State of Alabama
Ambient Air Monitoring
2026 Network Plan

May 22, 2026

Alabama Department of Environmental Management

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Definitions and Acronyms

AADT	Annual Average Daily Traffic
AAQM	Ambient Air Quality Monitoring
AAQMP	Ambient Air Quality Monitoring Plan
ADEM	Alabama Department of Environmental Management
ARM	Approved Regional Method
AQS	Air Quality System
avg	average
CASTNET	Clean Air Status and Trends Network
CBSA	Core Based Statistical Area
CFR	*Code of Federal Regulations*
CO	Carbon Monoxide
CSA	Combined Statistical Area
CSN	Chemical Speciation Network
EE	Exception Event
EPA	Environmental Protection Agency
FEM	Federal Equivalent Method
FRM	Federal Reference Method
GA EPD	Georgia Department of Natural Resources -Environmental Protection Division
HDNREM	Huntsville Division of Natural Resources and Environmental Management
hr	hour
hi-vol	high-volume sampler
JCDH	Jefferson County Department of Health
low-vol	low-volume particulate sampler
m3	cubic meter
min	minute
ml	milliliter
MSA	Metropolitan Statistical Area
NAAQS	National Ambient Air Quality Standards
NCore	National Core multipollutant monitoring station
O_3	ozone
PAMS	Photochemical Assessment Monitoring Station
Pb	lead
PM	particulate matter
$PM_{2.5}$	particulate matter ≤2.5 micrometers diameter
PM_{10}	particulate matter ≤10 micrometers diameter
ppb	parts per billion
PQAO	primary quality assurance organization
PSD	Prevention of Significant Deterioration
PWEI	Population Weighted Emissions Index
QA	Quality Assurance
QAPP	Quality Assurance Project Plan
QC	Quality Control
SLAMS	State or Local Air Monitoring Station
SO2	Sulfur Dioxide
SPM	Special Purpose Monitor
STN ($PM_{2.5}$)	Speciation Trends Network
tpy	tons per year
TSP	Total Suspended Particulate
URG	URG-3000N $PM_{2.5}$ Speciation monitoring carbon-specific sampler
° C	degree Celsius
µg/m^3	micrograms (of pollutant) per cubic meter (of air sampled)
µSA	Micropolitan Statistical Area
≥	greater than or equal to
>	greater than
≤	less than or equal to
<	less than

Introduction

In October 2006, the United States Environmental Protection Agency (EPA) issued final Federal Regulations (40 CFR Part 58) concerning state and local agency ambient air monitoring networks. These regulations require states to submit an annual monitoring network review to EPA. This document provides the framework for establishment and maintenance of Alabama's air quality surveillance system, lists changes that occurred during 2025/2026, and changes proposed to take place to the current ambient air monitoring network during 2026/2027. Any changes made to the plan after public comment period will be found in Appendix D.

Public Review and Comment

The annual monitoring network review must be made available for public inspection for thirty (30) days prior to submission to the EPA. For monitoring year 2026/2027, this document was placed on ADEM's website on 05/22/2026 to begin a 30-day public review period. This document was accessed at the following link:

https://adem.alabama.gov/public-notices

Or by contacting:

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Overview of Alabama's Air Monitoring Network

Ambient air monitors in the state of Alabama are operated for a variety of monitoring objectives. These objectives include determining whether areas of the state meet the National Ambient Air Quality Standards (NAAQS), to provide public information such as participation in the EPA's AirNow program, Air Quality Index (AQI) reporting for larger Metropolitan Statistical Areas (MSAs), for use in Air Quality Models, and to provide data to Air Quality Researchers. Entities in Alabama monitor all six (6) criteria pollutants which have NAAQS identified for them: Carbon Monoxide (CO), Lead (Pb), Nitrogen Dioxide (NO_2), Ozone (O_3), particulate matter (PM_{10}, $PM_{2.5}$), and Sulfur Dioxide (SO_2). $PM_{2.5}$ speciated compounds, a non-criteria pollutant, is also monitored for special purposes. In addition, meteorological data may be collected to support air monitoring and aid in analysis of the ambient air monitoring data.

In Alabama, the air quality surveillance system is operated by three separate entities: the Alabama Department of Environmental Management (ADEM), and two local agencies, the Jefferson County Department of Health (JCDH), and the Huntsville Department of Natural Resources and Environmental Management (HDNREM). Each agency is responsible for its own annual network plan. This document reflects only the ADEM air quality surveillance system. An overview of the 2026 ADEM Monitoring Network can be found in Table 1.

The JCDH plan will be available for review on their website by following this link.
https://jcdh.org/SitePages/Misc/AirProgReports.aspx

The HDNREM plan will be available for review on their website by following this link.
https://www.huntsvilleal.gov/environment/air-quality/

Alabama shares a MSA with Georgia on the eastern border. Although each state meets the monitoring requirements of the MSA, attainment status is determined by the combined data set. Details of air monitoring by the State of Georgia in the Columbus, GA-AL MSA are found on their website by following this link.
https://airgeorgia.org/networkplans.html

Currently, the Air Quality Index (AQI) is reported for Huntsville, Birmingham, Mobile, Montgomery and Phenix City on the Internet at the sites listed below.

ADEM	https://adem.alabama.gov/air/air-quality-information
JCDH	https://jcdh.org/SitePages/Programs-Services/EnvironmentalHealth/Air-RadiationProtectionDivision/AirQualForecast.aspx
HDNREM	https://www.huntsvilleal.gov/environment/air-quality/air-quality-index-reports/

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Summary of adjustments and proposals for the ADEM AAQMP

Summary of changes in 2025/2026

- **Helena, AQS ID 01-117-0004,** began ozone monitoring in a new CAS shelter on March 1, 2026.
- **Lhoist, Montevallo Plant, AQS ID 01-117-9001**, operated by a Lhoist contractor within the ADEM PQAO has met the SLAMS requirements of 40 CFR 58.14 for discontinuation and closed December 31, 2025, with EPA approval.
- **Ward, Sumter Co., AQS ID 01-119-0003**, NO_2 monitoring at the site officially began its 24-month evaluation period again on July 1, 2025.
- **Wetumpka Westside Technology Park, AQS ID 01-051-0004,** discontinued monitoring on November 1, 2025, because ADEM lost access to its current location. A new location for ozone monitoring was found within this MSA at **Worthy Wetumpka, AQS ID 01-051-0005**. See justification in Appendix C.
- **Worthy Wetumpka, AQS ID 01-051-0005,** was established to replace **Wetumpka Westside Technology Park, AQS ID 01-051-0004** for monitoring in this MSA with the new CAS shelter that was purchased for Wetumpka Westside Technology Park. Ozone monitoring began at this location on March 1, 2026.

Summary of proposed changes for 2026/2027

- ADEM plans to replace TFE filters that need to be changed bi-weekly with Kynar DFU filters that are only required to be changed every 6 to 8 months in continuous gaseous analyzers. This will apply to T100 analyzers at both SO_2 sites and T400 analyzers at all ozone sites. This change complies with Automated Equivalent Method: EQSA-0495-100 and EQOA-0992-087 and will take place during laboratory maintenance.
- **Chickasaw, AQS ID 01-097-0003**, plans to discontinue monitoring at this location by December 31, 2026. All ambient monitoring will be relocated to Africatown (01-097-0023).
- **Africatown AQS ID 01-097-0023,** ADEM will relocate all parameters from **Chickasaw, AQS ID 01-097-0003** and continue ambient air monitoring in the MSA by no later than January 1, 2027. Efforts continue to find a suitable location. ADEM will request the AQS IDs be linked from Chickasaw for design value and trend purposes.
- **Phenix City – South Girard School, AQS ID 01-113-0003,** will discontinue the supplemental speciation monitoring on December 31, 2026. There is another supplemental speciation monitor in this MSA operated by Georgia EPD operated on a 1-in-6-day schedule. See justification in Appendix C.
- **Seals Park, AQS ID 01-097-8001**, is a special project that will end July 1, 2026, according to the project design.
- **Troy Lead, AQS ID 01-109-0003**, ADEM is requesting a siting waiver. See justification in Appendix A.

Table 1 2026 ADEM Ambient Air Monitoring Network

ADEM Site Common Name	AQS ID	Ozone	PM 2.5 Local	PM 2.5 Local Collocated	PM2.5 Speciation	PM2.5 Continuous	PM10 Lo-Vol	PM10 Lo-Vol Collocated	Lead TSP	Lead TSP Collocated	NO2	SO2
Fairhope	01-003-0010	X				X						
Ashland	01-027-0001					X						
Crossville	01-049-1003					X						
Worthy Wetumpka[1]	01-051-0005	X										
Gadsden C College	01-055-0010	X				X						
Chickasaw[2]	01-097-0003	X				X						X
Africatown[3]	01-097-0023	X				X						X
Bay Road	01-097-2005	X										
Seals Park[5]	01-097-8001						X					
MOMS, ADEM	01-101-1002	X		X		X	X	X				
Decatur	01-103-0011	X				X						
Troy Lead	01-109-0003								X	X		
Phenix City-South Girard School	01-113-0003	X	X	X	X							
Helena	01-117-0004	X										
Lhoist, Montevallo Plant (DRR)[4]	01-117-9001											X
Ward, Sumter Co.	01-119-0003	X				X					X	X
Duncanville Middle School	01-125-0011	X				X						

1 = Wetumpka Westside Technology closed 11/1/2025. Air monitoring began at Worthy Wetumpka on 3/1/2026.

2 = Anticipated shutdown on 12/31/26. Relocation of monitoring to Africatown.

3 = Anticipated start date 1/1/2027.

4 = Site shut down on 12/31/2025.

5 = Site will shut down 7/1/2026 as planned.

Network Plan Description

As per 40 CFR Part 58.10, an annual monitoring network plan which provides for the establishment and maintenance of an air quality surveillance system consisting of the air quality monitors in the state is required to be submitted by all states to the EPA.

Specifically, §58.10 (a) requires for each existing and proposed monitoring site:

1. A statement of purpose for each monitor.
2. Evidence that siting and operation of each monitor meets the requirements of Appendices A, C, D, and E of 40 CFR Part 58, where applicable.

Additionally, §58.10 (b) requires the plan contain the following information for each existing and proposed site:

1. The Air Quality System (AQS) site identification number.
2. The location, including street address and geographical coordinates.
3. The sampling and analysis method(s) for each measured parameter.
4. The operating schedules for each monitor.
5. Any proposals to remove or move a monitoring station within a period of 18 months following plan submittal.
6. The monitoring objective and spatial scale of representativeness for each monitor.
7. The identification of any sites that are suitable and sites that are not suitable for comparison against the annual $PM_{2.5}$ NAAQS as described in §58.30.
8. The Metropolitan Statistical Area (MSA), Core Based Statistical Area (CBSA), Combined Statistical Area (CSA) or other area represented by the monitor.
9. The designation of any Pb monitors as either source-oriented or non-source-oriented according to 40 CFR part 58 Appendix D.
10. Any source-oriented monitors for which a waiver has been requested or granted by the EPA Regional Administrator as allowed for under paragraph 4.5(a)(ii) of 40 CFR part 58 Appendix D.
11. Any source-oriented or non-source-oriented site for which a waiver has been requested or granted by the EPA Regional Administrator for the use of Pb-PM_{10} monitoring in lieu of Pb-TSP monitoring as allowed for under paragraph 2.10 of Appendix C to 40 CFR part 58.
12. The identification of required NO_2 monitors as near-road, area-wide, or vulnerable and susceptible population monitors in accordance with Appendix D, section 4.3 of this part.
13. The identification of any $PM_{2.5}$ FEMs used in the monitoring agency's network where the data are not of sufficient quality such that data are not to be compared to the NAAQS. For required SLAMS where the agency identifies that the $PM_{2.5}$ Class III FEM does not produce data of sufficient quality for comparison to the NAAQS, the monitoring agency must ensure that an operating FRM or filter-based FEM meeting the sample frequency requirements described in § 58.12 or other Class III $PM_{2.5}$ FEM or ARM with data of sufficient quality is operating and reporting data to meet the network design criteria described in Appendix D to this part.

Monitoring Requirements

Appendix A of 40 CFR Part 58 outlines the Quality Assurance Requirements for SLAMS, SPMs, and PSD Air Monitoring. It details calibration and auditing procedures used to collect valid air quality data, the minimum number of collocated monitoring sites, calculations used for data quality assessments, and reporting requirements. All sites operated by ADEM follow the requirements set forth in Appendix A.

Appendix C of 40 CFR Part 58 specifies the criteria pollutant monitoring methods which must be used in SLAMS and NCore stations. All criteria pollutant monitoring operated by ADEM follow the methods specified in Appendix C.

Appendix D of 40 CFR Part 58 specifies network design criteria for ambient air quality monitoring. The overall design criteria, the minimum number of sites for each parameter, the type of sites, the spatial scale of the sites, and the monitoring objectives of the sites are detailed. In designing the air monitoring network for ADEM, the requirements of Appendix D were followed. The specifics for each pollutant network are in their individual chapters.

Appendix E of 40 CFR Part 58 specifies probe material, placement of the monitoring probe and spacing from obstructions. All monitors operated by ADEM were evaluated against Appendix E criteria.

Population and CBSA

Alabama has a 2025 population estimate of 5,193,088. Alabama's Metropolitan and Micropolitan Core Based Statistical Areas with corresponding classifications as Metropolitan or Micropolitan, county names included in that area, the 2020 population base and the 2025 population estimates are listed in Table 2. Alabama's network is represented in Figure 1.

Minimum monitoring requirements vary for each pollutant and can be based on a combination of factors such as population, the level of monitored pollutants, and Core Based Statistical Area boundaries as defined in the latest U.S. Census information. The term "Core Based Statistical Area" (CBSA) is a collective term for both Metropolitan Statistical Areas (MSA) and Micropolitan Statistical Areas (μSA).

Table 2 Alabama Statistical Areas

Alabama Core Based Statistical Area	Counties in MSA	2020 Population Base	2025 Population Estimate	Statistical Area
Birmingham	Bibb, Blount, Chilton, Jefferson, Shelby, St. Clair, Walker	1,180,600	1,197,766	Metropolitan
Huntsville	Limestone, Madison	491,717	556,444	Metropolitan
Mobile	Mobile	414,810	411,658	Metropolitan
Montgomery	Autauga, Elmore, Lowndes, Montgomery	386,056	388,747	Metropolitan
Columbus, GA-AL	Russell County in Alabama and Chattahoochee, Harris, Marion, Muscogee, Stewart, Talbot Counties in Georgia	328,872	326,082	Metropolitan
Tuscaloosa	Greene, Hale, Pickens, Tuscaloosa	269,780	281,362	Metropolitan
Daphne-Fairhope-Foley	Baldwin	231,767	267,761	Metropolitan
Auburn-Opelika	Lee, Macon	193,872	208,013	Metropolitan
Decatur	Lawrence, Morgan	156,510	160,326	Metropolitan
Florence-Muscle Shoals	Colbert, Lauderdale	150,792	156,609	Metropolitan
Dothan	Geneva, Henry, Houston	151,016	156,106	Metropolitan
Anniston-Oxford	Calhoun	116,437	115,834	Metropolitan
LaGrange, GA-AL Micro Area	Chambers County, AL and Troup County, GA	104,124	106,347	Micropolitan
Gadsden	Etowah	103,415	103,886	Metropolitan
Albertville	Marshall	97,609	103,537	Micropolitan
Cullman	Cullman	87,861	94,009	Micropolitan
Talladega-Sylacauga	Coosa, Talladega	92,532	91,764	Micropolitan
Fort Payne	DeKalb	71,627	74,085	Micropolitan
Enterprise	Coffee	53,470	56,953	Micropolitan
Scottsboro	Jackson	52,563	54,281	Micropolitan
Ozark	Dale	49,320	49,912	Micropolitan
Alexander City	Tallapoosa	41,311	40,953	Micropolitan
Selma	Dallas	38,470	35,140	Micropolitan
Troy	Pike	33,003	33,688	Micropolitan
Russellville	Franklin	32,111	32,449	Micropolitan
Eufaula, AL-GA Micro Area	Barbour County, AL and Quitman County, GA	27,460	26,890	Micropolitan

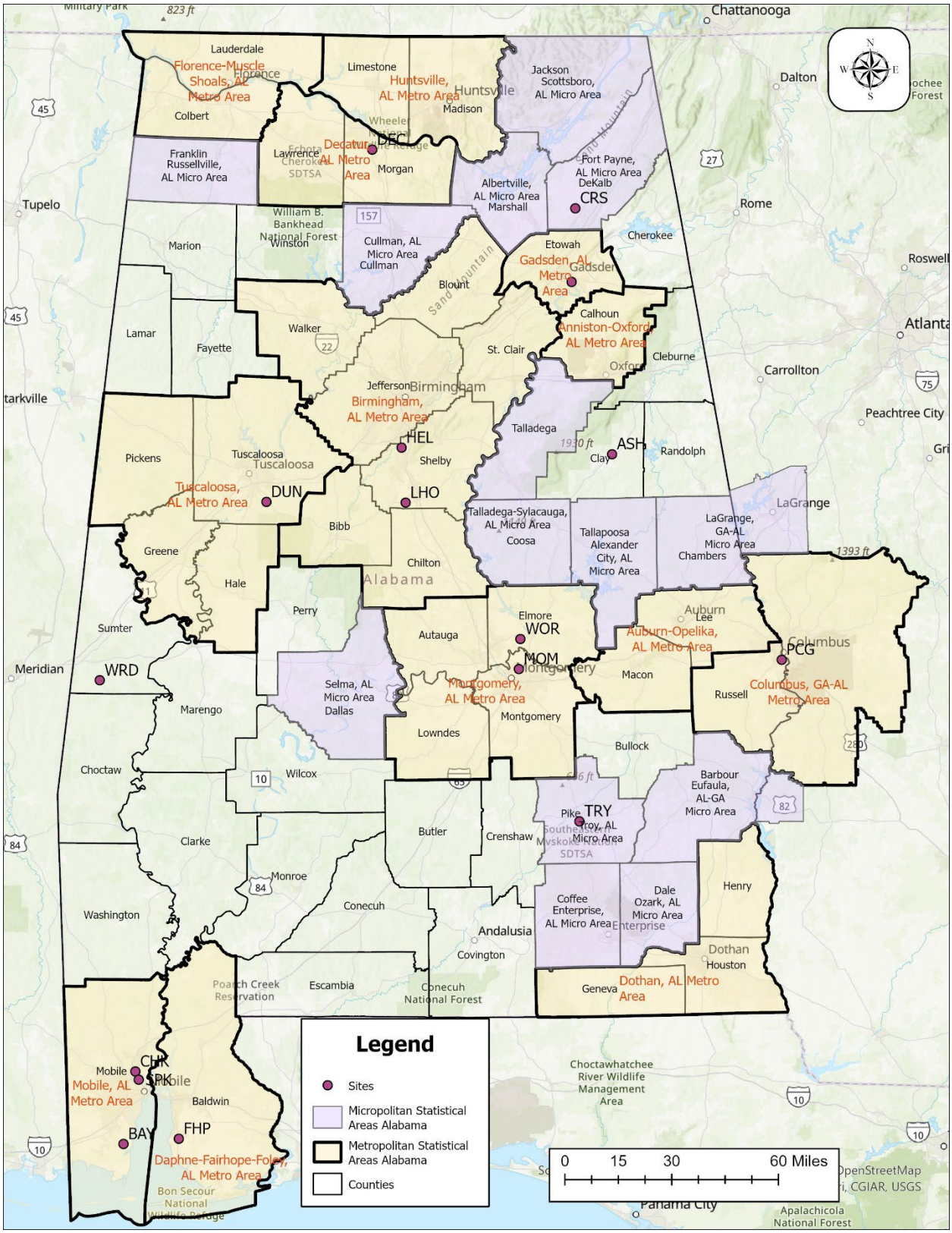


Figure 1 Alabama MSAs and ADEM Monitoring Sites

Types of Monitoring Stations

CASTNET – *Clean Air Status and Trends Network*: is a national air quality monitoring network designed to provide data to assess trends in air quality, atmospheric deposition, and ecological effects due to changes in air pollutant emissions. CASTNET provides long-term monitoring of air quality in rural areas to determine trends in regional atmospheric nitrogen, sulfur, and ozone concentrations and deposition fluxes of sulfur and nitrogen pollutants in order to evaluate the effectiveness of national and regional air pollution control programs. EPA-sponsored CASTNET ozone monitors are Part 58 compliant; therefore, the data can be used for regulatory purposes. CASTNET Ozone data is now reported to AQS. There is one CASTNET site in Alabama, **Sand Mountain (SND152), AQS ID 01-049-9991**, in DeKalb County, operated by the EPA.

NCore – *National Core multi-pollutant monitoring station*: Sites that measure multiple pollutants at trace levels in order to provide support to integrated air quality management data needs. Each state is required to operate at least one NCore site. There is one NCore site in Alabama, **North Birmingham, AQS ID 01-073-0023**, located in Jefferson County and operated by JCDH. Refer to the JCDH Ambient Air Network Plan for details.

PAMS – *Photochemical Assessment Monitoring Station*: PAMS are established to obtain more comprehensive data in areas with high levels of ozone pollution by also monitoring oxides of Nitrogen (NOx) and volatile organic compounds (VOCs). PAMS monitoring requirements were revised in the 2016 ozone NAAQS rule and a PAMS site is required in Jefferson County. Refer to the JCDH Ambient Air Network Plan for details.

SLAMS - *State or Local Ambient Monitoring Station*: SLAMS make up ambient air quality monitoring sites that are primarily needed for NAAQS comparisons. ADEM SLAMS monitors are described in detail in the section labeled ADEM AAQMP Pollutant Network Tables.

SPM – *Special Purpose Monitor:* **Ward, Sumter Co., AQS ID 01-119-0003**, began its 24-month evaluation period for NO_2 with a Teledyne N500, CAPS NOx Analyzer on July 1, 2025. **Seals Park, AQS ID 01-097-8001**, began sampling on July 1, 2023, with two special purpose monitors for PM_{10}, an FRM local sampler and an FEM E-BAM PLUS continuous sampler, for the purpose of calculating a valid design value for PM_{10} in the MSA. This site will close on July 1, 2026, as scheduled.

SO2 DRR - *SO2 Data Requirements Rule*: DRR became effective September 21, 2015. Per 40 CFR Part 51, states are required to report all sources that generate >2,000 tpy SO2, not dependent upon population density. Each source in this category must characterize air quality through air quality modeling or ambient air monitoring. The annual progress report for sources that utilized modeling can be found in

Appendix B. A source that chooses monitoring must operate a site equivalent with the SLAMS requirements of 40 CFR Part 58. Alabama has one DRR SO2 monitoring site, **Lhoist, Montevallo Plant, AQS ID 01-117-9001**, operated by a Lhoist contractor within the ADEM PQAO. The Lhoist-Montevallo facility was designated attainment/unclassifiable on March 26, 2021, under Round IV of the SO2 DRR, based on 2017-2019 monitoring data. This site met the requirements of 40 CFR 58.14 and was discontinued December 31, 2025.

STN – *$PM_{2.5}$ Speciation Trends Network*: A $PM_{2.5}$ speciation station designated to be part of the speciation trends network. This network provides chemical species data of fine particulates. There is one STN site in Alabama, **North Birmingham, AQS ID 01-073-0023**, located in Jefferson County and operated by JCDH. Refer to the JCDH Ambient Air Network Plan for details.

Supplemental Speciation – A monitoring site that is not dedicated as an STN site in the Chemical Speciation Network but has monitors used to gain supplemental data for that network. ADEM provides supplemental speciation data from **Phenix City-South Girard School, AQS ID 01-113-0003.** This monitor will be discontinued December 31, 2026. See Justification in Appendix C. Georgia EPD also operates a speciation monitor within this MSA.

ADEM's Monitoring Networks by Pollutant

Carbon Monoxide (CO) Network

On August 12, 2011, the EPA issued a final rule that retained the existing NAAQS for Carbon Monoxide (CO) and made changes to the ambient air monitoring requirements. The EPA revised the minimum requirements for CO monitoring by requiring CO monitors to be collocated with one required near-road NO_2 monitor in CBSAs having a population of 1,000,000 or more persons. ADEM does not operate a near-road monitoring site or CO monitor. For more information regarding CO monitoring in Alabama refer to the JCDH Ambient Air Network Plan for details.

Lead (Pb) Network

In 2008, the EPA revised the NAAQS for lead (Pb). The Pb standard was lowered from 1.5 ug/m^3 for a quarterly average to 0.15 ug/m^3 based on the highest rolling 3-month average over a 3-year period. The EPA set minimum monitoring requirements for source and population-oriented monitoring. Source oriented monitoring is required near sources that have Pb emissions ≥1 ton per year. Population-oriented monitoring is required for CBSAs >500,000. In December 2010, the EPA revised the Pb rule to require source-oriented monitors for sources greater than ½ ton per year (tpy) and stated that population-oriented monitors would be located at NCore sites. In March 2016, the EPA removed the requirement for Pb monitoring at NCore sites that were not located near a Pb emissions source.

After the initial 2010 ruling, two sources were identified that exceeded the 0.5 tpy threshold: Sanders Lead Company and the Anniston Army Depot. Since then, updated emissions inventories have reduced that to one identified source, Sanders Lead Company, Inc., located in Troy, Pike County, a Micropolitan statistical area, which emits greater than ½ ton of Pb per year. **Troy Lead, AQS ID 01-109-0003,** operated by ADEM, has been monitoring for Pb near that source since 1979. To meet QA requirements, collocated lead monitoring is also occurring at this site. ADEM is requesting a siting waiver for Troy in Appendix A. No additional changes with monitoring are anticipated.

Ozone (O_3) Network

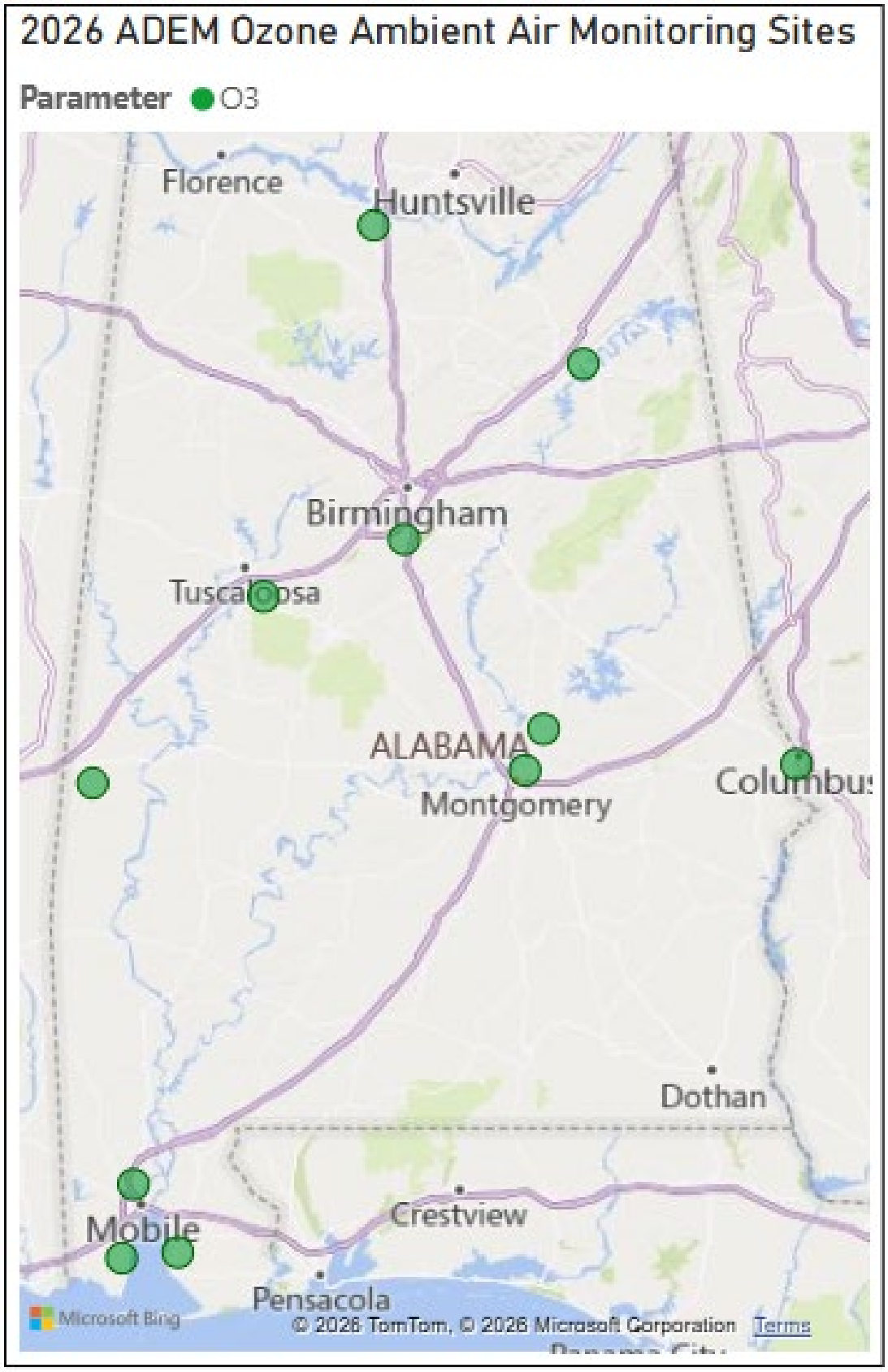


Figure 2 AAQMP Map of Ozone Monitoring Sites

Effective December 28, 2015, the level of the NAAQS for ozone was changed from 0.075 to 0.070 ppm. To attain this standard, the 3-year average of the fourth-highest daily maximum 8-hour average ozone concentrations measured at each monitor within an area over each year must not exceed 0.070 ppm. Minimum monitoring requirements for ozone are based on population and whether the design value is <85% of the NAAQS, or ≥85% of the NAAQS (See Table 3). Since the NAAQS for ozone is 0.070 parts per million of ozone, then 85% of the NAAQS truncated is **0.059** ppm. ADEM's Ozone Monitoring Sites and Design Values using 2023-2025 data are described in Table 4.

Table 3 SLAMS Minimum Ozone Monitoring Site Requirements

SLAMS MINIMUM OZONE MONITORING REQUIREMENTS		
MSA population[1, 2]	Most recent 3-year design value concentrations ≥85% of any O_3 NAAQS[3]	Most recent 3-year design value concentrations <85% of any O_3 NAAQS[3,4]
>10 million	4	2
4–10 million	3	1
350,000–<4 million	2	1
50,000–<350,000[5]	1	0

1 Minimum monitoring requirements apply to the Metropolitan statistical area (MSA).
2 Population based on latest available census figures.
3 The ozone (O_3) National Ambient Air Quality Standards (NAAQS) levels and forms are defined in 40 CFR part 50.
4 These minimum monitoring requirements apply in the absence of a design value.
5 Metropolitan statistical areas (MSA) must contain an urbanized area of 50,000 or more population.

Table 4 ADEM Ozone Monitoring Sites and Design Values

Site Name	AQS ID	2023-2025 Design Values	MSA	MSA MAX DV[2]	2025 Population Base
Helena[1]	01-117-0004	0.064	Birmingham-Hoover	0.069	1,197,766
Phenix City - South Girard School[1]	01-113-0003	0.060	Columbus, GA-AL	0.061	324,830
Fairhope	01-003-0010	0.062	Daphne-Fairhope-Foley	0.062	267,761
Decatur	01-103-0011	0.063	Decatur	0.063	160,326
Gadsden Community College	01-055-0011	0.062	Gadsden	0.062	103,886
Chickasaw	01-097-0003	0.061	Mobile	0.061	411,658
Bay Road	01-097-2005	0.059	Mobile		411,658
Wetumpka Westside Technology	01-051-0004	0.056	Montgomery	0.061	388,747
MOMS, ADEM	01-101-1002	0.061	Montgomery		388,747
Ward, Sumter Co.	01-119-0003	0.055	not in MSA	N/A	NA
Duncanville Middle School	01-125-0011	0.061	Tuscaloosa	0.061	281,850
DV ≥ 85% of the NAAQS					

1 Only site within MSA operated by ADEM.
2 MSA MAX DV may be obtained from monitors not operated by ADEM.

Ozone Monitoring Requirements for Alabama MSAs

Birmingham-Hoover MSA

Using the Birmingham-Hoover MSA 2025 population estimate and the design value from Table 4, two Ozone monitors are required in this MSA. ADEM operates **Helena, AQS ID 01-117-0004**, in Shelby County. Other ozone sites in this MSA are located within the jurisdiction of the JCDH. For more information regarding ozone monitoring in Jefferson County refer to the JCDH ambient air network plan. ADEM upgraded the shelter at this site in late 2025 using IRA funding.

Columbus, GA-AL MSA

Using the Columbus GA-AL MSA 2025 population estimate and the design value from Table 4, one Ozone monitor is required for this MSA. ADEM operates one ozone monitor at **Phenix City-South Girard School, AQS ID 01-113-0003**, in Russell County, Alabama. For more information regarding other ozone monitoring in this MSA, refer to the State of Georgia's ambient air network plan. No changes are planned.

Daphne-Fairhope-Foley MSA

Using the Daphne-Fairhope-Foley MSA 2025 population estimate and the design value from Table 4, one Ozone monitor is required for this MSA. There is currently one Ozone site, **Fairhope, AQS ID 01-003-0010** in Baldwin County, Alabama. No changes are planned.

Decatur MSA

Using the Decatur MSA 2025 population estimate and the design value from Table 4, one Ozone monitor is required for this MSA. There is currently one Ozone site, **Decatur, AQS ID 01-103-0011**, in Morgan County, Alabama. No changes are planned.

Gadsden MSA

Using the Gadsden MSA 2025 population estimate and the design value from Table 4, one Ozone monitor is required for this MSA. There is currently one Ozone site, **Gadsden Community College, AQS ID 01-055-0010**, in Etowah County, Alabama. No changes are planned.

Huntsville MSA

ADEM does not operate any ozone monitors in this MSA. For information regarding ozone monitoring in Huntsville refer to the HDNREM ambient air network plan.

Mobile MSA

Using the Mobile MSA 2025 population estimate and the design value from Table 4, two Ozone monitors are required for this MSA. There are currently two Ozone sites, **Chickasaw, AQS ID 01-097-0003, and Bay Road, 01-097-2005**, both in Mobile County, Alabama. ADEM anticipates moving monitoring from **Chickasaw, AQS ID 01-097-0003** to **Africatown, AQS ID 01-097-0023**, in 2027.

Montgomery MSA

Using the Montgomery MSA 2025 population estimate and the design value from Table 4, two Ozone monitors are required for this MSA. There are currently two Ozone sites, **MOMS, ADEM, AQS ID 01-101-1002**, in Montgomery County, Alabama, and **Worthy Wetumpka, AQS ID 01-051-0005** in Elmore County, Alabama. ADEM unexpectedly lost access to the property at **Wetumpka Westside Technology, AQS ID 01-051-0004** at the end of Ozone season. A new site, **Worthy Wetumpka, AQS ID 01-051-0005,** still located in Elmore County, was quickly

established and ADEM began monitoring at the new location with a new shelter purchased with IRA funding in 2026. Please see Appendix C for details.

Tuscaloosa MSA

Using the Tuscaloosa MSA 2025 population estimate and design value from Table 4, one Ozone monitor is required for this MSA. There is currently one Ozone site, **Duncanville Middle School, AQS ID 01-125-0011** in Tuscaloosa County, Alabama. No changes are planned.

Florence-Muscle Shoals and Dothan MSAs

ADEM operated Ozone monitors in both of these MSAs in the past ten years. Both showed low DV, qualified for closure, and were approved for shut-down by EPA in previous network plans. Since neither MSA has a current DV, no monitors are required by Appendix D of 40 CFR Part 58.

Anniston-Oxford and Auburn-Opelika MSAs

The MSAs of Auburn-Opelika and Anniston-Oxford were evaluated by ADEM during the 5-year assessment. It was determined that due to the close proximity of ozone monitors in the neighboring MSAs, additional ozone monitors would not be needed. Since these areas do not have design values, no ozone monitors are required by Appendix D of 40 CFR Part 58.

Sites not located in an MSA

Ward, Sumter Co., AQS ID 01-119-0003, represents rural, background ozone values for the state. The historical design values for this monitor have been less than 85% of the NAAQS. No changes are planned.

Nitrogen Dioxide (NO_2) Network

On January 22, 2010, the EPA finalized the monitoring rules for Nitrogen Dioxide (NO_2). The rules require the placement of NO_2 monitors near a major road in each CBSA with a population ≥500,000 people and a second monitor is required near another major road in areas with either a CBSA population ≥2.5 million people, or one or more road segments with an annual average daily traffic (AADT) count ≥250,000 vehicles. For near road NO_2 monitoring, Birmingham-Hoover is the only MSA in Alabama with a population greater than 500,000. However, the population is less than 2.5 million and there are no road segments with AADT greater than 250,000 vehicles. The rules also require an NO_2 monitor to be placed in any urban area with a population greater than or equal to 1 million people to assess community-wide concentrations. Birmingham-Hoover is the only MSA in Alabama with a population greater than 1 million. Refer to the JCDH Ambient Air Network Plan for details. **Ward, Sumter Co., AQS ID 01-119-0003**, began its 24-month evaluation period for NO_2 with a Teledyne N500, CAPS NOx Analyzer on July 1, 2025, after purchasing a new sampler. No changes are planned.

$PM_{2.5}$ Network

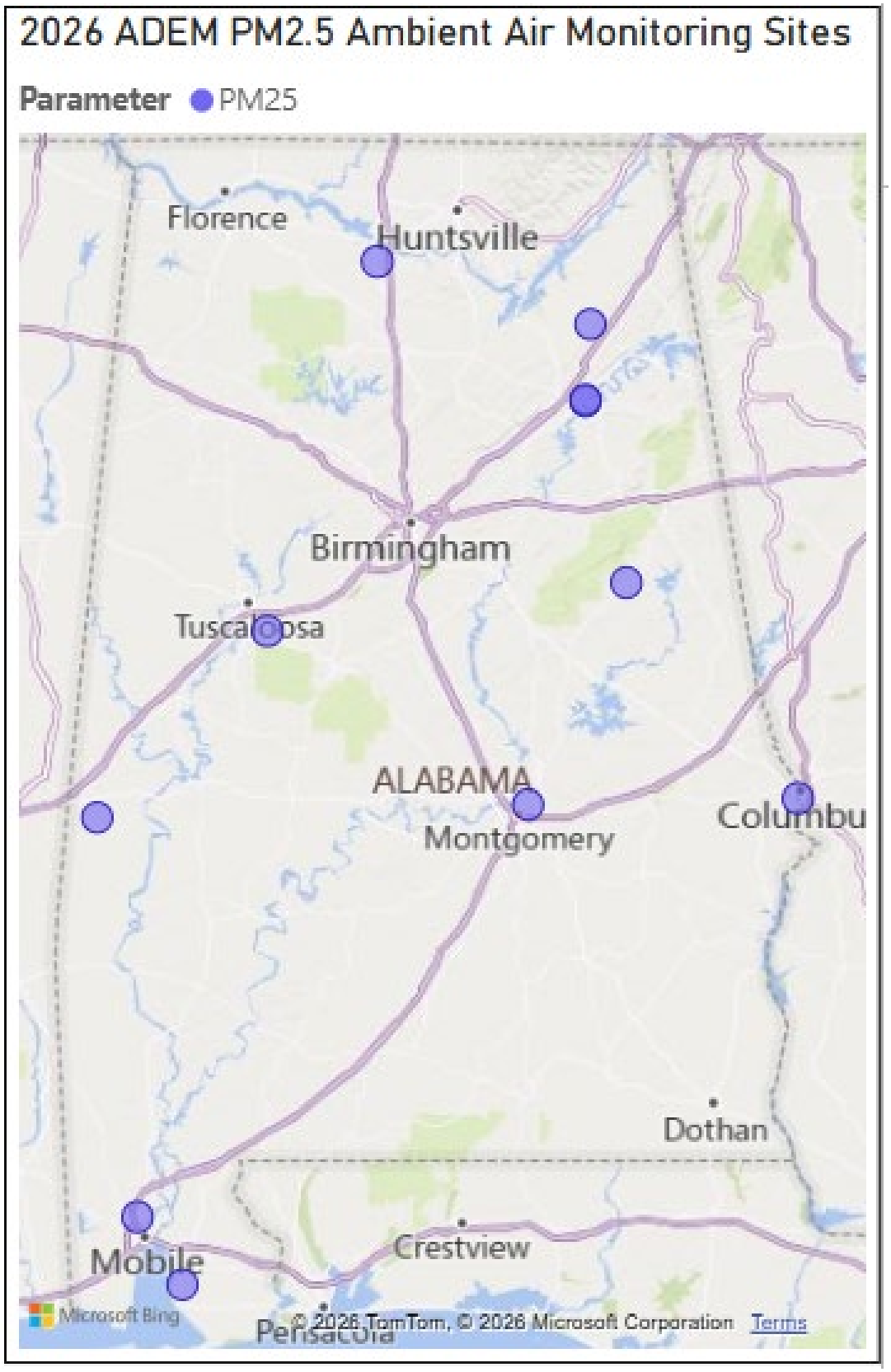


Figure 3 AAQMP Map of PM2.5 Monitoring Sites

Minimum monitoring requirements for $PM_{2.5}$ are based on population and whether the design value is <85% of the NAAQS, or ≥85% of the NAAQS (See Table 5). Additionally, a regional background site and a regional transport site are required.

Also, CBSAs with populations greater than one million but less than four million were required to operate a $PM_{2.5}$ monitor at its NO_2 near road site by January 1, 2017. ADEM does not operate an NO_2 near road site. More information regarding this requirement in Alabama can be found in the JCDH ambient air network plan.

As discussed below for each of these requirements, ADEM meets or exceeds the minimum requirements under 40 CFR Part 58, Appendix D, Section 4.7 in all MSAs. On March 6, 2024, U.S. EPA finalized rulemaking (89 FR 16202) to lower the annual $PM_{2.5}$ NAAQS from 12.0 µg/m^3 to 9.0 µg/m^3. After EPA approval of exceptional event (EE) justifications for selected days between 2023-2025, none of the Alabama MSAs now exceed the criteria. Originally anticipated in February 2026, final ruling on the MSA designations have been postponed. If any additional monitoring is required after designations, ADEM will amend the network in the next annual network plan.

$PM_{2.5}$ design values in Table 6 are based on 2023-2025 data. Design values must be less than **29.75** ug/m^3 (85% of the NAAQS) to meet the 24-hour standard of 35 ug/m^3 and less than **7.65** ug/m^3 (85% of the NAAQS) to meet the annual standard of 9 ug/m^3 (effective February 7, 2024).

Table 5 $PM_{2.5}$ Minimum Monitoring Site Requirements

$PM_{2.5}$ MINIMUM MONITORING REQUIREMENTS		
MSA population [1,2]	Most recent 3-year design value ≥85% of any $PM_{2.5}$ NAAQS[3]	Most recent 3-year design value<85% of any $PM_{2.5}$ NAAQS[3,4]
>1,000,000	3	2
500,000–1,000,000	2	1
50,000–<500,000 [5]	1	0

1 Minimum monitoring requirements apply to the Metropolitan statistical area (MSA).
2 Population based on latest available census figures.
3 The $PM_{2.5}$ National Ambient Air Quality Standards (NAAQS) levels and forms are defined in 40 CFR part 50.
4 These minimum monitoring requirements apply in the absence of a design value.
5 Metropolitan statistical areas (MSA) must contain an urbanized area of 50,000 or more population.

Section 4.7.2 of Appendix D of 40 CFR Part 58 requires a collocated continuous $PM_{2.5}$ monitor in each MSA that is required to have a FRM monitor. The number of collocated continuous monitors required for an MSA will be equal to at least half of the required FRM monitors for that MSA. This is not required if the continuous monitor is a FEM that is labeled as the primary and comparable to the NAAQS. The state is also required to operate $PM_{2.5}$ speciation monitors to characterize the constituents of $PM_{2.5}$. The number of speciation monitors is determined by the EPA Region IV.

Continuous $PM_{2.5}$ monitors satisfy the reporting requirement by submitting data to AirNow. Every Alabama MSA with the exception of Birmingham-Hoover has a population less than 500,000. ADEM's $PM_{2.5}$ Network is described in Table 6.

Table 6 ADEM $PM_{2.5}$ Monitoring Sites and Design Values

Site Name	AQS Site ID	PM2.5 24 hr DV 2023-2025	PM2.5 Annual DV 2023-2025	MSA	24hr MSA MAX DV	Annual MSA MAX DV[2]	2025 Population Base
Phenix City - South Girard School	01-113-0003	21	8.9	Columbus, GA-AL[1,2]	26	9.3	324,830
Fairhope	01-003-0010	15	7.1	Daphne-Fairhope-Foley	15	7.1	267,761
Decatur	01-103-0011	15	7.1	Decatur	15	7.1	160,326
Gadsden Community College	01-055-0010	19	8.9	Gadsden	19	8.9	103,886
Chickasaw	01-097-0003	17	8.1	Mobile	17	8.1	411,658
MOMS, ADEM	01-101-1002	18	8.5	Montgomery	18	8.5	388,747
Duncanville Middle School	01-125-0011	17	6.9	Tuscaloosa	17	6.9	281,850
Ashland (Regional Transport)	01-027-0001	17	6.9	Not in MSA	NA	NA	NA
Crossville (Regional Background)	01-049-1003	17	7.2	Not in MSA	NA	NA	NA
Ward (Regional Background)	01-119-0003	15	6.1	Not in MSA	NA	NA	NA
DV ≥ 85% of the 2024 NAAQS							

1 MSA MAX DV was obtained from monitors not located in Alabama or operated by ADEM.
2 ADEM and Georgia EPD have submitted exceptional event justifications for select data between 2023-2025; Design Values currently exceed new standards.

$PM_{2.5}$ Monitoring Requirements for Alabama MSAs

Birmingham-Hoover MSA

ADEM does not operate $PM_{2.5}$ monitors in the Birmingham-Hoover MSA. For more information regarding $PM_{2.5}$ monitoring in this MSA refer to the JCDH ambient air network plan.

Columbus, GA-AL MSA

Using Columbus, GA-AL MSA 2025 population base and the design value from Table 6, one FRM monitor is required. ADEM operates one FRM monitor on a 1 in 3-day frequency, one collocated FRM monitor on a 1 in 6-day frequency for quality assurance, and one supplemental speciation monitor at **Phenix City – South Girard School, AQS ID 01-113-0003**. ADEM will discontinue the supplemental speciation monitoring on December 31, 2026. There is another supplemental speciation monitor in this MSA operated by Georgia EPD operated on a one in six day schedule. See justification in Appendix C. No other changes are planned. For more information regarding other $PM_{2.5}$ monitoring in this MSA refer to the State of Georgia's ambient air network plan.

Daphne-Fairhope-Foley MSA

Using the Daphne-Fairhope-Foley MSA 2025 population base and the design value from Table 6, zero FRM monitors are required. There is currently one FEM BAM-1022 $PM_{2.5}$ continuous monitor located at **Fairhope, AQS ID 01-003-0010**. No changes are planned.

Decatur MSA

Using the Decatur MSA 2025 population base and the design value from Table 6, zero FRM monitors are required. There is currently one FEM BAM-1022 $PM_{2.5}$ continuous monitor located at **Decatur, AQS ID 01-103-0011**. The monitoring spatial scale of the site was changed from Middle to Urban. This change was made to better reflect the objective of this monitor, from several blocks to city-wide. No monitoring methods were changed, only the spatial scale for AQI purposes.

Gadsden MSA

Using the Gadsden MSA 2025 population base and the design value from Table 6, one FRM monitor is required. There is currently one FEM BAM-1022 $PM_{2.5}$ continuous monitor at **Gadsden Community College, AQS ID 01-055-0010**. No changes are planned.

Huntsville MSA

ADEM does not operate $PM_{2.5}$ monitors in the Huntsville MSA. For information regarding $PM_{2.5}$ monitoring in this MSA refer to the HDNREM ambient air network plan.

Mobile MSA

Using the Mobile MSA 2025 population base and the design value from Table 6, one FRM monitor is required. There is currently one FEM BAM-1022 continuous monitor located at **Chickasaw, AQS ID 01-097-0003**. ADEM is moving all monitoring from **Chickasaw, AQS ID 01-097-0003** to **Africatown, AQS ID 01-097-0023**, at the end of 2026.

Montgomery MSA

Using the Montgomery MSA 2025 population base and the design value from Table 6, one FRM monitor is required. There is currently one FEM BAM-1022 $PM_{2.5}$ continuous monitor and one

collocated FRM monitor on a 1 in 3-day frequency for quality assurance located at **MOMS, ADEM, AQS ID 01-101-1002**. No changes are planned.

Tuscaloosa MSA

Using the Tuscaloosa MSA 2025 population base and the design value from Table 6, zero FRM monitors are required. There is currently one FEM BAM-1022 $PM_{2.5}$ continuous monitor located at **Duncanville Middle School, AQS ID 01-125-0011**. No changes are planned.

Florence-Muscle Shoals and Dothan MSAs

ADEM operated $PM_{2.5}$ monitors in both of these MSAs in the past ten years. Both showed low DV, qualified for closure, and were approved for shut-down by EPA in previous network plans. Since neither MSA has a current DV, no monitors are required by Appendix D of 40 CFR Part 58.

Anniston-Oxford and Auburn-Opelika MSAs

The MSAs of Anniston-Oxford and Auburn-Opelika were evaluated to determine the need for monitors during the 5-yr network review. It was determined that due to the close proximity of $PM_{2.5}$ monitors in neighboring MSAs, additional monitors would not be needed. $PM_{2.5}$ monitoring in the adjacent MSAs continues to provide adequate coverage. Since these areas do not have design values, no FRM monitors are required by Appendix D of 40 CFR Part 58.

$PM_{2.5}$ Monitors not located in MSAs

Ashland, AQS ID 01-027-0001, serves as a regional transport site in between the large MSAs of Birmingham-Hoover, Alabama and Atlanta-Sandy Springs-Roswell, Georgia using one continuous FEM BAM-1022 $PM_{2.5}$ monitor. No changes are planned.

Crossville, **AQS ID 01-049-1003**, represents rural, background $PM_{2.5}$ values for the northeast part of the state using one continuous FEM BAM-1022 $PM_{2.5}$ monitor. No changes are planned.

Ward, Sumter Co., AQS ID 01-119-0003, represents rural, background $PM_{2.5}$ values for the state using one continuous FEM BAM-1022 $PM_{2.5}$ monitor. No changes are planned.

PM_{10} Network

PM_{10} has been a criteria pollutant since 1987. Since that time there has been widespread monitoring of the PM_{10} levels in Alabama. In 2006, the EPA modified the NAAQS for PM_{10} to revoke the annual standard. Currently, there is a daily standard of 150 ug/m3 based on 3 years of data.

The Montgomery MSA has a population between 250,000 and 500,000 and PM_{10} concentrations are less than 80% of the NAAQS daily standard. According to Table D-4 of Appendix D to Part 58, 0 to 1 PM_{10} monitors are required.

Montgomery MSA

ADEM operates two low-volume PM_{10} monitors on a 1 in 6-day schedule at **MOMS, ADEM, AQS ID 01-101-1002**, one being the collocated quality assurance monitor. No changes are planned.

Mobile MSA

ADEM set up a PM_{10} site at James Seals Park Recreation Center, 540 Texas Street, Mobile, AQS ID 01-097-8001. This site became operational 7/1/2023. This site has one Special Purpose Monitor, a FRM 2025i monitor run on a 1 in 6-day schedule. A second monitor collects filters used for particle analysis. The site will be shut down on July 1, 2026, as scheduled.

Sulfur Dioxide (SO_2) Network

Effective August 23, 2010, the EPA strengthened the primary NAAQS for SO_2. The EPA established a new 1-hour standard at 75 ppb, based on the 3-year average of the annual 99th percentile of 1-hour daily maximum concentrations. According to the EPA, for a short-term 1-hour SO_2 standard, it is more technically appropriate, efficient, and effective to use modeling as the principal means of assessing compliance for medium to larger sources, and to rely more on monitoring for groups of smaller sources and sources not as conducive to modeling. This is consistent with the EPA's historical approach and longstanding guidance for SO_2. The EPA sets specific minimum requirements that inform states on where they are required to place SO_2 monitors. The final monitoring regulations require monitors to be placed in Core Based Statistical Areas (CBSAs) based on a Population Weighted Emissions Index (PWEI) for the area. The final rule requires:

- 3 monitors in CBSAs with PWEI values ≥1,000,000 or more;
- 2 monitors in CBSAs with PWEI values <1,000,000 but >100,000; and
- 1 monitor in CBSAs with PWEI values >5,000.

According to the latest PWEI calculations listed in Table 7 only the Birmingham-Hoover MSA requires SO_2 monitoring**.** For more information regarding SO_2 monitoring in the Birmingham-Hoover MSA refer to the JCDH ambient air monitoring network plan.

ADEM operates two SO_2 monitors: **Chickasaw, AQS ID 01-097-0003**, for the Mobile MSA and **Ward, AQS ID 01-119-0003**, not located in an MSA, for background purposes. ADEM is moving all monitoring from **Chickasaw, AQS ID 01-097-0003** to **Africatown, AQS ID 01-097-0023**, in late 2026.

Effective September 21, 2015, the SO_2 Data Requirements Rule (DRR) per 40 CFR Part 51, requires states to report all sources that generate >2,000 tpy SO_2, not dependent upon population density. Each source in this category must characterize air quality through air quality modeling or ambient air monitoring. Sources that model must provide an annual report located in Appendix B. Each source that chooses monitoring must operate their site equivalent to the SLAMS requirements of 40 CFR Part 58. Lhoist North America of Alabama, LLC – Montevallo Plant, located within the Birmingham-Hoover MSA, monitored SO_2 within ADEM's PQAO in accordance with the DRR at **Lhoist, Montevallo Plant, AQS ID 01-117-9001** from January 1, 2017, through December 31, 2025.

Table 7 SO_2 Minimum Monitoring Site Requirements

SO2 Population Weighted Emissions Index (PWEI) Calcuations using 2023 Census Estimates and 2023 National Emissions Inventory (NEI)				
CBSA Name	**2023 NEI SO2 (tpy)**	**Population Est (2025)**	**PWEI in Million**	**Required Monitors**
Birmingham-Hoover	10,172	1,197,766	12,183	2
Mobile	3,012	411,658	1,240	0
Florence-Muscle Shoals	168	156,609	26	0
Albertville	78	103,537	8	0
Anniston-Oxford	191	115,834	22	0
Auburn-Opelika	380	208,013	79	0
Columbus, GA-AL	1,274	326,082	416	0
Cullman	77	94,009	7	0
Daphne-Fairhope-Foley	236	267,761	63	0
Decatur	486	160,326	78	0
Dothan	186	156,106	29	0
Enterprise	122	56,953	7	0
Gadsden	35	103,886	4	0
Huntsville	282	556,444	157	0
Montgomery	1,167	388,747	454	0
Ozark	100	49,912	5	0
Scottsboro	755	54,281	41	0
Selma	225	35,140	8	0
Talladega-Sylacauga	322	91,764	30	0
Troy	838	33,688	28	0
Tuscaloosa	741	281,362	209	0
LaGrange, GA-AL	196	106,347	21	0

Quality Assurance

The ADEM has an EPA-approved Quality Assurance Program Plan (QAPP) and Quality Management Plan (QMP) that details the activities used to control and document the quality of the data collected. ADEM is an independent Primary Quality Assurance Organization (PQAO) as defined by 40 CFR Part 58. Part of the EPA-required quality control program for particulate monitoring is the use of collocated particulate monitors. 40 CFR Part 58, Appendix A requires a percentage of manual particulate monitors to be collocated with FRM and FEM monitors so that quality statistics can be calculated. ADEM includes monitors for this purpose.

ADEM AAQMP Pollutant Network Tables

A description of ADEM's ambient air monitoring network, followed by detailed site evaluations, will be presented in this section.

Included will be:

- Site Common Name
- County/CBSA
- AQS ID
- Address
- Latitude and Longitude
- Monitoring Objective/Scale
- Beginning and Ending Sampling Date
- Method, Method Code and Operating Schedule
- Comparability to the NAAQS

Ozone

Site Common Name	County/CBSA	AQS ID	Address	Latitude	Longitude	Monitoring Objective/ Scale	Type	Date Began	Date Ended	Method, Method Code and Schedule	NAAQS
Fairhope	Baldwin/Daphne-Fairhope-Foley MSA	01-003-0010	Fairhope High School, Fairhope	30.497478	-87.880258	HC/PE/N	SLAMS	3/1/2000	active	UV, 087, C	Y
Wetumpka Westside Technology Park	Elmore/ Montgomery MSA	01-051-0004	3148 Elmore Road, Wetumpka	32.53568	-86.255193	HC/U	SLAMS	3/1/2018	11/1/2025	UV, 087, C	Y
Worthy Wetumpka	Elmore/ Montgomery MSA	01-051-0005	1640 Central Plank Rd, Wetumpka	32.576083	-86.178168	HC/U	SLAMS	3/1/2026	active	UV, 087, C	Y
Gadsden Community College	Etowah/Gadsden MSA	01-055-0010	1001 Wallace Drive, Gadsden	33.99821	-85.992556	PE/U	SLAMS	3/7/2024	active	UV, 087, C	Y
Chickasaw	Mobile/Mobile MSA	01-097-0003	Iroquois and Azalea Chickasaw	30.770181	-88.087761	PE/N	SLAMS	3/2/1982	Est. 11/1/2026	UV, 087, C	Y
Africatown	Mobile/Mobile MSA	01-097-0023	TBD	TBD	TBD	PE/N	SLAMS	Est. 3/1/2027		UV, 087, C	Y
Bay Road	Mobile/ Mobile MSA	01-097-2005	Bay Road, Mobile	30.474305	-88.141022	HC/PE/N	SLAMS	3/1/1999	active	UV, 087, C	Y
MOMS, ADEM	Montgomery/ Montgomery MSA	01-101-1002	1350 Coliseum Blvd, Montgomery	32.412811	-86.263394	PE/N	SLAMS	6/2/1993	active	UV, 087, C	Y
Decatur	Morgan/Decatur MSA	01-103-0011	Wallace Development Center, Decatur	34.530717	-86.967536	HC/PE/U	SLAMS	4/1/2000	active	UV, 087, C	Y
Phenix City - S. Girard School	Russell/Columbus GA-AL MSA	01-113-0003	510 6th Place South, Phenix City	32.437028	-84.999653	HC/U	SLAMS	3/1/2018	active	UV, 087, C	Y
Helena	Shelby/Birmingham-Hoover MSA	01-117-0004	Bearden Farm. Helena	33.317142	-86.825754	PE/U	SLAMS	1/1/1983	active	UV, 087, C	Y
Ward, Sumter Co.	Sumter/no MSA	01-119-0003	NNE of Ward Post Office	32.362606	-88.277992	GB/R	SLAMS	3/1/2013	active	UV, 087, C	Y
Duncanville Middle School	Tuscaloosa/ Tuscaloosa MSA	01-125-0011	11205 Eagle Pkwy, Duncanville	33.095379	-87.481507	HC/PE/U	SLAMS	3/1/2022	active	UV, 087, C	Y

GB = General Background; HC = Highest Concentration; N = Neighborhood; PE = Population Exposure; R = Regional; U = Urban
C = Continuous; UV = Ultra-violet

PM2.5

Site Common Name	County/CBSA	AQS ID	Address	Latitude	Longitude	Monitoring Objective/ Scale	Type	Date Began	Date Ended	Method, Method Code and Schedule	NAAQS
Fairhope	Baldwin/Daphne-Fairhope-Foley MSA	01-003-0010	Fairhope High School, Fairhope	30.497478	-87.880258	PE/N	SLAMS	1/1/2000	12/31/2022	L, 145, 3	Y
Fairhope	Baldwin/Daphne-Fairhope-Foley MSA	01-003-0010	Fairhope High School, Fairhope	30.497478	-87.880258	PE/N	SLAMS	1/1/2023	active	B, 209, C	Y
Ashland	Clay/no MSA	01-027-0001	Ashland Airport, Ashland	33.284928	-85.803608	RT/R	SLAMS	1/1/1999	12/31/2022	L, 145, 3	Y
Ashland	Clay/no MSA	01-027-0001	Ashland Airport, Ashland	33.284928	-85.803608	RT/R	SLAMS	1/1/2023	active	B, 209, C	Y
Crossville	DeKalb/no MSA	01-049-1003	13112 Hwy 68, Crossville	34.288567	-85.969858	GB/N	SLAMS	1/1/1999	12/31/2022	L, 145, 3	Y
Crossville	DeKalb/no MSA	01-049-1003	13112 Hwy 68, Crossville	34.288567	-85.969858	GB/N	SLAMS	1/1/2023	active	B, 209, C	Y
Gadsden C College	Etowah/ Gadsden MSA	01-055-0010	1001 Wallace Drive, Gadsden	33.991494	-85.992647	PE/U	SLAMS	1/1/2000	12/6/2021	L, 145, 3	Y
Gadsden C College	Etowah/ Gadsden MSA	01-055-0010	1001 Wallace Drive, Gadsden	33.99821	-85.992556	PE/U	SLAMS	12/2/2021	active	B, 209, C	Y
Chickasaw	Mobile/Mobile MSA	01-097-0003	Iroquois and Azalea, Chickasaw	30.770181	-88.087761	PE/R	SLAMS	7/19/2002	12/31/2022	L, 145, 3	Y
Chickasaw	Mobile/Mobile MSA	01-097-0003	Iroquois and Azalea, Chickasaw	30.770181	-88.087761	HC/PE/R	SLAMS	1/1/2023	Est. 12/31/2026	B, 209, C	Y
Africatown	Mobile/Mobile MSA	01-097-0023	TBD	TBD	TBD	HC/PE/R	SLAMS	Est. 1/1/2027		B, 209, C	Y
MOMS, ADEM	Montgomery/ Montgomery MSA	01-101-1002	1350 Coliseum Blvd, Montgomery	32.412811	-86.263394	PE/N	SLAMS	1/16/2009	2/13/2022	L, 145, 3	Y
MOMS, ADEM	Montgomery/ Montgomery MSA	01-101-1002	1350 Coliseum Blvd, Montgomery	32.412811	-86.263394	PE/N	SLAMS	2/14/2023	active	B, 209, C	Y
MOMS, ADEM	Montgomery/ Montgomery MSA	01-101-1002	1350 Coliseum Blvd, Montgomery	32.412811	-86.263394	QA/N	SLAMS	1/16/2009	active	L, 145, 3	Y
Decatur	Morgan/Decatur MSA	01-103-0011	Wallace Ctr.Hwy 31, Decatur	34.530717	-86.967536	PE/U	SLAMS	8/7/2001	1/31/2023	L, 145, 3	Y
Decatur	Morgan/Decatur MSA	01-103-0011	Wallace Ctr.Hwy 31, Decatur	34.530717	-86.967536	PE/U	SLAMS	2/1/2023	active	B, 209, C	Y
Phenix City - S. Girard School	Russell/Columbus GA-AL MSA	01-113-0003	510 6th Place South, Phenix City	32.437028	-84.999653	HC/U	SLAMS	9/18/2017	2/16/2023	B, 209, C	Y
Phenix City - S. Girard School	Russell/Columbus GA-AL MSA	01-113-0003	510 6th Place South, Phenix City	32.437028	-84.999653	HC/U	SLAMS	2/17/2023	active	L, 145, 3	Y
Phenix City - S. Girard School	Russell/Columbus GA-AL MSA	01-113-0003	510 6th Place South, Phenix City	32.437028	-84.999653	QA/U	SLAMS	1/18/2017	active	L, 145, 6	Y
Ward, Sumter Co.	Sumter/no MSA	01-119-0003	NNE of Ward Post Office, Ward	32.362606	-88.277992	GB/R	SLAMS	1/1/2021	active	B, 209, C	Y
Duncanville Middle School	Tuscaloosa/ Tuscaloosa MSA	01-125-0011	11205 Eagle Pkwy, Duncanville	33.095379	-87.481507	PE/U	SLAMS	1/1/2023	active	B, 209, C	Y

GB = General Background; HC = Highest Concentration; N = Neighborhood; PE = Population Exposure
QA = Quality Assurance; R = Regional; RT = Regional Transport; U = Urban
B = Beta Attenuation Monitor; L = Low Volume Sequential Sampler; 3 = 24 hours every 3rd day; 6 = 24 hours every 6th day; C = Continuous

PM10

Site Common Name	County/CBSA	AQS ID	Address	Latitude	Longitude	Monitoring Objective/Scale	Type	Date Began	Date Ended	Method, Method Code and Schedule	NAAQS
MOMS, ADEM	Montgomery/ Montgomery MSA	01-101-1002	1350 Coliseum Blvd, Montgomery	32.412811	-86.263394	Population Exposure/ Neighborhood	SLAMS	9/16/1993	active	L, 127, 6	Y
MOMS, ADEM	Montgomery/ Montgomery MSA	01-101-1002	1350 Coliseum Blvd, Montgomery	32.412811	-86.263394	Quality Assurance/ Neighborhood	SLAMS	1/1/2013	active	L, 127, 6	Y
Seals Park	Mobile/ Mobile MSA	01-097-8001	540 Texas St, Mobile	30.679499	-88.04658	Population Exposure/ Neighborhood	SPM	7/1/2023	6/30/2026	L, 127, 6	N
Seals Park	Mobile/ Mobile MSA	01-097-8001	540 Texas St, Mobile	30.679499	-88.04658	Population Exposure/ Neighborhood	SPM	7/1/2023	12/31/2024	B, 226, C	N
L = Low Volume Sequential Sampler; B = Beta Attenuation Monitor; 3= 24 hours every 3rd day; 6 = 24 hours every 6th day; C= continuous											

SO2

Site Common Name	County/CBSA	AQS ID	Address	Latitude	Longitude	Monitoring Objective/ Scale	Type	Date Began	Date Ended	Method, Method Code and Schedule	NAAQS
Africatown	Mobile/ Mobile MSA	01-097-0023	TBD	TBD	TBD	Population Exposure/ Neighborhood	SLAMS	Est. 1/1/2027		P, 100, C	Y
Chickasaw	Mobile/ Mobile MSA	01-097-0003	801 Iroquois St, Chickasaw	30.770181	-88.087761	Population Exposure/ Neighborhood	SLAMS	1/1/2013	Est. 1/1/2027	P, 100, C	Y
Lhoist	Shelby/ Birmingham-Hoover MSA	01-117-9001	7444 St. Hwy 25, Calera	33.0928	-86.8072	High Concentration – SO2 DRR/ Middle	SLAMS	1/1/2017	12/31/2025	P, 100, C	Y
Ward	Sumter/ no MSA	01-119-0003	NNE of Ward Post Office, Ward	32.362606	-88.277992	General/ Background/ Regional	SLAMS	1/1/2018	active	P, 100, C	Y
P = Pulsed Fluorescent C = Continuous											

Lead

Site Common Name	County/CBSA	AQS ID	Address	Latitude	Longitude	Monitoring Objective/ Scale	Type	Date Began	Date Ended	Method, Method Code and Schedule	NAAQS
Troy Lead	Pike/Troy µSA	01-109-0003	Henderson Road, Troy	31.790479	-85.978974	Highest Concentration / Neighborhood	SLAMS	1/1/1979	active	I, 813, 6	Y
Troy Lead	Pike/Troy µSA	01-109-0003	Henderson Road, Troy	31.790479	-85.978974	Quality Assurance / Neighborhood	SLAMS	1/1/1979	active	I, 813, 6	Y
I=Inductively Coupled Plasma Mass Spectroscopy 6 = 24 hours every 6th day											

NO2

Site Common Name	County/CBSA	AQS ID	Address	Latitude	Longitude	Monitoring Objective/ Scale	Type	Date Began	Date Ended	Method, Method Code and Schedule	NAAQS
Ward	Sumter / no MSA	01-119-0003	NNE of Ward Post Office, Ward	32.362606	-88.277992	General/ Background/ Regional	SLAMS	7/1/2025	active	CAP, 256, C	Y[1]
CAP = Cavity Attenuated Phase Shift C = Continuous											
1=NAAQS exclusion flag will be applied to the 1st 24 months of data											

Appendix A

Site Assessments

All of ADEM's sites were evaluated for compliance and were found to meet the requirements of 40 CFR 58, Appendices A, C, D and E, except as listed below.

PLEASE NOTE: INDIVIDUAL SITE EVALS WILL BE SUBMITTED WITH THE FINAL PLAN TO EPA ON JULY 1.

The following issues were observed during site evaluations to date and any corrective actions noted.

Table 8 Issues observed during site assessments to date

Site	Issue	Correction
Troy AQS ID 01-109-0003	Closest tree is an obstruction that is not two times the distance from the inlet.	Siting Criteria Waiver requested. See below.
Ashland AQS ID 01-027-0001	A shrub taller than the inlet is within 10m of the inlet.	Data is qualified with "SX" until the shrub can be removed.

Siting Criteria Waiver Request

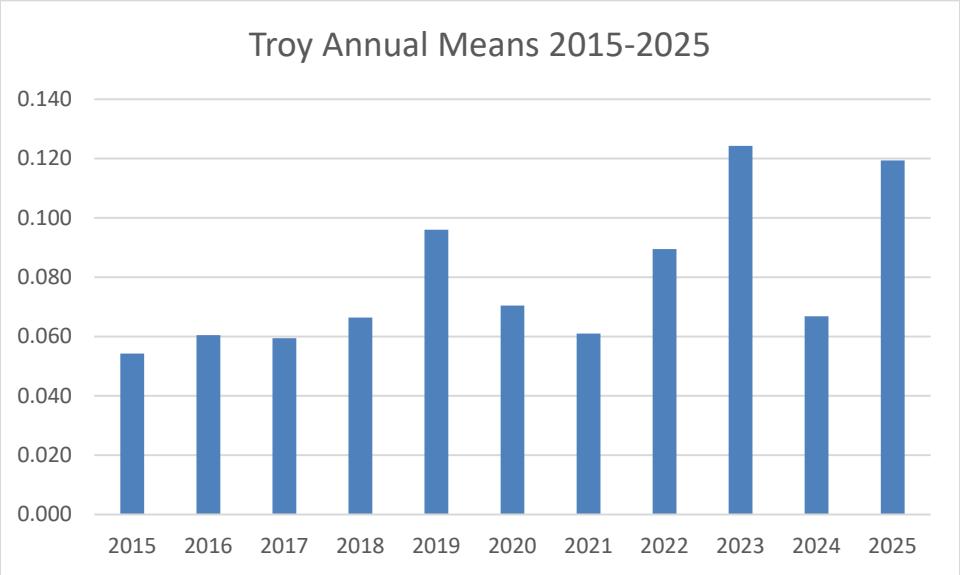
Lead (Pb) is an elemental heavy metal that can be released directly into the air as suspended particles during manufacturing process. As a heavy metal, it settles quickly out of the air into soil or dust. The aerodynamics of this settling increases the priority in neighborhood source-oriented monitoring at a site in direct line with the source.

ADEM requests a waiver from EPA for the siting requirement in 40 CFR Part 58 Appendix E §3.3(b) stating, "…At least 90 percent of the monitoring path for open path analyzers must have unrestricted airflow with no obstructions (as defined in paragraph (a) of this section) in a continuous arc of at least 270 degrees…"

40 CFR Part 58 Appendix E section 4 states, in pertinent part, "*However, some existing sites may not meet these requirements and may still produce useful data for some purposes. The EPA will consider a written request from the State, or where applicable local, agency to waive one or more siting criteria for some monitoring sites providing that the State or their designee can adequately demonstrate the need (purpose) for monitoring or establishing a monitoring site at that location.*"

The site at Troy (AQS ID 01-109-0003) was established in 2009 at its current location, as a source-oriented, highest concentration site located adjacent to Sanders Lead Company. Source oriented monitoring is required near sources that have Pb emissions ≥0.5 ton per year. Until the siting criteria updates in 2024, the site fully met the 270°, cumulative standard. The property has one large tree located to the north, measuring 18.1 m tall. This tree is less than a meter (<3ft) shy of the two times the height requirement that identifies it as an obstruction. This new obstruction now breaks the 270° unrestricted airflow requirement, as there is another clump of trees that qualify as obstructions, located to the east of the monitor. Neither the single tree, nor the clump of trees, lie in the predominant wind path between the facility and monitors. In fact, these trees may aid in

filtering some of the Pb emissions as it travels beyond the site. A review of historic annual means from 2015 to 2025, show a positive trend which would likely not be visible if the obstruction was causing scrubbing or impeding the flow of air from the facility. Due to the long historic monitoring record, siting of the monitors adjacent to the facility in the area of highest concentration, and since the identified obstacle is located downwind, not between the source and the monitor, this site continues to be as representative of the monitoring area as it would be if the siting criteria were being met. ADEM is requesting site waiver under 40 CFR Part 58 Appendix E §4.1.1 for the requirement that analyzers must have unrestricted airflow with no obstructions in a continuous arc of at least 270 degrees requirement.



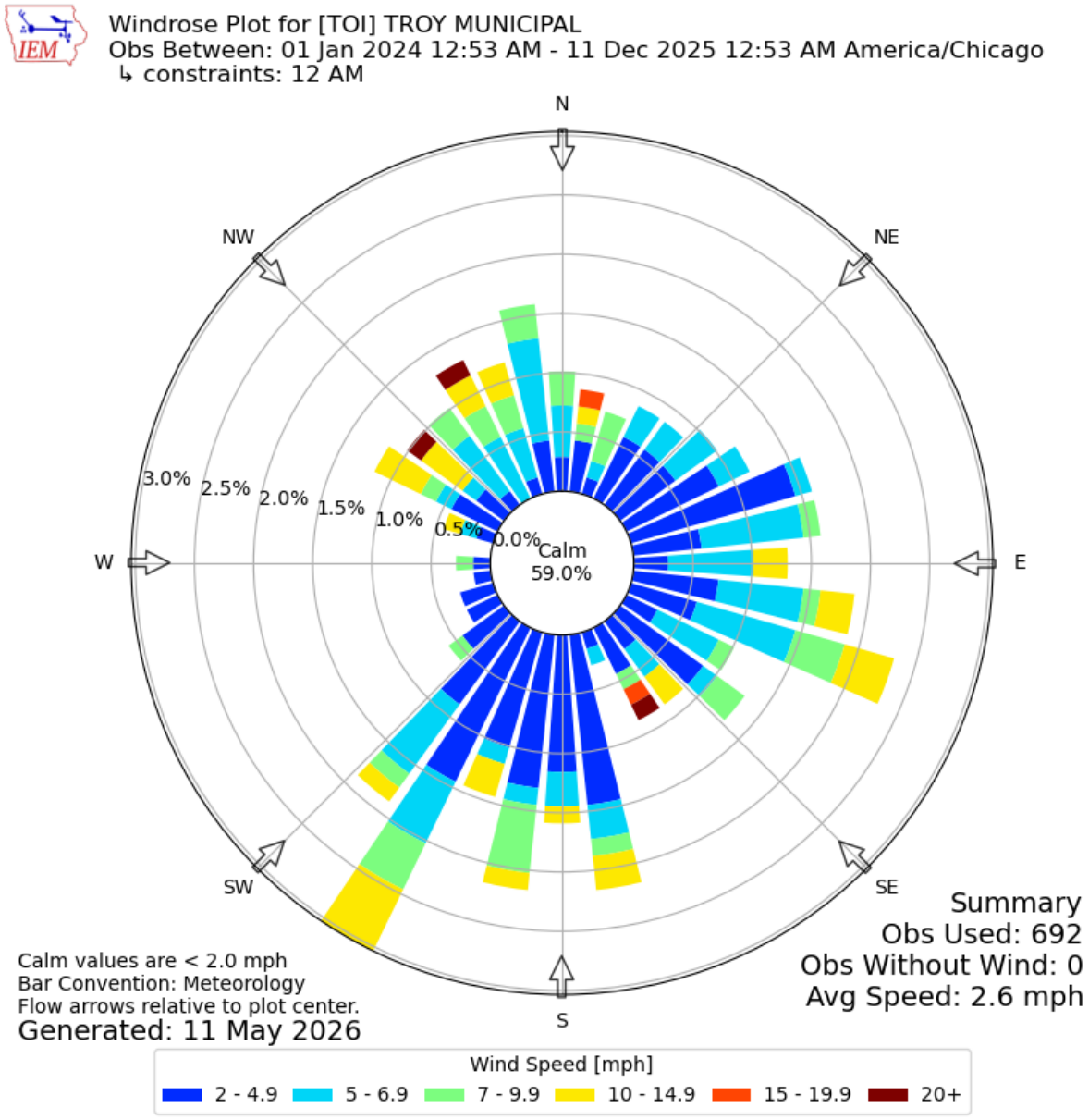

Windrose Plot for [TOI] TROY MUNICIPAL
Obs Between: 01 Jan 2024 12:53 AM - 11 Dec 2025 12:53 AM America/Chicago
↳ constraints: 12 AM
N
NE
E
SE
S
SW
W
NW
3.0%
2.5%
2.0%
1.5%
1.0%
0.5%
0.0%
Calm
59.0%
Summary
Obs Used: 692
Obs Without Wind: 0
Avg Speed: 2.6 mph
Calm values are < 2.0 mph
Bar Convention: Meteorology
Flow arrows relative to plot center.
Generated: 11 May 2026
Wind Speed [mph]
2 - 4.9
5 - 6.9
7 - 9.9
10 - 14.9
15 - 19.9
20+

Figure 4 Overview of Troy site and Sanders Lead Company: Red Circle-Sanders; Yellow Circle-Monitors

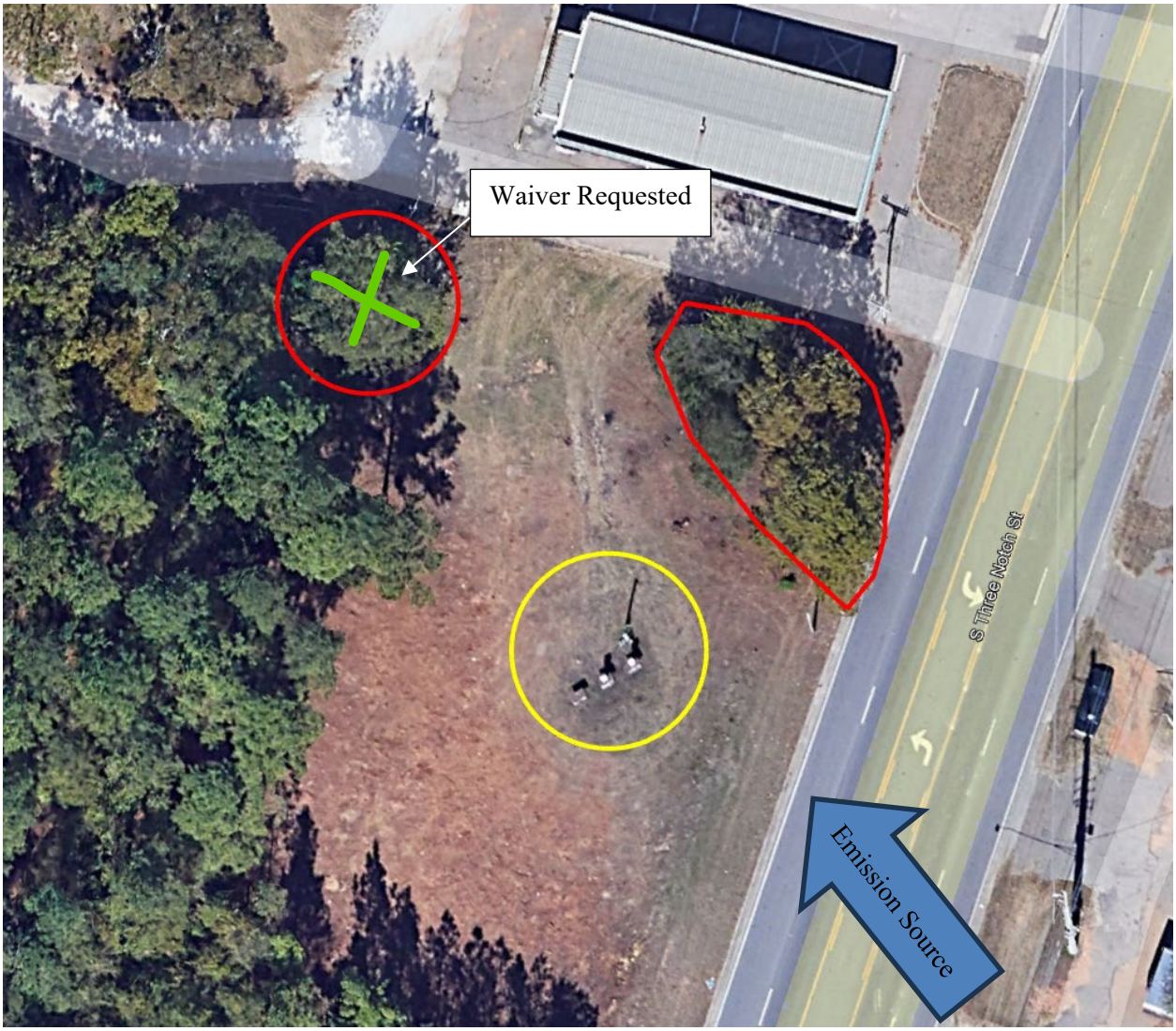


Figure 5 Close Up of Troy Site: Red Circles-Tree Obstructions; Yellow Circle-Monitors

Appendix B

DRR SO_2 Annual Report

The Alabama Department of Environmental Management (ADEM) submits this annual assessment pursuant to the United States Environmental Protection Agency's (EPA) Data Requirements Rule (DRR) for the 2010 1-hour Sulfur Dioxide (SO_2) Primary National Ambient Air Quality Standard (NAAQS). Specifically, Title 40 of the Code of Federal Regulation (CFR), Part 51.1205(b) states, "For any area where modeling of actual SO_2 emissions serve[s] as the basis for designating such area as attainment for the 2010 SO_2 NAAQS, the air agency shall submit an annual report to the EPA Regional Administrator by July 1 of each year…. that is available for public inspection, that documents the annual SO2 emissions of each applicable source in each such area and provides an assessment of the cause of any emissions increase from the previous year." This report satisfies this requirement.

Table B-1: Alabama SO_2 DRR Sources

Facility No.	Plant Name
201-0001	International Paper Company- Prattville Mill

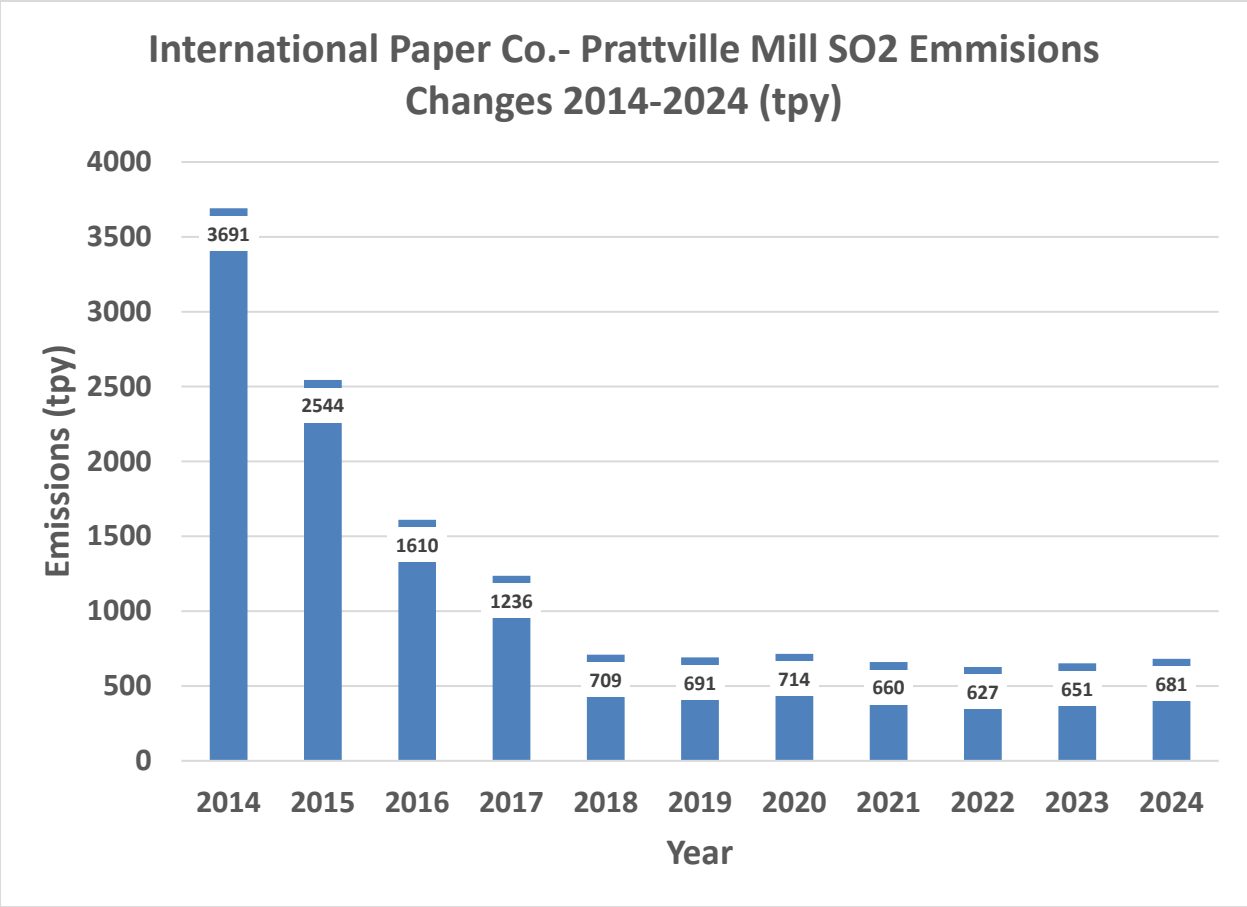
International Paper Company- Prattville Mill

For this review, actual emissions from the last ten Title V reporting periods were compared (2014-2024) to assess possible increases in SO_2 emissions. This data is presented both graphically and in table form below. (Table B-2 and Figure B-1, respectively). Between the base year of 2014 and 2024, the International Paper- Prattville facility showed an overall decrease in SO_2 emissions.

Table B-2: International Paper Co- Prattville Mill SO_2 Emissions (2014-2024)

Facility No.	Plant Name	Year	SO_2 Emissions (tpy)
201-0001	International Paper-Prattville Mill	2014	3691
		2015	2544
		2016	1610
		2017	1236
		2018	709
		2019	691
		2020	714
		2021	660
		2022	627
		2023	651
		2024	681

Figure B-1: International Paper- Prattville Mill SO_2 Emissions 2014- 2024



Based on the analysis of 2024 emissions compared to earlier emissions, which were the basis of the modeled emissions, it is reasonable to conclude that no additional modeling is necessary for International Paper- Prattville. The existing modeling was approved by EPA in its attainment/unclassifiable determination for Autauga County and can still be relied on to demonstrate that the 1-hour SO_2 NAAQS continues to be met in this area.

Appendix C
Site Change Justifications

Closure of Supplemental Chemical Speciation Network Site (01-113-0003)

ADEM has been monitoring for $PM_{2.5}$ speciation in the Phenix City area since 2005. During the last configuration of the Chemical Speciation Network (CSN), the Phenix City-Girard School site (01-113-0003) was selected as a supplemental site to be sampled on a 1-in-6-day schedule. While ADEM was responsible for operations and maintenance of the monitors, filters were analyzed through a national contract. ADEM has operated this site for over twenty years. Due to increasing costs for operations, redundancy of monitoring in the MSA, and difficulty with the monitor vendor, ADEM is requesting closure of Supplemental Speciation Site at Phenix City-Girard School site (01-113-0003) on 12/31/2026. Georgia Department Environmental Protection operates a supplemental CSN site within the same MSA at Columbus (13-215-0011), using the same 1-in-6-day frequency. The state's required speciation site is operated by Jefferson County Health Department (JCHD) at North Birmingham N-Core site (01-073-0023) on a 1-in-3-day schedule. JCHD operates a second speciation site on the same schedule at Wylam (01-073-2003). The Phenix City-Girard School site (01-113-0003) is not required in the CSN and supplemental sampling will continue in the MSA at the Columbus site. For these reasons, ADEM requests closure of the Phenix City CSN site.

Update on Relocation of Chickasaw (01-097-0003) to Africatown (01-097-0023)

ADEM still plans to relocate the Chickasaw O_3, $PM_{2.5}$, and SO_2 monitoring site (AQS ID: 01-097-0003) to a new site in Africatown (AQS ID: 01-097-0023). This site relocation is in response to public comments that ADEM received on the 2023 and 2024 Network Plans requesting an air monitoring site in Africatown and raising environmental justice concerns in the community. The EPA provided funding to ADEM under an IRA Air Monitoring Grant to support this site relocation.

ADEM began a comprehensive effort to find a site in the fall of 2024 and continued throughout 2025. ADEM has found multiple suitable sites that met ambient air monitoring requirements, but property owners were unwilling to allow placement of the shelter (school sites and other private businesses) or had plans for the site incompatible with air monitoring (site adjacent to Africatown Hall as suggested by previous public comments). To date, ADEM's extensive efforts to find a willing property owner with a suitable location have been futile. ADEM is committed to finding a suitable site in the Africatown community and is continuing the search with hopes to have an approved site operational by January 1, 2027.

Notice of Site Relocation

Wetumpka Westside Technology (WTT AQS: 01-051-0004) to Worthy Wetumpka (WOR AQS: 01-051-0005)

Executive Summary

ADEM received ARP funding for a new air monitoring shelter. The shelter at Wetumpka was over 20 years old and in need of replacement. When ADEM tried to contact the landowner in late August to gain permission for placement of the new shelter, it learned the property was sold. The new landowner had new purpose for the property and was not interested in granting permission for the air monitoring site at its current location. The landowners did allow ADEM to finish up the ozone season and gave notice to be completely off the property by 12/31/25. ADEM immediately began the process to locate a new site as the shelter was expected to be delivered in a couple months. Wetumpka Water Works (WWW) owned property across the street from the existing site. ADEM contacted WWW and they were willing to grant permission for an air monitoring site to be located on one of their selected properties in the area. While the site across the street did not meet regulatory requirements, a property they offered, located on Hwy 9, was perfect. Both sites are in a similar direction from the City of Montgomery (Figure

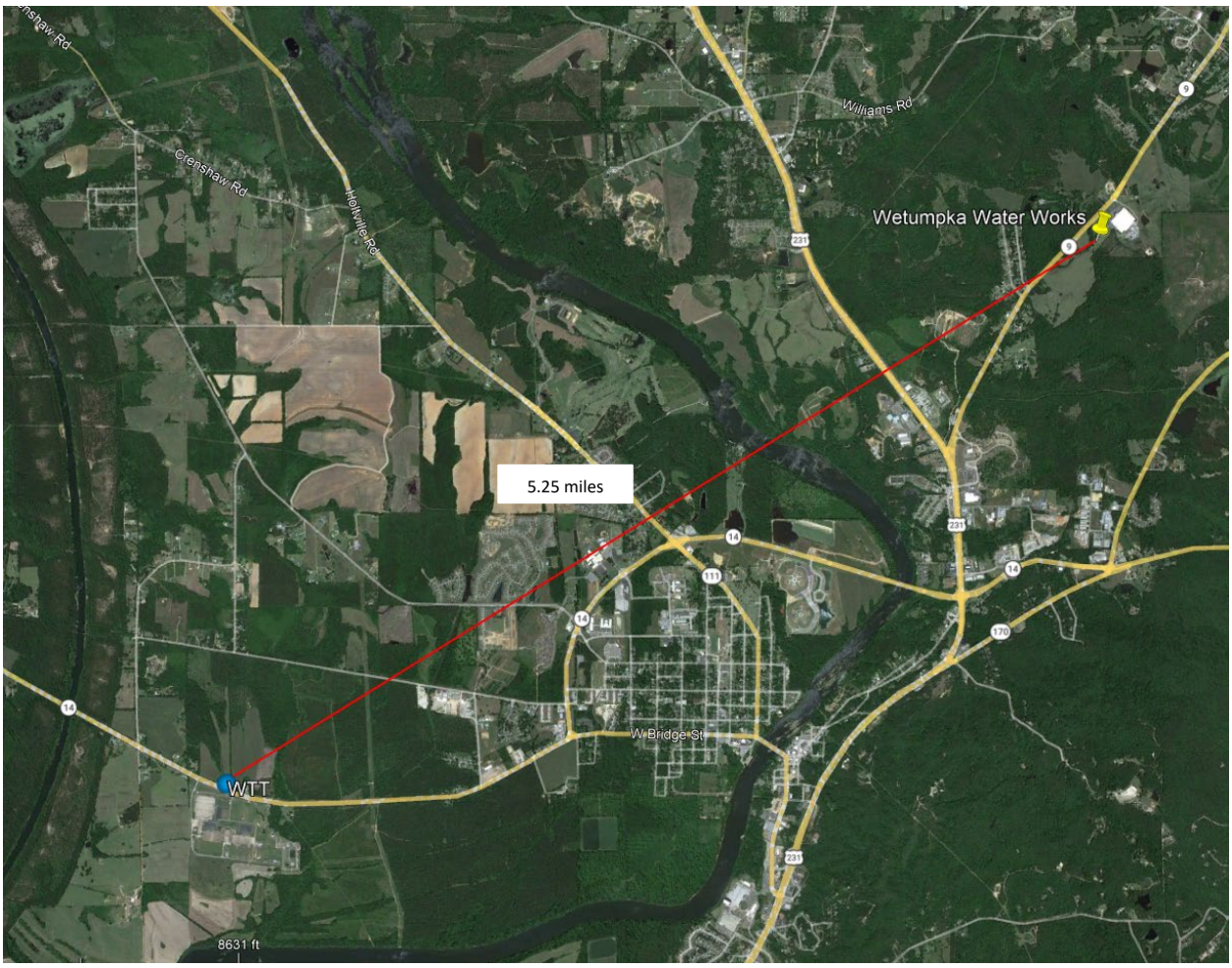


Figure 6 Distance between WTT and WOR

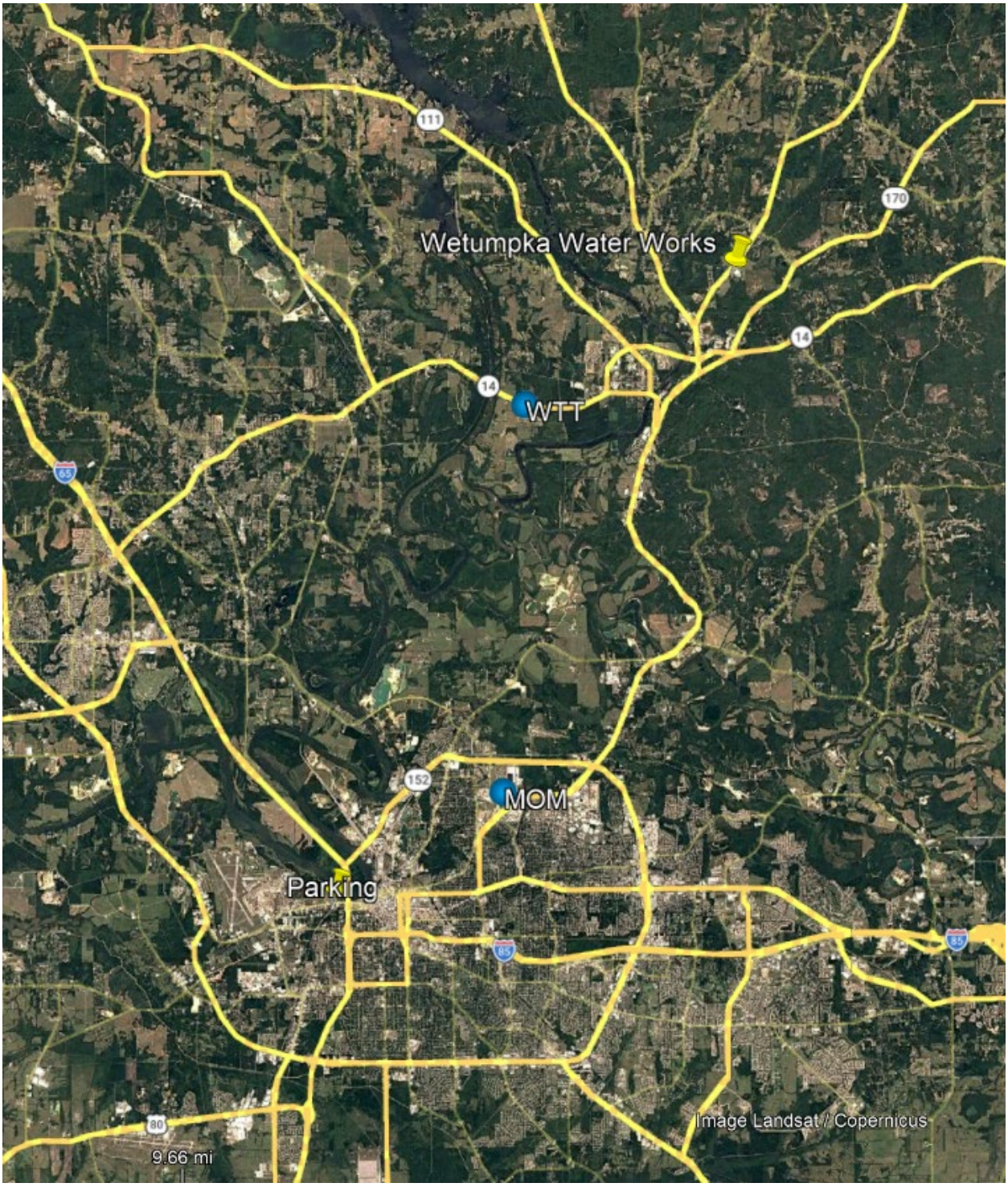


Figure 7 Site in relation to the City of Montgomery

Current Site Analysis

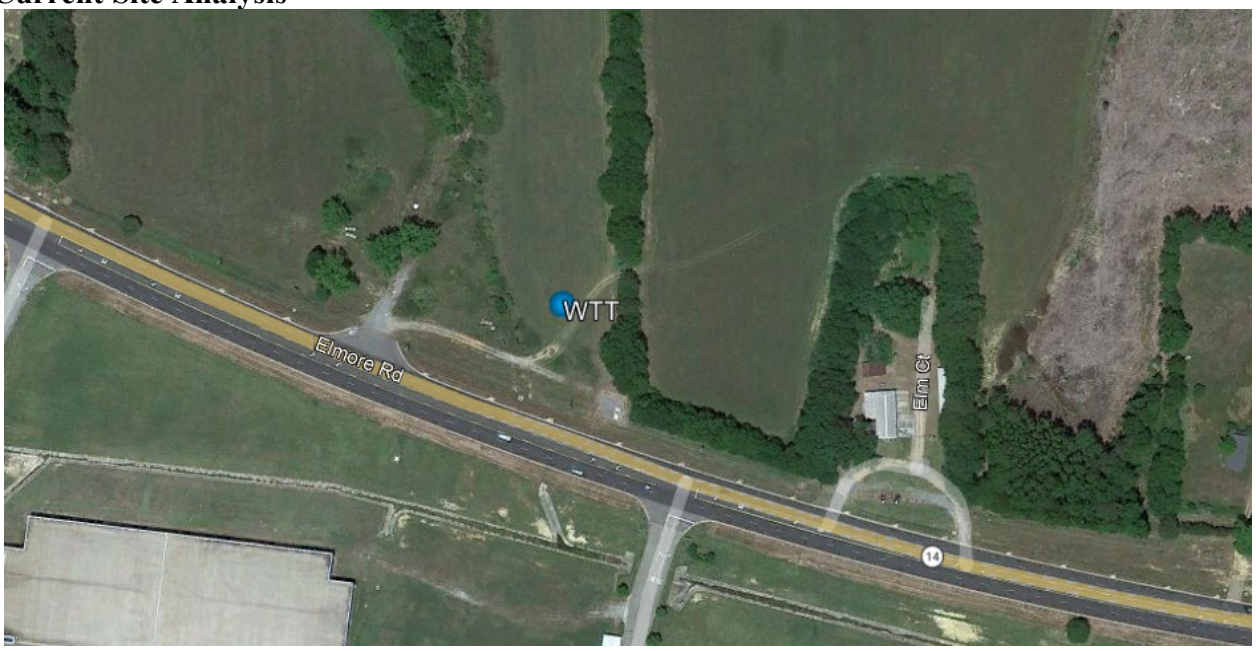


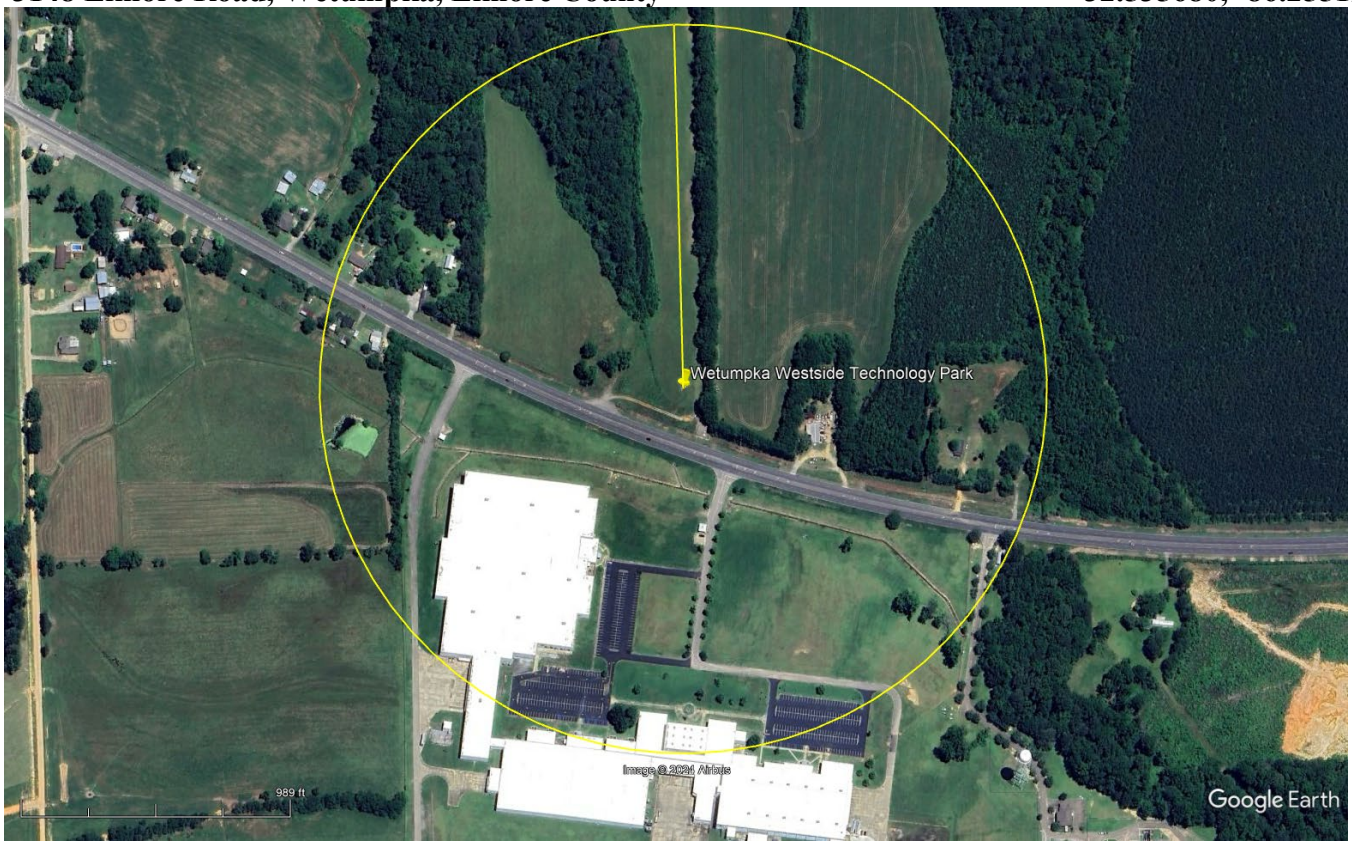
Figure 8 Westside Wetumpka Technology Site in the Montgomery MSA

In accordance with 40 CFR 58.10 regarding relocation requests for State or Local Air Monitoring Stations (SLAMS), ADEM provides the following documentation in support of relocation of Wetumpka Westside Technology (WTT AQS: 01-051-0004) to Worthy Wetumpka (WOR AQS: 01-051-0005). Both locations are northeast of the City of Montgomery and will serve the same purpose.

WTT (Figure 7) is located in the outskirts of Wetumpka, a rural area of low population density. The site is the required second ozone site in the Montgomery MSA. WOR is located northeast of Wetumpka also in rural area in the Montgomery MSA, only 5.25 miles from WTT. The last site evaluation is included on the following page.

WETUMPKA WESTSIDE TECHNOLOGY PARK **AQS ID 01-051-0004**

3148 Elmore Road, Wetumpka, Elmore County **32.535680, -86.255193**



MSA: Montgomery 56m to Hwy 14 Property Type: Industrial

NORTH SOUTH EAST WEST




Parameter	Monitoring Objective/ Scale	Schedule	Start Date	AQS Method Code	Probe/Rain Shield Material	Probe Inlet Height from ground	Distance from probe to supporting structure	Distance from probe to nearest tree dripline	Height of nearest tree/ Direction from probe to tree
Ozone	Highest Concentration/ Urban	Continuous	03/20/2018	087	Teflon	4.0 m	1.4 m	20.7 m	5.8 m East

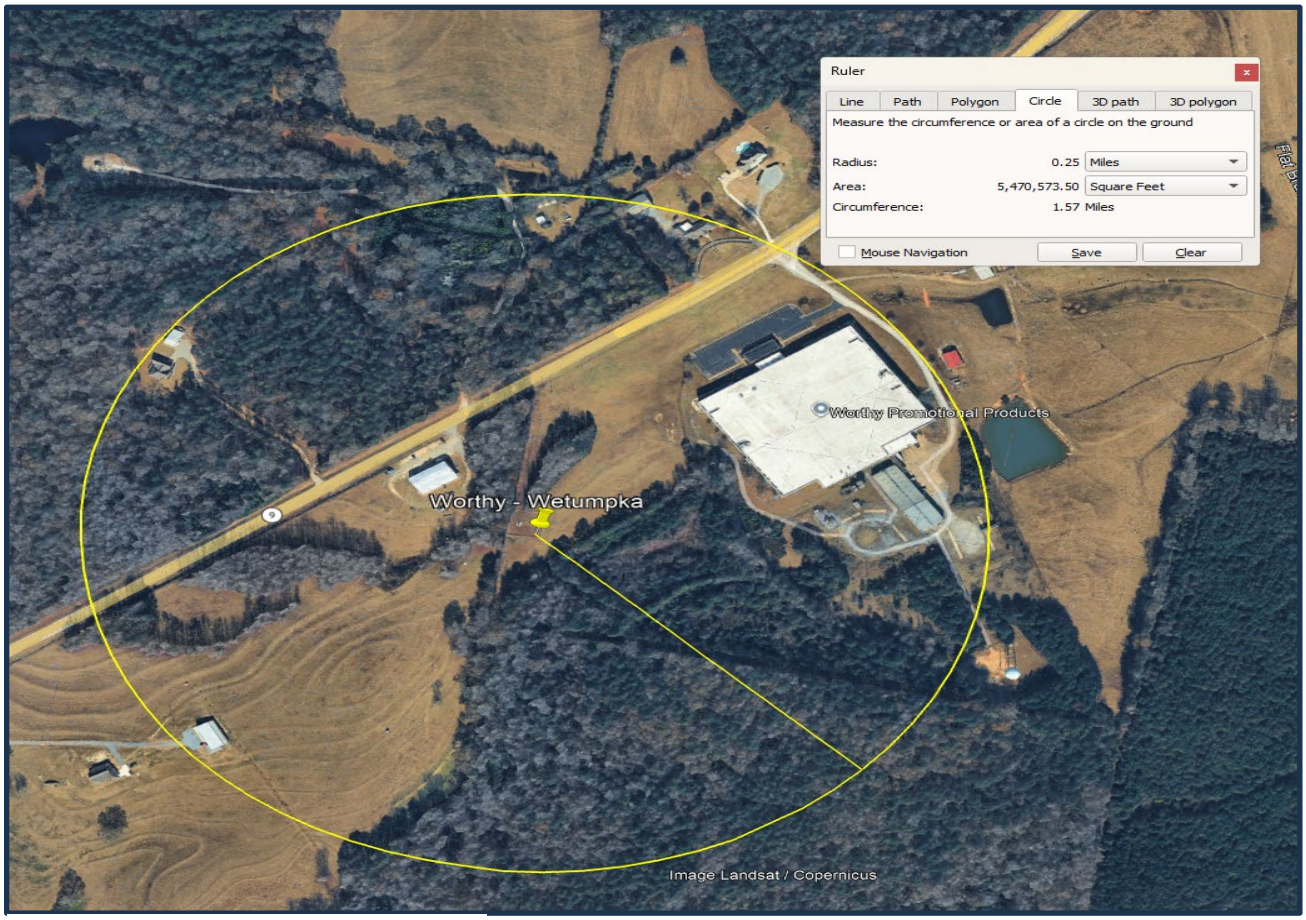
This site meets all requirements of 40 CFR Part 58. Evaluation Date: 03/20/2025

Relocation of WTT to WOR in the Montgomery MSA

Figure 9 Worthy Wetumpka Site in the Montgomery MSA

Due to the timeline of eviction and pending delivery of the new shelter, ADEM had to make quick decisions on relocation. After a thorough review of available properties, it was decided the proposed location off Hwy 9, provided optimal siting conditions for air monitoring, Ozone concentrations measured at this location would likely be representative and similar to the previous, and the site could be developed quickly. This justification serves as notice of relocation for WTT to WOR. ADEM began monitoring Ozone at the new location on March 1, 2026. The site was evaluated for compliance on 3/6/2026. The results are included on the following page.

WORTHY WETUMPKA **AQS ID 01-051-0005**
1640 Central Plank Rd, Wetumpka, **32.576083, -86.178168**



MSA: Montgomery

Property Type: Industrial

WORTHY NORTH

WORTHY SOUTH

WORTHY EAST

WORTHY WEST

Parameter	Objective/ Scale	Schedule	Start Date	AQS Method Code	Probe Material	Probe Inlet Height from ground	Distance from probe to supporting structure	Probe to nearest tree dripline distance	Nearest tree/ Probe to tree direction
Ozone	Highest Concentration/ Urban	Continuous	03/01/2026	087	Teflon	3.6m	1.1m	25.4m	17.8m/West

This site meets all requirements of 40 CFR Part 58. Evaluation Date: 03/06/2026

Appendix D
Comments

The following table contains changes made to the plan after the public comment period.

Page	Change