

FEATHER RIVER AIR QUALITY MANAGEMENT DISTRICT  
MEMORANDUM  
02/07/2022

TO: FRAQMD BOARD OF DIRECTORS  
FROM: Christopher D. Brown, AICP, APCO  
SUBJECT: Informational Item on State Implementation Plan development for 2022.

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BACKGROUND:

The United States Environmental Protection Agency (US EPA) sets health based ambient air quality standards for several pollutants. These standards are known as National Ambient Air Quality Standards, or NAAQS. The NAAQS are issued for pollutants for which a level can be established to protect public health and welfare, including ground level ozone and particulate matter.

After the US EPA sets a NAAQS, the agency uses monitoring data to determine whether areas are meeting the standards. For areas not meeting the standards, the Clean Air Act requires them to submit a plan to attain the standard. The higher the pollutant levels are above the standard, the higher the “classification” of the nonattainment area. The higher the classification, the greater amount of controls are required by the Clean Air Act. A higher classification also allows nonattainment areas additional time to meet the standard. The plan is called a State Implementation Plan, or SIP.

If a nonattainment area fails to submit the SIP by the date required in the Clean Air Act, the US EPA will issue a Finding of Failure to Submit, which starts a sanctions clock. If the SIP is not submitted within 18 months of the initiation of the sanctions clock then stationary sources requiring offsets will be forced to purchase them at increased ratios. If the SIP is not submitted within 24 months, the area will lose federal highway funding and the US EPA can adopt a Federal Implementation Plan (FIP) which will implement the requirements of the Clean Air Act without local input or control.

Ground Level Ozone NAAQS

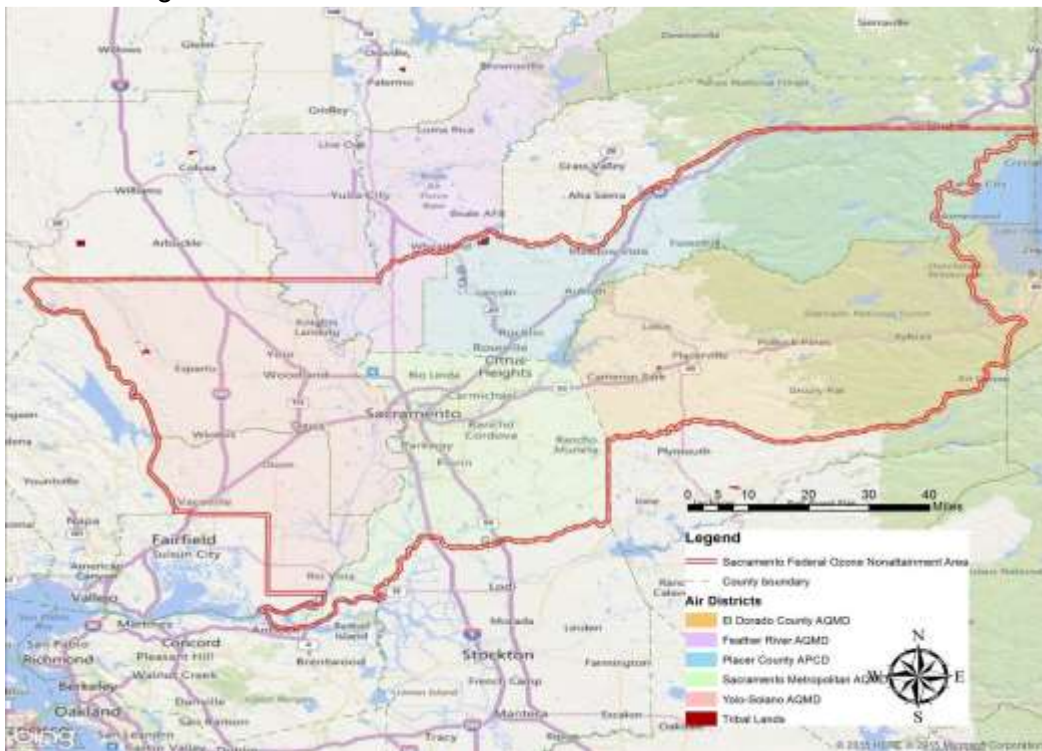
One pollutant for which US EPA issues NAAQS is ground level ozone. It is formed through chemical reactions between oxides of nitrogen and reactive organic gases in the presence of sunlight. Ozone can cause health impacts on humans, including difficulty breathing, shortness of breath, damage to lung tissue and airways, and increase the risk of cardiovascular problems such as heart attacks. It can also damage vegetation.

The US EPA set the ozone NAAQS at 70 parts per billion (ppb) in 2015. The designations for the standard were finalized on November 2017. The southern portion of Sutter County was included in the Sacramento Federal Nonattainment Area (SFNA) and classified as a “moderate” nonattainment area with an attainment date no later than August 2024. The SFNA air districts submitted a request to bump up to a “serious” classification with an attainment date no later than August 2027.

The SFNA air districts were required to submit a Reasonably Available Control Technology analysis and emissions inventory to US EPA within two years of designations (August 2020), a New Source Review rule (or a certification that the current NSR rule meets the requirements of the CAA) within three years of designations (August 2021) and the remaining Clean Air Act requirements by August 3, 2022.

The SFNA includes all of Sacramento and Yolo Counties, and portions of Sutter, Placer, El Dorado, and Solano counties, as shown in Figure 1. The 2015 ozone nonattainment area boundary of the SFNA remains the same as it was for the previous three ozone standards (finalized in 1979, 1997, and 2008).

Figure 1: Sacramento Federal Nonattainment Area for Ozone



The District submitted the RACT analysis to the US EPA in the summer of 2020. The District worked with CARB on their development of a statewide emission inventory that was submitted to US EPA in the summer of 2020.

The District Board of Directors adopted a certification of the District’s NSR rules to satisfy the CAA requirements in June 2021 and submitted it to the US EPA.

The remaining SIP elements for the 2015 Ozone NAAQS are due in 2022. The SIP elements include an Attainment Plan with modeling demonstrating the area will meet its attainment date, a Reasonable Further Progress Plan, an analysis of Reasonably Available Control Measures and whether adoption of such measures would advance attainment by one year or more, and other elements. This will be a coordinated effort by the SFNA air districts, in consultation with Sacramento Area Council of Governments (SACOG) and the California Air Resources Board (CARB). Each air district will hold a separate public hearing prior to adoption by their respective Board of Directors. After the SFNA air districts adopt and CARB approve the Plan it will be submitted to the US EPA as a revision to the California State Implementation Plan.

Fine Particulate Matter (PM2.5) NAAQS

The Yuba City-Marysville Area was designated as nonattainment for the 2006 24-hour PM2.5 NAAQS in 2009. The area met the standard and the Board of Directors adopted a Redesignation Request and Maintenance Plan in April 2013. US EPA approved the redesignation to attainment effective January 8, 2015. As part of our redesignation to attainment, the area must submit a second maintenance plan 8 years after the approval of the first plan and redesignation.

The Yuba City-Marysville PM2.5 nonattainment area includes all of Sutter County and most of Yuba County, as shown in figure 2.

Figure 2: Yuba City-Marysville Nonattainment Area for PM2.5



The second maintenance plan for the 2006 24-hour PM2.5 NAAQS is due in 2022. The maintenance plan will require an exceptional event demonstration as wildfire smoke caused exceedances of the PM2.5 NAAQS in 2021 and 2019. The District staff will work and consult with CARB, SACOG, and other affected agencies and partners to develop the plan. The District staff expect to bring this item to the Board for consideration in October. After adoption by the Board, the second maintenance plan will be submitted to the US EPA as a revision to the SIP.

**FISCAL IMPACT:**

The District’s staff time preparing the Plan was included in the current fiscal year’s budget.