ND	5.0	104	105	1.0	108	106	1.9	70 - 130	30	
Bromochloromethane	ND	5.0	103	105	1.9	112	105	6.5	70 - 130	30	
Bromodichloromethane	ND	5.0	105	105	0.0	103	103	0.0	70 - 130	30	
Bromoform	ND	5.0	109	113	3.6	111	107	3.7	70 - 130	30	
Bromomethane	ND	5.0	110	117	6.2	71	90	23.6	70 - 130	30	
Carbon Disulfide	ND	5.0	108	107	0.9	109	108	0.9	70 - 130	30	
Carbon tetrachloride	ND	5.0	95	99	4.1	111	102	8.5	70 - 130	30	
Chlorobenzene	ND	1.0	104	105	1.0	110	107	2.8	70 - 130	30	
Chloroethane	ND	5.0	116	115	0.9	131	123	6.3	70 - 130	30	m
Chloroform	ND	5.0	102	105	2.9	121	111	8.6	70 - 130	30	
Chloromethane	ND	5.0	114	115	0.9	122	115	5.9	70 - 130	30	
cis-1,2-Dichloroethene	ND	5.0	103	103	0.0	122	115	5.9	70 - 130	30	

QA/QC Data

SDG I.D.: GCS15371

Parameter	Blank	Blk RL	LCS %	LCSD %	LCS RPD	MS %	MSD %	MS RPD	% Rec Limits	% RPD Limits	
cis-1,3-Dichloropropene	ND	5.0	101	101	0.0	97	97	0.0	70 - 130	30	
Dibromochloromethane	ND	5.0	106	112	5.5	109	106	2.8	70 - 130	30	
Dibromomethane	ND	5.0	102	102	0.0	103	98	5.0	70 - 130	30	
Dichlorodifluoromethane	ND	5.0	104	108	3.8	105	96	9.0	70 - 130	30	
Ethylbenzene	ND	1.0	104	106	1.9	112	110	1.8	70 - 130	30	
Hexachlorobutadiene	ND	5.0	102	101	1.0	106	103	2.9	70 - 130	30	
Isopropylbenzene	ND	1.0	107	108	0.9	112	110	1.8	70 - 130	30	
m&p-Xylene	ND	1.0	106	108	1.9	112	109	2.7	70 - 130	30	
Methyl ethyl ketone	ND	5.0	96	104	8.0	115	103	11.0	70 - 130	30	
Methyl t-butyl ether (MTBE)	ND	1.0	112	109	2.7	121	115	5.1	70 - 130	30	
Methylene chloride	ND	5.0	103	100	3.0	117	110	6.2	70 - 130	30	
Naphthalene	ND	1.0	119	120	0.8	131	130	0.8	70 - 130	30	m
n-Butylbenzene	ND	1.0	109	111	1.8	117	114	2.6	70 - 130	30	
n-Propylbenzene	ND	1.0	108	107	0.9	113	109	3.6	70 - 130	30	
o-Xylene	ND	1.0	103	106	2.9	108	106	1.9	70 - 130	30	
p-Isopropyltoluene	ND	1.0	107	109	1.9	114	112	1.8	70 - 130	30	
sec-Butylbenzene	ND	1.0	109	110	0.9	116	114	1.7	70 - 130	30	
Styrene	ND	1.0	105	107	1.9	110	108	1.8	70 - 130	30	
tert-Butylbenzene	ND	1.0	106	107	0.9	112	110	1.8	70 - 130	30	
Tetrachloroethene	ND	1.0	100	101	1.0	102	103	1.0	70 - 130	30	
Tetrahydrofuran (THF)	ND	5.0	93	95	2.1	112	103	8.4	70 - 130	30	
Toluene	ND	1.0	102	101	1.0	105	104	1.0	70 - 130	30	
trans-1,2-Dichloroethene	ND	5.0	107	104	2.8	120	114	5.1	70 - 130	30	
trans-1,3-Dichloropropene	ND	5.0	101	104	2.9	100	99	1.0	70 - 130	30	
trans-1,4-dichloro-2-butene	ND	5.0	120	121	0.8	113	110	2.7	70 - 130	30	
Trichloroethene	ND	5.0	101	103	2.0	106	108	1.9	70 - 130	30	
Trichlorofluoromethane	ND	5.0	108	110	1.8	126	115	9.1	70 - 130	30	
Trichlorotrifluoroethane	ND	5.0	108	108	0.0	123	115	6.7	70 - 130	30	
Vinyl chloride	ND	5.0	112	115	2.6	134	123	8.6	70 - 130	30	m
% 1,2-dichlorobenzene-d4	98	%	100	100	0.0	101	100	1.0	70 - 130	30	
% Bromofluorobenzene	92	%	98	98	0.0	94	94	0.0	70 - 130	30	
% Dibromofluoromethane	102	%	100	103	3.0	108	102	5.7	70 - 130	30	
% Toluene-d8	97	%	99	98	1.0	97	96	1.0	70 - 130	30	

QA/QC Batch 760523 (ug/L), QC Sample No: CS15373 (CS15373 (5X))

Volatiles - Ground Water

cis-1,2-Dichloroethene	ND	1.0	116	118	1.7				70 - 130	30	
Vinyl chloride	ND	1.0	124	128	3.2				70 - 130	30	
% 1,2-dichlorobenzene-d4	102	%	100	100	0.0				70 - 130	30	
% Bromofluorobenzene	91	%	95	94	1.1				70 - 130	30	
% Dibromofluoromethane	100	%	116	111	4.4				70 - 130	30	
% Toluene-d8	89	%	98	97	1.0				70 - 130	30	

Comment:

A LCS and LCS Duplicate were performed instead of a matrix spike and matrix spike duplicate.

m = This parameter is outside laboratory MS/MSD specified recovery limits.

QA/QC Data

SDG I.D.: GCS15371

Parameter	Blank	Blk RL	LCS %	LCSD %	LCS RPD	MS %	MSD %	MS RPD	% Rec Limits	% RPD Limits

If there are any questions regarding this data, please call Phoenix Client Services at extension 200.

RPD - Relative Percent Difference
LCS - Laboratory Control Sample
LCSD - Laboratory Control Sample Duplicate
MS - Matrix Spike
MS Dup - Matrix Spike Duplicate
NC - No Criteria
Intf - Interference
(ISO) - Isotope Dilution

Phyllis Shiller, Laboratory Director
December 03, 2024

Tuesday, December 03, 2024

Criteria: NY: DEP EFF, GW

State: NY

Sample Criteria Exceedances Report

GCS15371 - AMC-ENG

SampNo	Acode	Phoenix Analyte	Criteria	Result	RL	Criteria	RL Criteria	Analysis Units
CS15371	$8260GWR	1,2-Dibromo-3-chloropropane	NY / TOGS - Water Quality / GA Criteria	ND	0.50	0.04	0.04	ug/L
CS15371	$8260GWR	1,2-Dibromoethane	NY / TOGS - Water Quality / GA Criteria	ND	0.25	0.0006	0.0006	ug/L
CS15371	$8260GWR	1,2,3-Trichloropropane	NY / TOGS - Water Quality / GA Criteria	ND	0.25	0.04	0.04	ug/L
CS15372	$8260GWR	Vinyl chloride	NY / TAGM - Volatile Organics / Groundwater Standards	9.2	1.0	2	2	ug/L
CS15372	$8260GWR	1,2,3-Trichloropropane	NY / TOGS - Water Quality / GA Criteria	ND	0.25	0.04	0.04	ug/L
CS15372	$8260GWR	1,2-Dibromo-3-chloropropane	NY / TOGS - Water Quality / GA Criteria	ND	0.50	0.04	0.04	ug/L
CS15372	$8260GWR	1,2-Dibromoethane	NY / TOGS - Water Quality / GA Criteria	ND	0.25	0.0006	0.0006	ug/L
CS15372	$8260GWR	cis-1,2-Dichloroethene	NY / TOGS - Water Quality / GA Criteria	8.6	1.0	5	5	ug/L
CS15372	$8260GWR	Vinyl chloride	NY / TOGS - Water Quality / GA Criteria	9.2	1.0	2	2	ug/L
CS15373	$8260GWR	Vinyl chloride	NY / TAGM - Volatile Organics / Groundwater Standards	92	5.0	2	2	ug/L
CS15373	$8260GWR	1,2-Dibromoethane	NY / TOGS - Water Quality / GA Criteria	ND	0.25	0.0006	0.0006	ug/L
CS15373	$8260GWR	1,2-Dibromo-3-chloropropane	NY / TOGS - Water Quality / GA Criteria	ND	0.50	0.04	0.04	ug/L
CS15373	$8260GWR	cis-1,2-Dichloroethene	NY / TOGS - Water Quality / GA Criteria	160	5.0	5	5	ug/L
CS15373	$8260GWR	Vinyl chloride	NY / TOGS - Water Quality / GA Criteria	92	5.0	2	2	ug/L
CS15373	$8260GWR	1,2,3-Trichloropropane	NY / TOGS - Water Quality / GA Criteria	ND	0.25	0.04	0.04	ug/L
CS15374	$8260GWR	1,2,3-Trichloropropane	NY / TOGS - Water Quality / GA Criteria	ND	0.25	0.04	0.04	ug/L
CS15374	$8260GWR	1,2-Dibromo-3-chloropropane	NY / TOGS - Water Quality / GA Criteria	ND	0.50	0.04	0.04	ug/L
CS15374	$8260GWR	1,2-Dibromoethane	NY / TOGS - Water Quality / GA Criteria	ND	0.25	0.0006	0.0006	ug/L
CS15375	$8260GWR	1,2-Dibromoethane	NY / TOGS - Water Quality / GA Criteria	ND	0.25	0.0006	0.0006	ug/L
CS15375	$8260GWR	1,2,3-Trichloropropane	NY / TOGS - Water Quality / GA Criteria	ND	0.25	0.04	0.04	ug/L
CS15375	$8260GWR	1,2-Dibromo-3-chloropropane	NY / TOGS - Water Quality / GA Criteria	ND	0.50	0.04	0.04	ug/L

Phoenix Laboratories does not assume responsibility for the data contained in this exceedance report. It is provided as an additional tool to identify requested criteria exceedences. All efforts are made to ensure the accuracy of the data (obtained from appropriate agencies). A lack of exceedence information does not necessarily suggest conformance to the criteria. It is ultimately the site professional's responsibility to determine appropriate compliance.

Environmental Laboratories, Inc.
587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
Tel. (860) 645-1102 Fax (860) 645-0823

NY Temperature Narration

December 03, 2024

SDG I.D.: GCS15371

The samples in this delivery group were received at 1.8°C.
(Note acceptance criteria for relevant matrices is above freezing up to 6°C)

Cooler: Yes ☑ No ☐
Coolant: IPK ☑ ICE ☐ No ☐
Temp [-8] °C Pg 1 of 1

PHOENIX Environmental Laboratories, Inc.

NY/NJ/PA CHAIN OF CUSTODY RECORD

587 East Middle Turnpike, P.O. Box 370, Manchester, CT 06040
Email: Makrina Nolan, makrina@phoenixlabs.com Fax (860) 645-0823
Client Services (860) 645-1102

Contact Options:
☐ Phone:
☐ Fax:
■ Email: ARIEL@AMC-ENGINEERING.COM

Customer: AMC ENGINEERING PLLC
Address: 18-36 42ND STREET
ASTORIA NY 11105

Project: 34-11 Beach Channel Drive, Qns
Report to: ARIEL CZEMERINSKI
Invoice to: AMC ENGINEERING PLLC
QUOTE # : N/A

Project P.O:

This section MUST be completed with Bottle Quantities.

Client Sample - Information - Identification
Sampler's Signature: [signature] Date: 11/22/2024

Matrix Code:
DW=Drinking Water **GW**=Ground Water **SW**=Surface Water **WW**=Waste Water
RW=Raw Water **SE**=Sediment **SL**=Sludge **S**=Soil **SD**=Solid **W**=Wipe
OIL=Oil **B**=Bulk **L**=Liquid

Analysis Request

PHOENIX USE ONLY SAMPLE #	Customer Sample Identification	Sample Matrix	Date Sampled	Time Sampled	*MS/MSD (May be billable at analysis unit rate)	VOCs 8260	+	+	+	+	+	+	+	GL Amber 8 oz. [ ] w/H_3PO_4 [ ] $NAHSO_4$	Soil VOA Vials [ ] methanol [ ] H_2O	GL Soil container (8) oz	GL Soil container (4) oz	40 ml VOA Vial [ ] As is [X] HCl	GL Amber 1000ml [ ] As is [ ] H_2SO_4	PL As is [ ] 250ml [ ] 500ml [ ] 1000ml	PL H_2SO_4 [ ] 250ml [ ] 500ml	PL NaOH 250ml	PL HNO_3 250ml	Bacteria Bottle w/thio	Bacteria Bottle as is
15371	24MW-1S	GW	11/22/24	10:20AM	X	X												9								
15372	24MW-1I	GW	11/22/24	11:20AM		X												3								
15373	24MW-1D	GW	11/22/24	12:20PM		X												3								
15374	Duplicate	GW	11/22/24	10:25AM		X												3								
15375	Trip Blank	GW	N/A	N/A		X												2								

Relinquished by:	Accepted by:	Date:	Time:
	[signature]	11/25/24	1410
[signature]	[signature]	11/25/24	18:35

Comments, Special Requirements or Regulations:

***MS/MSD are considered site samples and will be billed as such in accordance with the prices quoted.**

Data Format:
☐ Phoenix Std Report ☐ EQuIS
■ Excel ☐ NJ Hazsite EDD
■ PDF ☐ NY EZ EDD (ASP)
☐ GIS/Key ☐ Other

Turnaround:
☐ 1 Day*
☐ 2 Days*
☐ 3 Days*
☐ 4 Days*
☐ 5 Days*
■ Standard
* SURCHARGE APPLIES

Data Package:
☐ NJ Reduced Deliv. * ☐ Other
■ NY Enhanced (ASP B) *

NJ
☐ Res. Criteria
☐ Non-Res. Criteria
☐ Impact to GW Soil Cleanup Criteria
☐ Impact to GW soil screen Criteria
☐ GW Criteria

NY
■ TOGS GW
☐ CP-51 SOIL
☐ 375SCO Unrestricted Soil
☐ 375SCO Residential Soil
☐ 375SCO Residential Restricted Soil
☐ 375SCO Commercial Soil
☐ 375SCO Industrial Soil
☐ NY 375 GWP

PA
☐ Clean Fill Limits
☐ PA-GW
☐ Reg Fill Limits
☐ PA Soil Restricted
☐ PA Soil non-restricted

State Samples Collected?
NY

APPENDIX G

PRR REJECTION LETTER

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

Division of Environmental Remediation, Region 2
47-40 21st Street, Long Island City, NY 11101
P: (718) 482-4995
www.dec.ny.gov

January 17, 2024

Daniel Moritz
Rockaway Seagirt Commercial LLC
1044 Northern Blvd, 2nd Floor
Roslyn, NY 11576-1588

Re: Site Management (SM) Periodic Review Report (PRR) Response Letter
34-11 Beach Channel Drive, Far Rockaway
Queens County, Site No.: C241141

Dear Daniel Moritz (as the Certifying Party):

The New York State Department of Environmental Conservation (NYSDEC) has reviewed your Periodic Review Report (PRR) and IC/EC Certification for following period: May 25, 2022 to May 25, 2023.

NYSDEC hereby rejects the PRR and associated Certification for the following reason:

- The request to end ground water monitoring and shut off the sub-slab depressurization system cannot be accepted as NYSDEC has determined the monitoring wells are not installed properly, and are not providing an accurate depiction of the groundwater conditions. NYSDEC requires that additional monitoring well clusters be installed to confirm the groundwater flow direction and provide adequate groundwater quality monitoring above, within, and below the treatment area. This request has been relayed by NYSDEC in several emails and phone calls with your consultant since September 2021, with the latest request in November 2023.

You are required to submit a Corrective Measures Work Plan, including a schedule for completion of the work planned, within 30 days of receipt of this letter.

If you have any questions, or need additional forms, please contact me at 718-482-4065 or christopher.allan@dec.ny.gov.

Sincerely,

Christopher Allan

Christopher Allan
Project Manager

NEW YORK STATE | Department of Environmental Conservation

ec: J. O'Connell, C. Maycock – NYSDEC
S. McLaughlin, S. Wagh – NYSDOH
A. Czemerinski, A. Sung – AMC Engineering

APPENDIX H

APPROVED CMWP

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

Division of Environmental Remediation, Region 2
47-40 21st Street, Long Island City, NY 11101
P: (718) 482-4995
www.dec.ny.gov

May 20, 2024

Daniel Moritz
Rockaway Seagirt Commercial LLC
1044 Northern Blvd, 2nd Floor
Roslyn, NY 11576-1588

Re: Corrective Measures Work Plan (CMWP) Approval Letter
34-11 Beach Channel Drive, Far Rockaway
Queens County, Site No.: C241141

Dear Daniel Moritz (as the Certifying Party):

The New York State Department of Environmental Conservation (the Department) has completed its review of the Corrective Measures Work Plan (CMWP) dated April 2024, which was prepared by AMC Engineering PLLC on behalf of Rockaway Seagirt Limited Partnership (the Volunteer). The CMWP is hereby approved.

The Volunteer and its contractors are solely responsible for the safe execution of all invasive and other field work performed under the CMWP. The Volunteer and its contractors must obtain all local, state, and/or federal permits or approvals that may be required to perform work under the CMWP. Further, the Volunteer and its contractors are solely responsible for the identification of utilities that might be affected by work under the CMWP and the implementation of all required, appropriate, or necessary health and safety measures during performance of work under the CMWP.

In accordance with the requirements of the Brownfield Cleanup Agreement (BCA) and the Citizen Participation Plan, please place a copy of the approved CMWP in the document repositories within 5 business days and provide a certification that the repositories have been populated with all relevant site-related documents. Any draft copies of the CMWP should be removed.

In accordance with the terms of the BCA, please notify the Department at least 7 days in advance of commencing fieldwork related to the CMWP.

If you have any technical questions regarding this matter, please contact Christopher Allan at (718) 482-4065 or christopher.allan@dec.ny.gov.

Sincerely,

Christopher Allan

Christopher Allan
Project Manager

ec: J. O'Connell, C. Maycock – NYSDEC
S. McLaughlin, S. Wagh – NYSDOH
A. Czemerinski, A Sung – AMC Engineering
J. Dunston – Rockaway Seagirt Limited Partnership

Revised – Underlined text is revised / added

34-11 BEACH CHANNEL DRIVE SITE

34-11 BEACH CHANNEL DRIVE, FAR ROCKAWAY, NEW YORK 11691

CORRECTIVE MEASURES WORK PLAN

NYSDEC BCP Number: C-241141

Prepared For:

Rockaway Seagirt Limited Partnership
15 Verbena Avenue, Suite 100
Floral Park, NY 11001

Prepared by:

AMC Engineering PLLC
18-36 42nd Street
Astoria, NY 11105

APRIL 2024

April 17, 2024

Mr. Christopher H. Allan
New York State Department of Environmental Conservation (NYSDEC)
Division of Environmental Remediation
47-40 21st Street
Long Island City, NY 11101

Ref.: NYSDEC BCP# C241141
34-11 Beach Channel Drive
Queens, NY 11418
Staten Island, NY 10305
Corrective Measures Work Plan & Response to PRR Comments

Dear Mr. Allan:

This Corrective Measures Work Plan (CMWP) has been prepared in response to your Site Management (SM) Periodic Review Report (PRR) Response Letter (dated January 17, 2024), and the rejection of our PRR. This rejection has been issued after our request to terminate the sub-slab depressurization system (SSDS) and terminate groundwater sampling was denied.

Background Information and Summary

The Site underwent remedial activities under NYSDEC BCP Project# C241141. A Final Engineering Report (FER) and Site Management Plan were issued at the end of 2016, which describes the scope of the remedy, which included groundwater dewatering, in-situ chemical injections, excavation activities, and the implementation of Institutional and Engineering Controls (ICs/ECs) at the site.

The concerns stem from the possibility that the existing groundwater monitoring wells (15MW1, 15MW2, and 15MW3) may not be properly depicting the groundwater conditions. The groundwater table starts 4-5 feet below grade, and soil CVOCs contamination were found in “RIB-2 soil boring” at 13-15’, 20-22’, and 37-39’ below grade. The existing monitoring wells are installed to a termination depth of 30’ below grade and consist of a 15’ screen and 15’ riser.

The main concerns with the existing monitoring wells are: a) the wells do not extend down to determine whether the 37-39’ contamination has been addressed, and b) the wells penetrate the clay layer (20-25’ below grade) and they are screened within the two aquifers, which may have different groundwater flow directions (as per Remedial

Investigation Report by FPM Group, dated February 2015, and Remedial Investigation Report by TRC, dated August 2015 for the adjacent site).

Proposed Corrective Measures

The following corrective measures are proposed:

1. Install three (3) new cluster wells on the job site, as shown in Figure 2. Each cluster consists of three wells (one screened for the 11-16' interval, the second screened for the 19-24' interval, and the last for the 35-40' interval), for a total of nine (9) wells.
2. Install data loggers in all nine newly proposed wells, to determine the effect of tidal influence and other factors that may influence the groundwater flow direction.
3. Survey top of casing of all new monitoring wells at the site, relative to NAVD88 datum.
4. Collect groundwater samples from 24MW-1S, 24MW-1I, and 24MW-1D, the cluster well closest to "RIB-2", to establish groundwater quality in the 13-15', 20-22', and 37-39' intervals.
5. Decommission (abandon) existing monitoring wells: 15MW1, 15MW2, and 15MW3.

These correctives measures will be implemented to:

- Determine the groundwater flow direction in the shallow aquifer;
- Determine the groundwater flow direction in the deep aquifer;
- Establish groundwater quality in the 13-15', 20-22', and 37-39' intervals; and
- Eliminate 15MW1, 15MW2, and 15MW3, which no longer serve any practical purpose onsite.

Based on the results of the groundwater sampling event and direction of groundwater flow, additional direction and guidance may be required from the Department.

Installation of New Monitoring/Cluster Wells

The installation of new cluster wells is necessary to determine the groundwater flow direction within the upper and lower aquifers, and to evaluate whether the on-site groundwater contamination has migrated off-site.

A total of three (3) cluster wells are proposed to determine the direction of the groundwater flow within the upper and lower aquifers. Each cluster well will consist of three (3) monitoring wells, denoted as "Monitoring Well Shallow (MW-S)", "Monitoring Well Intermediate (MS-I)", and "Monitoring Well Deep (MW-D)". For three clusters, this is a total of nine (9) monitoring wells.

All proposed wells will be constructed using a 2-inch diameter PVC riser/casing and 0.02-

inch machine-slotted PVC screen. Each monitoring well will be installed within a 6" borehole, to create a 2" annulus around the wells. The well annuli will be backfilled with #2 well gravel/sand pack (or equal) to cover the screened interval. The sand pack above each screen will be sealed with a two-foot bentonite seal, and the balance of each annulus will be backfilled with the sand pack to grade elevation.

Shallow Wells

The shallow wells (24MW-1S, 24MW-2S, 24MW-3S) will be installed from grade elevation to 16' below grade. Each shallow well will consist of an 11' riser and 5' screen. The shallow wells will represent groundwater conditions from 11-16' below grade, which aims to capture the 13-15' contamination zone found during the remedial investigation.

Intermediate Wells

The intermediate wells (24MW-1I, 24MW-2I, 24MW-3I) will be installed from grade elevation to 24' below grade. Each intermediate well will consist of an 19' riser and 5' screen. The intermediate wells will represent groundwater conditions from 19-24' below grade, which aims to capture the 20-22' contamination zone found during the remedial investigation. The intermediate wells also represent the groundwater quality within the injection zone.

Deep Wells

The deep wells (24MW-1D, 24MW-2D, 24MW-3D) will be installed from grade elevation to 40' below grade. Each deep well will consist of a 35' riser and 5' screen. The deep wells will represent groundwater conditions from 35-40' below grade, which aims to capture the 37-39' contamination zone found during the remedial investigation.

Well construction logs will be generated upon completion of the cluster well installation and submitted to the Department as part of the Corrective Measures Report.

The new cluster well installation will follow the sequence below:

1. Advance a soil boring to 40' below grade and characterize the subsurface materials to note the intervals of clay present in each location.
2. Install the deep well (24MW-1D, 24MW-2D, or 24MW-3D) such that the screen is not fully embedded in clay.**
3. Install the intermediate well (24MW-1I, 24MW-2I, or 24MW-3I) such that the screen is not fully embedded in clay.**
4. Install the shallow well (24MW-1S, 24MW-2S, or 24MW-3S) to 16' below grade.

**The terminal depth of the intermediate and deep well will be determined by the qualified environmental consultant overseeing the cluster well installation. The final depths of each

well may vary, but the objective is to capture the 13-15', 20-22', and 37-39' intervals for the shallow, intermediate, and deep wells, respectively.

Installation of Data Loggers

Data loggers will be installed in all nine (9) wells after well development. Data loggers (Level TROLL series by In-Situ Inc. or equal) will be installed to the bottom of the wells. Each data logger will be programmed to obtain one reading per minute for a total of seven (7) days, to determine the changes in the groundwater elevations over a week. This data will be used to determine whether tidal influence affects the respective aquifer. If the data is unclear, the data loggers may need to remain for a longer period.

On-site Survey & Groundwater Flow Direction

The surveying of the wells will be performed after all the data loggers have been removed. This is to ensure that the groundwater levels within the wells have stabilized, and all tidal influence can be accounted for, based on data obtained during the prior week. A summary of the surveying event and established groundwater flow direction will be submitted to the Department as part of the Corrective Measures Report.

Groundwater Sample Collection

Three (3) groundwater samples will be collected from 24MW-1S, 24MW-1I, and 24MW-1D, and analyzed for:

- Volatile Organic Compounds (VOCs) via EPA Method 8260

A summary of the groundwater sampling event will be submitted to the Department as part of the Corrective Measures Report.

Monitoring Well Abandonment

The existing monitoring wells, 15MW1, 15MW2, and 15MW3 will no longer serve any purpose at the site and will be abandoned as part of this CMWP. The monitoring wells will be decommissioned as per NYSDEC CP-43: Groundwater Monitoring Well Decommissioning Policy, and tremie-fed with a mixture of grout/bentonite, Portland Cement, and sand.

Well decommissioning records will be submitted to the Department as part of the Corrective Measures Report.

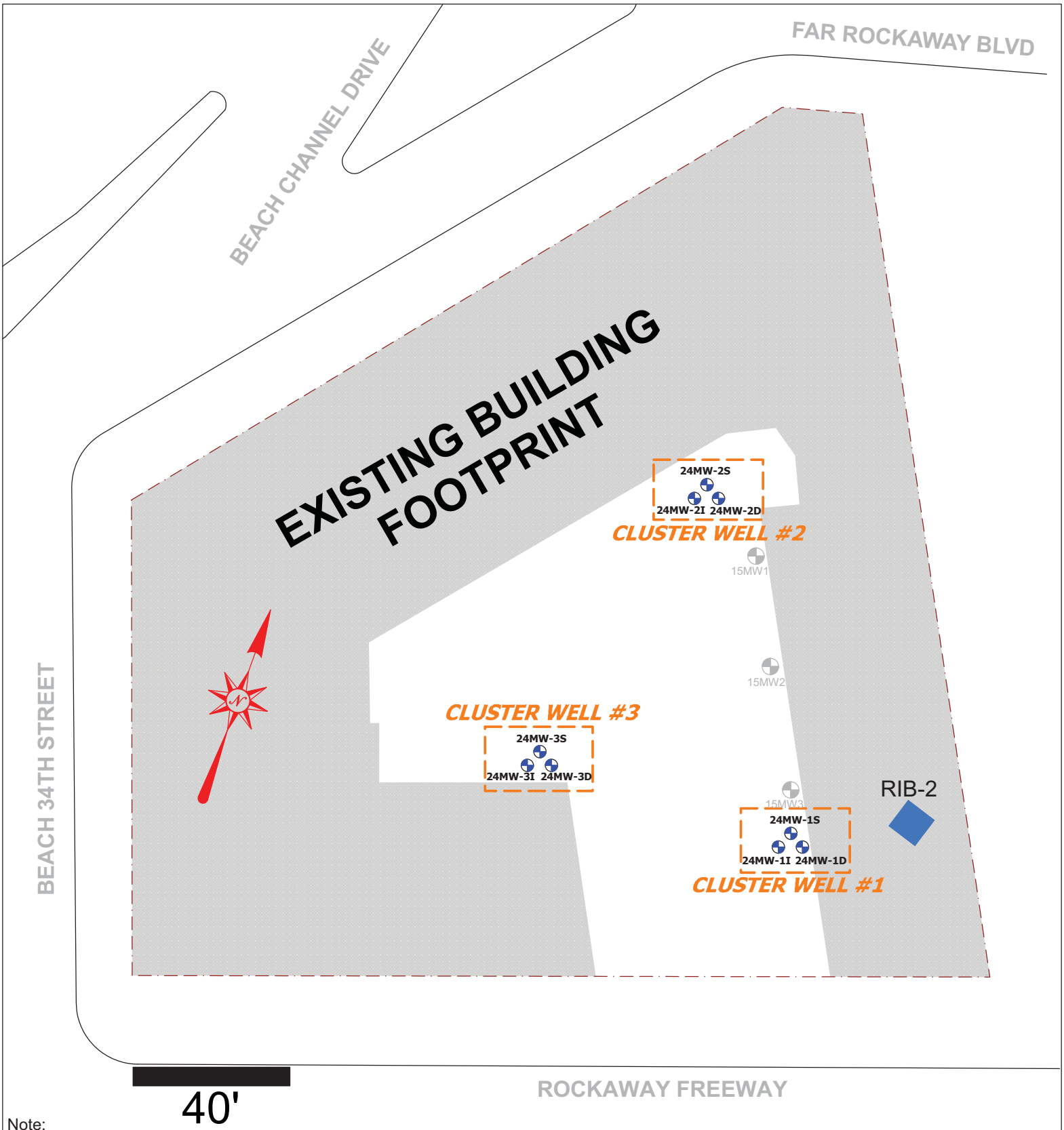
Please feel free to contact me with any questions or concerns.

Sincerely,

Ariel Czemerinski, PE
AMC Engineering, PLLC

Attachments

1. Figures
    a. Cluster Well Installation Plan
    b. Monitoring Well Abandonment Plan
    c. Geologic Cross Sections: West to East
    d. Geologic Cross Sections: South-West to North-East
    e. Geologic Cross Sections: North-West to South-East
2. Copy of PRR Rejection Letter



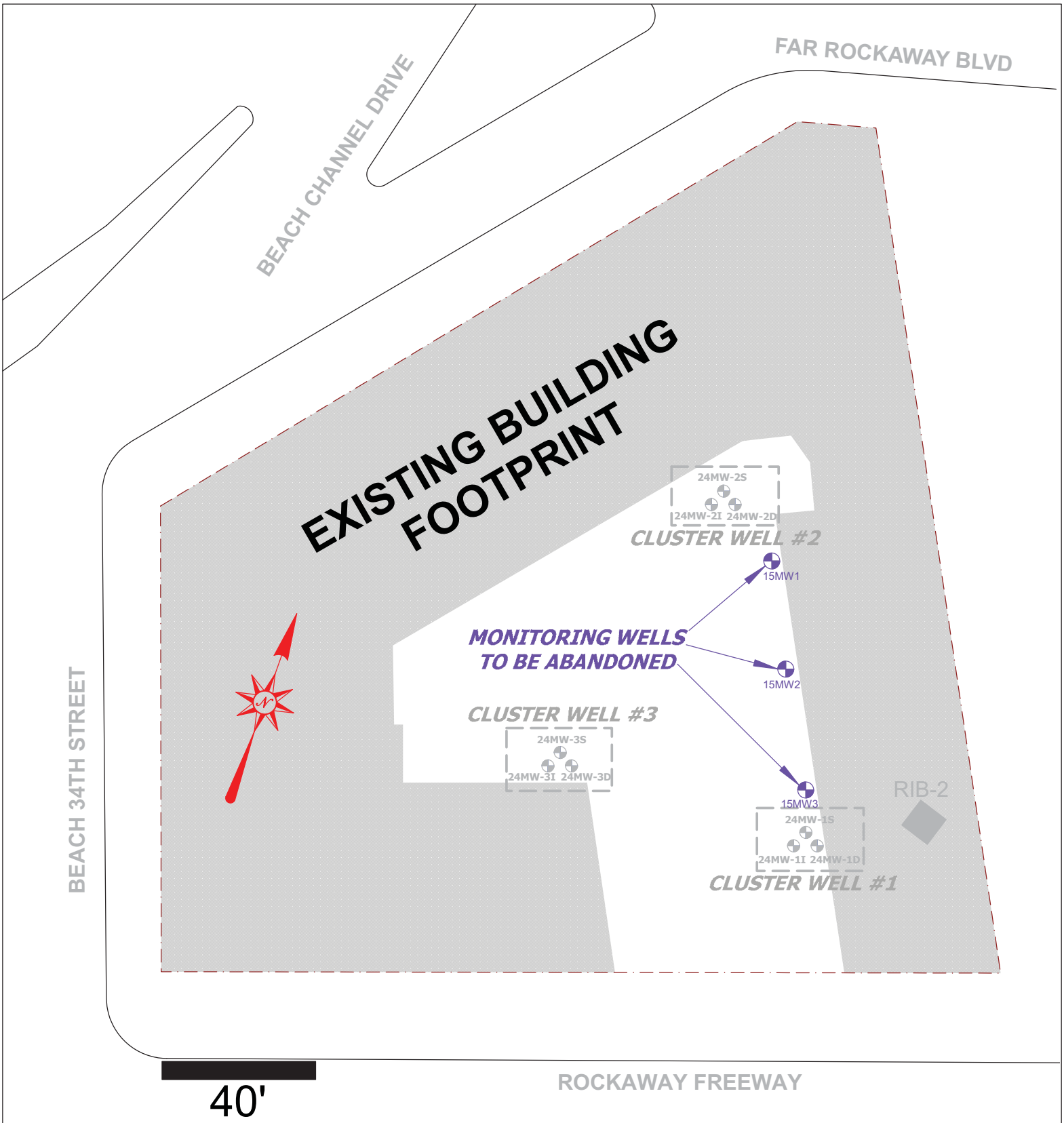
Note:
1. Shallow wells will be installed to a depth of 16' below grade.
2. Intermediate wells will be installed to a depth of 24' below grade.
3. Deep wells will be installed to a depth of 40' below grade.
4. Each well is made up of 5' screen, and the rest as riser pipe.

AMC ENGINEERING PLLC
18-36 42nd Street
Astoria, NY 11105
718-545-0474

PROJECT
NYSDEC BCP #C-241141
34-11 Beach Channel Drive
Far Rockaway, NY

DATE: APR 17, 2024 | DRAWING BY: AS

TITLE:
Cluster Well Installation Plan



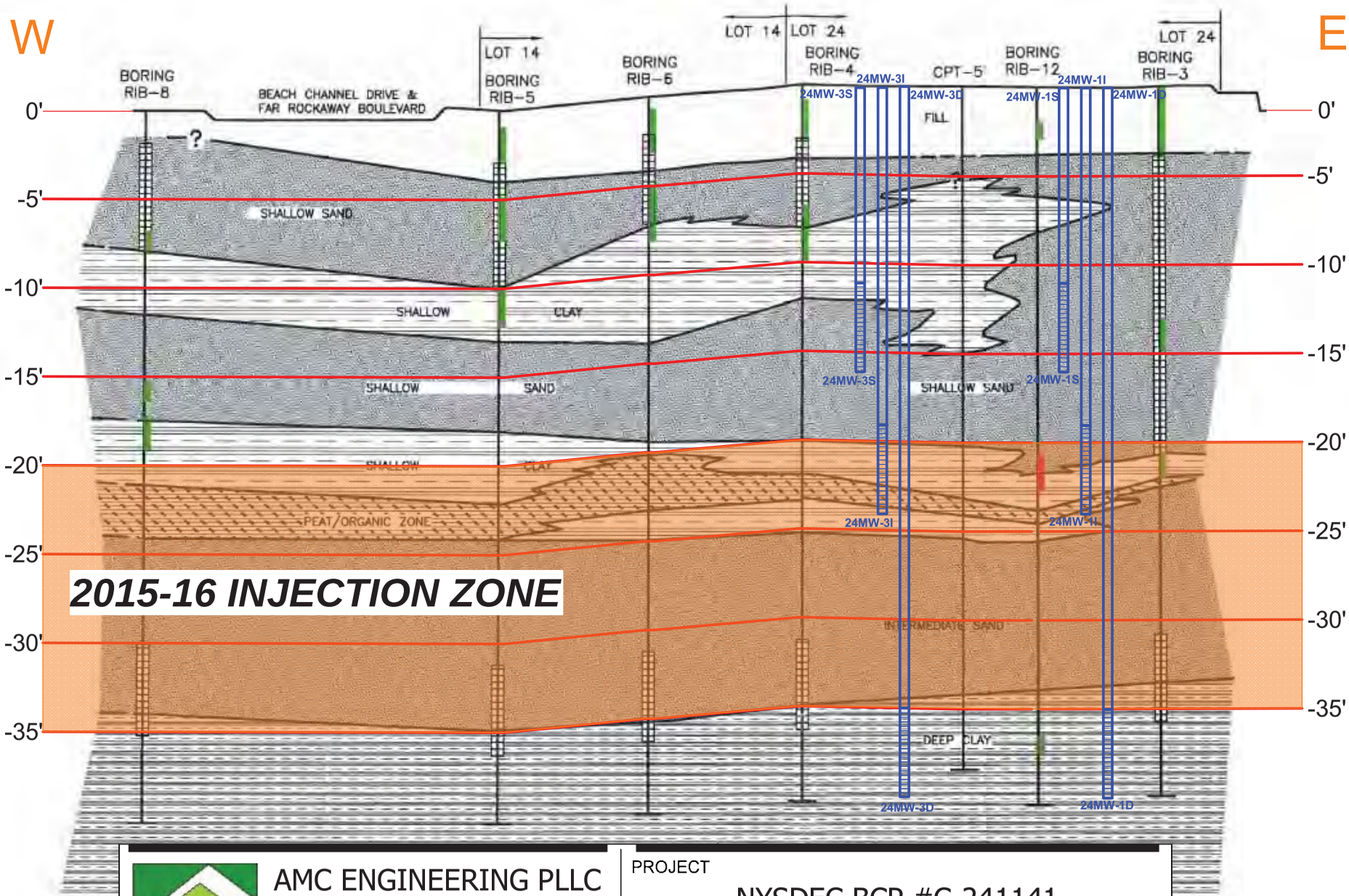
Note:
1. Three (3) existing monitoring wells (15MW1, 15MW2, 15MW3) will be abandoned as part of this CMWP.

AMC ENGINEERING PLLC
18-36 42nd Street
Astoria, NY 11105
718-545-0474

PROJECT
NYSDEC BCP #C-241141
34-11 Beach Channel Drive
Far Rockaway, NY

DATE: APR 17, 2024 | DRAWING BY: AS

TITLE: Monitoring Well Abandonment Plan

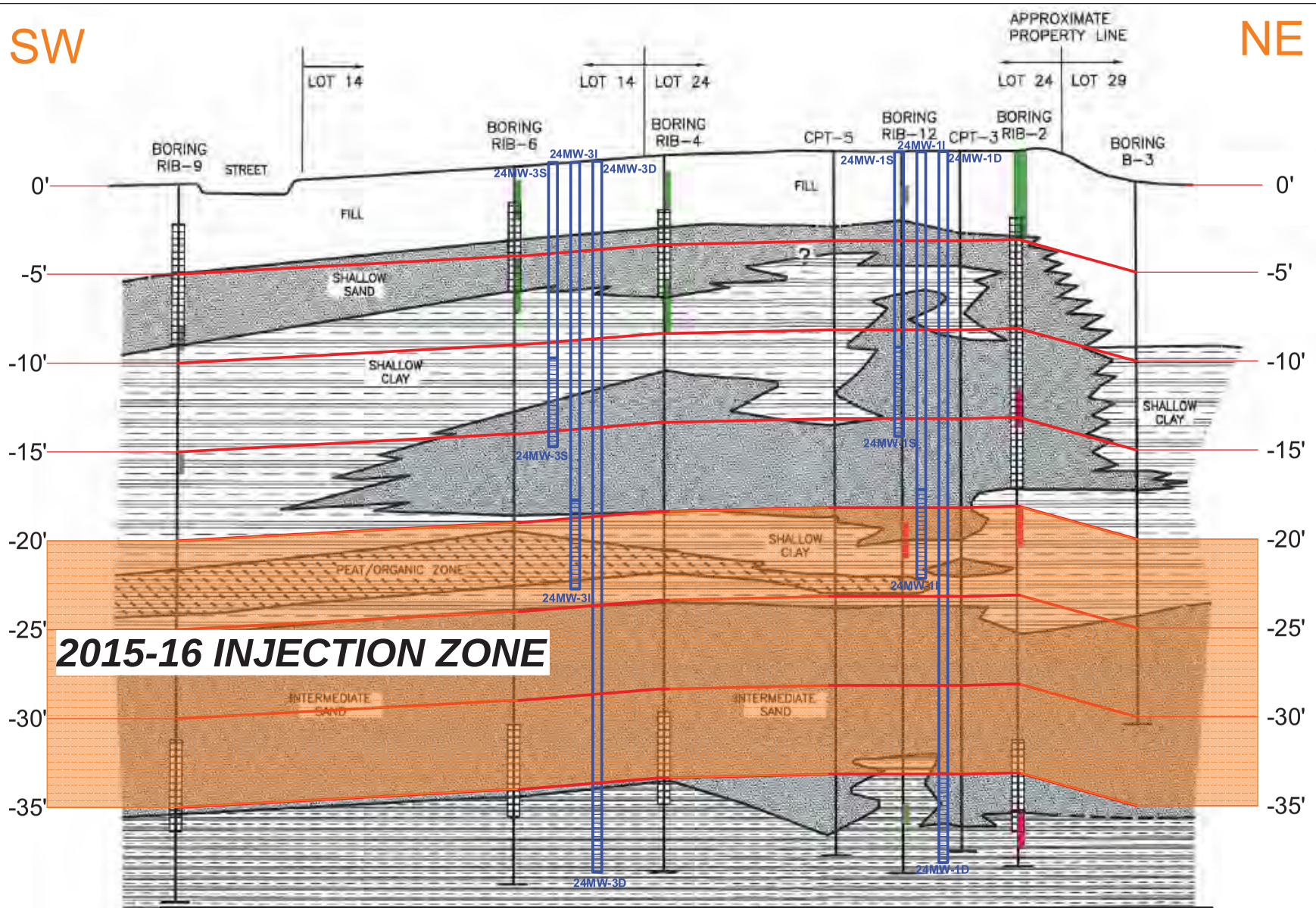


AMC ENGINEERING PLLC
18-36 42nd Street
Astoria, NY 11105
718-545-0474

PROJECT
NYSDEC BCP #C-241141
34-11 Beach Channel Drive
Far Rockaway, NY

DATE: APR 17, 2024 | DRAWING BY: AS

TITLE: GEOLOGIC CROSS SECTIONS WEST TO EAST



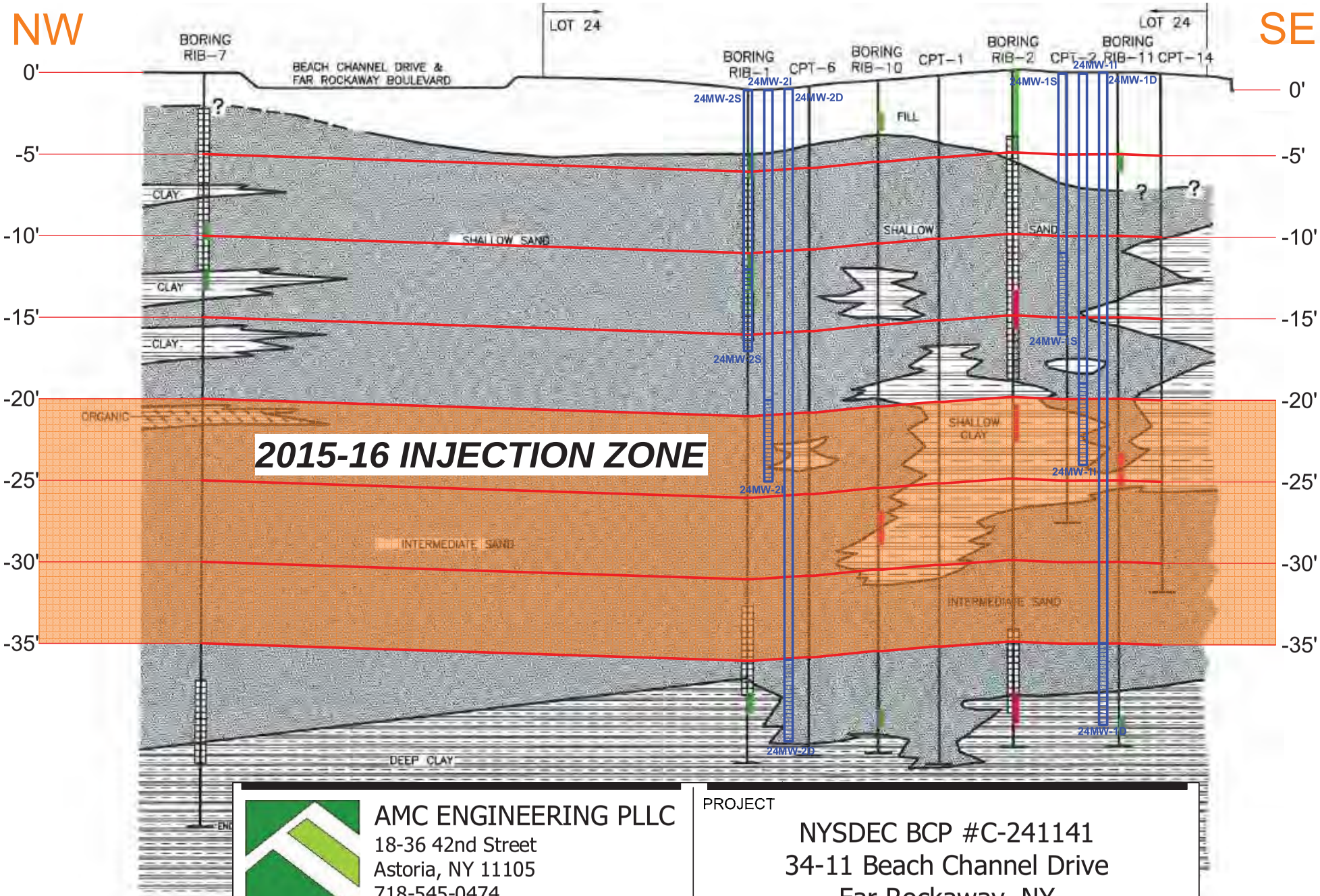
AMC ENGINEERING PLLC
18-36 42nd Street
Astoria, NY 11105
718-545-0474

PROJECT
NYSDEC BCP #C-241141
34-11 Beach Channel Drive
Far Rockaway, NY

DATE: APR 17, 2024

DRAWING BY: AS

TITLE: GEOLOGIC CROSS SECTIONS SOUTH-WEST TO NORTH-EAST



AMC ENGINEERING PLLC
18-36 42nd Street
Astoria, NY 11105
718-545-0474

PROJECT
NYSDEC BCP #C-241141
34-11 Beach Channel Drive
Far Rockaway, NY

DATE: APR 17, 2024

DRAWING BY: AS

TITLE: GEOLOGIC CROSS SECTIONS NORH-WEST TO SOUTH-EAST

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

Division of Environmental Remediation, Region 2
47-40 21st Street, Long Island City, NY 11101
P: (718) 482-4995
www.dec.ny.gov

January 17, 2024

Daniel Moritz
Rockaway Seagirt Commercial LLC
1044 Northern Blvd, 2nd Floor
Roslyn, NY 11576-1588

Re: Site Management (SM) Periodic Review Report (PRR) Response Letter
34-11 Beach Channel Drive, Far Rockaway
Queens County, Site No.: C241141

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If you have any questions, or need additional forms, please contact me at 718-482-4065 or christopher.allan@dec.ny.gov.

Sincerely,

Christopher Allan

Christopher Allan
Project Manager

NEW YORK STATE | Department of Environmental Conservation

ec: J. O'Connell, C. Maycock – NYSDEC
S. McLaughlin, S. Wagh – NYSDOH
A. Czemerinski, A. Sung – AMC Engineering