

# Air Monitoring Summary Tables

The table below summarizes monitoring data collected using a portable wireless remote monitoring system.  
All times in Eastern Standard Time (EST).

**From:** 03/15/23 12:00 am

**To:** 03/15/23 11:59 pm

## Offsite Monitors

Instrument	Analyte	ATSDR MRL 14-day Avg Reached?	Concentration Range Detected <sup>a</sup>	24-hr Average <sup>a</sup>	7-day Average	ATSDR 14-day MRL
<b>Catawba Headstart</b>						
Acrulog PPB	H <sub>2</sub> S	No	0 – 0 ppb	0.00 ppb <sup>b</sup>	0.00 ppb	70 ppb
<b>Treetops</b>						
Acrulog PPB	H <sub>2</sub> S	No	0 – 0 ppb	0.00 ppb <sup>c</sup>	0.00 ppb	70 ppb
<b>Liberty Hill</b>						
Acrulog PPB	H <sub>2</sub> S	No	0 – 0 ppb	0.00 ppb <sup>d</sup>	0.00 ppb	70 ppb
<b>Riverchase Estates</b>						
Acrulog PPB	H <sub>2</sub> S	No	0 – 0 ppb	0.00 ppb <sup>e</sup>	0.00 ppb	70 ppb
<b>Millstone Creek</b>						
Acrulog PPB	H <sub>2</sub> S	No	0 – 0 ppb	0.00 ppb <sup>f</sup>	0.00 ppb	70 ppb

<sup>b</sup> The 24-hr average at this location is not represented by the full 24-hr period; a total of 17 30-minute average are missing from the reported period due to a quarterly audit performed at Catawba Headstart.

<sup>c</sup> The 24-hr average at this location is not represented by the full 24-hr period; a total of 15 30-minute average are missing from the reported period due to a quarterly audit performed at Treetops.

<sup>d</sup> The 24-hr average at this location is not represented by the full 24-hr period; a total of 17 30-minute average are missing from the reported period due to quarterly audit performed at Liberty Hill.

<sup>e</sup> The 24-hr average at this location is not represented by the full 24-hr period; a total of 16 30-minute average are missing from the reported period due to a quarterly audit performed at Riverchase Estates.

<sup>f</sup> The 24-hr average at this location is not represented by the full 24-hr period; a total of 15 30-minute average are missing from the reported period due to quarterly audit performed at Millstone Creek.

## Onsite Fenceline Monitors

Instrument	Analyte	30-min AEGL Reached?	Concentration Range Detected <sup>a</sup>	24-hr Average <sup>a</sup>	7-day Average	30-min AEGL
<b>Station 1</b>						
TAPI Analyzer	H <sub>2</sub> S	No	0 - 4 ppb	0.56 ppb	0.80 ppb	600 ppb
<b>Station 2</b>						
TAPI Analyzer	H <sub>2</sub> S	No	0 – 0 ppb	0.21 ppb <sup>g</sup>	0.30 ppb	600 ppb
<b>Station 3</b>						
TAPI Analyzer	H <sub>2</sub> S	No	0 – 1 ppb	0.26 ppb <sup>h</sup>	0.36 ppb	600 ppb

<sup>a</sup> Based on 30-minute averages.

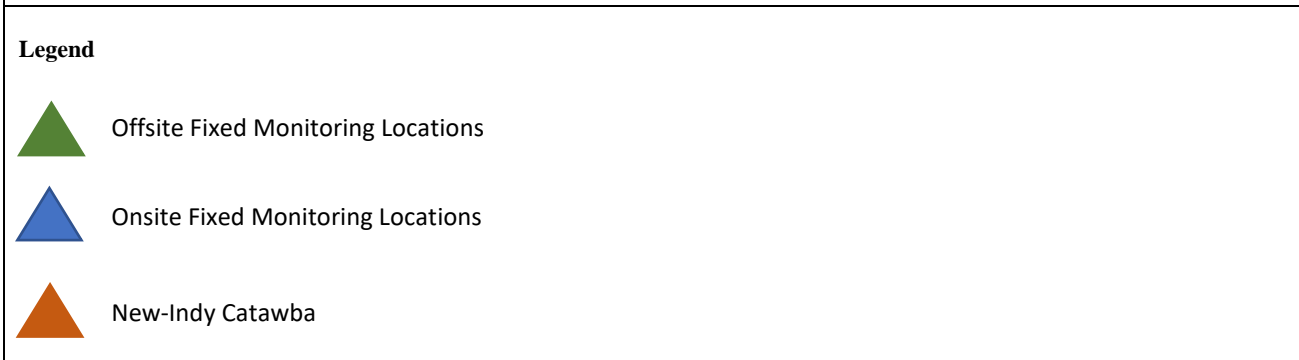
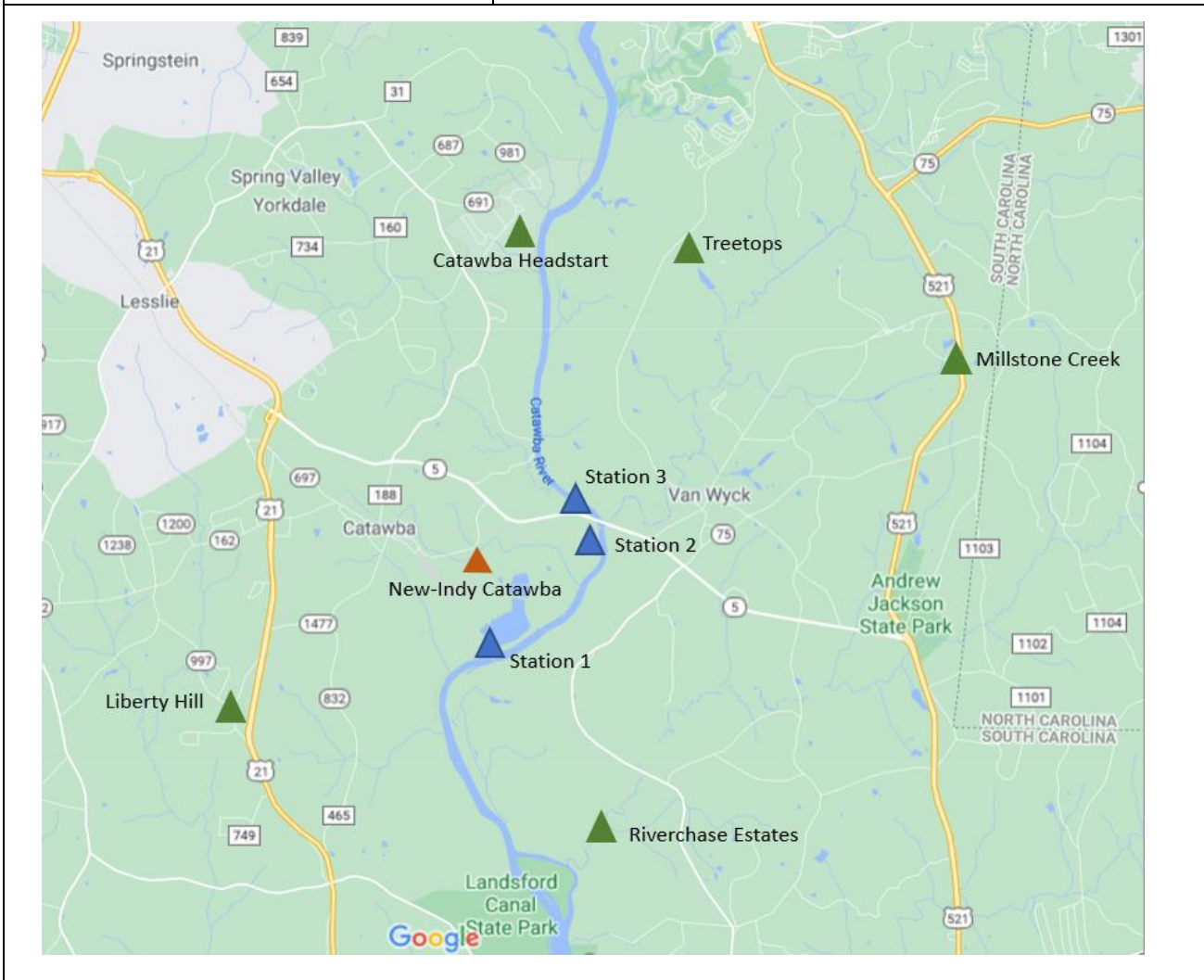
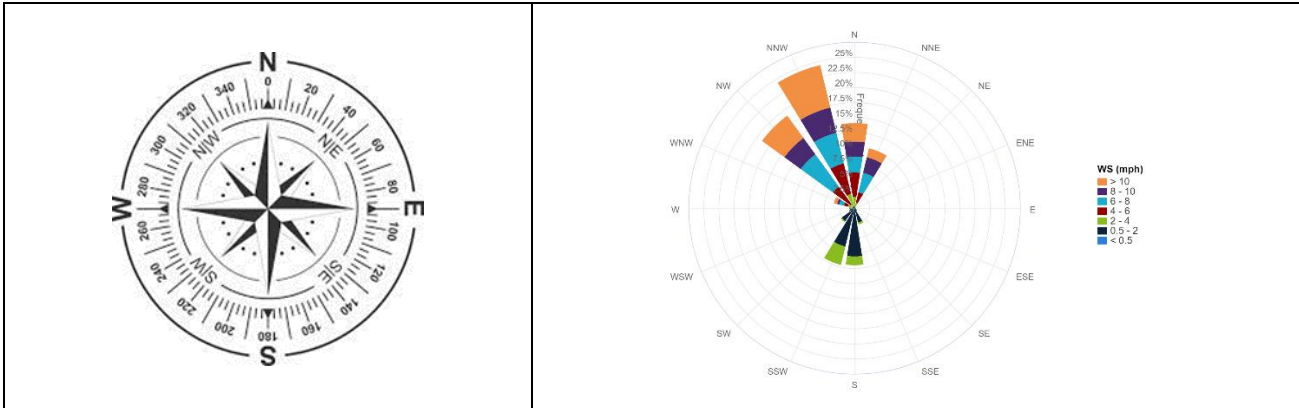
<sup>g</sup> The 24-hr average at Station 2 is not represented by the full 24-hr period; a total of 21 30-minute averages are missing from the reported period due to routine maintenance, quarterly calibration, and multi-point verification work performed at this station. The data at Station 2 is represented by the redundant unit data due to a failed overnight QC check on the primary unit.

<sup>h</sup> The 24-hr average at Station 3 is not represented by the full 24-hr period; a total of 8 30-minute averages are missing from the reported period due to a quarterly audit performed at this station.

### Notes:

ATSDR MRL	Agency for Toxic Substances and Disease Registry Minimal Risk Level (MRL)
AEGL	EPA Acute Exposure Guidelines Levels
H <sub>2</sub> S	Hydrogen Sulfide
TAPI	Teledyne API H <sub>2</sub> S Analyzer
hr	Hour
min	Minute
ppb	Parts per billion
MRL Limit	Limit defined as a 14-day average value.

**Station 1 Wind Rose – Shows the direction the wind is coming from, the monitoring station being at the center of the rose.**



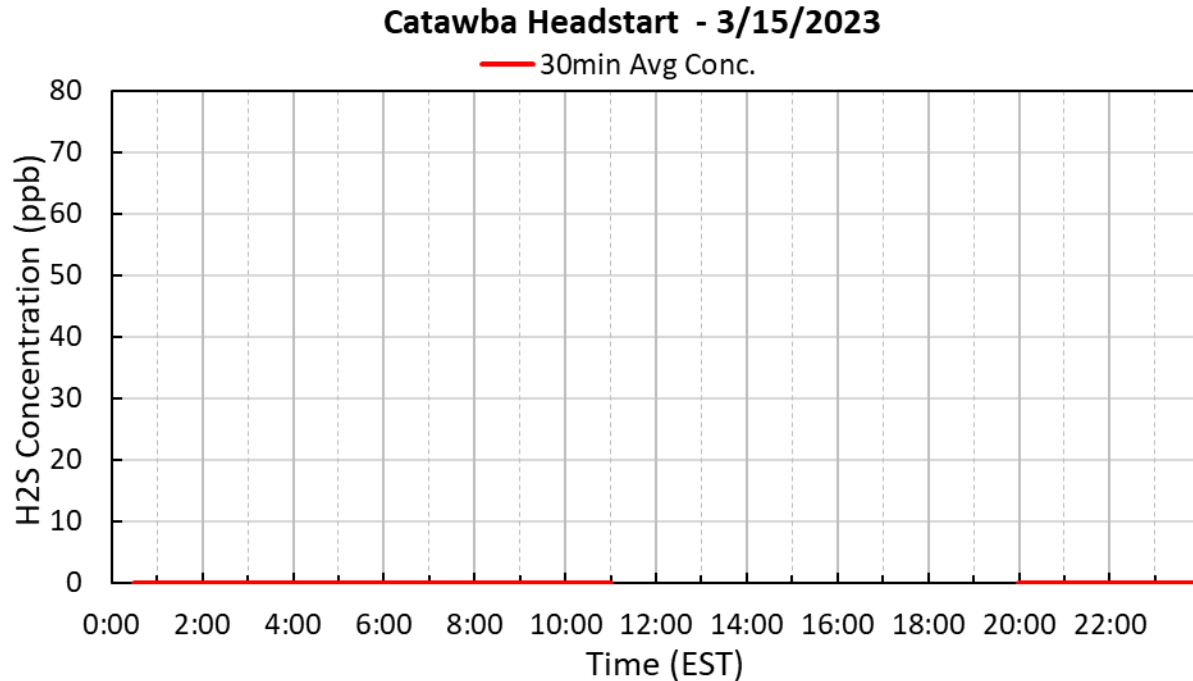
## Period H<sub>2</sub>S Monitoring Hydrogen Sulfide Offsite Monitors

Below are graphs for offsite locations where hydrogen sulfide (H<sub>2</sub>S) was detected during the current reporting period.

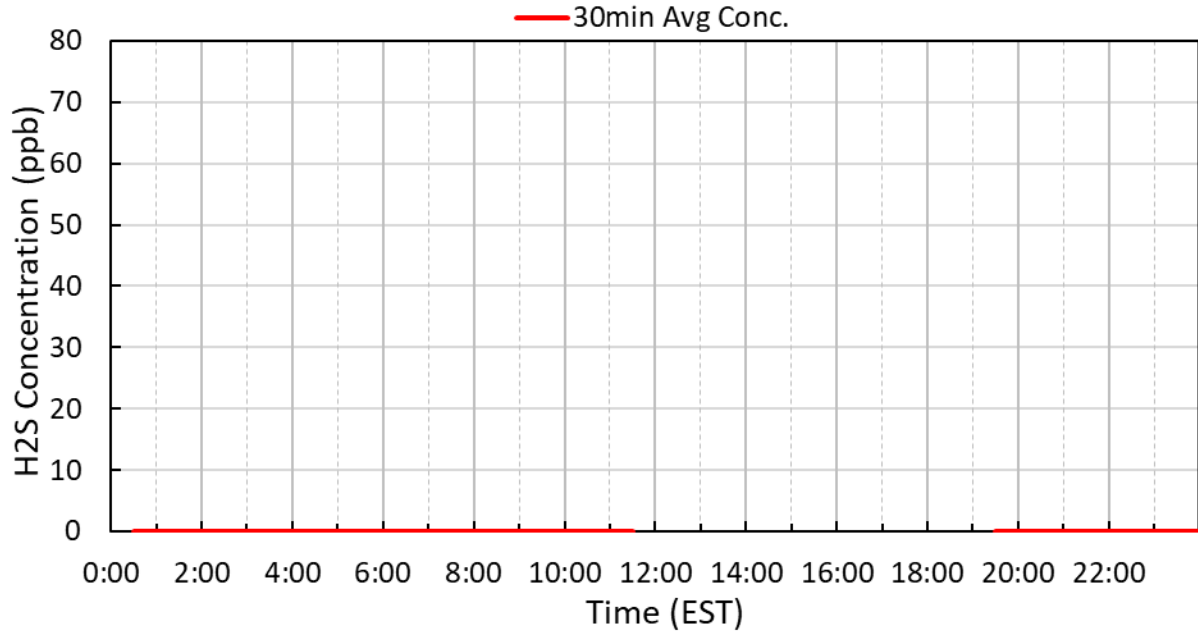
The five stand-alone H<sub>2</sub>S monitoring stations correlate with five previous EPA's Viper monitoring system which includes areas to the north-northeast and south-southwest of the New-Indy Catawba Mill.

Winds were coming from a variable direction throughout the day at 1 to 12 mph.

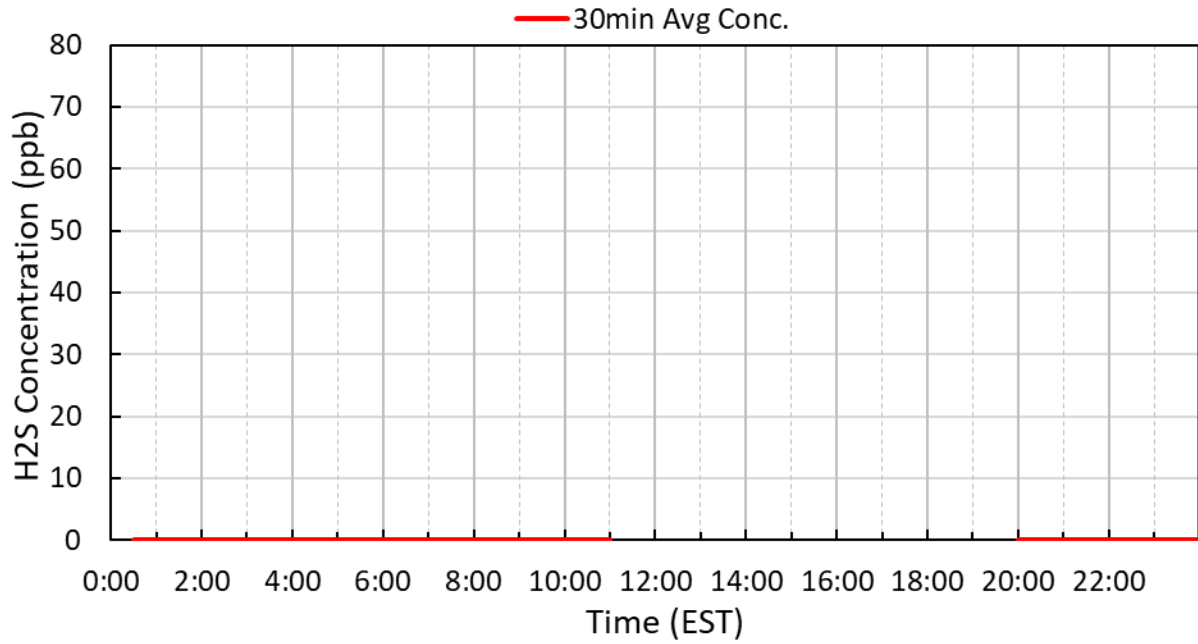
See wind rose diagram with aerial map figure for full wind data during this reporting period.



### Treetops - 3/15/2023

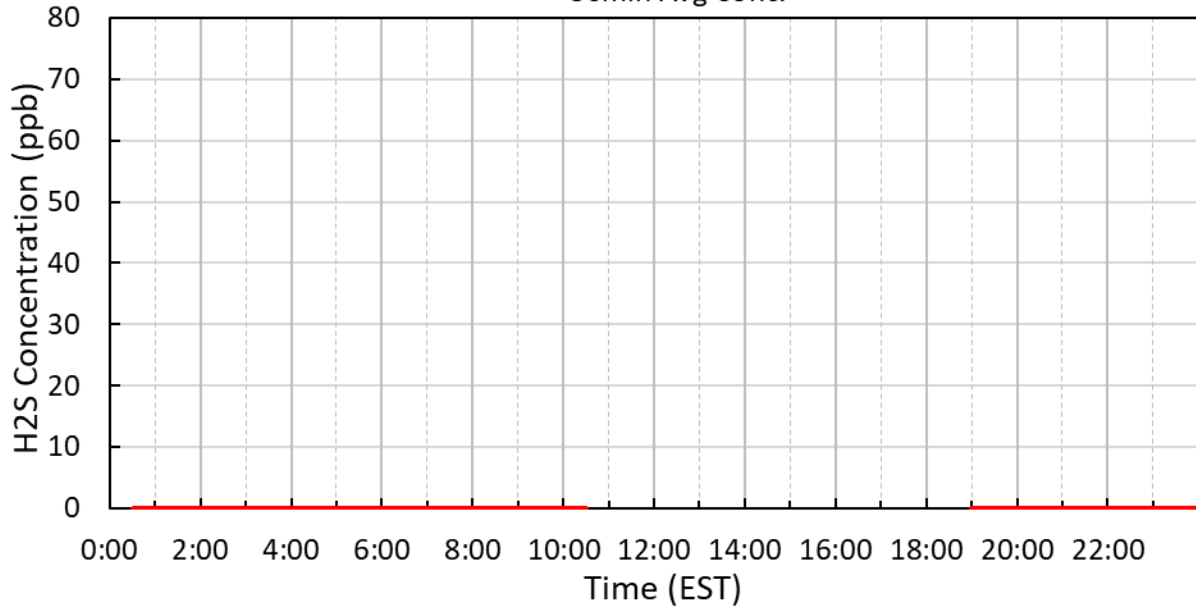


### Liberty Hill - 3/15/2023



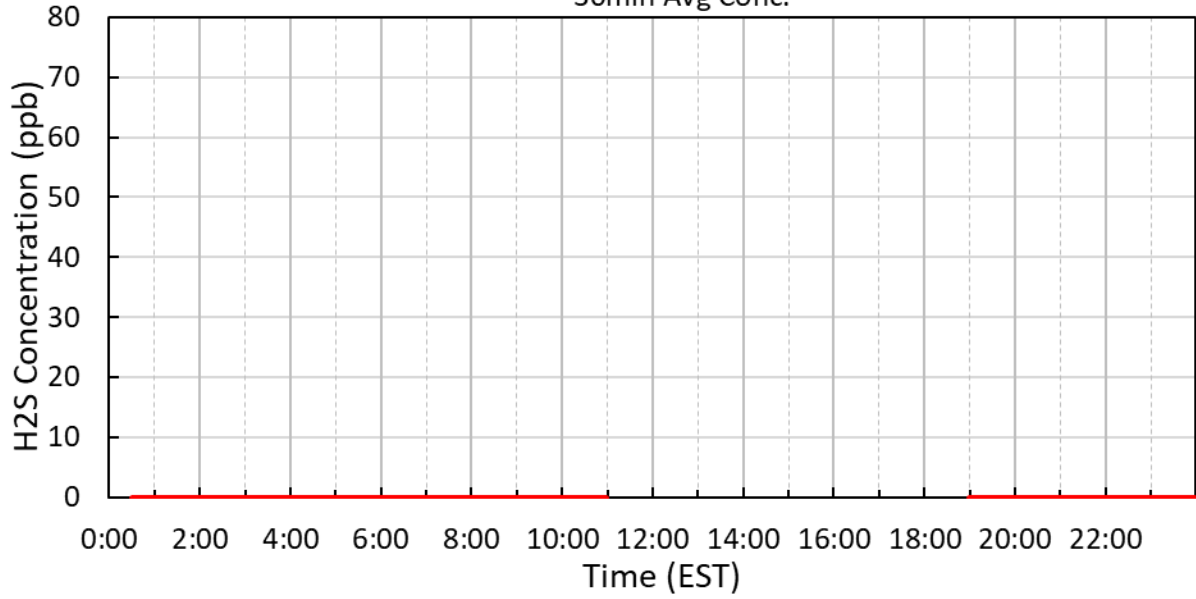
### Riverchase - 3/15/2023

— 30min Avg Conc.



### Millstone Creek - 3/15/2023

— 30min Avg Conc.



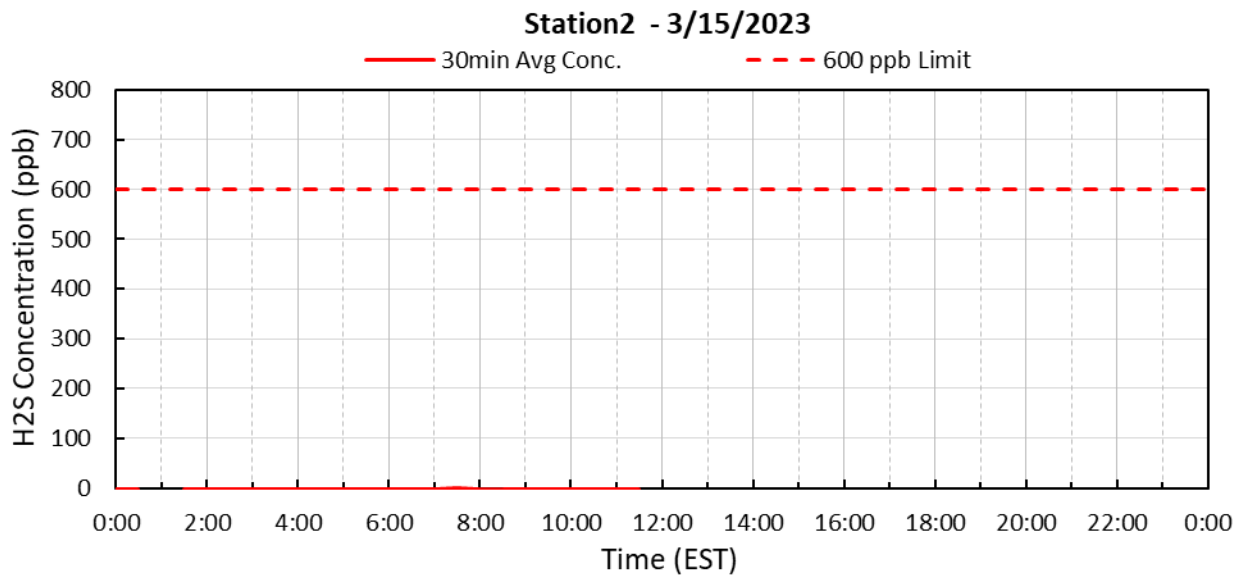
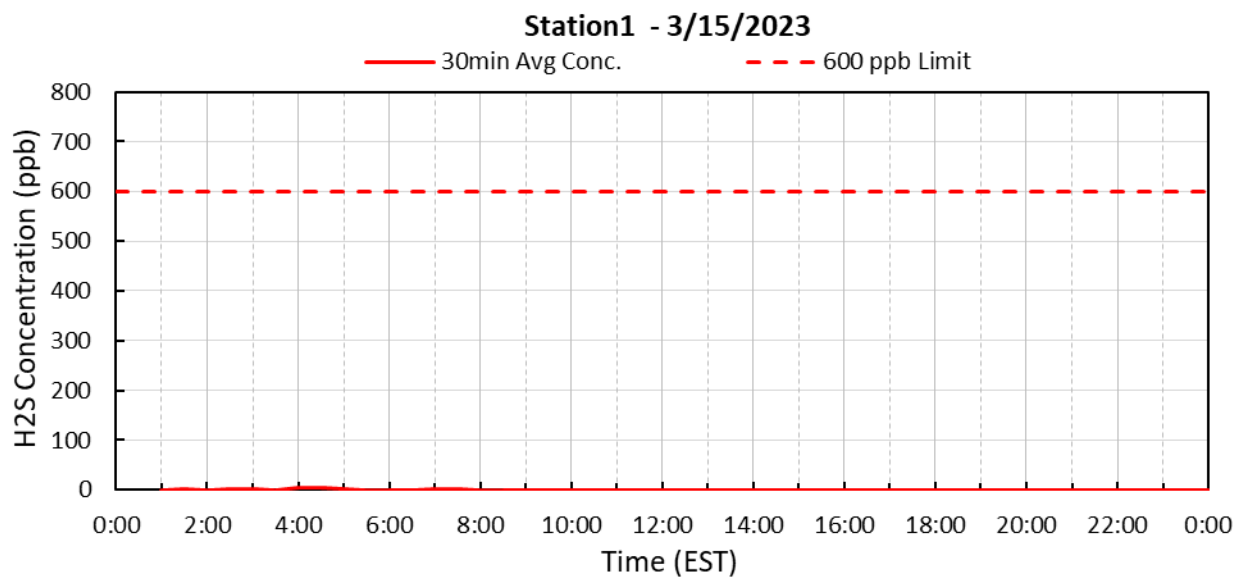
## Period H<sub>2</sub>S Monitoring Hydrogen Sulfide Onsite Monitors

Below are graphs for onsite locations during the current reporting period.

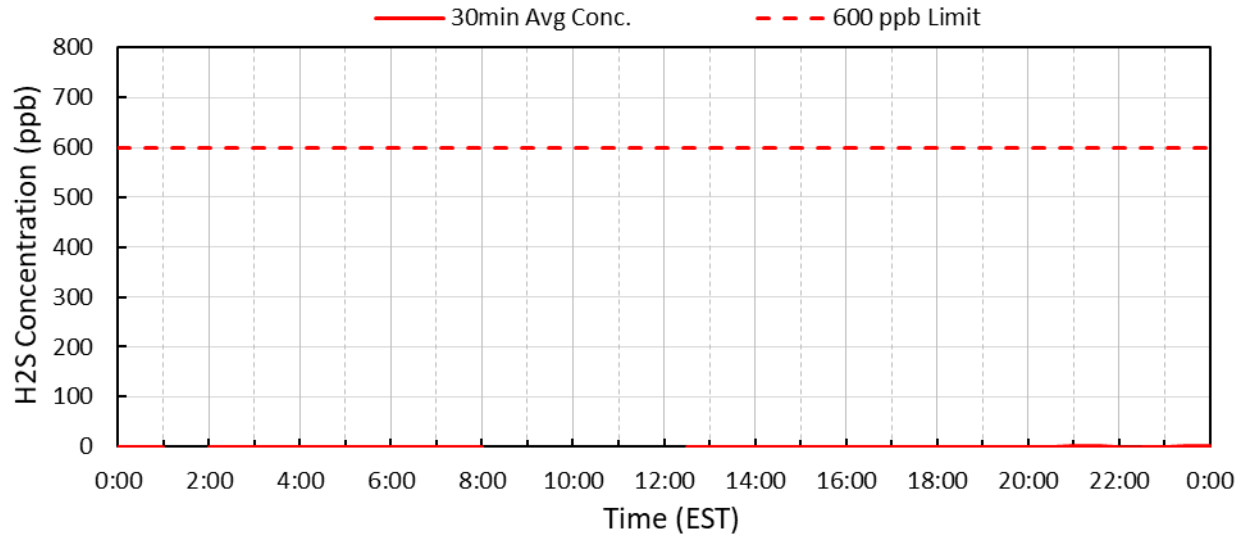
Depending on wind direction, the H<sub>2</sub>S measured at the onsite fence line locations may not exit the mill property at reported concentrations. Wind directions from offsite locations, blowing onto mill property, will disperse ambient concentrations to lower levels prior to exiting the plant site.

Winds were coming from a variable direction throughout the day at 1 to 12 mph.

See wind rose diagram with aerial map figure for full wind data during this reporting period.



**Station3 - 3/15/2023**



Submitted Fenceline H<sub>2</sub>S and Met 30-minute Data

30-Minute Avgs	Station 1			Station 2			Station 3		
	H2S	Met		H2S	Met		H2S	Met	
	30min Avg H2S Conc.	30min Avg WS	30min Avg WD	30min Avg H2S Conc.	30min Avg WS	30min Avg WD	30min Avg H2S Conc.	30min Avg WS	30min Avg WD
Date / Time	ppb	mph	degrees	ppb	mph	degrees	ppb	mph	degrees
3/15/2023 0:30	AX	8.8	13	0.2	1.3	325	0.2	0.4	266
3/15/2023 1:00	0.2	6.4	12	AX	0.9	11	0.2	0.5	338
3/15/2023 1:30	1.0	5.5	2	0.2	1.2	280	AX	1.2	233
3/15/2023 2:00	0.7	4.6	350	0.2	1.6	321	0.2	0.4	268
3/15/2023 2:30	2.3	7.0	11	0.2	0.7	342	0.2	0.4	274
3/15/2023 3:00	1.8	1.8	341	0.2	0.8	24	0.2	0.3	287
3/15/2023 3:30	0.6	2.3	261	0.2	0.5	2	0.2	0.3	298
3/15/2023 4:00	3.5	4.6	358	0.2	1.5	13	0.2	0.5	272
3/15/2023 4:30	3.6	4.3	351	0.2	1.1	40	0.2	0.4	304
3/15/2023 5:00	1.5	6.7	332	0.2	1.5	322	0.2	0.3	169
3/15/2023 5:30	0.7	7.9	339	0.2	2.5	352	0.2	0.9	16
3/15/2023 6:00	0.7	10.8	331	0.2	2.2	321	0.2	0.5	266
3/15/2023 6:30	0.8	7.0	322	0.2	2.1	17	0.2	0.8	21
3/15/2023 7:00	1.0	5.9	321	0.2	1.6	316	0.2	0.6	241
3/15/2023 7:30	0.9	6.7	318	0.4	1.6	302	0.2	0.8	356
3/15/2023 8:00	0.4	7.5	322	0.2	1.5	323	0.2	1.1	29
3/15/2023 8:30	0.2	6.4	321	0.2	3.7	317	AZ	1.2	352
3/15/2023 9:00	0.2	7.5	319	0.2	4.4	294	AZ	1.6	324
3/15/2023 9:30	0.2	9.1	331	0.2	6.1	300	AZ	3.0	335
3/15/2023 10:00	0.2	8.0	324	0.2	6.5	317	AZ	3.4	329
3/15/2023 10:30	0.2	9.3	326	0.2	6.4	337	AZ	3.4	337
3/15/2023 11:00	0.2	11.8	336	0.2	5.9	323	AZ	3.7	333
3/15/2023 11:30	0.2	10.2	337	0.2	5.9	318	AZ	3.3	326
3/15/2023 12:00	0.2	11.5	337	0.2	6.5	325	AZ	2.7	334
3/15/2023 12:30	0.2	9.3	334	0.2	6.7	299	0.2	2.5	307
3/15/2023 13:00	0.2	BA	BA	0.2	5.2	11	0.2	4.6	359
3/15/2023 13:30	0.2	8.7	334	0.2	5.2	354	0.2	3.8	342
3/15/2023 14:00	0.2	7.8	357	BA	6.0	316	0.2	3.9	340
3/15/2023 14:30	0.2	11.0	7	BA	5.8	335	0.2	4.8	344
3/15/2023 15:00	0.2	9.8	342	BC	4.9	354	0.2	3.1	338
3/15/2023 15:30	0.2	10.9	339	BC	5.1	324	0.2	2.9	337
3/15/2023 16:00	0.2	7.9	331	BC	4.9	341	0.2	3.1	338
3/15/2023 16:30	0.2	11.0	353	BC	6.1	297	0.2	1.5	318
3/15/2023 17:00	0.2	5.0	313	BC	4.2	327	0.2	2.2	333
3/15/2023 17:30	0.2	4.7	352	BC	2.8	334	0.2	1.3	285
3/15/2023 18:00	0.2	2.2	305	BC	2.2	325	0.2	0.8	246
3/15/2023 18:30	0.2	2.1	220	BC	1.2	358	0.2	0.7	202
3/15/2023 19:00	0.2	1.4	207	BC	0.4	277	0.2	0.6	254
3/15/2023 19:30	0.2	1.9	185	BC	0.6	55	0.2	0.6	262
3/15/2023 20:00	0.2	1.3	196	BC	0.6	287	0.2	0.6	313
3/15/2023 20:30	0.2	1.7	185	BC	0.5	342	0.2	0.5	244
3/15/2023 21:00	0.2	1.4	187	BC	0.4	350	0.6	0.3	233
3/15/2023 21:30	0.2	1.5	189	BC	0.8	319	0.6	0.5	303
3/15/2023 22:00	0.2	1.4	191	BC	0.6	2	0.4	0.4	303
3/15/2023 22:30	0.2	1.7	176	BC	0.5	5	0.2	0.3	306
3/15/2023 23:00	0.2	1.5	188	BC	0.7	7	0.4	0.3	316
3/15/2023 23:30	0.2	1.5	184	BC	0.4	342	0.6	0.4	304
3/16/2023 0:00	0.2	1.5	191	BC	0.8	24	0.8	0.5	319



AQS Null Data Codes	
Qualifier Code	Item Description
AB	TECHNICIAN UNAVAILABLE
AC	CONSTRUCTION/REPAIRS IN AREA
AD	SHELTER STORM DAMAGE
AE	SHELTER TEMPERATURE OUTSIDE LIMITS
AI	INSUFFICIENT DATA (CAN'T CALCULATE)
AM	MISCELLANEOUS VOID
AN	MACHINE MALFUNCTION
AO	BAD WEATHER
AP	VANDALISM
AS	POOR QUALITY ASSURANCE RESULTS
AT	CALIBRATION
AU	MONITORING WAIVED
AV	POWER FAILURE (POWR)
AW	WILDLIFE DAMAGE
AX	PRECISION CHECK (PREC)
AY	Q C CONTROL POINTS (ZERO/SPAN)
AZ	Q C AUDIT (AUDT)
BA	MAINTENANCE/ROUTINE REPAIRS
BB	UNABLE TO REACH SITE
BC	MULTI-POINT CALIBRATION
BD	AUTO CALIBRATION
BE	BUILDING/SITE REPAIR
BF	PRECISION/ZERO/SPAN
BJ	OPERATOR ERROR
BK	SITE COMPUTER/DATA LOGGER DOWN
EC	EXCEED CRITICAL CRITERIA