

**GOWANUS CANAL SUPERFUND SITE  
RTA2 REMEDIAL CONSTRUCTION  
Water Quality Monitoring Weekly Data Summary**

**PERIOD: December 9, 2024 – December 13, 2024**

**Date of Report: December 17, 2024**

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## **1. SCOPE OF MONITORING**

### **1.1 Buoy Locations**

In accordance with the Water Quality Monitoring Plan for In-waterway Construction Activities (WQMP) issued March 27, 2024, buoys equipped with multi-parameter water quality sondes, were deployed to monitor turbidity related to RTA2 construction activities. Buoys were deployed in the Fourth Street Turning Basin (TB4) to monitor background turbidity unaffected by in-water construction activities and at the North Carroll Street Bridge, which is referred to as the ambient buoy. A sentinel buoy was deployed north of 3<sup>rd</sup> Street Bridge (3SB), along the west bulkhead. These buoys (Figure 1) are in use to monitor the RTA2 pre-construction activities.

All readings from buoys were transmitted via telemetry at 15-minute intervals. The instrument used to collect turbidity from the buoys is an In-Situ VuLink (telemetry) and AquaTroll500 (sonde), equipped with optical sensors capable of reading turbidity levels with an accuracy of +/- 0.5 NTU.

### **1.2 Summary of Monitoring Adjustments during Construction**

- August 9, 2024, after the conclusion of RTA1 WQMP, two additional buoys were added to the RTA2 WQMP, for a total of three sentinel buoys. The ambient buoy was moved to approximately ten meters north of Carroll Street Bridge, on the west side of the canal (ambient). A sentinel buoy was placed approximately twenty meters north of 3<sup>rd</sup> Street Bridge on the west side (3SB). A sentinel buoy was placed in Fourth Street Turning Basin (TB4). The 9<sup>th</sup> Street Bridge sentinel buoy (9SB) was not moved.
- To reduce instrument downtime, the 9th Street Bridge sentinel buoy (9SB) was relocated to the northeast side of the 9th Street Bridge on August 19, 2024. After two days of data collection, elevated turbidity readings were observed both during and outside of work hours. Consequently, on August 21, 2024, the buoy was moved again, this time to the northeast corner of the Hamilton Street Bridge.
- Turbidity readings at the Hamilton Street Bridge location exceeded 100 NTU both during and outside working hours. However, these readings were not representative of the actual turbidity within the RTA2 work area. Due to commercial traffic, a safe location for the sonde and buoy could not be found south of the 9th Street Bridge. Consequently, the sonde and buoy were relocated to the west side, 5 meters north of the 9th Street Bridge on Tuesday, August 27, 2024, at 08:15.
- Turbidity readings at 9SB were noted to be erratic and exceed 100 NTU both during and outside working hours. The buoy was moved approximately 20 meters north of 9<sup>th</sup> Street Bridge on Monday, September 9, 2024.
- On September 16, 2024, the 9SB was deselected from construction monitoring, as there are no construction activities in the main canal or in the vicinity of 9<sup>th</sup> Street Bridge. The

buoy will remain in the water to collect background data as it is believed this area has naturally high NTU readings. A spot check zero calibration was performed on the buoy on Wednesday, September 18, 2024 to confirm the sensors were reading properly during this background monitoring period.

- On November 7, 2024, the ambient sonde and buoy was moved to the center of Carroll Street Bridge in an effort to reduce instrument downtime due to poor cell signal. This area was found to have a 100% cellular signal.
- On November 18, 2024, the sentinel buoy in TB4 was deselected from construction monitoring due to instrument errors. The buoy will remain out of service until maintenance and field observations can be made.
- On November 25, 2024, the 9SB sonde and buoy were placed back into the water quality monitoring program.



<p><b>Legend</b></p> <ul style="list-style-type: none"><li><span style="color: orange;">●</span> Ambient Buoy</li><li><span style="color: green;">●</span> Sentinel Buoy</li><li><span style="color: orange;">□</span> RTA1</li><li><span style="color: blue;">□</span> RTA2</li><li><span style="color: green;">□</span> RTA3</li></ul>	<p>300    150    0    300 Feet</p>
	<p><b>RTA2 Buoy Locations</b></p>
	<p>Gowanus Canal, Brooklyn, NY</p>
	<p>B&amp;B Engineers &amp; Geologists  of new york, p.c.</p>
	<p><i>an affiliate of Geosyntec Consultants</i></p>
	<p>Brooklyn, NY      November 25, 2024</p>
<p><b>Figure 1</b></p>	

### **1.3 Current Reporting Period Scope of Monitoring**

During the week of December 9, 2024, three buoys equipped with multi-parameter water quality sondes were deployed as described in Section 1.2.

All readings from buoys were transmitted via telemetry at 15-minute intervals. The instrument used to collect turbidity and DO from the buoys is an In-Situ VuLink (telemetry) and AquaTroll500 (sonde), equipped with optical sensors capable of reading turbidity levels with an accuracy of +/-0.5 NTU and DO levels with an accuracy of +/-0.1 mg/L.

Visual observations of turbidity and sheen are summarized in Section 5.

### **1.4 Meteorological Conditions**

The weather conditions onsite were as follows:

Meteorological Parameters	12/9/2024	12/10/2024	12/11/2024	12/12/2024	12/13/2024
<i>Wind Direction (from)</i>	E	NE	N	WNW	NNW
<i>Wind Speed (mph)</i>	3.2	5.2	3.4	13.6	6.5
<i>Temperature (°F)</i>	47.4	49.0	52.5	35.5	31.1
<i>Humidity (%)</i>	84.3	99.0	100.0	42.5	39.3
<i>Barometric Pressure (inHg)</i>	29.88	29.93	29.80	30.14	30.59
<i>Precipitation (Inch)</i>	0.15	0.10	0.97	0.55	0

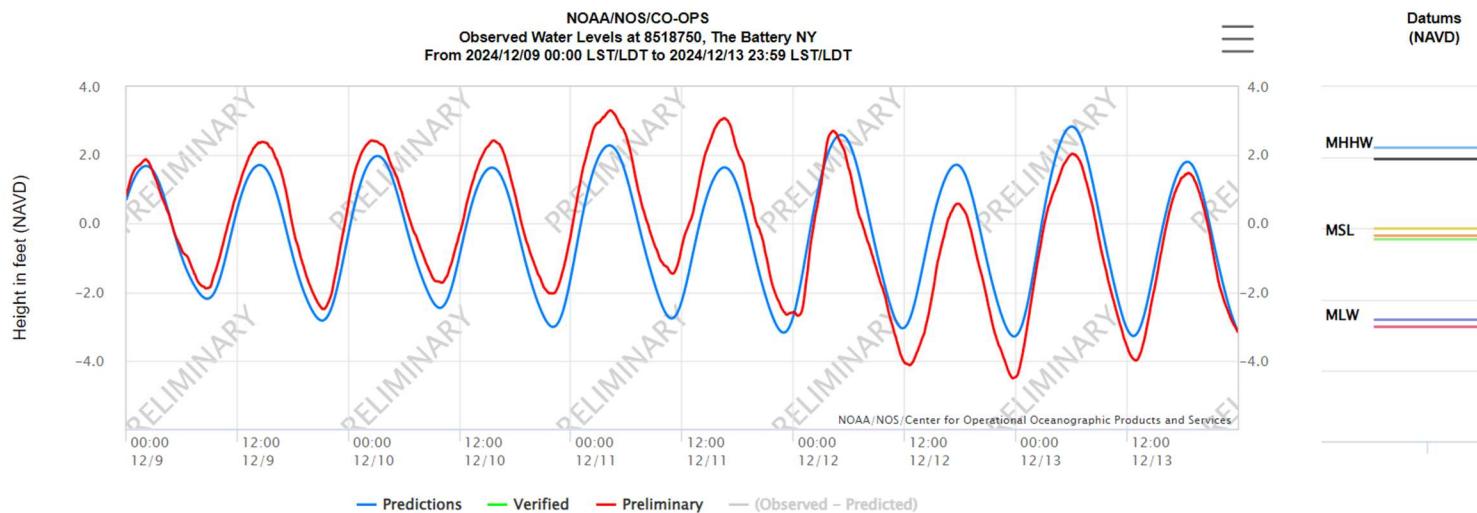
Table 1 - Summary of Weather Conditions for reporting period.

### **1.5 Tidal Conditions**

Tidal data from the Battery (National Oceanic and Atmospheric Administration [NOAA] Station 8518750) was reviewed and is summarized as follows:

Date	Time (LST/LDT)	Predicted (ft)	Preliminary (ft)	High/Low
Monday, December 9, 2024	2:06	1.68	1.88	H
Monday, December 9, 2024	8:42	-2.19	-1.87	L
Monday, December 9, 2024	14:22	1.71	2.38	H
Monday, December 9, 2024	21:06	-2.83	-2.49	L
Tuesday, December 10, 2024	3:05	1.98	2.41	H
Tuesday, December 10, 2024	9:49	-2.46	-1.73	L
Tuesday, December 10, 2024	15:25	1.64	2.42	H
Tuesday, December 10, 2024	22:01	-3.02	-2.03	L
Wednesday, December 11, 2024	4:06	2.28	3.29	H
Wednesday, December 11, 2024	10:48	-2.77	-1.43	L
Wednesday, December 11, 2024	16:31	1.64	3.08	H
Wednesday, December 11, 2024	22:54	-3.18	-2.58	L
Thursday, December 12, 2024	5:05	2.59	2.71	H
Thursday, December 12, 2024	11:44	-3.06	-4.12	L
Thursday, December 12, 2024	17:32	1.72	0.58	H
Thursday, December 12, 2024	23:46	-3.3	-4.49	L
Friday, December 13, 2024	5:59	2.83	2.04	H
Friday, December 13, 2024	12:38	-3.28	-3.96	L
Friday, December 13, 2024	18:27	1.81	1.44	H

**Table 2 - NOAA Preliminary observations and predictions.**



**Figure 2 - Tidal Chart for reporting period.**

## 2. REPORT OF EXCEEDANCES

No readings exceeded the trigger or action criterion during the monitoring period.

The 9SB monitor was noted to have been in shallow waters and as a result the sonde was stuck and/or beached in sediment for some periods of the reporting period causing false elevated readings between Thursday December 12 to Friday December 13.

Turbidity and floatables were observed throughout the reporting period unrelated to construction activities.

- **Trigger criterion** – Any of the following:
  - The rolling average of the relevant sentinel buoy turbidity measurements over a one-hour period exceeds the rolling average of the ambient buoy turbidity measurements by 20 NTU excluding any eliminated outlier measurements and in-waterway construction activities cannot be immediately excluded as the source following consultation with EPA; or
  - Either an oil sheen or a turbidity plume is visually observed at the relevant sentinel buoy and in-waterway construction activities are readily identified as the source.
- **Action criterion** – Any of the following:
  - The rolling average of the turbidity measurements of the sentinel buoy outside of RTA2 over a one-hour period exceeds the rolling average of the ambient buoy turbidity measurements by 40 NTU excluding any eliminated outlier measurements and in-waterway construction activities cannot be immediately excluded as the source following consultation with EPA; or
  - Either an oil sheen or a turbidity plume is visually observed outside of RTA2, and any deployed engineering controls and in-waterway construction activities are readily identified as the source.

An outlier is defined as a reading that is outside the range of 50 to 200 percent of the average of the three previous readings. In addition, to be considered an outlier, the subsequent reading must return to a range of 75 to 133 percent of the average of the three readings preceding the outlier.

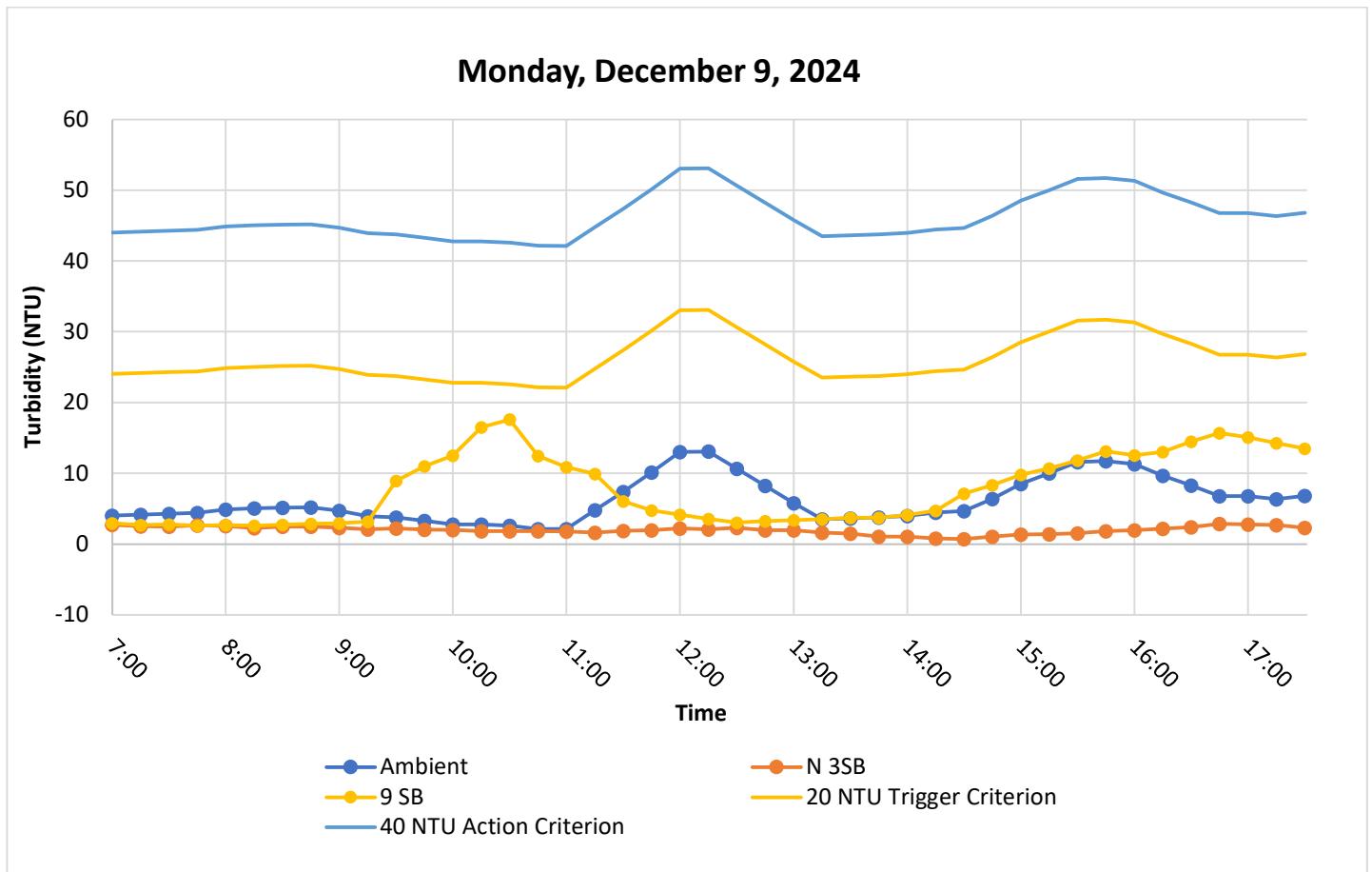
## **2.1 Response to Criteria Exceedances**

The trigger level criterion serves to provide early notification to the contractor of construction activities that may lead to an exceedance of the action level criterion. In the event of an exceedance to the trigger criterion, the contractor will not be stopped, and the contractor will be directed to investigate the source of the exceedance and evaluate Best Management Practices (BMPs). In the event of an exceedance to the action level criterion, in-waterway construction activities may be slowed or temporarily suspended as necessary while the contractor investigates the source of the exceedance and appropriate mitigation, and corrective measures are determined. A more detailed description of responses to exceedances of the trigger and action level criteria is provided in Section 4.2 of the WQMP.

### 3. TURBIDITY BUOY DATA

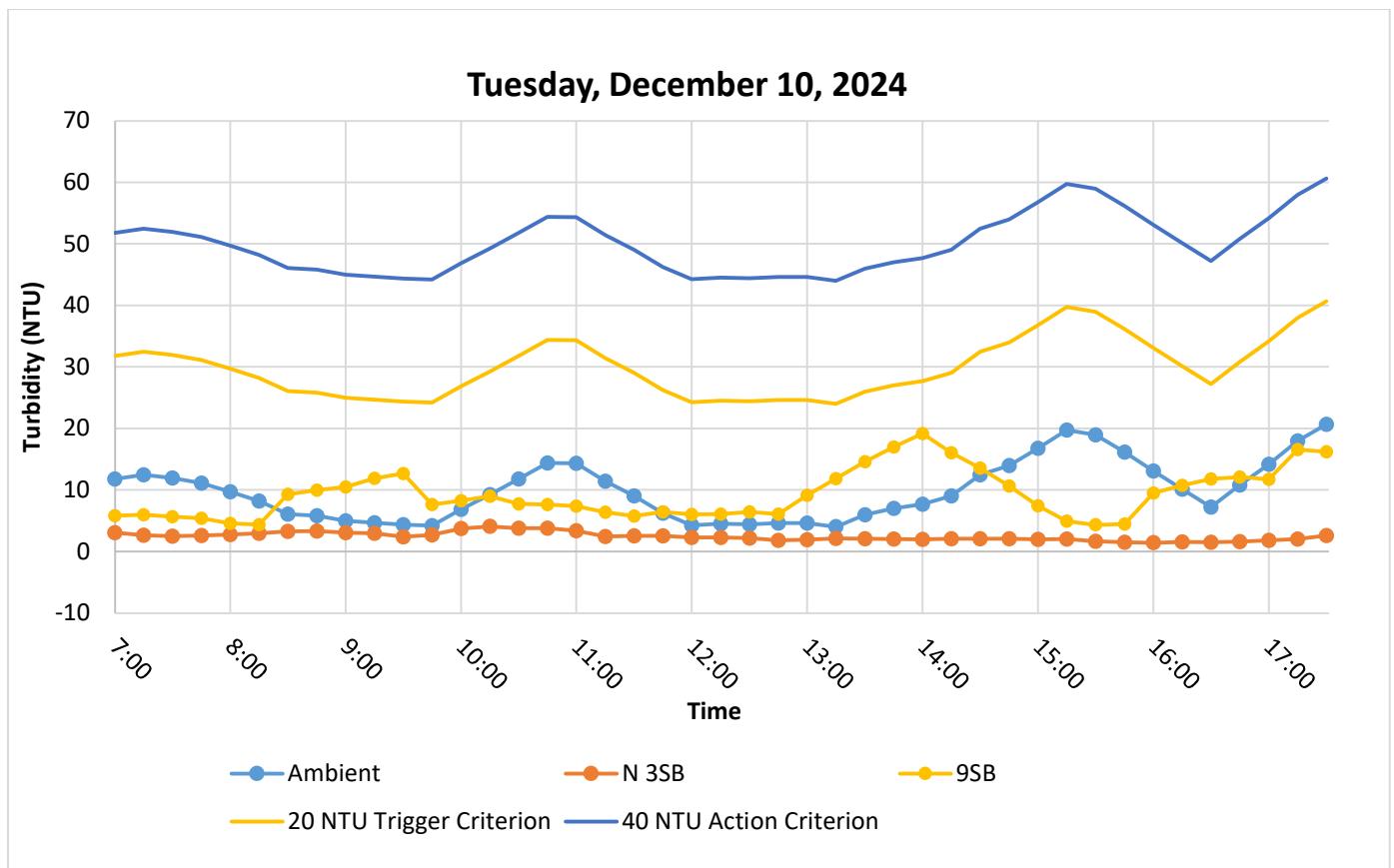
Throughout the reporting period, readings at the Ambient and 3SB sonde remained relatively stable. 9SB sonde readings fluctuated as it was moved to too shallow water midday from on Thursday, December 12 to Friday December 13. Heavy rainfall occurred throughout the day on Wednesday, December 11.

#### 3.1 Monday, December 9, 2024



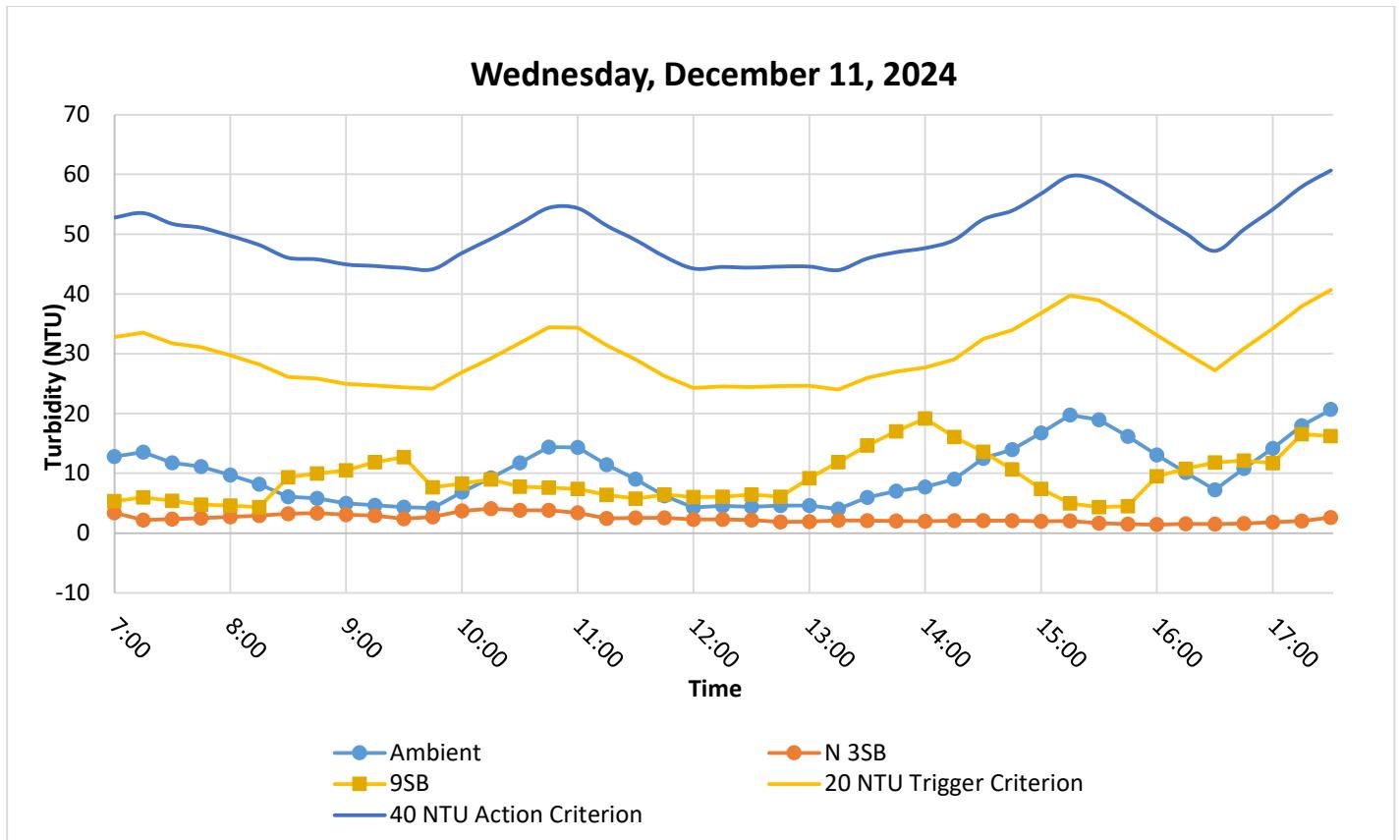
**Figure 3.** Hourly rolling average turbidity readings from 07:00 to 17:30.

### 3.2 Tuesday, December 10, 2024



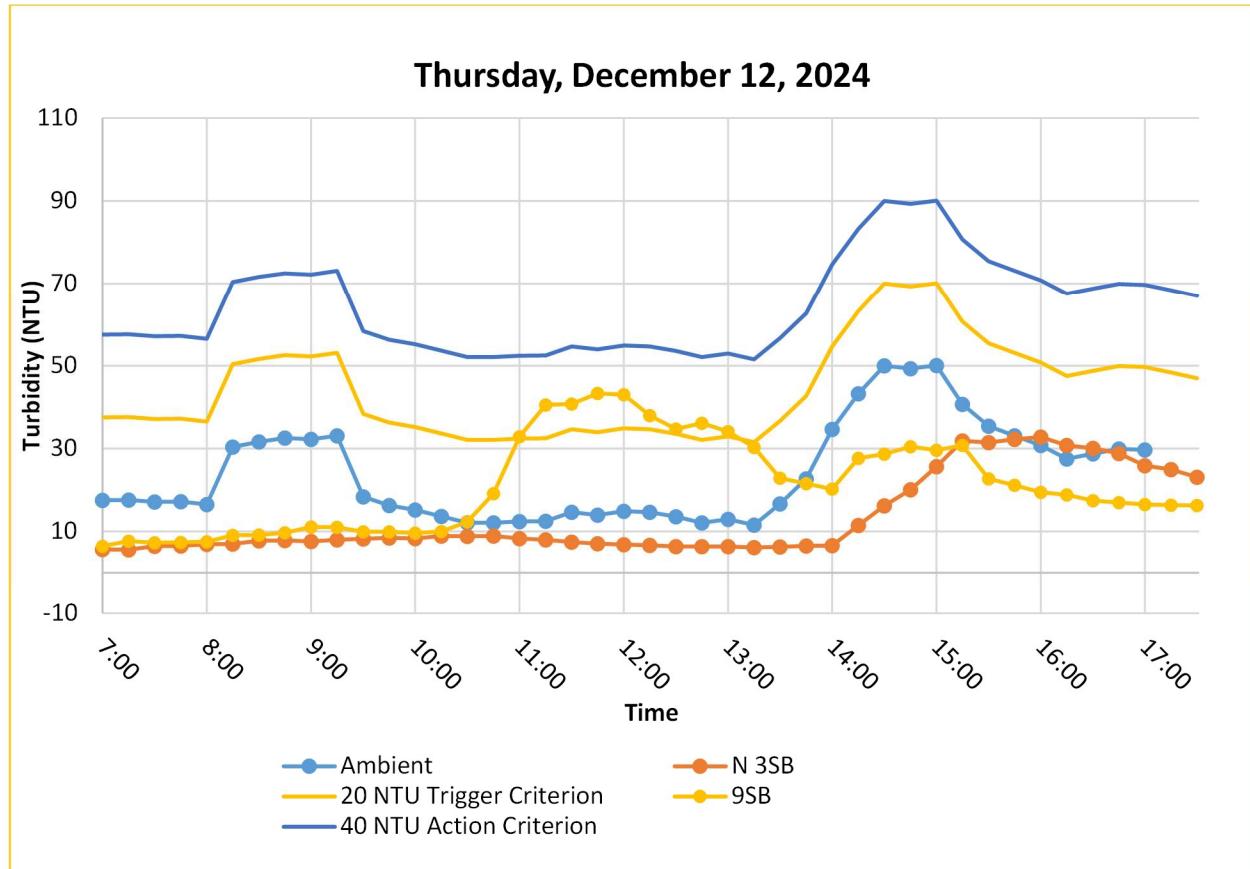
**Figure 4.** Hourly rolling average turbidity readings from 07:00 to 17:30.

### 3.3 Wednesday, December 11, 2024



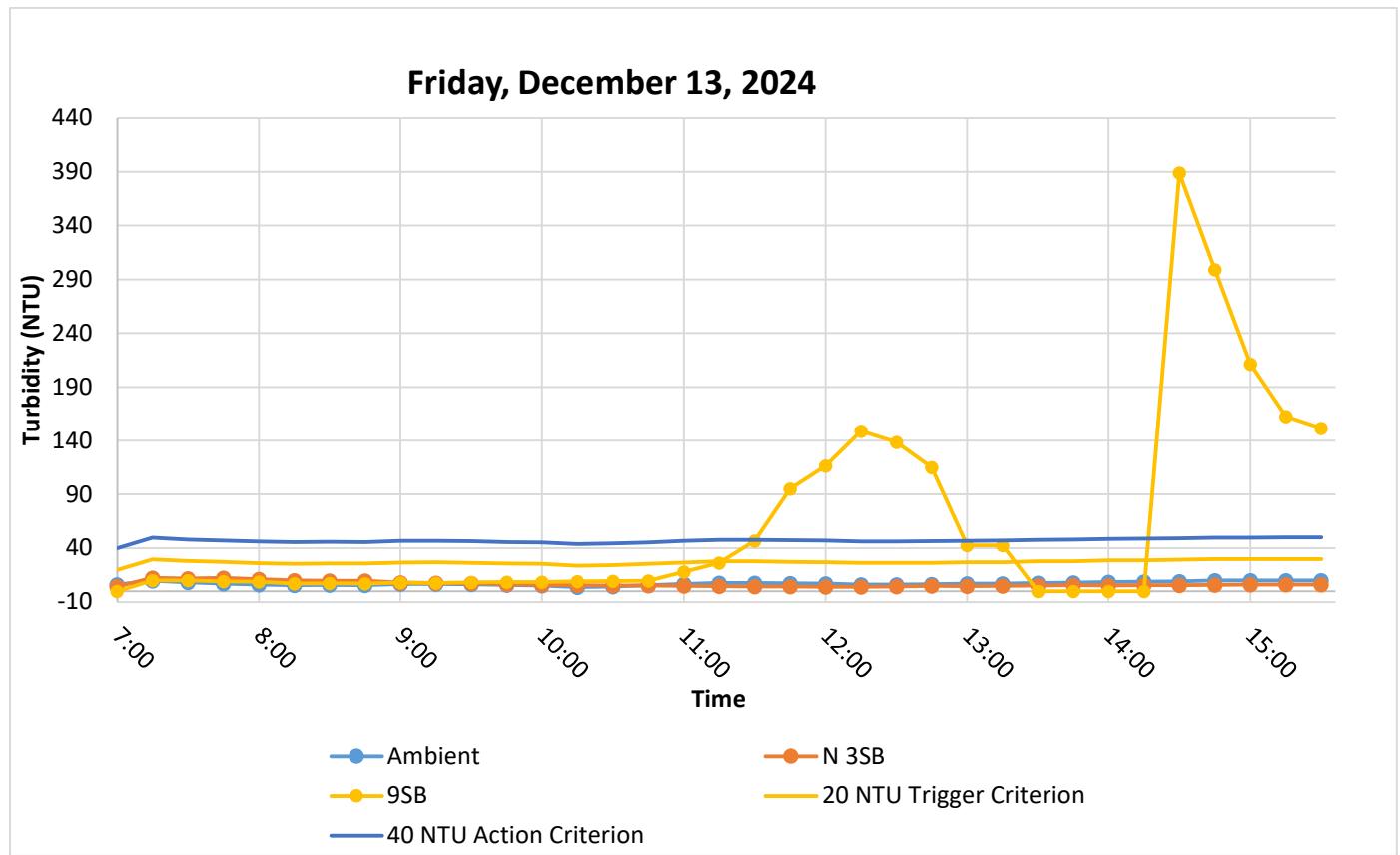
**Figure 5.** Hourly rolling average turbidity readings from 07:00 to 17:30.

**3.4      Thursday, December 12, 2024**



**Figure 6.** Hourly rolling average turbidity readings from 07:00 to 17:30 False elevated readings at 9SB sonde associated with the sonde interfering with the sediment mudline.

**3.5      Friday, December 13, 2024**



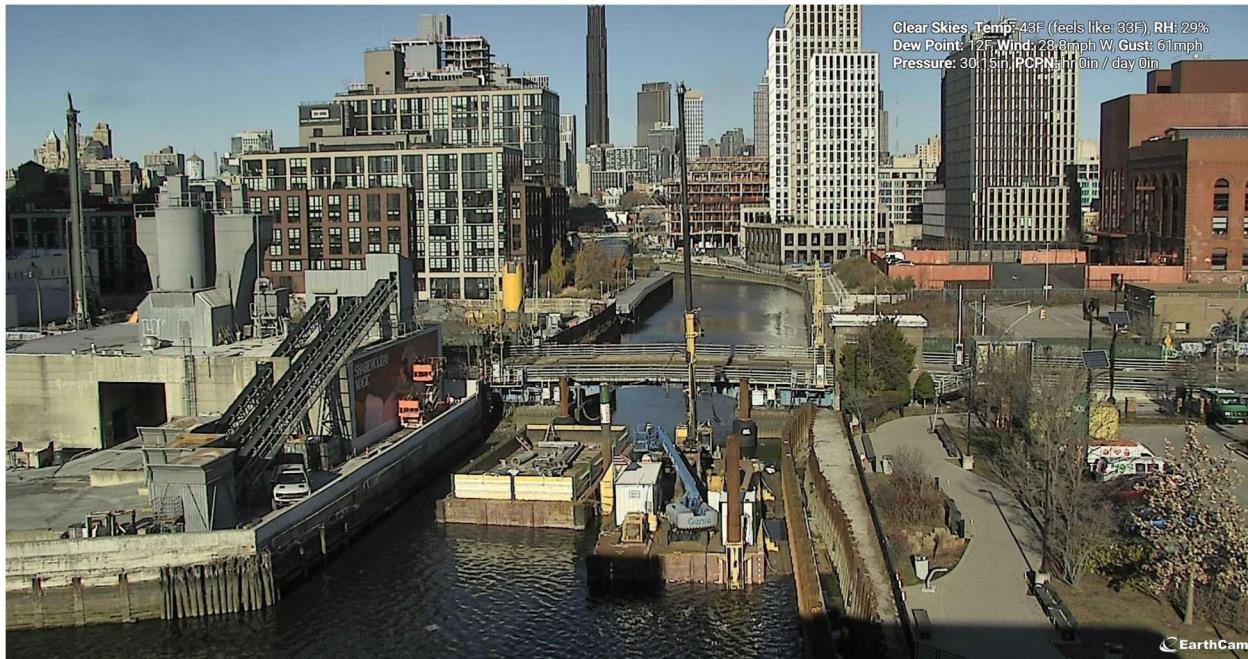
**Figure 7.** Hourly rolling average turbidity readings from 07:00 to 15:30. False elevated readings at 9SB sonde associated with the sonde interfering with the sediment mudline.

#### 4. SUMMARY OF VISUAL OBSERVATIONS

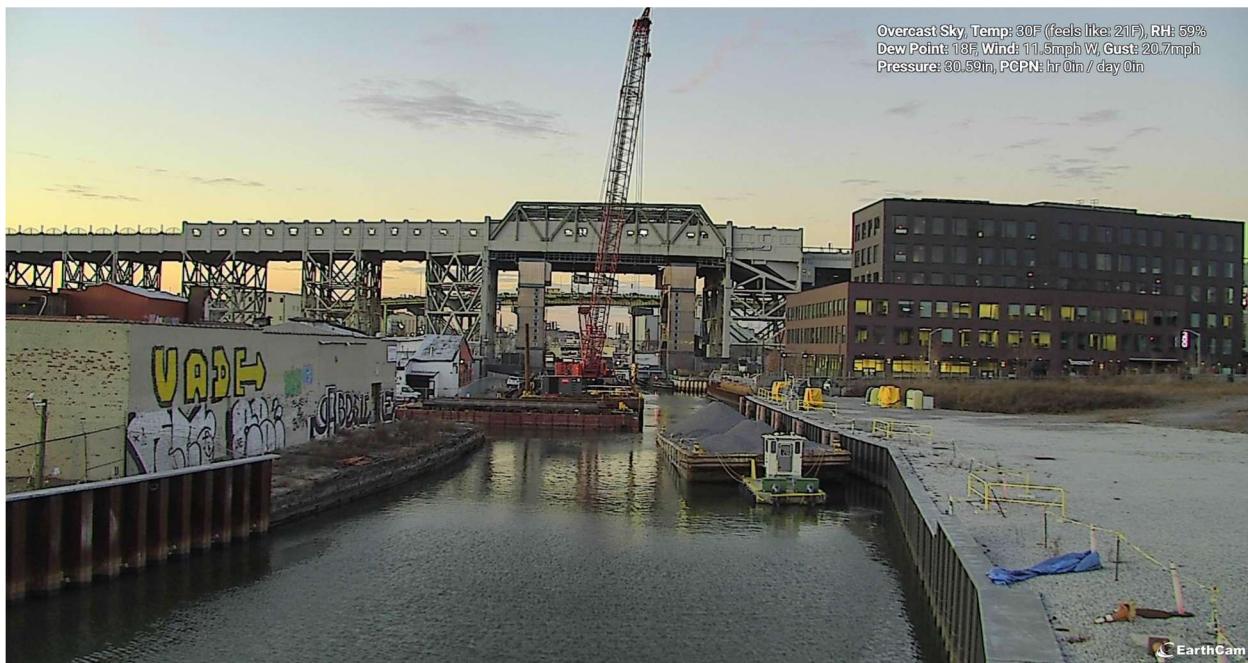
Throughout the reporting period, sheens in the RTA2 areas ranged from minimal to moderate. During work activities, one turbidity curtain was deployed in the Turning Basin 4 and one turbidity curtain was in place west of the tieback barge. The curtain north of 3<sup>rd</sup> Street bridge opened on Thursday December 12 for New York City Department of Transportation maintenance activities. It was closed late Friday December 13.



**Figure 8 – December 9, 2024.** General Conditions in Canal north of 9<sup>th</sup> Street Bridge during work activities work activities.



**Figure 9– December 10, 2024.** General Conditions in Canal south of 3<sup>rd</sup> Street Bridge during work activities work activities.



**Figure 10– December 12, 2024.** General Conditions in Canal north of 9<sup>th</sup> Street Bridge during work activities work activities.

## **APPENDIX A**

### **Turbidity Data Tables**

Table 3

Monday, Dec 9, 2024

Date	Time	Turbidity (NTU)			Rolling Average Turbidity (NTU)			Difference (NTU)	
		Ambient	N3SB	9SB	Ambient	N3SB	9SB	N3SB - Ambient	9SB - Ambient
12/9/2024	7:00:00	4.02	2.71	2.94	4.02	2.71	2.94	-1.32	-1.08
12/9/2024	7:15:00	4.26	2.35	2.44	4.14	2.53	2.69	-1.61	-1.45
12/9/2024	7:30:00	4.55	2.35	2.91	4.28	2.47	2.76	-1.81	-1.52
12/9/2024	7:45:00	4.70	3.08	2.18	4.38	2.62	2.62	-1.76	-1.77
12/9/2024	8:00:00	6.76	2.28	3.02	4.86	2.55	2.70	-2.31	-2.16
12/9/2024	8:15:00	4.88	1.20	2.45	5.03	2.25	2.60	-2.78	-2.43
12/9/2024	8:30:00	4.77	3.31	3.04	5.14	2.45	2.72	-2.69	-2.42
12/9/2024	8:45:00	4.75	2.51	3.67	5.17	2.48	2.87	-2.70	-2.30
12/9/2024	9:00:00	2.37	2.08	2.51	4.71	2.28	2.94	-2.43	-1.77
12/9/2024	9:15:00	2.83	1.29	4.18	3.92	2.08	3.17	-1.84	-0.75
12/9/2024	9:30:00	4.01	1.81	31.24	3.75	2.20	8.93	-1.55	5.18
12/9/2024	9:45:00	2.39	2.48	13.35	3.27	2.03	10.99	-1.24	7.72
12/9/2024	10:00:00	2.22	2.40	11.17	2.76	2.01	12.49	-0.75	9.73
12/9/2024	10:15:00	2.37	1.17	22.55	2.76	1.83	16.50	-0.93	13.73
12/9/2024	10:30:00	1.91	1.29	9.70	2.58	1.83	17.60	-0.75	15.02
12/9/2024	10:45:00	1.80	1.74	5.41	2.14	1.82	12.44	-0.32	10.30
12/9/2024	11:00:00	2.30	2.24	5.48	2.12	1.77	10.86	-0.35	8.74
12/9/2024	11:15:00	15.46	1.48	6.50	4.77	1.59	9.93	-3.18	5.16
12/9/2024	11:30:00	15.41	2.61	3.17	7.38	1.87	6.05	-5.50	-1.33
12/9/2024	11:45:00	15.72	1.76	3.21	10.14	1.97	4.75	-8.17	-5.39
12/9/2024	12:00:00	16.23	2.97	2.31	13.03	2.21	4.13	-10.81	-8.89
12/9/2024	12:15:00	2.65	1.46	2.56	13.10	2.06	3.55	-11.04	-9.55
12/9/2024	12:30:00	3.16	2.62	3.82	10.64	2.29	3.01	-8.35	-7.62
12/9/2024	12:45:00	3.37	0.95	4.23	8.23	1.95	3.22	-6.28	-5.00
12/9/2024	13:00:00	3.44	1.72	3.99	5.77	1.95	3.38	-3.83	-2.39
12/9/2024	13:15:00	4.85	1.37	2.89	3.49	1.62	3.50	-1.87	0.00
12/9/2024	13:30:00	3.29	0.73	--	3.62	1.48	3.73	-2.14	0.11
12/9/2024	13:45:00	3.75	0.36	3.67	3.74	1.03	3.70	-2.72	-0.04
12/9/2024	14:00:00	4.53	--	5.90	3.97	1.05	4.11	-2.93	0.14
12/9/2024	14:15:00	5.72	0.76	6.33	4.43	0.80	4.70	-3.63	0.27
12/9/2024	14:30:00	5.94	1.01	12.47	4.65	0.71	7.09	-3.93	2.45
12/9/2024	14:45:00	12.03	2.06	13.33	6.39	1.04	8.34	-5.35	1.95
12/9/2024	15:00:00	14.31	1.50	10.80	8.51	1.33	9.77	-7.17	1.26
12/9/2024	15:15:00	12.03	1.72	10.60	10.01	1.41	10.71	-8.60	0.70
12/9/2024	15:30:00	13.54	1.25	11.76	11.57	1.51	11.79	-10.06	0.22
12/9/2024	15:45:00	6.59	2.50	18.90	11.70	1.81	13.08	-9.90	1.38
12/9/2024	16:00:00	10.05	2.66	10.55	11.31	1.93	12.52	-9.38	1.22
12/9/2024	16:15:00	6.11	2.65	13.28	9.67	2.16	13.02	-7.51	3.35
12/9/2024	16:30:00	5.12	2.80	17.88	8.28	2.37	14.47	-5.91	6.19
12/9/2024	16:45:00	5.88	3.73	17.85	6.75	2.87	15.69	-3.88	8.94
12/9/2024	17:00:00	6.64	2.01	15.75	6.76	2.77	15.06	-3.99	8.30
12/9/2024	17:15:00	7.97	2.14	6.58	6.34	2.67	14.27	-3.68	7.93
12/9/2024	17:30:00	8.48	0.74	9.43	6.82	2.28	13.50	-4.53	6.68

Table 4

Tuesday, Dec 10, 2024

Date	Time	Turbidity (NTU)			Rolling Average Turbidity (NTU)			Difference (NTU)	
		Ambient	N3SB	9SB	Ambient	N3SB	9SB	N3SB - Ambient	9SB - Ambient
12/10/24	7:00:00	13.08	3.41	5.34	11.81	3.04	5.81	-8.77	-6.00
12/10/24	7:15:00	15.01	0.96	6.53	12.45	2.62	5.96	-9.82	-6.49
12/10/24	7:30:00	6.33	2.69	4.28	11.94	2.47	5.68	-9.47	-6.26
12/10/24	7:45:00	8.51	2.98	2.92	11.09	2.60	5.41	-8.50	-5.69
12/10/24	8:00:00	5.68	3.60	3.81	9.72	2.73	4.58	-7.00	-5.14
12/10/24	8:15:00	5.45	4.44	4.24	8.20	2.93	4.36	-5.26	-3.84
12/10/24	8:30:00	4.42	2.55	31.28	6.08	3.25	9.31	-2.83	3.23
12/10/24	8:45:00	5.01	3.14	7.48	5.82	3.34	9.95	-2.47	4.13
12/10/24	9:00:00	4.22	1.62	5.58	4.96	3.07	10.48	-1.89	5.52
12/10/24	9:15:00	4.25	--	10.80	4.67	2.94	11.88	-1.74	7.21
12/10/24	9:30:00	3.84	2.34	8.31	4.35	2.41	12.69	-1.94	8.34
12/10/24	9:45:00	3.59	3.71	5.99	4.18	2.70	7.63	-1.48	3.45
12/10/24	10:00:00	18.45	7.21	10.62	6.87	3.72	8.26	-3.15	1.39
12/10/24	10:15:00	16.01	3.07	9.21	9.23	4.08	8.99	-5.15	-0.24
12/10/24	10:30:00	16.92	2.61	4.62	11.76	3.79	7.75	-7.97	-4.02
12/10/24	10:45:00	17.02	2.43	--	14.40	3.81	7.61	-10.59	-6.79
12/10/24	11:00:00	3.32	1.55	5.07	14.34	3.38	7.38	-10.97	-6.96
12/10/24	11:15:00	3.81	2.53	6.60	11.42	2.44	6.37	-8.98	-5.04
12/10/24	11:30:00	4.06	3.54	6.71	9.03	2.53	5.75	-6.49	-3.28
12/10/24	11:45:00	3.02	2.56	7.34	6.25	2.52	6.43	-3.72	0.19
12/10/24	12:00:00	7.12	1.24	4.27	4.27	2.29	6.00	-1.98	1.73
12/10/24	12:15:00	4.65	1.63	5.36	4.53	2.30	6.06	-2.23	1.52
12/10/24	12:30:00	3.18	1.84	8.44	4.41	2.16	6.42	-2.24	2.02
12/10/24	12:45:00	5.00	1.92	4.99	4.59	1.84	6.08	-2.76	1.48
12/10/24	13:00:00	3.10	3.01	22.76	4.61	1.93	9.16	-2.68	4.55
12/10/24	13:15:00	4.22	2.28	17.65	4.03	2.13	11.84	-1.90	7.81
12/10/24	13:30:00	14.31	1.44	19.24	5.96	2.10	14.62	-3.87	8.65
12/10/24	13:45:00	8.36	1.42	20.35	7.00	2.01	17.00	-4.99	10.00
12/10/24	14:00:00	8.47	1.63	15.88	7.69	1.95	19.18	-5.74	11.49
12/10/24	14:15:00	9.81	3.55	7.18	9.03	2.06	16.06	-6.97	7.03
12/10/24	14:30:00	21.47	2.41	5.24	12.48	2.09	13.58	-10.39	1.09
12/10/24	14:45:00	21.67	1.34	4.53	13.96	2.07	10.64	-11.89	-3.32
12/10/24	15:00:00	22.42	0.96	4.20	16.77	1.98	7.40	-14.79	-9.36
12/10/24	15:15:00	23.37	1.85	3.61	19.75	2.02	4.95	-17.73	-14.80
12/10/24	15:30:00	5.81	1.69	4.11	18.95	1.65	4.34	-17.30	-14.61
12/10/24	15:45:00	7.60	1.60	5.96	16.17	1.49	4.48	-14.69	-11.69
12/10/24	16:00:00	6.18	1.09	29.55	13.08	1.44	9.49	-11.64	-3.59
12/10/24	16:15:00	7.58	1.47	10.60	10.11	1.54	10.77	-8.57	0.66
12/10/24	16:30:00	8.84	1.58	8.81	7.20	1.49	11.81	-5.72	4.60
12/10/24	16:45:00	23.86	2.30	5.64	10.81	1.61	12.11	-9.20	1.30
12/10/24	17:00:00	24.44	2.63	4.00	14.18	1.81	11.72	-12.37	-2.46
12/10/24	17:15:00	25.04	2.05	53.67	17.95	2.01	16.54	-15.95	-1.41
12/10/24	17:30:00	21.16	4.48	9.01	20.67	2.61	16.22	-18.06	-4.44

Table 5

Wednesday, Dec 11, 2024

Date	Time	Turbidity (NTU)			Rolling Average Turbidity (NTU)			Difference (NTU)	
		Ambient	N3SB	9SB	Ambient	N3SB	9SB	N3SB - Ambient	9SB - Ambient
12/11/2024	7:00:00	13.08	3.41	5.34	12.81	3.41	5.34	-9.40	-7.46
12/11/2024	7:15:00	15.01	0.96	6.53	13.54	2.19	5.94	-11.36	-7.60
12/11/2024	7:30:00	6.33	2.69	4.28	11.74	2.35	5.39	-9.39	-6.35
12/11/2024	7:45:00	8.51	2.98	2.92	11.09	2.51	4.77	-8.58	-6.32
12/11/2024	8:00:00	5.68	3.60	3.81	9.72	2.73	4.58	-7.00	-5.14
12/11/2024	8:15:00	5.45	4.44	4.24	8.20	2.93	4.36	-5.26	-3.84
12/11/2024	8:30:00	4.42	2.55	31.28	6.08	3.25	9.31	-2.83	3.23
12/11/2024	8:45:00	5.01	3.14	7.48	5.82	3.34	9.95	-2.47	4.13
12/11/2024	9:00:00	4.22	1.62	5.58	4.96	3.07	10.48	-1.89	5.52
12/11/2024	9:15:00	4.25	--	10.80	4.67	2.94	11.88	-1.74	7.21
12/11/2024	9:30:00	3.84	2.34	8.31	4.35	2.41	12.69	-1.94	8.34
12/11/2024	9:45:00	3.59	3.71	5.99	4.18	2.70	7.63	-1.48	3.45
12/11/2024	10:00:00	18.45	7.21	10.62	6.87	3.72	8.26	-3.15	1.39
12/11/2024	10:15:00	16.01	3.07	9.21	9.23	4.08	8.99	-5.15	-0.24
12/11/2024	10:30:00	16.92	2.61	4.62	11.76	3.79	7.75	-7.97	-4.02
12/11/2024	10:45:00	17.02	2.43	--	14.40	3.81	7.61	-10.59	-6.79
12/11/2024	11:00:00	3.32	1.55	5.07	14.34	3.38	7.38	-10.97	-6.96
12/11/2024	11:15:00	3.81	2.53	6.60	11.42	2.44	6.37	-8.98	-5.04
12/11/2024	11:30:00	4.06	3.54	6.71	9.03	2.53	5.75	-6.49	-3.28
12/11/2024	11:45:00	3.02	2.56	7.34	6.25	2.52	6.43	-3.72	0.19
12/11/2024	12:00:00	7.12	1.24	4.27	4.27	2.29	6.00	-1.98	1.73
12/11/2024	12:15:00	4.65	1.63	5.36	4.53	2.30	6.06	-2.23	1.52
12/11/2024	12:30:00	3.18	1.84	8.44	4.41	2.16	6.42	-2.24	2.02
12/11/2024	12:45:00	5.00	1.92	4.99	4.59	1.84	6.08	-2.76	1.48
12/11/2024	13:00:00	3.10	3.01	22.76	4.61	1.93	9.16	-2.68	4.55
12/11/2024	13:15:00	4.22	2.28	17.65	4.03	2.13	11.84	-1.90	7.81
12/11/2024	13:30:00	14.31	1.44	19.24	5.96	2.10	14.62	-3.87	8.65
12/11/2024	13:45:00	8.36	1.42	20.35	7.00	2.01	17.00	-4.99	10.00
12/11/2024	14:00:00	8.47	1.63	15.88	7.69	1.95	19.18	-5.74	11.49
12/11/2024	14:15:00	9.81	3.55	7.18	9.03	2.06	16.06	-6.97	7.03
12/11/2024	14:30:00	21.47	2.41	5.24	12.48	2.09	13.58	-10.39	1.09
12/11/2024	14:45:00	21.67	1.34	4.53	13.96	2.07	10.64	-11.89	-3.32
12/11/2024	15:00:00	22.42	0.96	4.20	16.77	1.98	7.40	-14.79	-9.36
12/11/2024	15:15:00	23.37	1.85	3.61	19.75	2.02	4.95	-17.73	-14.80
12/11/2024	15:30:00	5.81	1.69	4.11	18.95	1.65	4.34	-17.30	-14.61
12/11/2024	15:45:00	7.60	1.60	5.96	16.17	1.49	4.48	-14.69	-11.69
12/11/2024	16:00:00	6.18	1.09	29.55	13.08	1.44	9.49	-11.64	-3.59
12/11/2024	16:15:00	7.58	1.47	10.60	10.11	1.54	10.77	-8.57	0.66
12/11/2024	16:30:00	8.84	1.58	8.81	7.20	1.49	11.81	-5.72	4.60
12/11/2024	16:45:00	23.86	2.30	5.64	10.81	1.61	12.11	-9.20	1.30
12/11/2024	17:00:00	24.44	2.63	4.00	14.18	1.81	11.72	-12.37	-2.46
12/11/2024	17:15:00	25.04	2.05	53.67	17.95	2.01	16.54	-15.95	-1.41
12/11/2024	17:30:00	21.16	4.48	9.01	20.67	2.61	16.22	-18.06	-4.44

Table 6

Thursday, Dec 12, 2024

Date	Time	Turbidity (NTU)			Rolling Average Turbidity (NTU)			Difference (NTU)	
		Ambient	N3SB	9SB	Ambient	N3SB	9SB	N3SB - Ambient	9SB - Ambient
12/12/2024	7:00:00	17.53	6.44	6.42	17.53	5.67	6.42	-11.86	-11.11
12/12/2024	7:15:00	17.62	5.20	8.81	17.57	5.58	7.62	-11.99	-9.96
12/12/2024	7:30:00	16.11	9.15	6.48	17.09	6.42	7.24	-10.67	-9.85
12/12/2024	7:45:00	17.40	7.13	7.66	17.17	6.49	7.34	-10.67	-9.82
12/12/2024	8:00:00	13.67	6.38	7.96	16.47	6.86	7.47	-9.61	-9.00
12/12/2024	8:15:00	87.12	6.87	14.35	30.38	6.95	9.05	-23.44	-21.33
12/12/2024	8:30:00	23.62	9.16	9.03	31.58	7.74	9.10	-23.85	-22.49
12/12/2024	8:45:00	20.71	9.45	9.26	32.50	7.80	9.65	-24.71	-22.85
12/12/2024	9:00:00	15.86	6.18	14.59	32.19	7.61	11.04	-24.59	-21.15
12/12/2024	9:15:00	18.28	8.32	7.68	33.12	8.00	10.98	-25.12	-22.13
12/12/2024	9:30:00	13.46	7.95	8.89	18.38	8.21	9.89	-10.17	-8.49
12/12/2024	9:45:00	12.83	10.04	8.95	16.23	8.39	9.87	-7.84	-6.35
12/12/2024	10:00:00	15.63	8.76	7.83	15.21	8.25	9.59	-6.96	-5.62
12/12/2024	10:15:00	8.08	9.43	16.43	13.65	8.90	9.95	-4.75	-3.70
12/12/2024	10:30:00	10.48	7.73	19.56	12.10	8.78	12.33	-3.31	0.24
12/12/2024	10:45:00	13.38	8.57	42.86	12.08	8.91	19.13	-3.18	7.05
12/12/2024	11:00:00	14.49	6.94	77.68	12.41	8.28	32.87	-4.13	20.46
12/12/2024	11:15:00	15.85	7.08	46.09	12.46	7.95	40.52	-4.51	28.07
12/12/2024	11:30:00	19.02	6.80	17.58	14.65	7.42	40.75	-7.22	26.11
12/12/2024	11:45:00	6.97	5.62	32.19	13.94	7.00	43.28	-6.94	29.34
12/12/2024	12:00:00	18.16	7.40	41.41	14.90	6.77	42.99	-8.13	28.09
12/12/2024	12:15:00	13.16	6.33	52.68	14.63	6.65	37.99	-7.98	23.36
12/12/2024	12:30:00	10.44	5.38	29.65	13.55	6.31	34.70	-7.24	21.15
12/12/2024	12:45:00	11.52	6.83	24.46	12.05	6.31	36.08	-5.74	24.03
12/12/2024	13:00:00	11.18	5.91	22.33	12.89	6.37	34.11	-6.52	21.22
12/12/2024	13:15:00	11.32	6.20	22.18	11.52	6.13	30.26	-5.39	18.74
12/12/2024	13:30:00	38.71	7.01	15.61	16.63	6.26	22.85	-10.37	6.21
12/12/2024	13:45:00	40.83	6.42	23.26	22.71	6.47	21.57	-16.24	-1.14
12/12/2024	14:00:00	71.15	7.47	17.75	34.64	6.60	20.23	-28.04	-14.41
12/12/2024	14:15:00	54.24	30.13	59.54	43.25	11.45	27.67	-31.80	-15.58
12/12/2024	14:30:00	44.89	29.71	27.25	49.96	16.15	28.68	-33.81	-21.28
12/12/2024	14:45:00	35.29	26.46	24.53	49.28	20.04	30.47	-29.24	-18.81
12/12/2024	15:00:00	44.72	34.32	18.94	50.06	25.62	29.60	-24.44	-20.45
12/12/2024	15:15:00	24.30	38.72	23.32	40.69	31.87	30.72	-8.82	-9.97
12/12/2024	15:30:00	27.74	28.23	19.33	35.39	31.49	22.67	-3.90	-12.71
12/12/2024	15:45:00	33.40	33.40	19.59	33.09	32.23	21.14	-0.86	-11.95
12/12/2024	16:00:00	23.71	29.11	16.06	30.77	32.76	19.45	1.98	-11.33
12/12/2024	16:15:00	28.41	24.23	15.67	27.51	30.74	18.79	3.23	-8.72
12/12/2024	16:30:00	30.29	35.25	16.59	28.71	30.05	17.45	1.34	-11.26
12/12/2024	16:45:00	33.87	21.92	16.88	29.94	28.78	16.96	-1.15	-12.98
12/12/2024	17:00:00	32.09	18.89	17.19	29.67	25.88	16.48	-3.79	-13.20
12/12/2024	17:15:00	17.06	24.49	15.28	28.34	24.96	16.32	-3.39	-12.02
12/12/2024	17:30:00	21.46	14.86	15.42	26.95	23.08	16.27	-3.87	-10.68

Table 7

Friday, Dec 13, 2024

Date	Time	Turbidity (NTU)			Rolling Average Turbidity (NTU)			Difference (NTU)	
		Ambient	N3SB	9SB	Ambient	N3SB	9SB	N3SB - Ambient	9SB - Ambient
12/13/2024	7:00:00	8.48	13.06	14.46	6.17	4.28	0.00	-15.69	--
12/13/2024	7:15:00	5.50	10.91	6.75	9.68	12.31	10.09	1.34	0.41
12/13/2024	7:30:00	6.31	7.85	9.03	8.05	11.78	9.97	4.17	1.92
12/13/2024	7:45:00	5.99	15.37	5.06	7.07	12.42	9.11	6.44	2.04
12/13/2024	8:00:00	4.22	8.25	9.33	6.10	11.09	8.92	8.66	2.82
12/13/2024	8:15:00	5.46	7.61	5.41	5.50	10.00	7.11	6.65	1.62
12/13/2024	8:30:00	6.97	8.60	7.29	5.79	9.54	7.22	5.49	1.43
12/13/2024	8:45:00	5.23	8.69	7.68	5.58	9.71	6.95	4.47	1.38
12/13/2024	9:00:00	11.54	7.00	10.27	6.68	8.03	7.99	2.58	1.31
12/13/2024	9:15:00	4.86	6.43	8.04	6.81	7.67	7.74	6.71	0.92
12/13/2024	9:30:00	3.50	5.73	8.20	6.42	7.29	8.30	11.95	1.88
12/13/2024	9:45:00	3.25	4.72	8.06	5.68	6.52	8.45	18.08	2.78
12/13/2024	10:00:00	3.31	4.88	8.52	5.29	5.75	8.62	24.61	3.33
12/13/2024	10:15:00	3.90	6.07	12.46	3.76	5.57	9.06	33.00	5.29
12/13/2024	10:30:00	7.67	4.15	--	4.33	5.11	9.31	26.88	4.99
12/13/2024	10:45:00	8.96	6.19	10.03	5.42	5.20	9.77	20.82	4.35
12/13/2024	11:00:00	9.36	3.75	40.51	6.64	5.01	17.88	14.19	11.24
12/13/2024	11:15:00	8.43	3.20	42.39	7.66	4.67	26.35	7.06	18.68
12/13/2024	11:30:00	3.88	4.38	93.86	7.66	4.34	46.70	1.76	39.03
12/13/2024	11:45:00	6.01	4.67	289.70	7.33	4.44	95.30	2.68	87.97
12/13/2024	12:00:00	7.05	4.17	--	6.95	4.04	116.61	3.79	109.67
12/13/2024	12:15:00	5.48	--	170.14	6.17	4.11	149.02	5.32	142.85
12/13/2024	12:30:00	8.49	4.41	0.00	6.18	4.41	138.42	6.93	132.24
12/13/2024	12:45:00	5.18	6.00	0.00	6.44	4.81	114.96	4.47	108.52
12/13/2024	13:00:00	8.12	4.27	0.00	6.86	4.71	42.53	3.74	35.67
12/13/2024	13:15:00	7.77	5.38	--	7.01	5.02	42.53	3.06	35.53
12/13/2024	13:30:00	8.89	5.62	--	7.69	5.14	0.00	2.17	-7.69
12/13/2024	13:45:00	9.47	5.59	--	7.88	5.37	0.00	3.65	-7.88
12/13/2024	14:00:00	8.77	5.58	--	8.60	5.29	0.00	5.71	-8.60
12/13/2024	14:15:00	9.15	5.19	--	8.81	5.47	--	9.77	--
12/13/2024	14:30:00	9.80	--	388.98	9.21	5.50	388.98	11.77	379.76
12/13/2024	14:45:00	13.01	7.16	209.59	10.04	5.88	299.28	18.65	289.24
12/13/2024	15:00:00	8.59	--	34.94	9.86	5.98	211.17	20.92	201.30
12/13/2024	15:15:00	9.20	6.21	17.32	9.95	6.19	162.71	16.16	152.76
12/13/2024	15:30:00	9.34	5.00	107.81	9.99	6.12	151.73	8.73	141.74