



EAST-WEST GATEWAY Council of Governments

Creating Solutions Across Jurisdictional Boundaries

Other Criteria Pollutants

The Clean Air Act requires EPA to set National Ambient Air Quality Standards (NAAQS) for maximum allowable concentrations of six "criteria" pollutants in outdoor air. Other than ground-level ozone and particulate matter, these criteria pollutants include: carbon monoxide, lead, sulfur dioxide, and nitrogen dioxide

Carbon Monoxide

Part of the St. Louis region, consisting of the city of St. Louis and that portion of St. Louis County within the I-270 loop, is classified as a limited maintenance area for this standard. As of March 29, 2019, the end of the 20-year maintenance period has been reached.

Lead Standard

An area within the city limits of Herculaneum in Jefferson County was designated by EPA as being in non-attainment of the 2008 standard. In 2013 MoDNR submitted to EPA a plan/timeline showing how the area would achieve compliance with this standard and a 2011 consent decree. In this federal multi-media consent decree between Doe Run Company, EPA and the state of Missouri, Doe Run agreed that sinter plant and blast furnace operations at its primary lead smelter in Herculaneum would be shut down by spring 2014. EPA approved the attainment demonstration, effective Nov 19, 2014.

In Illinois, EPA designated Granite City and Venice Township as non-attainment of the 2008 lead standard. The Illinois Environmental Protection Agency (Illinois EPA) worked with the affected facility on a State Implementation Plan (SIP)/rule which described action(s) to bring this area into attainment. The facility in Granite City has installed controls so it can comply with this rule. Illinois EPA has submitted the final lead rule to EPA and an update to a previous lead SIP. At the end of 2015, Granite City area had clean monitor data for lead which was certified and submitted to EPA. On March 28, 2018, EPA re-designated Granite City and Venice Township to attainment of the 2008 lead standard. EPA also approved the plan prepared by Illinois EPA to maintain this standard.

Sulfur Dioxide (SO₂) Standard

For the 2010 standard, EPA developed a designation strategy to designate in rounds those areas considered to be in attainment of the standard, non-attainment and unclassifiable. In the initial round, states were to evaluate those areas with monitors where 2009-2011 data indicates a violation of this standard and nearby areas containing sources that may contribute to the violation. In the next rounds, the states were to describe air quality in those areas without SO₂ monitors or significant SO₂ sources. State air agencies would be working on Attainment Demonstration Plans for Round 1 non-attainment areas as well as the process to identify future non-attainment areas. On March 2, 2015, the US District Court approved a consent decree between EPA, Sierra Club and the Natural Resources Defense Council setting out how EPA will complete the remaining rounds of SO₂ designations. The second round of designations is to be completed by July 2, 2016, the second by Dec 31, 2017, and the third by Dec 31, 2020. The 2017 and 2020 designation deadlines had already been established by EPA.

In Round 1 EPA designated a portion of east central Jefferson County as in non-attainment in 2013. Based on 2013-2015 monitor data, Jefferson County has attained the SO₂ standard. MoDNR is developing a Jefferson County SO₂ maintenance plan and re-designation request. Effective October 2017, EPA found that this area had attained the standard per EPA's Clean Data Policy.

For Round 2, EPA informed 28 states, including Missouri and Illinois, of sources and areas that were to be evaluated and designation recommendations submitted by September 2015. In the St. Louis region, Illinois EPA evaluated an area around the Dynegy Wood River power plant in Wood River Township in Madison County, and MoDNR examined an area around the Ameren Missouri Labadie Energy Center in Franklin County. In 2016, EPA designated as non-attainment a small area surrounding a steel facility in Alton Township in Madison County. Illinois EPA is working with the source to prepare a plan for the area to attain the standard. EPA classified a portion of Franklin and St. Charles Counties adjacent to the Ameren Missouri Labadie Energy Center as unclassifiable. EPA will make a designation determination when sufficient information is available.

EPA's 2015 Data Requirements Rule set out the criteria for the Round 3 and Round 4 evaluation process for the states to follow to prepare their designation recommendations. The rule covers sources which emitted more than 2,000 tons of SO₂ in 2014. A source can either conduct computer modeling (be part of Round 3) or install monitors (Round 4) in order to demonstrate compliance with the SO₂ standard. Some sources could opt for federally enforceable emission limits of less than 2,000 tons per

year which would remove the need to monitor or perform modeling. In January 2017 Missouri and Illinois submitted to EPA their Round 3 designation recommendations based on modeling output to EPA. Effective April 9, 2018, EPA found that the Missouri and Illinois counties in the St. Louis region were in attainment. Sources using the monitoring option will need three full years of monitor data (2017-2019) before a state can make a recommendation. EPA is to make the Round 4 designations by the end of 2020. There are no Round 4 sources of interest located in the St. Louis region.

Nitrogen Dioxide (NO₂) Primary Standard

As part of the implementation of the 2010 standard, EPA set out new air monitoring and reporting requirements. In urban areas, NO₂ monitors are to be installed near major roads (within 164 feet) as well as other sites at which peak maximum concentrations are expected to occur. Based on the population of the St. Louis region, two near-roadway monitors are required. The first near-roadway monitor is adjacent to I-64/US 40 in Forest Park in the city of St. Louis and began operation in January 2013. The second near-roadway site went into operation in early 2015. It is located at I-70 and Rider Trail in St. Louis County. Data on other pollutants is also collected at these sites.

Based on 2008-2012 monitor data, in 2012, EPA determined that no area in the US is violating the 2010 NO₂ standard. As sufficient air quality data is received from the new NO₂ monitor network, EPA will revisit the designation of areas as in attainment of the standard, in non-attainment or unclassifiable because additional data is needed.