Cleveland, Ohio Technical Support Document

Definition of important terms used in this document:

1) **Designated "unclassifiable"** – an area where EPA could not determine if there was a violation of the 2008 lead NAAQS or a contribution to a violation in a nearby area, because there was insufficient air quality data for both 2006-2008 and 2007-2009 and where additional monitoring data for 2010 could not result in a different designation.

2) **Designated "attainment"** – an area which EPA has determined, based on the most recent 3 years of certified air quality data from 2006-2008 or 2007-2009, has no violations of the 2008 lead NAAQS during 36 consecutive valid 3-month site means; and which EPA has further determined does not contribute to a violation of the 2008 lead NAAQS in a nearby area and that additional monitoring data from 2010 could not result in a different designation.

3) **Designated nonattainment area –** an area which EPA has determined, based on a State recommendation and/or on the technical analysis included in this document, has a violation of the 2008 lead NAAQS during the most recent 3 consecutive years of quality-assured, certified air quality data.

4) **Prior nonattainment area –** an area that is currently designated as nonattainment or maintenance for the 1978 lead NAAQS (including both current nonattainment areas and maintenance areas).

5**) Recommended nonattainment area –** an area a State or Tribe has recommended to EPA be designated as nonattainment.

6) **Violating monitor –** an ambient air monitor whose design value exceeds 0.15 micrograms per cubic meter (ug/m3). As described in Appendix R of part 50, a violation can be based on either Pb-TSP or Pb-PM10 data and only 3 months of data are necessary to produce a valid violating design value.

7) **1978 lead NAAQS –** 1.5 $\mu g/m^3$, National Ambient Air Quality Standard for lead promulgated in 1978. Based on Pb-TSP indicator and averaged over a calendar quarter.

8) **2008 lead NAAQS –** 0.15 $\mu g/m^3$, National Ambient Air Quality Standard for lead promulgated in 2008. Based on Pb-TSP indicator and a 3-month rolling average. Pb-PM10 data may be used in limited instances, including to show nonattainment.

OHIO
Area Designations For the
2008 Lead National Ambient Air Quality Standards

EPA has revised the level of the primary (health-based) standard from 1.5 micrograms per cubic meter (μg/m³) to 0.15 μg/m³ measured as total suspended particles (TSP). EPA has revised the secondary (welfare-based) standard to be identical in all respects to the primary standard.

Pursuant to section 107(d) of the Clean Air Act, EPA must designate as "nonattainment" those areas that violate the NAAQS and those nearby areas that contribute to violations. The table below identifies the partial county in Ohio that EPA intends to designate "nonattainment" for the 2008 lead National Ambient Air Quality Standard (2008 lead NAAQS).

Area (listed alphabetically)	Ohio Recommended Nonattainment Counties	EPA's Designated Nonattainment Counties	Nonattainment Area for 1978 Lead NAAQS
Cleveland	Cuyahoga (partial)	Cuyahoga (partial)	NA

Table 1: Ohio Nonattainment Area for the 2008 Lead NAAQS

Technical Analysis for Cleveland

Introduction

This technical analysis for Cleveland identifies the partial county with a monitor that violates the 2008 lead NAAQS and evaluates nearby counties for contributions to lead concentrations in the area. EPA has evaluated these counties based on the weight of evidence of the following factors recommended in previous EPA guidance:

- Air quality in potentially included versus excluded areas;
- Emissions and emissions-related data in areas potentially included versus excluded from the nonattainment area, including population data, growth rates, patterns and emissions controls;
- Meteorology (weather/transport patterns);
- Geography/topography (mountain ranges or other air basin boundaries);
- Jurisdictional boundaries (e.g., counties, air districts, reservations, etc.); and
- Any other relevant information submitted to or collected by EPA (e.g., modeling where done appropriately).

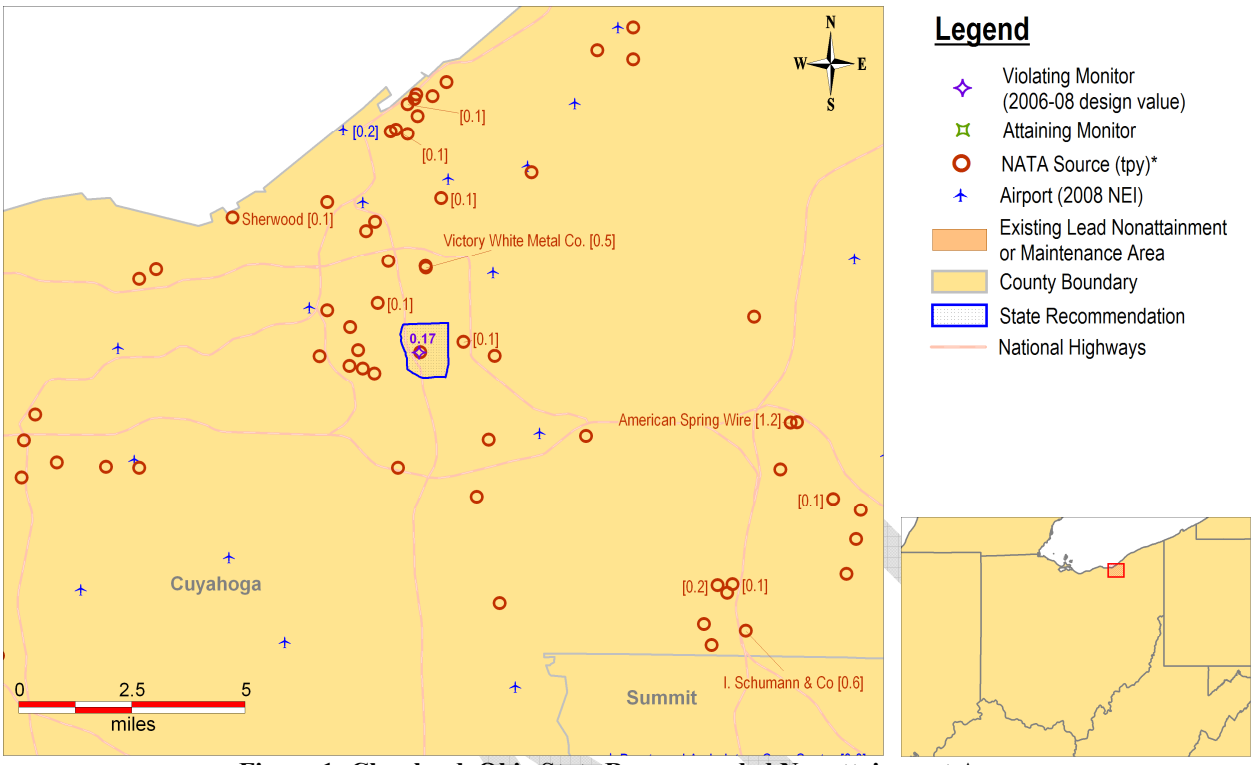

Figure 1: Cleveland, Ohio State Recommended Nonattainment Area
(Office of Air Quality and Planning Standards - OAQPS)

Figure 1 is a map of the area analyzed showing the locations and design values of air quality monitors in the area, and the counties surrounding any violating air quality monitors. Source data is also labeled in Figure 1 with the following guidelines: if the source emitted 0.5 or more tons, the symbol, name of the facility, and emissions are labeled; if the source emitted 0.1 – 0.5 tons, only the symbol and emissions are labeled; and if the source emitted less than 0.05 tons, only the symbol is shown.[1] Emissions in Cleveland and the surrounding areas will be discussed in the section addressing emissions in Cuyahoga County. The location of the detailed area in relation to the remainder of the State is shown in the bottom right corner of the figure.

[1] Emissions greater than 0.05 tpy round up to 0.1 tpy, and they are marked with the symbol and the emissions value.

Figure 2: Cleveland, Ohio State Recommended Nonattainment Area (OAQPS and Google Earth)

Figure 2 shows the State recommended nonattainment area boundary for Cleveland, Ohio. The boundary is shown with the red outline, and is bound on the west by Washington Park Blvd./Crete Ave./E. 49th St., on the east by E. 71st St., on the north by Fleet Ave., and on the south by Grant Ave.

In October 2009, Ohio recommended that a portion of Cuyahoga be designated as nonattainment for the 2008 lead NAAQS based on air quality data from 2006-2008. Their recommendation was based on data from Federal Reference Method (FRM) or Federal Equivalent Method (FEM) monitors located in the State. Chris Korleski, Director of the Ohio Environmental Protection Agency (Ohio EPA), submitted the State's recommendation to EPA in a letter dated October 5, 2009.

Based on EPA's technical analysis described below, EPA is intending to designate portions of Cuyahoga County in Ohio as nonattainment for the 2008 lead NAAQS as part of the Cleveland

nonattainment area based upon currently available information. This county is listed above in Table 1.

Detailed Assessment

Air Quality Data

This factor considers the lead design values (in $\mu g/m^3$) for air quality monitors in Cuyahoga County in Cleveland and the surrounding area based on data for the 2006-2008 and 2007-2009 period. A monitor's design value indicates whether that monitor attains a specified air quality standard. The 2008 lead NAAQS are met at a monitoring site when the identified design value is valid and less than or equal to 0.15 $\mu g/m^3$. A design value is only valid if minimum data completeness criteria are met. A lead design value that meets the NAAQS is generally considered valid if it encompasses 36 consecutive valid 3-month site means (specifically for a 3-year calendar period and the 2 previous months). For this purpose, a 3-month site mean is valid if valid data were obtained for at least 75 percent of the scheduled monitoring days in the 3-month period. A lead design value that does not meet the NAAQS is considered valid if at least one 3-month mean that meets the same 75 percent requirement is above the NAAQS. That is, a site does not have to monitor for 3 full calendar years in order to have a valid violating design value; a site could monitor just 3 months and still produce a valid (violating) design value.

County	State Recommended Nonattainment?	Monitor Name	Monitor Air Quality System ID	Monitor Location	Lead Design Value, 2006-2008 ($\mu g/m^3$)	Lead Design Value, 2007-2009 ($\mu g/m^3$)
Cuyahoga, Ohio	**Yes**	**E 56th Ferro**	**390350049**	**E 56th St. (41.446667, -81.651111)**	**0.17**	**0.17**
		St. Tikhon*	390350038	2547 St. Tikhon St. (41.476944, -81.681944)	0.02	0.02
		Fire Station 4*	390350042	3136 Lorain St. (41.482222, -81.708889)	0.03	0.03
		Grant Rd Ferro	390350050	Grant Rd. (41.4425, -81.64917)	0.05	0.05
		MM South*	390350061	West Side of 3rd St. (41.472222, -81.675278)	0.04	0.04

Monitor in bold have the highest 2006-2008 and 2007-2009 design value in the respective county. Latitudes and longitudes were provided by Ohio EPA in their submittal. *These monitors are in Cuyahoga County, but are not in the State recommended nonattainment area. Refer to Figure 3 below for their locations.

Table 2: Cleveland, Ohio and Surrounding Areas Air Quality Data

The 2008 lead NAAQS design values for Cuyahoga County in Cleveland and the surrounding area are shown in Table 2, and Cuyahoga County shows a violation of the 2008 lead NAAQS. Therefore some area in this county and possibly additional areas in surrounding counties must be designated nonattainment. The absence of a violating monitor alone is not a sufficient reason to

eliminate nearby counties as candidates for nonattainment status. Each area has been evaluated based on the weight of evidence of these factors and other relevant information.

According to EPA's monitor locator,[2] the monitor located on E. 56th St. (AQS ID 390350049) has an objective of determining the highest concentration for lead. This monitor is in very close proximity to Ferro Corporation (Ferro Corp). The location of this monitor, as well as the other 4 in the county, will be discussed in the section addressing emissions for Cuyahoga County.

Emissions and Emissions-Related Data

Evidence of lead emissions sources surrounding a violating monitor are an important factor for determining whether a nearby area is contributing to a monitored violation. For this factor, EPA evaluated county level emission data for lead and population data.

Emissions

Emissions data were derived from the 2005 National Emissions Inventory (NEI), version 2, which is the most up-to-date version of the national inventory available when these data were compiled for the designations process in 2009. See http://www.epa.gov/ttnchie1/net/2005inventory.html. EPA recognizes that for certain counties, emissions may have changed since 2005. For example, certain large sources of emissions in or near this area may have installed emission controls or otherwise significantly reduced emissions since 2005. Some States provided updated information on emissions and emission controls in their comments to EPA. Ohio did not provide updated emissions information, therefore EPA relied on the 2005 NEI emissions data. These data are provided in Table 3.

Table 3 shows total emissions of lead given in tons per year (tpy) for violating and potentially contributing counties in and around Cleveland and sources emitting (or anticipate to contribute) 0.1 ton per year or greater of lead according to the 2005 NEI. The county that is part of the Cleveland nonattainment area for the 2008 lead NAAQS is shown in **boldface**.

There are approximately 20,000 airport facilities in the U.S. at which leaded aviation gasoline is consumed. To evaluate the potential impact of emissions at and near these facilities, EPA recommends that States use the draft 2008 NEI. These data are provided in Table 4, and contain the facilities emitting (or anticipate to contribute) 0.1 ton per year or greater of lead according to the draft 2008 NEI.

[2] http://www.epa.gov/air/data/geosel.html.

County	Facility in State Recommended Nonattainment Area?	Facility Name	2005 NEI (tpy)	Location	City
Cuyahoga County, Ohio	No	American Spring Wire Corp.	1.2	26300 Miles Rd.	Bedford Heights
Cuyahoga County, Ohio	No	I. Schumann and Co.	0.6	22500 Alexander Rd.	Oakwood Village
Cuyahoga County, Ohio	No	Victory White Metal Co.	0.5	6100 Roland Ave.	Cleveland
Cuyahoga County, Ohio	No	Federal Metal Co.	0.2	7250 Division St.	Oakwood Village
Cuyahoga County, Ohio	No	Republic Metals	0.2	7930 Jones Rd.	Cleveland
Cuyahoga County, Ohio	No	Morgan Electro Ceramics	0.1	232 Forbes Rd.	Bedford
Cuyahoga County, Ohio	No	ISG Cleveland Inc.	0.1	3060 Eggers Ave.	Cleveland
Cuyahoga County, Ohio	No	TDE Group Inc.	0.1	28850 Aurora Rd.	Solon
Cuyahoga County, Ohio	No	Cleveland Thermal LLC	0.1	1921 Hamilton Ave.	Cleveland
Cuyahoga County, Ohio	No	HI TECMETAL Inc	0.1	1177 Marquette Ave.	Cleveland
Cuyahoga County, Ohio	No	Nettleton Steel Treating Company	0.1	1371 E. 45th St.	Cleveland
Cuyahoga County, Ohio	No	Sherwood	0.1	1201 W. 65th St.	Cleveland
Cuyahoga County, Ohio	No	T & B Foundry Company	0.1	2469 E. 71st St.	Cleveland
		Cuyahoga County Total Lead Emissions	3.7*		

Table 3: Cleveland, Ohio and Surrounding Areas Lead Emissions for Stationary Sources

Total lead emissions for Cuyahoga County were calculated by adding the 2005 NEI data for facilities not using leaded aviation gas (stationary sources) to the 2008 Draft NEI data for facilities using aviation gas. Sources with emissions below 0.1 tpy were included in this final calculation.

City	Facility Name	Type	2008 Draft NEI (tpy)	Distance to NA area (km)
Cleveland	Cleveland-Hopkins Intl	Airport	0.5	16.9
Cleveland	Burke Lakefront	Airport	0.2	7.15
Cleveland	Cuyahoga County	Airport	0.1	17.4

Table 4: Cleveland, Ohio and Surrounding Areas Lead Emissions for Leaded Aviation Gas Facilities

According to 2005 NEI data, Cuyahoga County has 7 sources emitting at or above 0.1 ton per year. The greatest emitter of lead in the county is American Spring Wire Corporation, and a source-oriented monitor was scheduled to begin operation in January 2010. EPA has taken comment on a proposal to lower the emissions threshold for monitoring requirements from 1.0 ton per year to 0.5 ton per year (74 FR 69050). If the final rulemaking requires monitors at sites that emit 0.5 ton per year or greater of lead, monitors at Victory White Metal Company and I.

Schumann & Company may be required in the future. There are 3 airport facilities with aircraft using leaded aviation gas in Cuyahoga County that emit more than .1 ton per year. Of these, Cleveland-Hopkins International would be the only airport facility in the county that could be required to monitor for lead if the threshold for monitoring requirements is lowered to 0.5 ton per year (74 FR 69050).

In addition to the existing source oriented monitoring network,[3] 4 new source oriented sites in Ohio were operational as of January 2010: American Spring Wire (Cuyahoga County), Nucor Steel (Marion County), Timken Company Canton Bearing (Canton County), and Ellwood Engineering Castings (Hubbard, County).

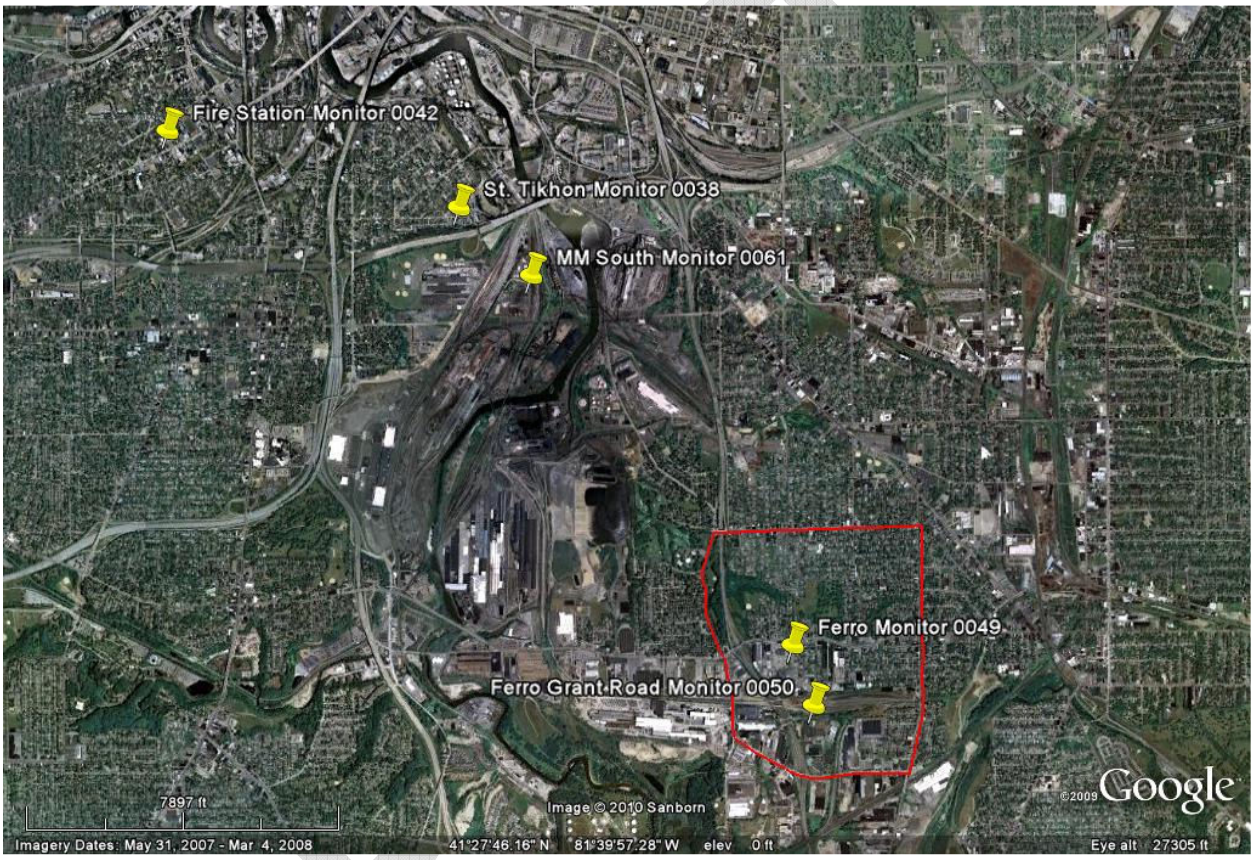

Figure 3: Cuyahoga County Lead Monitor Locations

As seen in Figure 3, there are 5 lead monitors in Cuyahoga County. For the addresses and coordinates of these monitors, please refer to Table 2. The violating monitor (AQS ID 390350049) is operated by Ferro Corporation, and has an objective to monitor for the highest concentration of lead.

[3] Daido Metal Bellefontaine in Logan County shut down in June 2009, but Ohio EPA will continue to monitor for lead at the Richard Ave. site (AQS 390910006).

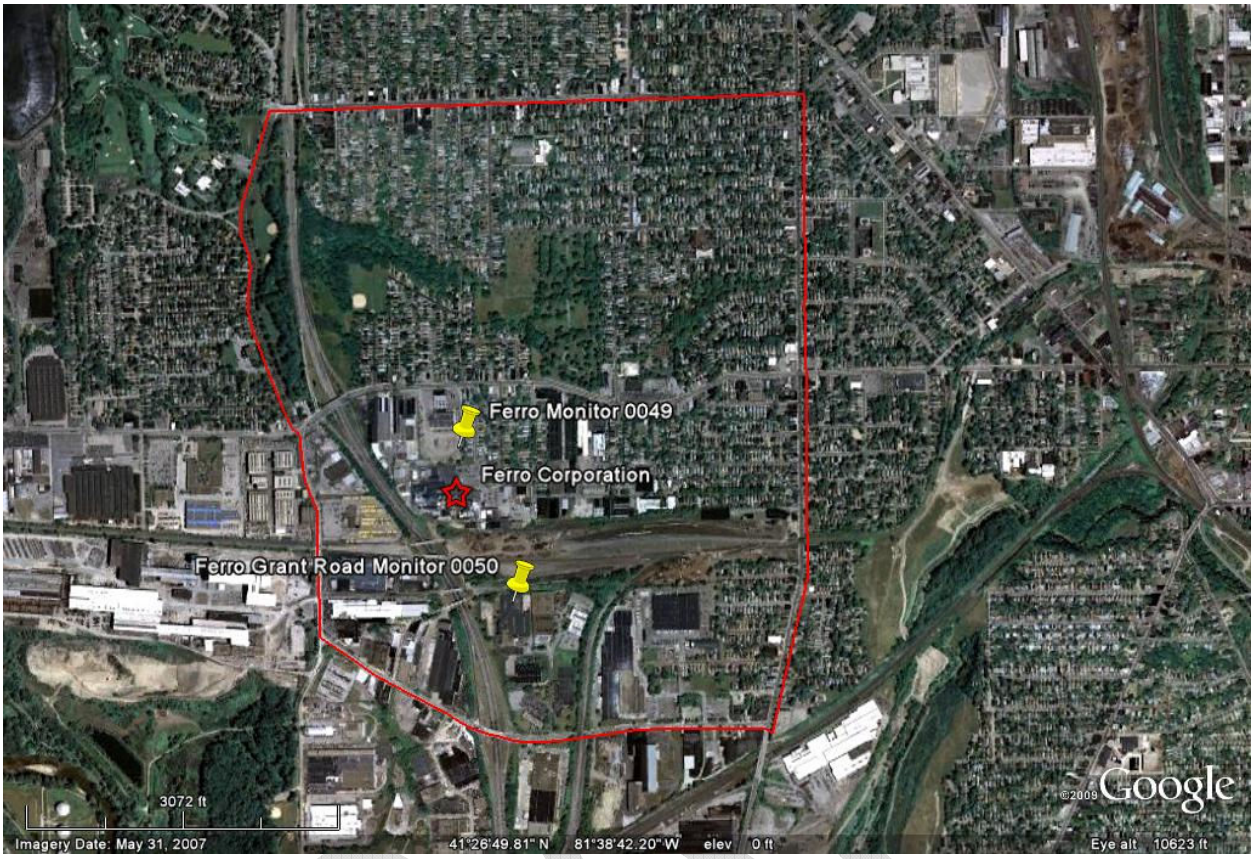

Figure 4: Lead Monitors within the State Recommended Nonattainment Area (Google Earth)

The 2 monitors within the State recommended nonattainment are shown in Figure 4 above. As previously mentioned, the violating monitor (AQS ID 390350049) is operated by Ferro Corporation, and is approximately 0.10 miles away from the center of facility, which is denoted with the red star. Although Ferro Corporation has a reported emissions value of zero in the 2005 NEI, it is still thought to be the source of the NAAQS violation. Communication with Ohio EPA on June 1, 2010, indicated that the agency is examining other potential sources of lead within the State recommended nonattainment area.

Population Data, Growth Rates, and Patterns

Table 5 shows the 2008 population for each county in the area being evaluated, as well as the population density for each county in that area. These data help assess the extent to which the concentration of human activities in the area and concentration of population-oriented commercial development may indicate emissions-based activity contributing to elevated ambient lead levels. This may include ambient lead contributions from activities that would disturb lead that has been deposited on the ground or on other surfaces. Re-entrainment of historically deposited lead is not reflected in the emissions inventory.

County	State Recommended Nonattainment?	2008 Population	2008 Population Density (pop/sq mi)	Population Change 2000-2008	Population % Change 2000-2008
Cuyahoga, Ohio	Yes	1,283,925	2,799	-108,186	-8

Table 5: Population Data for Cuyahoga County, Ohio

[Source of data: U.S. Census Bureau estimates for 2008 (http://www.census.gov/popest/datasets.html) and estimation of the area of U.S. counties]

EPA has considered the population growth rate for this area and does not believe that it affects the boundary recommendation.

Emissions Controls

Under this factor, the existing level of control of emission sources is taken into consideration. The emissions data used by EPA in this technical analysis and provided in Table 3 represent emissions levels taking into account any control strategies implemented in Cleveland before 2005 on stationary sources. EPA has received additional information on emissions reductions resulting from controls put into place since 2005.

Ohio EPA highlighted 2 State regulations that assist in reducing the potential impact on lead concentrations in Cuyahoga County. These regulations are included in Ohio Administrative Code (OAC) 3745-17-12 and 3745-17-06. The regulations contained in OAC 3745-17-06 address a source that has now been permanently shut down, and OAC 3745-17-12 provides more stringent requirements for particulate emissions from specific air contaminant sources in Cuyahoga County. Ohio EPA also highlighted several regulations that apply to the entire State that assist in reducing the potential impact on lead concentrations. These rules include restriction of emissions of fugitive dust, control of visible particulate emissions from stationary sources, and restrictions on particulate emissions from industrial processes.

Meteorology (weather/transport patterns)

For this factor, EPA considered data from National Weather Service instruments and other meteorological monitoring sites in the area. Historical wind direction frequencies collected between 1960 and 1992 are included in Figure 5 and Table 6. These data may provide evidence of the potential for lead emissions sources located upwind of a violating monitor to contribute to ambient lead levels at the violation location. Ohio EPA provided 2 wind roses for Cuyahoga County in their submittal, and they are shown in Figure 6 and Figure 7. The graphical representations from these figures corroborate the data from the National Weather Service.

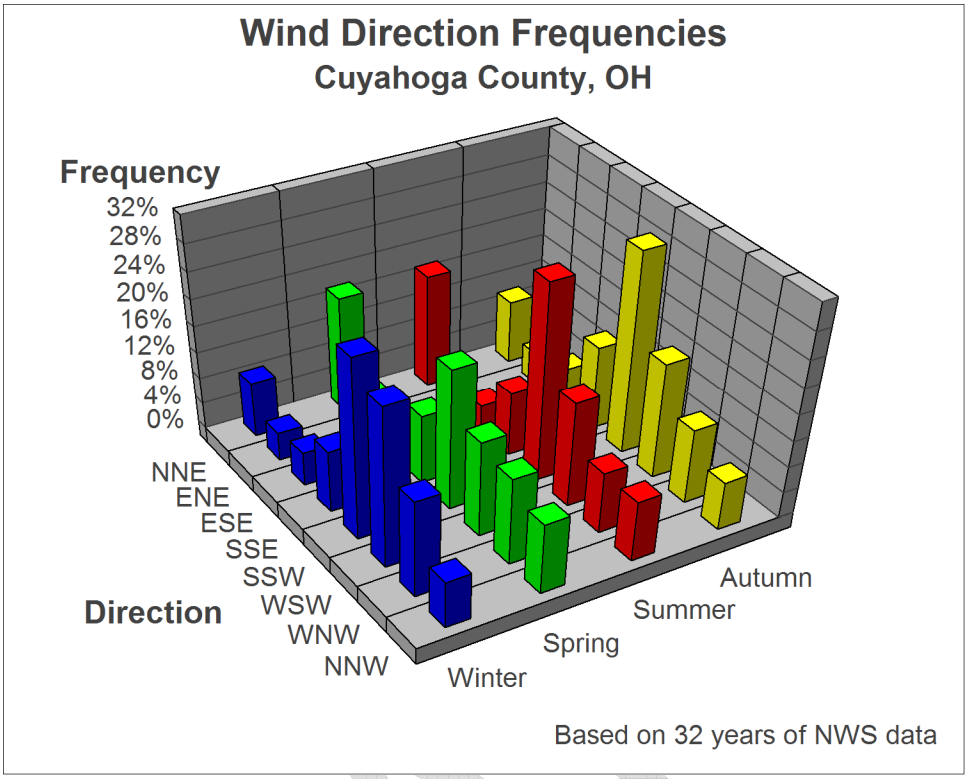

Figure 5: Historical Wind Direction Frequencies for Cuyahoga County, Ohio

Figure 5 is a 3-dimensional bar chart that shows the wind frequencies in 8 directions for the 4 seasons. These data are taken from 1960-1992 Solar and Meteorological Surface Observation Network information issued jointly by the U.S. Department of Commerce: National Climatic Data Center and the U.S. Department of Energy: National Renewable Energy Laboratory. The chart frequencies reflect the directions from which the winds come.

Cuyahoga County Wind Frequencies	
Frequency as a %	Seasonal Wind Directions
8.36	WINWINDFNNE
4.25	WINWINDFENE
5.10	WINWINDFESE
9.39	WINWINDFSSE
27.11	WINWINDFSSW
24.08	WINWINDFWSW
14.63	WINWINDFWNW
7.08	WINWINDFNNW
17.58	SPRWINDFNNE
5.84	SPRWINDFENE
6.40	SPRWINDFESE
10.46	SPRWINDFSSE
21.34	SPRWINDFSSW
14.49	SPRWINDFWSW
13.17	SPRWINDFWNW
10.72	SPRWINDFNNW
17.34	SUMWINDFNNE
4.61	SUMWINDFENE
4.03	SUMWINDFESE
9.78	SUMWINDFSSE
29.81	SUMWINDFSSW
15.95	SUMWINDFWSW
9.26	SUMWINDFWNW
9.22	SUMWINDFNNW
9.68	AUTWINDFNNE
4.65	AUTWINDFENE
5.76	AUTWINDFESE
12.86	AUTWINDFSSE
30.54	AUTWINDFSSW
17.71	AUTWINDFWSW
11.41	AUTWINDFWNW
7.38	AUTWINDFNNW

Table 6: Historical Wind Frequency Data as Percents for Cuyahoga County, Ohio

As shown in Figure 5 and Table 6, the period with the highest wind frequency occurs in the autumn months, with winds blowing from the south southwest. With the consistently strong representation of winds from a variation of the west in all seasons, special care must be made when determining the nonattainment boundary to the east of the violating monitor. There also appears to be a sizeable frequency of winds from the north northeast in all seasons.

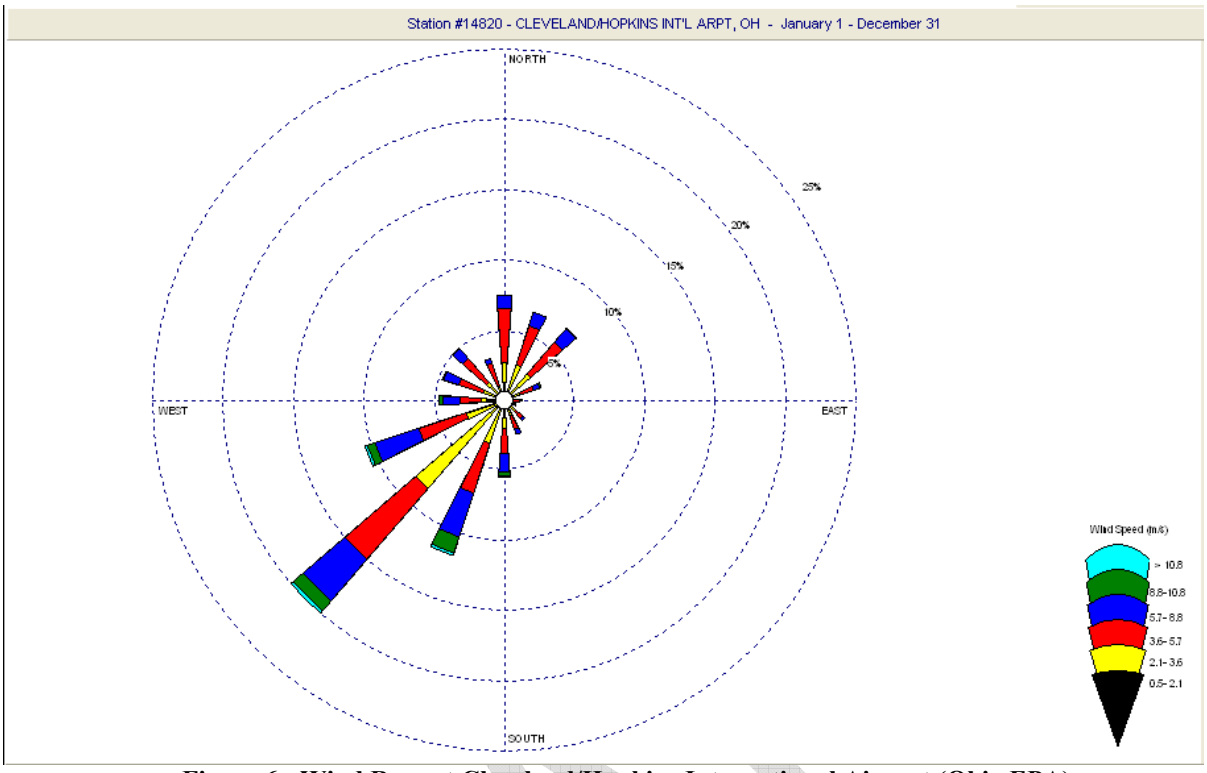

Figure 6: Wind Rose at Cleveland/Hopkins International Airport (Ohio EPA)

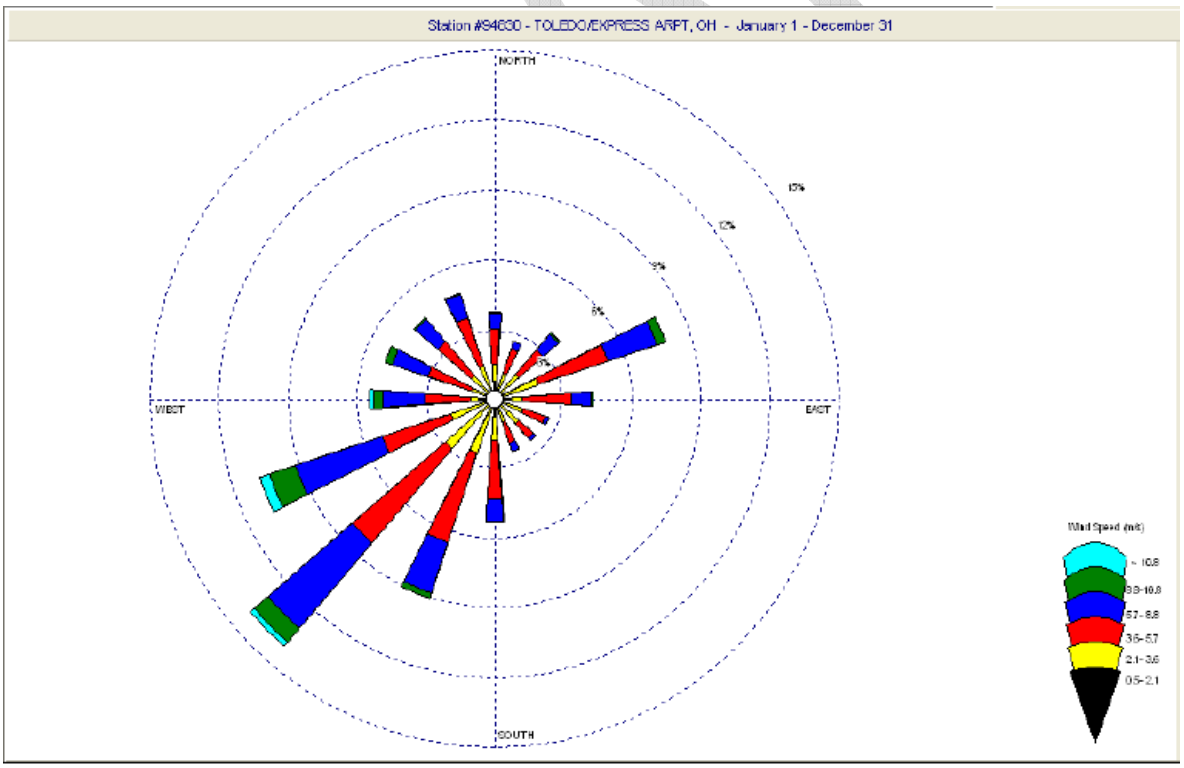

Figure 7: Wind Rose at Toledo/Express Airport (Ohio EPA)

Geography/topography (mountain ranges or other air basin boundaries)

The geography/topography analysis evaluates the physical features of the land that might have an effect on the air shed and, therefore, on the distribution of lead over Cleveland and the surrounding area.

The Cleveland area does not have any geographical or topographical barriers significantly limiting air pollution transport within its air shed. Therefore, this factor did not play a significant role in determining the nonattainment boundary.

Jurisdictional boundaries

Existing jurisdictional boundaries may be helpful in articulating a boundary for purposes of nonattainment designations, and for purposes of carrying out the governmental responsibilities of planning for attainment of the lead NAAQS and implementing control measures. These existing boundaries may include an existing nonattainment or maintenance area boundary, a county or township boundary, a metropolitan area boundary, an air management district, or an urban planning boundary established for coordinating business development or transportation activities.

In EPA's August 21, 2009 guidance memorandum, "Area Designations for the 2008 revised Lead National Ambient Air Quality Standard," EPA reiterated that the presumptive boundary for each nonattainment area should be the county containing the violating monitor. This concept was first introduced in the guidance for the 1978 lead NAAQS designations, and is described in the 1992 General Preamble (57 FR 13549). This same presumptive boundary guidance was addressed most recently in the final rulemaking for the 2008 lead NAAQS (73 FR 66964). EPA observed, however, that States have the flexibility in their recommendations to deviate from the presumptive county boundary to portions of the county containing the violating monitor, stating that any "nonattainment area boundaries that deviate from presumptive county boundaries should be supported by an assessment of several factors…," all of which have been discussed already in this document, except for jurisdictional boundaries.

For the Cleveland area, there are several jurisdictional boundaries that can be considered. The Ohio EPA Central Office and Cleveland Division of Air Quality are responsible for air quality planning within all areas of Cuyahoga County. The Northeast Ohio Areawide coordinating Agency (NOACA) is the planning agency designated as the Metropolitan Planning Organization for the greater Cleveland area. The NOACA region is composed of 5 Counties: Cuyahoga, Geauga, Lake, Lorain, and Medina. Air quality planning efforts to address the impending lead nonattainment area in Cleveland should not be problematic; it should be noted that the final rulemaking for the 2008 lead NAAQS (73 FR 66964) specifically addressed transportation conformity by stating, "In light of the elimination of lead additives from gasoline, transportation conformity does not apply to the Lead NAAQS." Lastly, Ohio EPA has recommended that the nonattainment area be defined by well-known and major roads which are bound on the west by Washington Park Blvd./Crete Ave./East 49th St., on the east by E. 71st St., on the north by Fleet Ave., and on the south by Grant Ave.

Other Relevant Information

EPA received additional relevant information from Ohio for establishing the nonattainment area boundary for Cleveland. This information will be discussed below.

The technique of spatial interpolation for defining the perimeter of the nonattainment boundary was found to be appropriate for the Cleveland area due to the locations and number of lead monitors (refer to Table 2). Ohio EPA used a concentration of 0.145 $\mu g/m^3$ as the bounding isopleth because it rounds up to the 0.15 $\mu g/m^3$ NAAQS. The violating monitor (AQS ID 390350049) showed 3 different 3-month rolling averages of lead concentrations above the NAAQS. It was decided that those 3 values would be spatially averaged with the readings from the other 4 monitors for the identical time period. The 3 time periods and associated concentrations are listed below in Table 7.

Period	39-035-0038	39-035-0042	39-035-0049	39-035-0050	39-035-0061
Nov. 2007	0.015	0.023	0.163	0.020	0.022
Dec. 2007	0.016	0.021	0.155	0.018	0.019
Oct. 2008	0.015	0.015	0.173	0.032	0.027

Table 7: Periods and Concentrations used in Ohio EPA's Spatial Averaging Analysis
The months in the "Period" column indicate the third month of the rolling 3 month period. The concentrations are all in $\mu g/m^3$

The process of defining the nonattainment area boundary involves constructing Krige plots for each of the time periods individually, and defining the nonattainment area to be every point falling inside the 0.145 $\mu g/m^3$ isopleth on any of the plots. After the plots were constructed, Ohio EPA concluded that the October 2008 period was controlling; in other words, the area inside the 0.145 $\mu g/m^3$ isopleth was large enough to fully enclose the corresponding isopleth in both of the other plots. The resulting nonattainment boundary based on Ohio EPA's spatial interpolation analysis is shown by the yellow octagonal outline in Figure 8. Any area outside of this octagonal outline has been interpolated to show an impact of less than 0.145 $\mu g/m^3$. Ohio EPA has included a buffer zone between the nonattainment boundary generated by the isopleth analysis and the final State recommended nonattainment area. Please note that the 2 green place markers at the southwest corner of the State recommended nonattainment area are artifacts from the mapping procedure used by Ohio EPA, and do not have an implication on the actual nonattainment area.

Figure 8: Cleveland, Ohio State Recommended Nonattainment Area Spatial Interpolation (Ohio EPA)

Conclusion

After considering the factors described above, EPA has determined that it is appropriate to include the portion of the county listed in Table 1 in the Cleveland nonattainment area for the 2008 lead NAAQS.

The air quality monitor in Cuyahoga County shows a violation of the 2008 lead NAAQS, based on 2006-2008 and 2007-2009 air quality data. The cumulative process of the factors analysis in conjunction with the State's spatial interpolation ultimately leads to the nonattainment area. There are no other major sources of lead emissions in the State recommended nonattainment area or upwind of the State recommended nonattainment area. One of the 2 monitors in this area,

located slightly north of Ferro Corporation, has monitored violations of the 2008 lead NAAQS. The other monitor, slightly to the south of Ferro Corporation, has shown consistent compliance with the 2008 lead NAAQS. When considering the factors analysis and the supplemental spatial interpolation analysis for the Cleveland area, EPA finds it appropriate to designate the portions of Cuyahoga County that are bound on the west by Washington Park Blvd./Crete Ave./East 49th St., on the east by East 71st St., on the north by Fleet Ave., and on the south by Grant Ave. Based on the consideration of all the relevant and available information, as described above, EPA believes that the boundaries described herein encompass the entire area that does not meet (or that contributes to ambient air quality in a nearby area that does not meet) the 2008 lead NAAQS.