AIR, NOISE AND VIBRATION MONTHLY MONITORING REPORT
Number 004

Prepared By:
Vibranalysis Inc

DDC. Project ID:	BBJ-KAFC	**Period Start:** 08/01/24 **End** 08/31/24
Project Name:	NYC Borough Based Jails System, Brooklyn Facility in the Borough of Brooklyn	
DDC Pin No.:	85023I8020KXL	

1) Community Air Monitoring Monthly Status Summary

TWA – Time Weighted Average
ug/m^3- micrograms per cubic meter

Number of Workdays in a Month	Number of Air Monitoring Days in a Month	Number of Days with Dust Concentrations above Action Concentrations by Month (100 ug/m^3 15 minute TWA)	Comments
27	27	0	Air Monitoring was performed during work hours. No exceedances were noted this month.

Community Air Monitoring Excursions and Corrective Actions

Action Concentration =100 ug/m^3 15 minute TWA above background concentration Stop Work Concentration = 150 ug/m^3 15 minute TWA above background concentration

Date: Time	Maximum Dust Reading Before Corrective Action 15 Minute TWA (ug/m^3)	Maximum Dust Reading After Corrective Action 15 Minute TWA (ug/m^3)	Corrective Action
N/A	N/A	N/A	

Narrative Summary of Air Monitoring, Excursions and Corrective Actions:

During the month of August 2024, a total of (4) Air monitoring devices were in continuous operation at the project site recording construction-related levels of Particulate Matter (PM).

From August 1 to August 31 the hours of Operation for the monitoring devices were during the standard working hours for the Project, Monday to Friday, 7AM to 9PM and Saturday 9AM to 5PM.

The Air Monitors move around the site based on where the activity of the day takes place. PM10 levels did not surpass Daily Permissible Exposure Limits (PEL) during this month as set by federal standards for the 24-hour Time Weighted Average (TWA), or daily value and did not trigger notifications to the project management construction team or contractor specific to air quality exceedances.

No corrective actions or mitigations measures were required this month.

2) Community Noise Monitoring Monthly Summary

Units to be determined (TBD) typically a weighted decibels (dBA) level

Number of Workdays in a Month	Number of Noise Monitoring Days in a Month	Number of Days with Noise Levels above Action Levels by Month	Comments
27	31	2	**No construction related activity caused this exceedance.** On 08/03/2024, Device 976A due to ambient noise. On 08/26/24 Device 988A due to device maintenance.

Community Noise Monitoring Excursions and Corrective Actions

Action Level = 88dBA
Stop Work Level = 90dBA

Date: Time	Maximum Noise Readingbefore Corrective Action (DBA)	Maximum Noise Reading after Corrective Action (DBA)	Corrective Action
08/03/2024	91	79	
08/26/2024	119.2	80	

Narrative Summary of Noise Monitoring, Excursions and Corrective Actions:

During the month of August 2024, (6) noise monitoring devices were in continuous operation at the project site recording construction-related noise levels in units of (DBA).

From August 1 to August 31 the hours of Operation for the monitoring devices were during the standard working hours for the Project, Monday to Friday, 7AM to 9PM and Saturday 9AM to 5PM.

There was one exceedance on Friday, August 3rd for Device 976A of 91 dBA. TPC performed sound level meter readings at different areas on and around the site to identify noise patterns and distinguish between construction related noise and ambient noise. TPC also conducted on-site inspections to identify potential noise sources, but all construction sources were below the noise thresholds. TPC did observe a significant amount of ambient noise coming from a variety of sources including traffic noise, public transportation, pedestrian activity, commercial activity, recreational activities and most significantly emergency vehicles i.e. ambulance sirens and police car sirens.

By examining the noise characteristics and differentiating between the construction equipment sounds and ambient noises, it was confirmed that the noise exceedance was due to ambient noise.

There was a second exceedance on Monday August 26th for Device 988A of 119.2 dBA. This was due to the device needing maintenance. While performing maintenance on the device, the technician was using loud hand tools in close proximity to the device and these tools resulted in the noise alert. This exceedance was not a result of ongoing construction work.

No other corrective actions or mitigations measures were required this month.

3) Community Vibration Monitoring Monthly Summary
Units TBD typically inches per second (in/sec)

Number of Workdays in a Month	Number of Vibration Monitoring Days in a Month	Number of Days with Vibration Levels above Action Levels by Month	Comments
27	31	0	Vibration Monitoring was performed during standard working hours. No vibration exceedances to report this month.

Community Vibration Monitoring Excursions and Corrective Actions
Action Level =0.25 in/sec
Stop Work Level = 0.5 in/sec

Date: Time	Maximum Vibration Level before Corrective Action (in/sec)	Maximum Vibration Level after Corrective Action (in/sec)	Corrective Action
N/A	N/A	N/A	N/A

Narrative Summary of Vibration Monitoring, Excursions and Corrective Actions:

During the month of August 2024, (15) vibration monitoring devices were in continuous operation at the project site recording construction-related noise levels in units of (DBA).

From August 1 to August 31 the hours of Operation for the monitoring devices were during the standard working hours for the Project, Monday to Friday, 7AM to 9PM and Saturday 9AM to 5PM.

No exceedances took place during the month of August 2024.

No corrective actions or mitigations measures were required this month.

ATTACHMENTS:

1 – Map of monitoring station/locations

2 – Data Plots

3 – Baseline Reference

Environmental Monitoring Plan



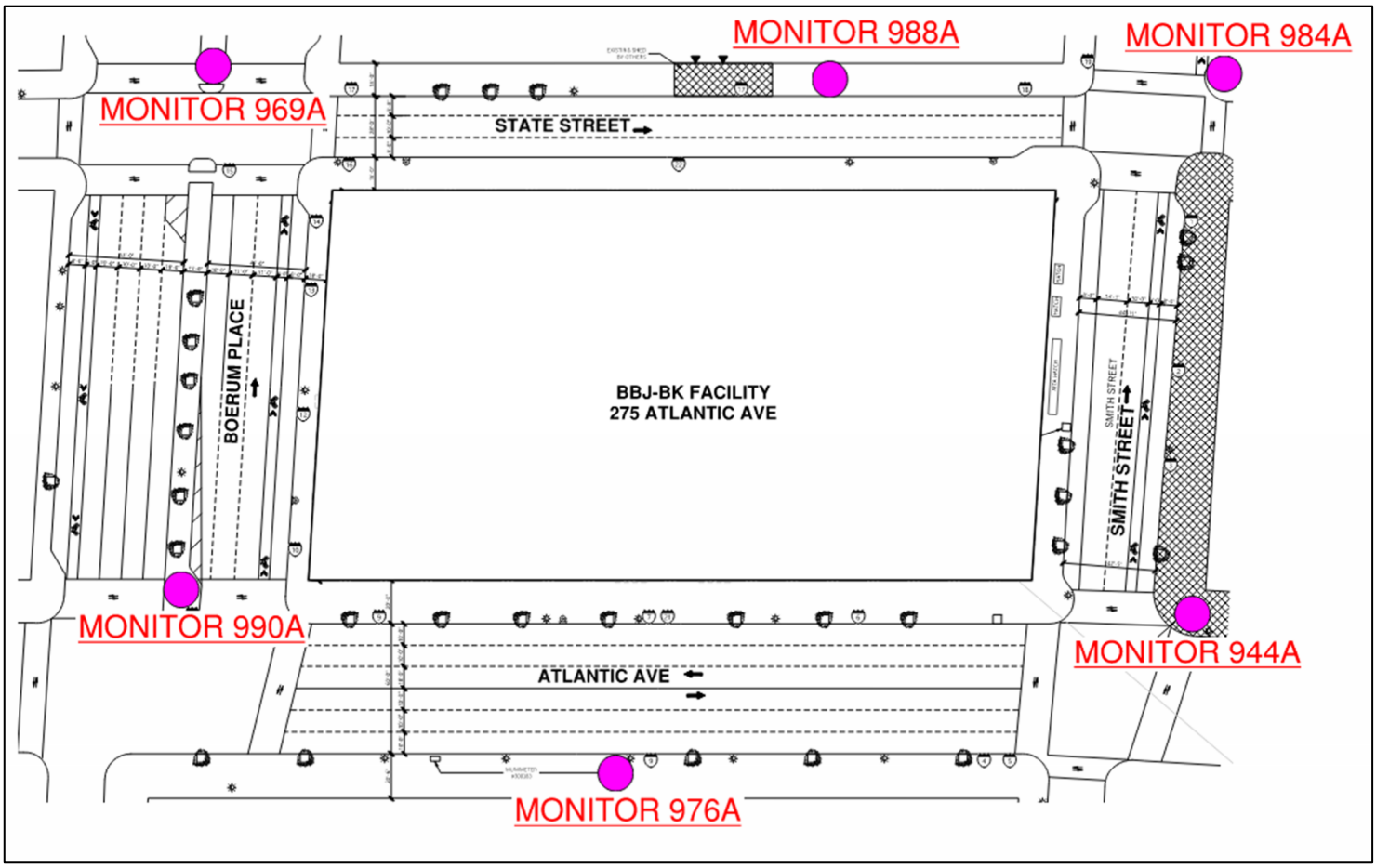
AIR MONITORING

VIBRATION MONITORING

NOISE MONITORING

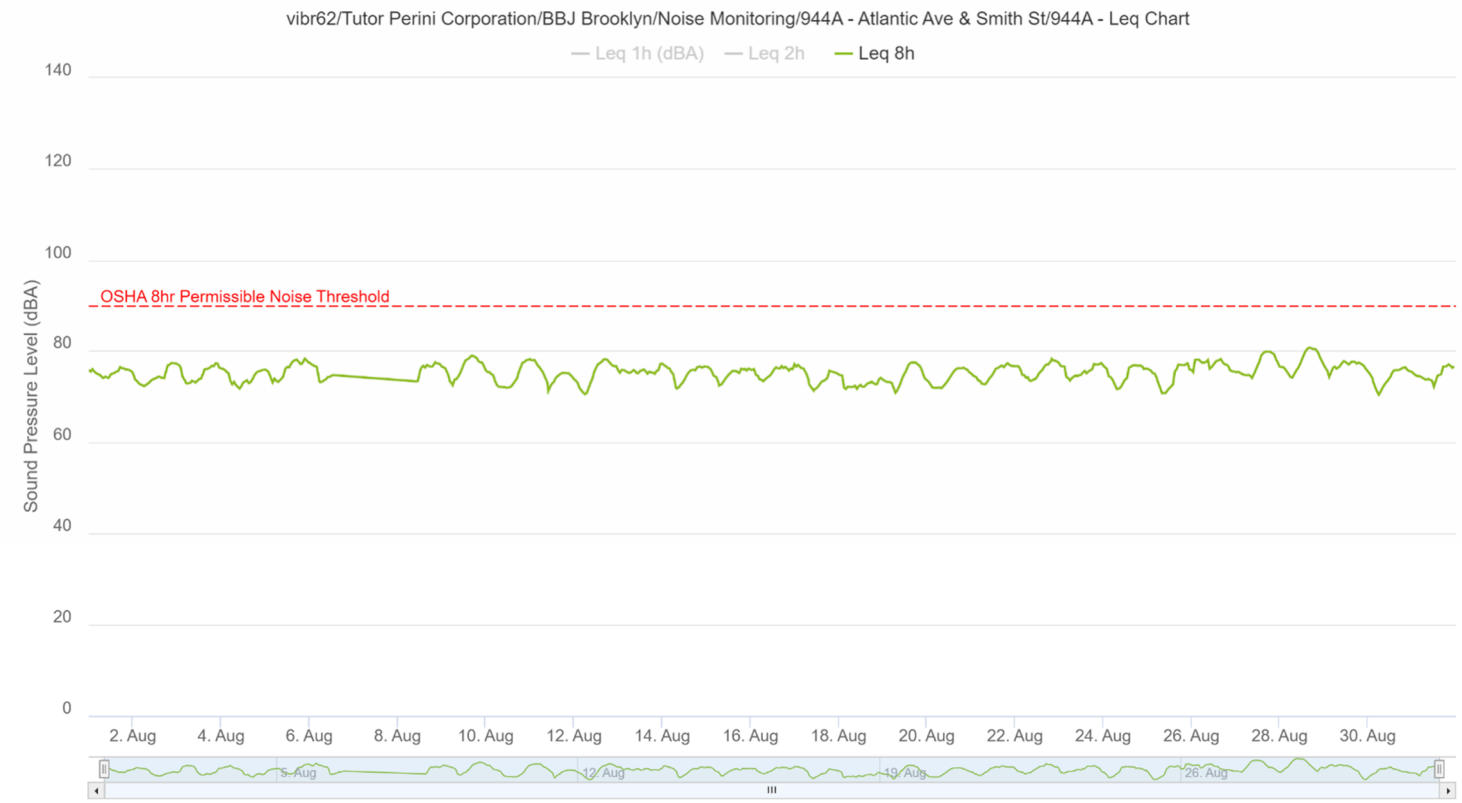
Quantity
(4) Air Monitors
(15) Vibration Monitors
(6) Noise Monitors

NOISE METER LOCATIONS

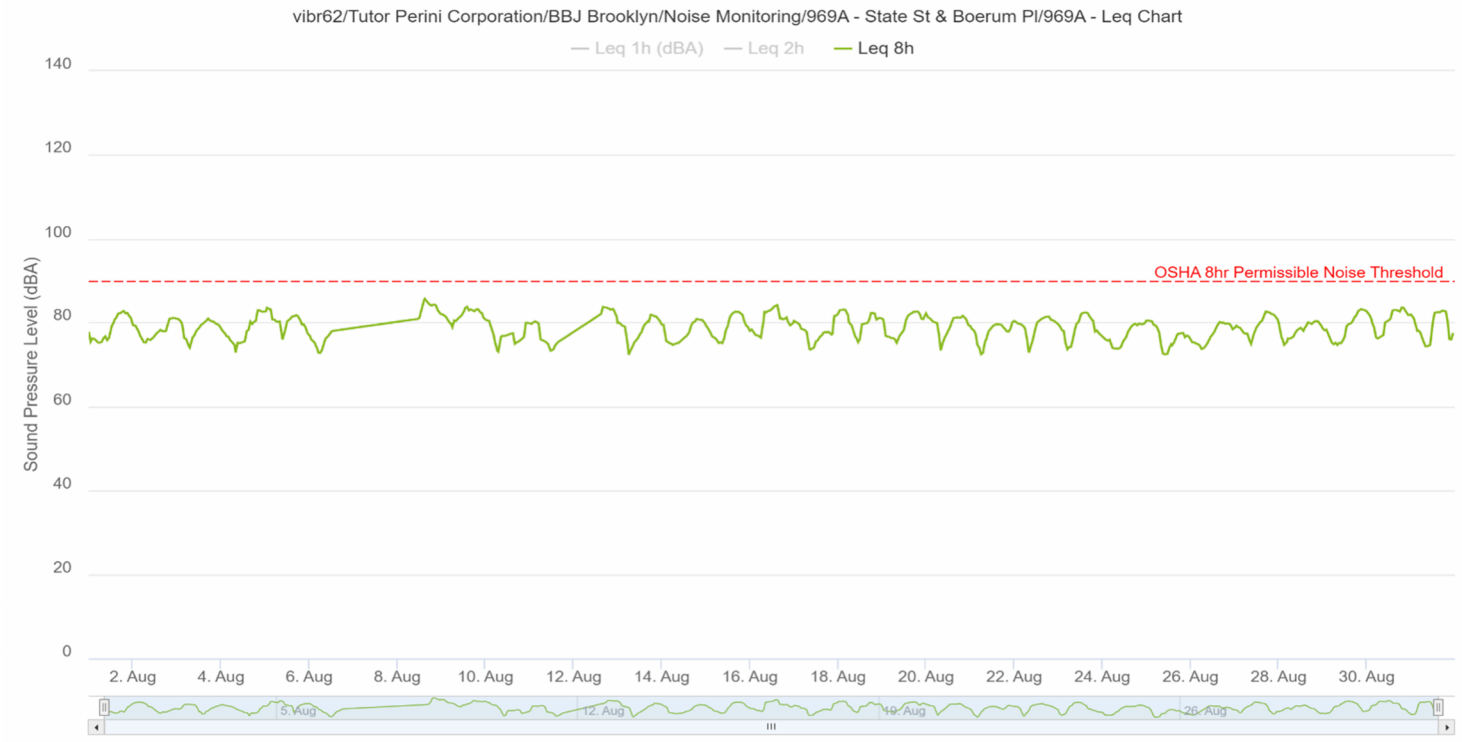


NOISE GRAPHS

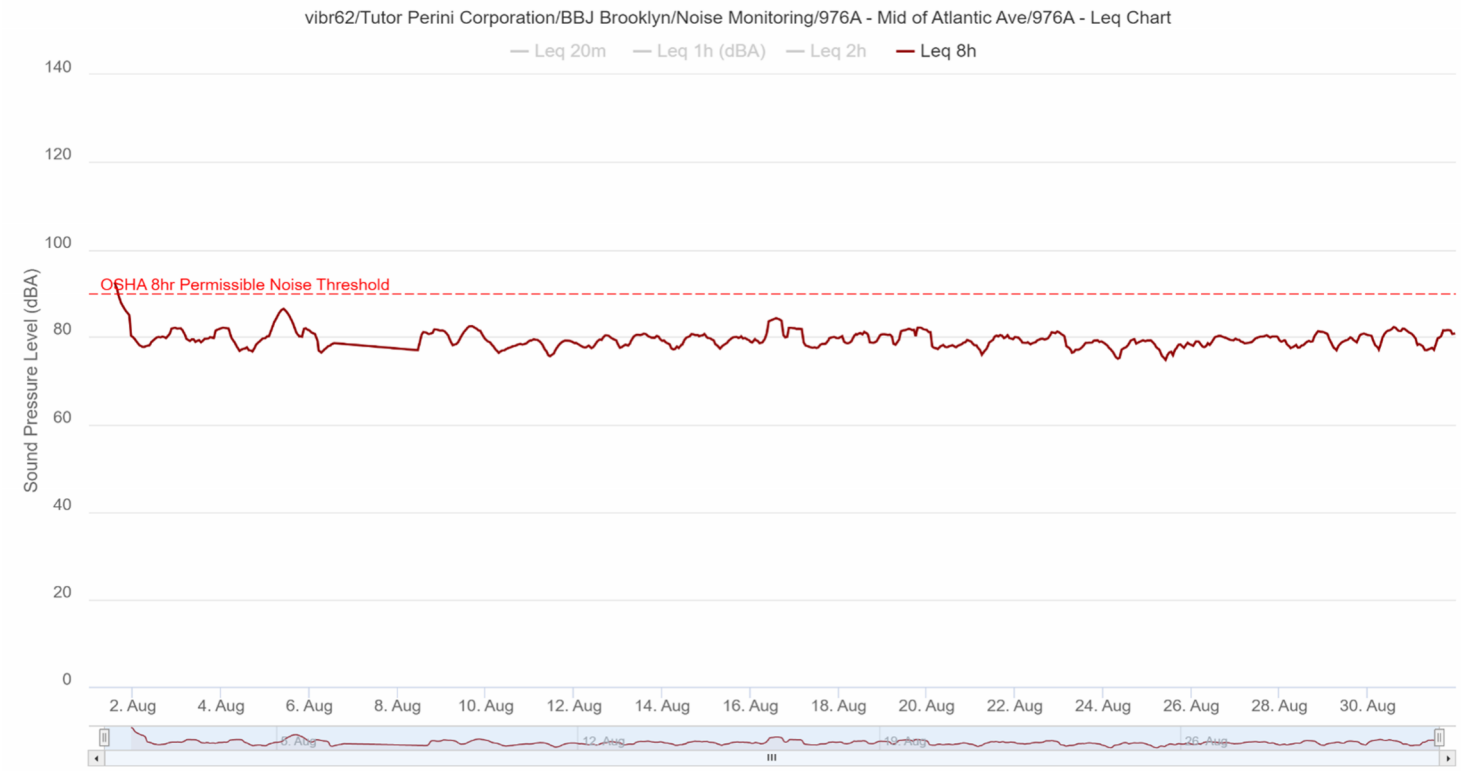
Device #944A – Noise Monitoring Station



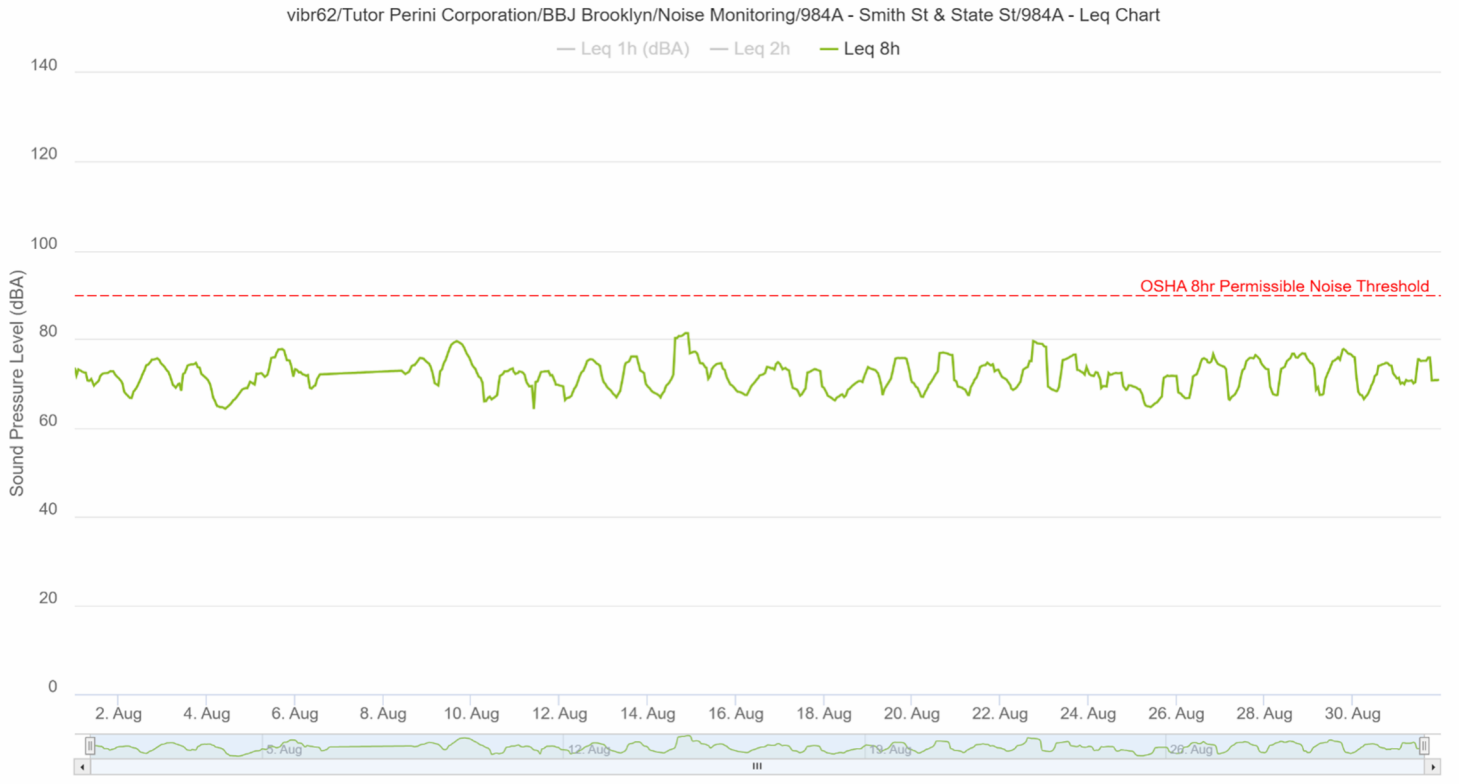
Device #969A – Noise Monitoring Station



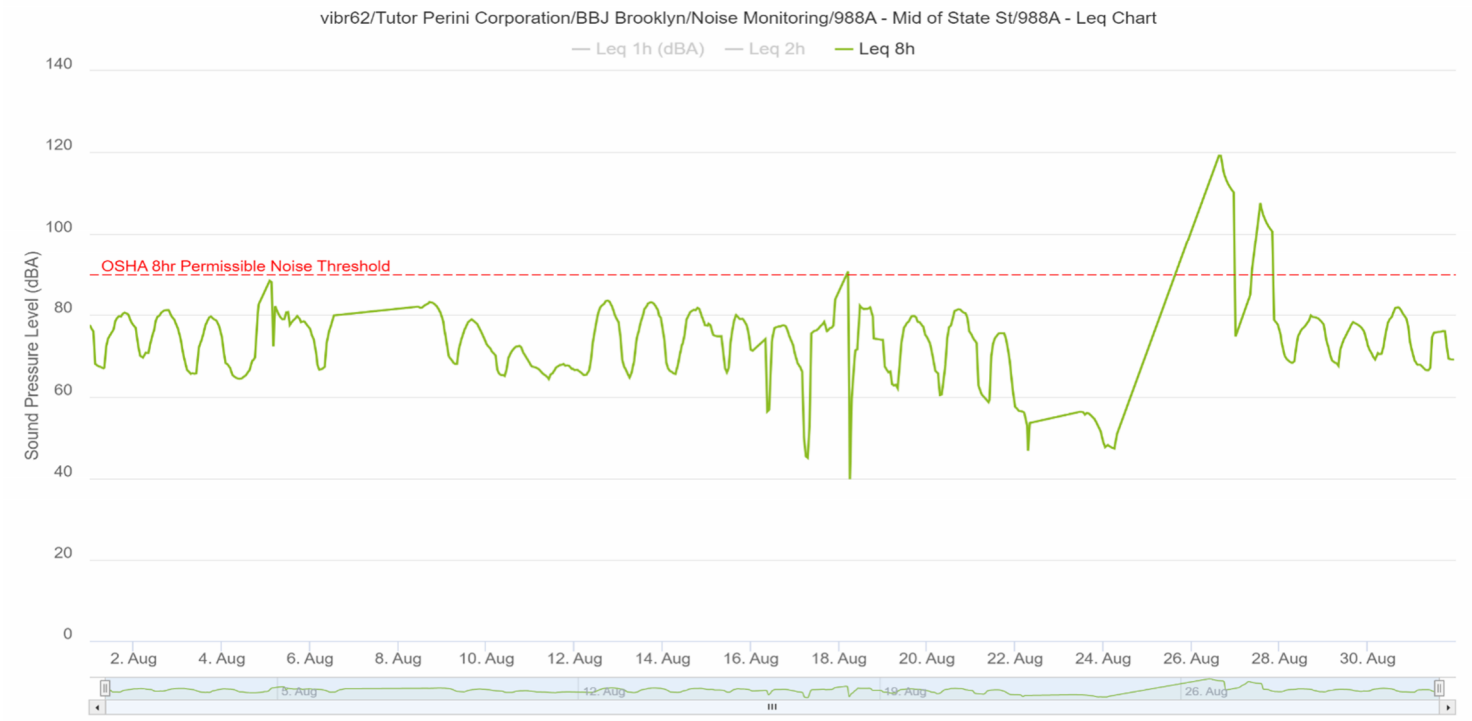
Device #976A – Noise Monitoring Station



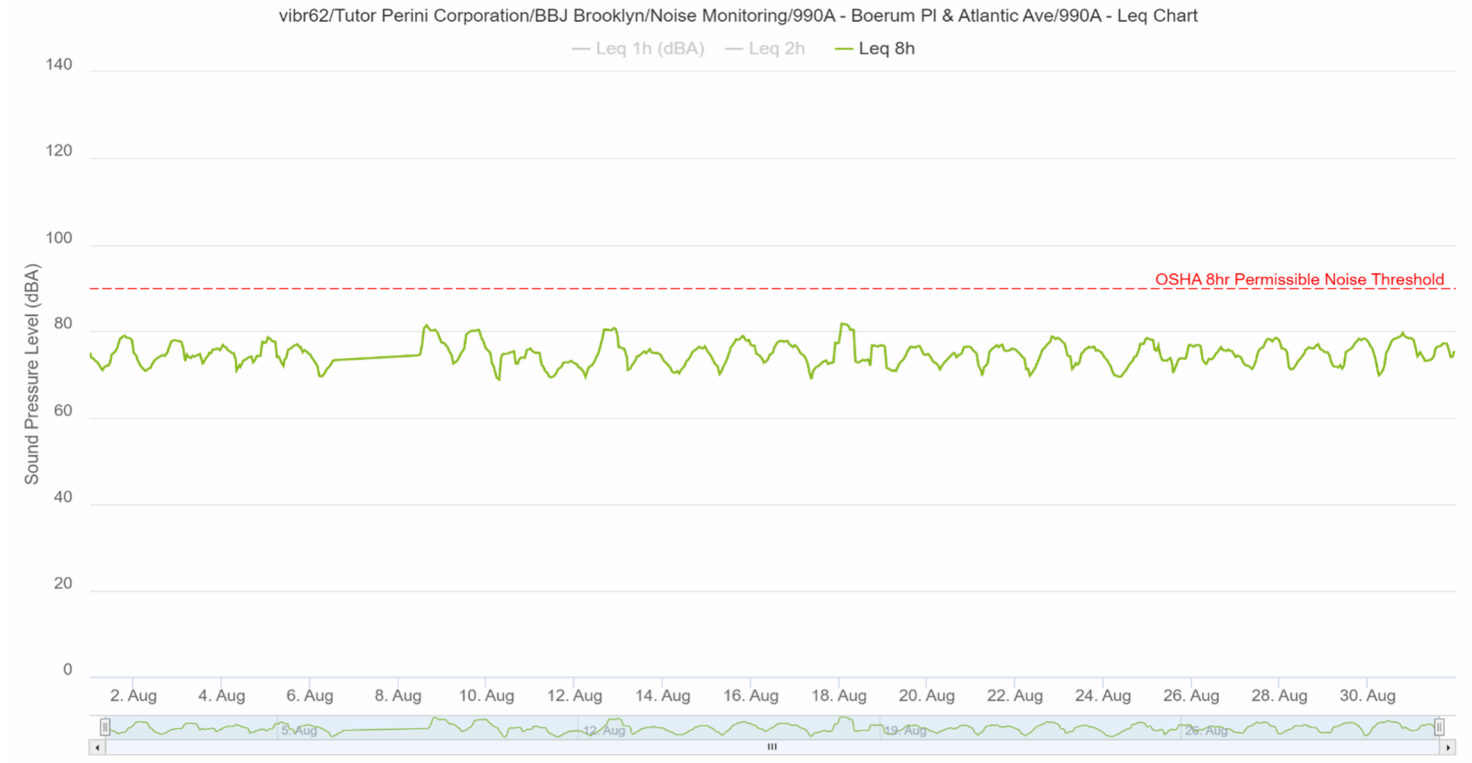
Device #984A – Noise Monitoring Station



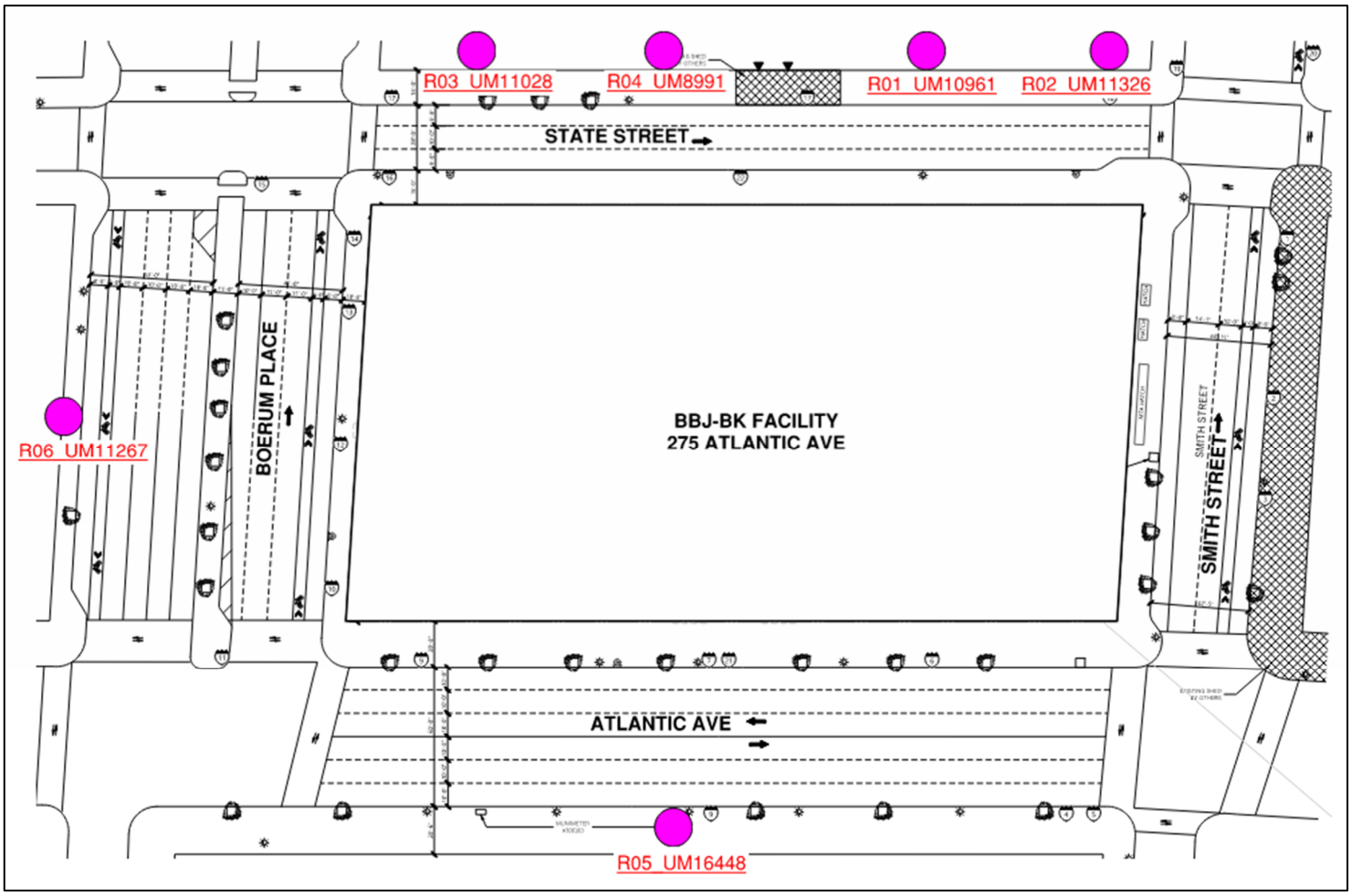
Device #988A – Noise Monitoring Station



Device #990A – Noise Monitoring Station

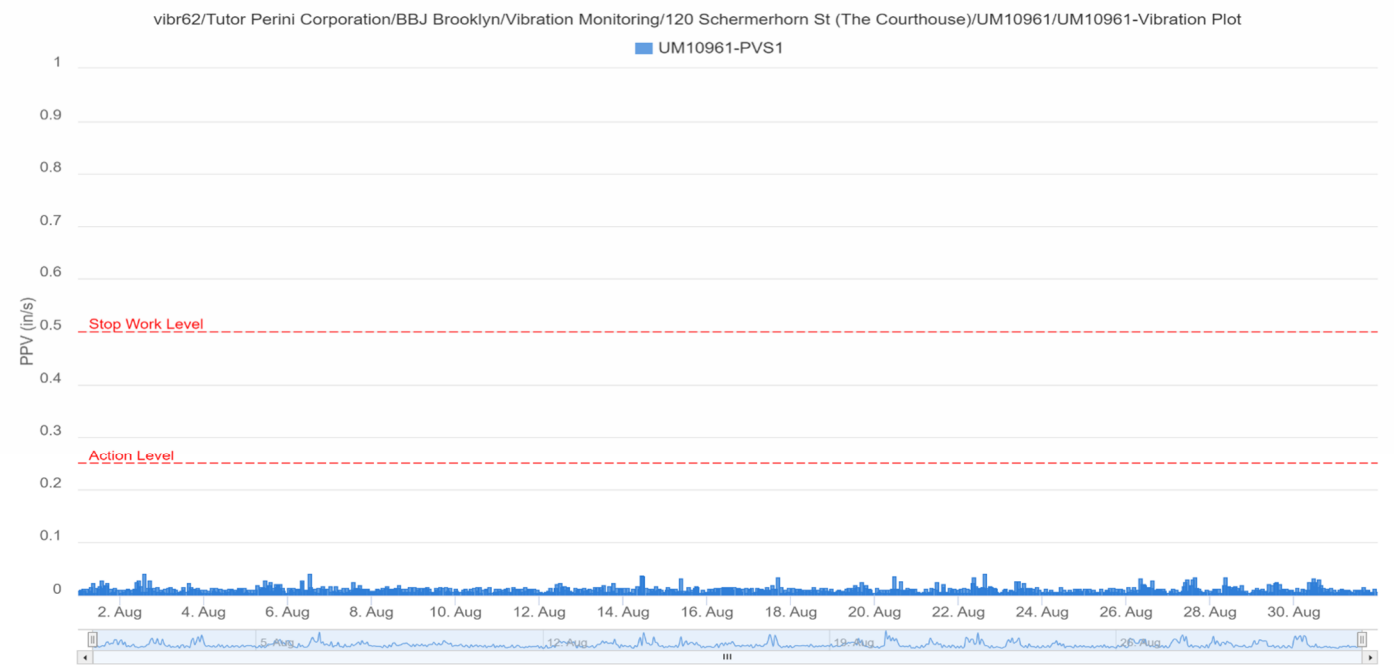


Vibration Monitor Location

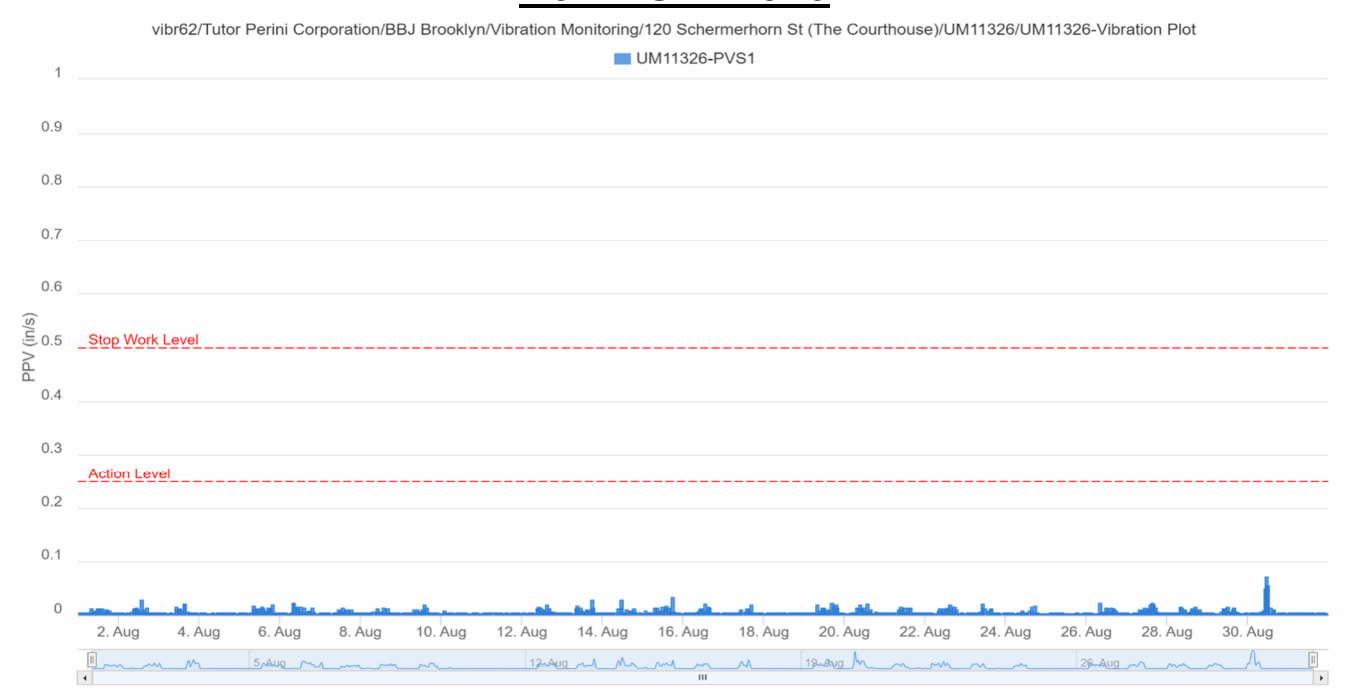


Vibration Monitor Plots

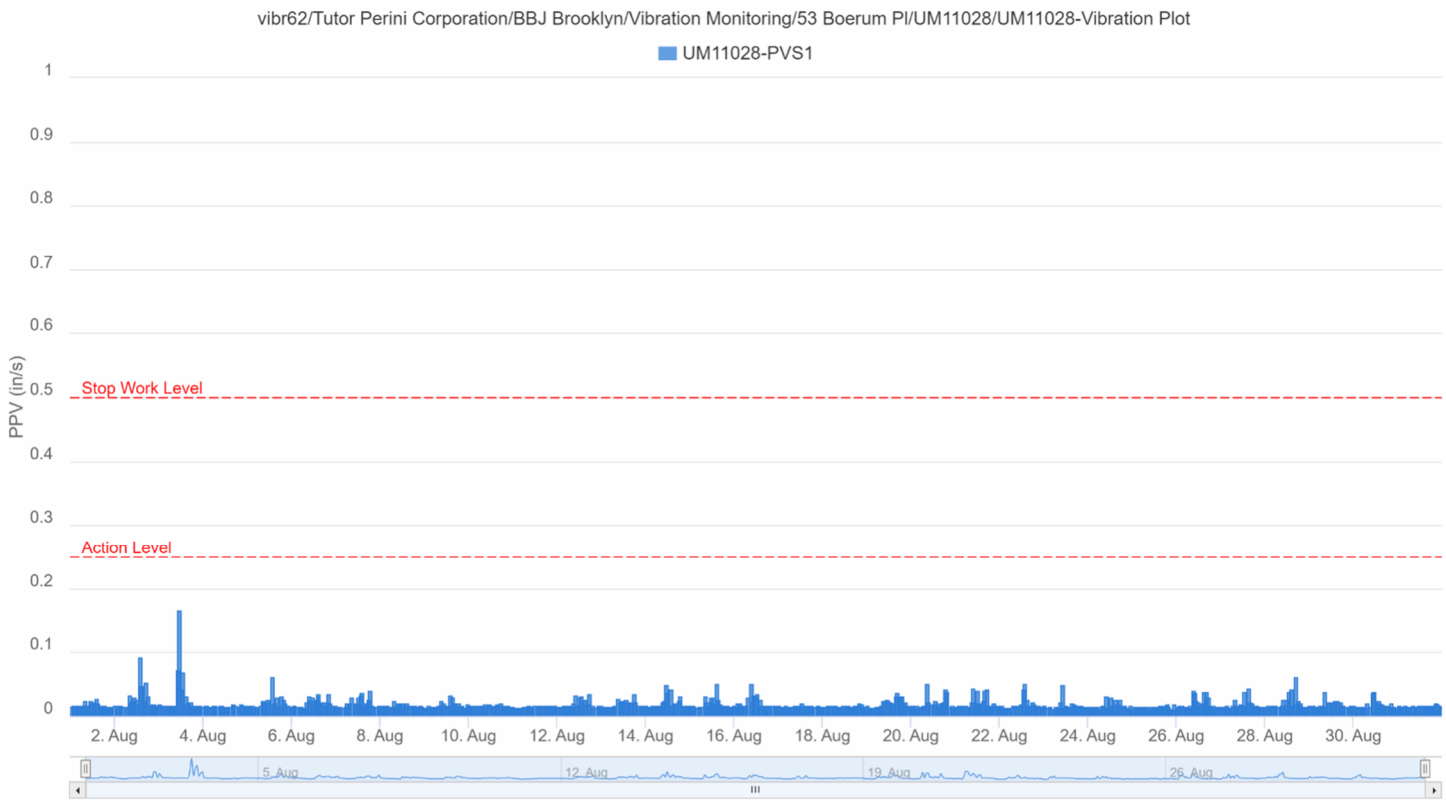
R01 – UM10961



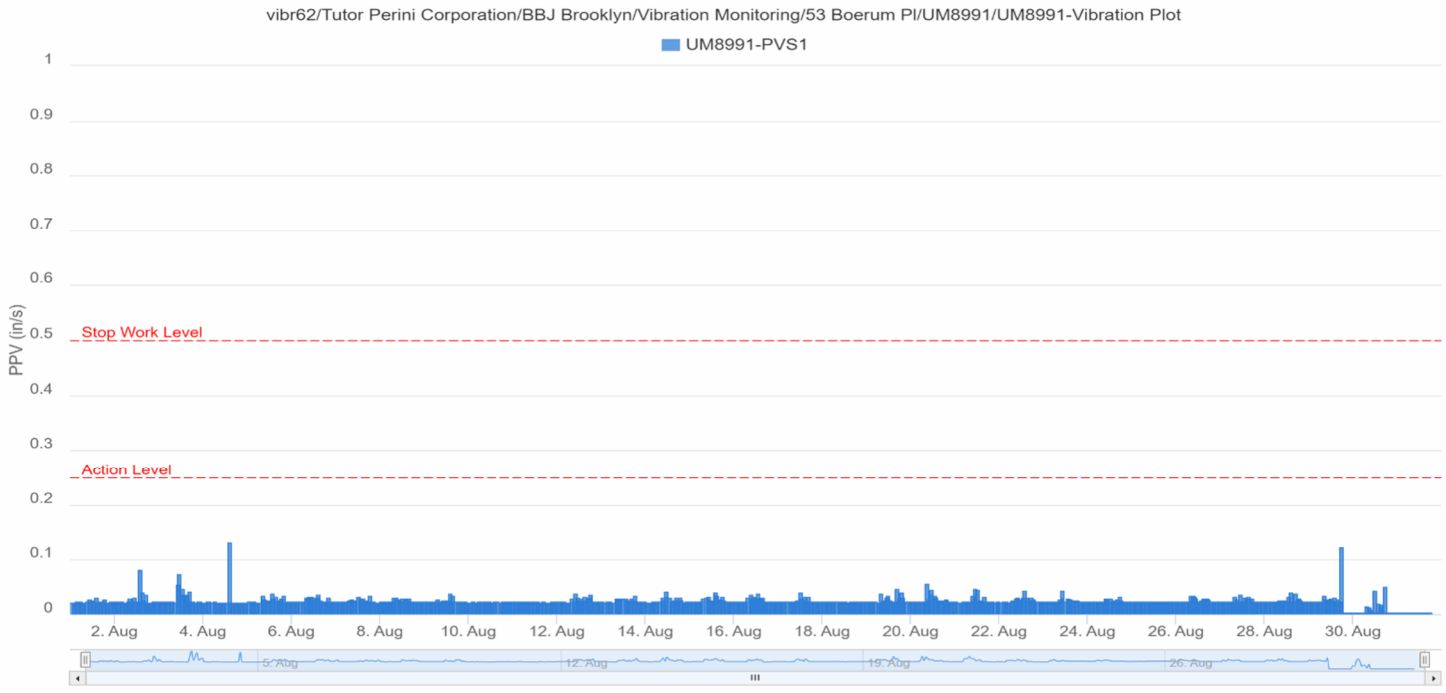
R02 – UM11326



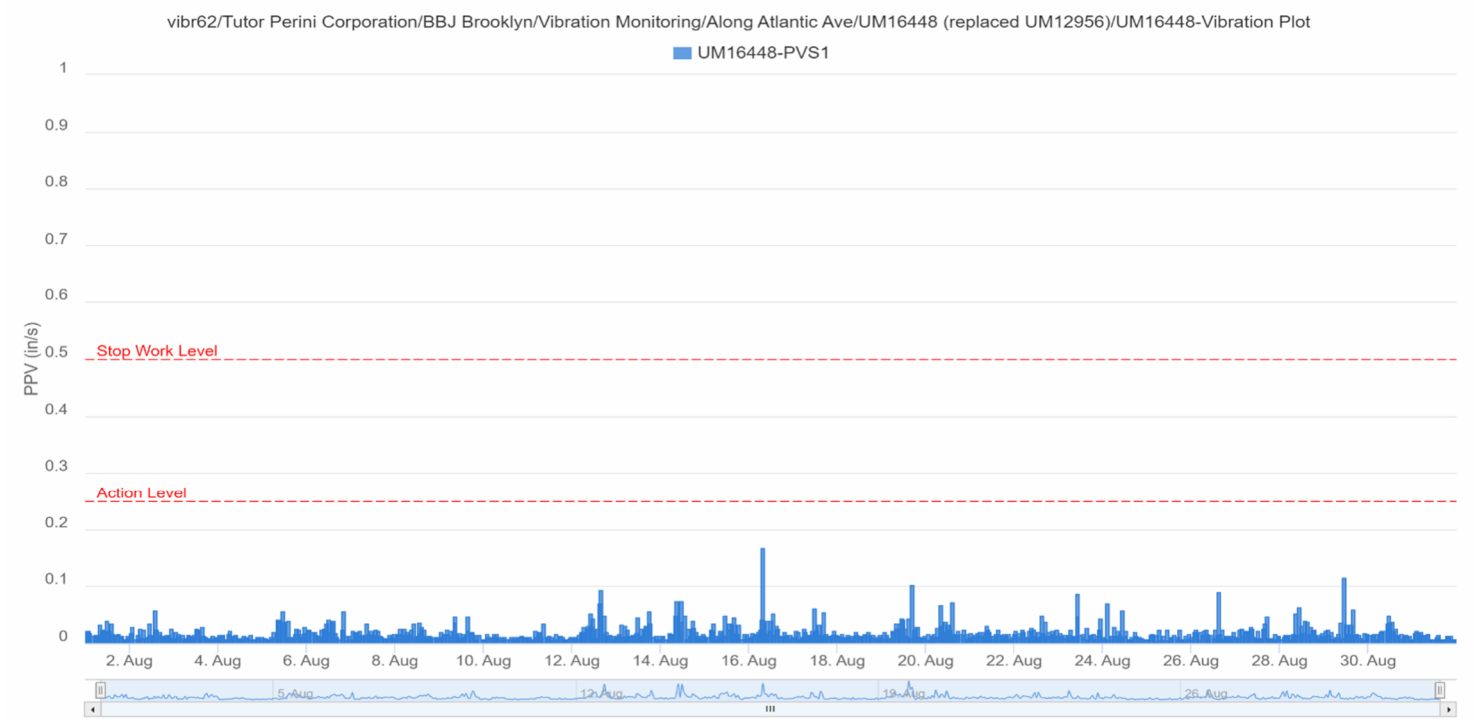
R03 – UM11028



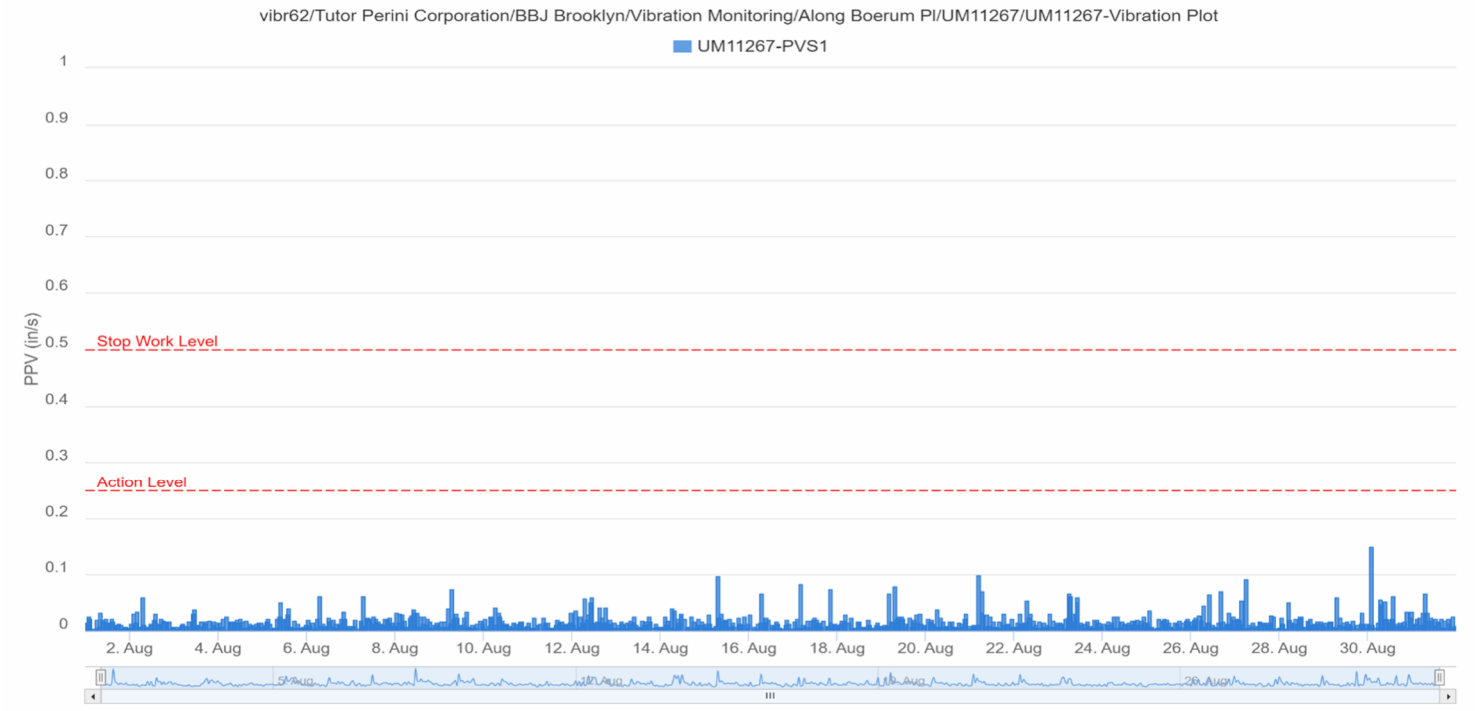
R04 – UM8991



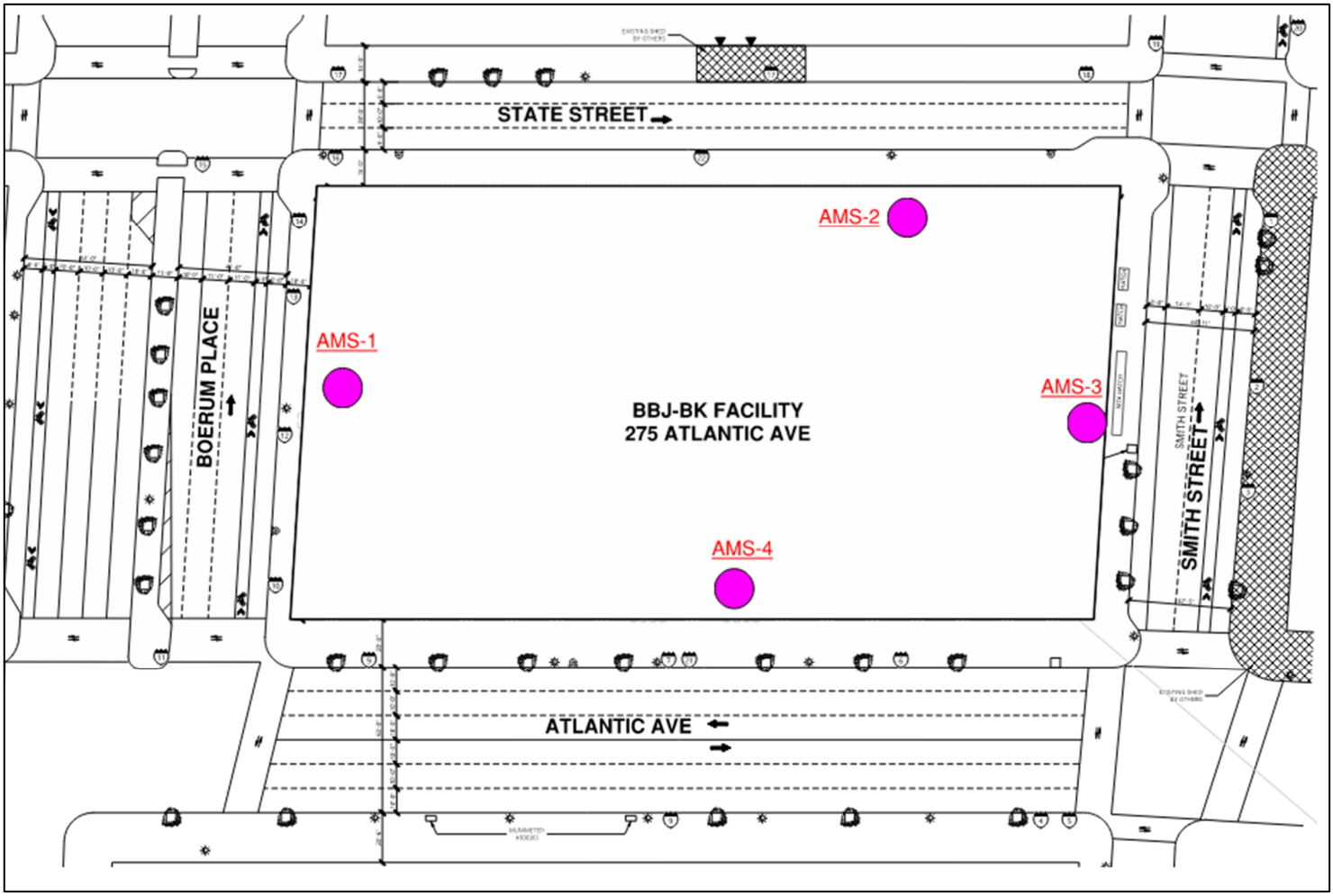
R05 – UM16448

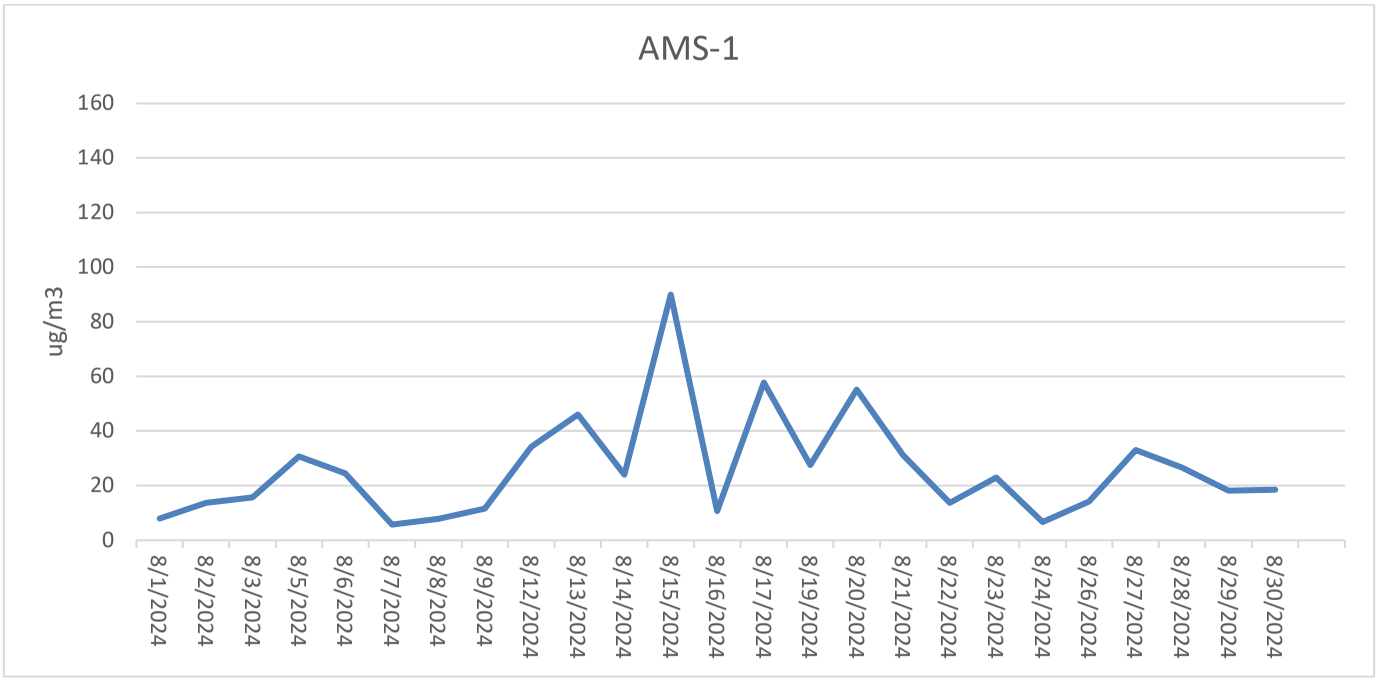


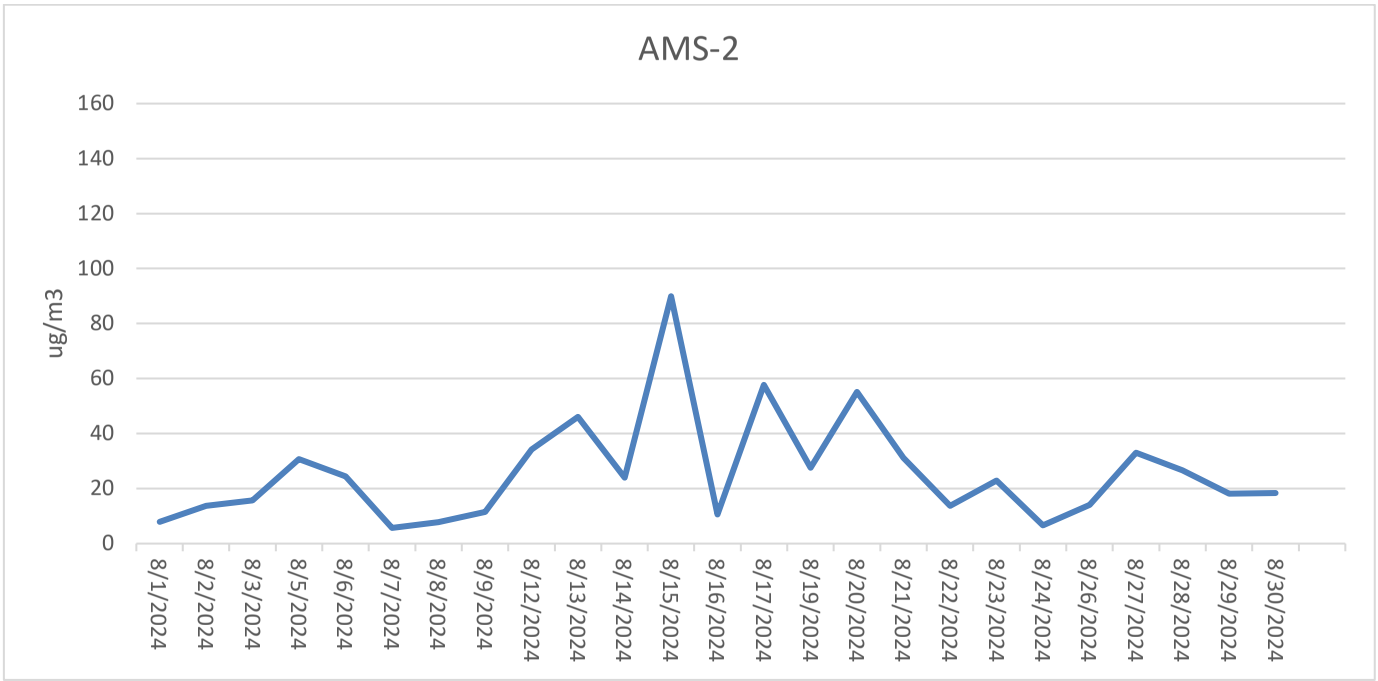
R06 – UM11267

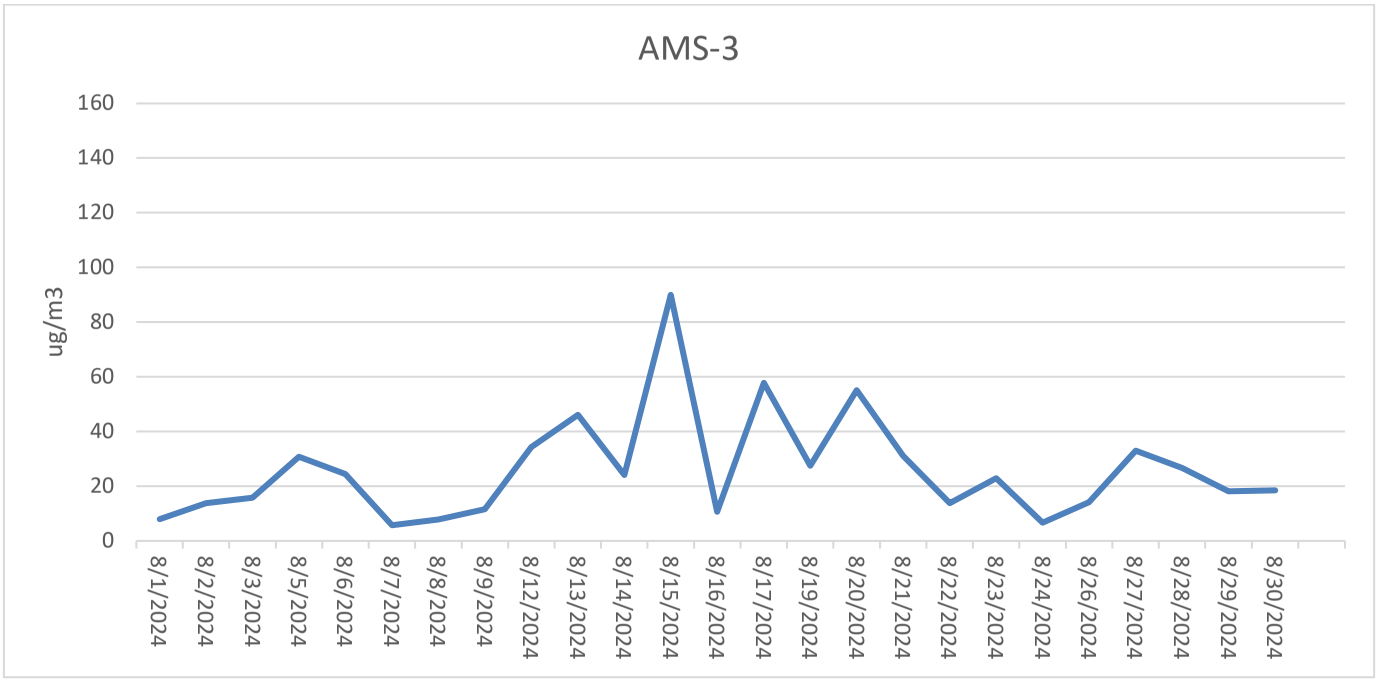


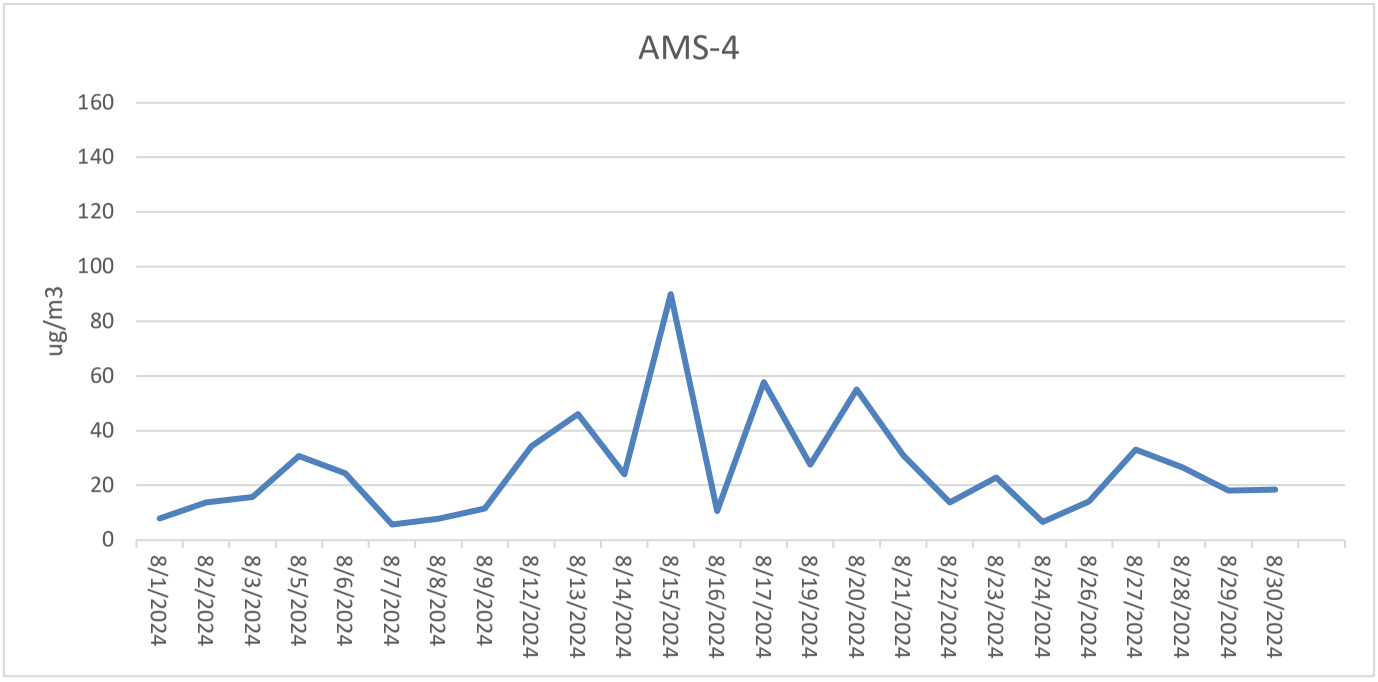
AIR MONITOR LOCATIONS




AMS-1
ug/m3
160
140
120
100
80
60
40
20
0
8/1/2024
8/2/2024
8/3/2024
8/5/2024
8/6/2024
8/7/2024
8/8/2024
8/9/2024
8/12/2024
8/13/2024
8/14/2024
8/15/2024
8/16/2024
8/17/2024
8/19/2024
8/20/2024
8/21/2024
8/22/2024
8/23/2024
8/24/2024
8/26/2024
8/27/2024
8/28/2024
8/29/2024
8/30/2024


AMS-2
ug/m3
160
140
120
100
80
60
40
20
0
8/1/2024
8/2/2024
8/3/2024
8/5/2024
8/6/2024
8/7/2024
8/8/2024
8/9/2024
8/12/2024
8/13/2024
8/14/2024
8/15/2024
8/16/2024
8/17/2024
8/19/2024
8/20/2024
8/21/2024
8/22/2024
8/23/2024
8/24/2024
8/26/2024
8/27/2024
8/28/2024
8/29/2024
8/30/2024


AMS-3
ug/m3
160
140
120
100
80
60
40
20
0
8/1/2024
8/2/2024
8/3/2024
8/5/2024
8/6/2024
8/7/2024
8/8/2024
8/9/2024
8/12/2024
8/13/2024
8/14/2024
8/15/2024
8/16/2024
8/17/2024
8/19/2024
8/20/2024
8/21/2024
8/22/2024
8/23/2024
8/24/2024
8/26/2024
8/27/2024
8/28/2024
8/29/2024
8/30/2024


AMS-4
ug/m3
160
140
120
100
80
60
40
20
0
8/1/2024
8/2/2024
8/3/2024
8/5/2024
8/6/2024
8/7/2024
8/8/2024
8/9/2024
8/12/2024
8/13/2024
8/14/2024
8/15/2024
8/16/2024
8/17/2024
8/19/2024
8/20/2024
8/21/2024
8/22/2024
8/23/2024
8/24/2024
8/26/2024
8/27/2024
8/28/2024
8/29/2024
8/30/2024

BASELINE Air & Dust Graph

