Improve Air Quality by Implementing Pollution Control Measures to Reduce the Number of Nonattainment Areas

Goal Leader: Elizabeth Shaw, Deputy Assistant Administrator
Deputy Goal Leader: Peter Tsirigotis, Director, Office of Air Quality Planning and Standards
Office of Air and Radiation

Theme: National Resources and Environment
Overview

Goal Statement
- **Improve air quality by implementing pollution control measures to reduce the number of nonattainment areas.** By September 30, 2019, EPA, in close collaboration with states, will reduce the number of nonattainment areas to 138 from a baseline of 166.

Challenge
- EPA’s authority to approve a state’s request to redesignate nonattainment areas hinges on the state meeting the minimum requirements of the Clean Air Act, which include:
  - A demonstration that the area has air quality that is attaining the National Ambient Air Quality Standards (NAAQS);
  - Establishing that pollution reductions are due to implementing permanent and enforceable measures;
  - A 10-year maintenance plan that includes contingency measures to be triggered in the event of a re-violation of the NAAQS; and,
  - Satisfying any other applicable and outstanding attainment planning and emissions control requirements.

Opportunity
- A number of nonattainment areas have attained a NAAQS or are close to attaining a NAAQS, which is a key step toward redesignation.
Leadership

Goal Leader:
Elizabeth Shaw
Deputy Assistant Administrator

Deputy Goal Leader:
Peter Tsirigotis, Director
Office of Air Quality Planning and Standards
Goal Structure & Strategies

- **Strategy 1:** EPA will work with air agencies to facilitate submittal of timely and approvable attainment plans (as a means of bringing areas into attainment) and redesignation requests, as appropriate.
  - Develop and provide data, analysis, and technical tools and assistance to industries, states, communities, and tribes to meet CAA obligations and other statutory requirements.
  - Focus on ways to improve the efficiency and effectiveness of the State Implementation Plan/Tribal Implementation Plan (SIP/TIP) process, including the Agency’s own review process, with a goal of maximizing timely processing of state/tribal-requested implementation plan actions.
  - Continue tracking air quality improvements through the collection of monitoring data.

- **Strategy 2:** Through collaboration with state, local and tribal air agencies, EPA will take actions to improve air quality in nonattainment areas so these areas can expeditiously attain the NAAQS. EPA will:
  - Operate effective nationwide and multi-state emissions control programs, including:
    - The acid rain program and the cross-state air pollution rule, which address global, national, and regional air pollutants from the power sector and other large stationary sources;
    - National mobile source emissions standards, which address emissions from highway and off-road vehicles, small engines, locomotives, and marine vessels; and
    - New source performance standards and preconstruction permit review program, which ensure the best demonstrated emission control technologies are installed as industrial infrastructure is modernized.
  - Fulfill its NAAQS implementation oversight role using tools available under the CAA to hold states accountable for fulfilling attainment planning responsibilities. Example actions include:
    - Taking action on state implementation plans (SIPs);
    - Determining whether an area has attained a NAAQS by the required attainment date;
    - Making findings of failure to submit required SIPs and imposing related CAA sanctions;
    - Reclassifying areas to a higher classification upon failure to attain by the required attainment date and establishing new state plan submission deadlines; and
    - Developing Federal Implementation Plans when states fail to submit complete SIPs, or TIPs in the case of tribes.
Goal Structure & Strategies, continued

• External factors
  o Under the CAA, states are responsible for initiating the redesignation process, a process that demands time and resources from states which may be limited for such purposes.
  o The CAA does not require states to request redesignation, and in some cases states may determine that undertaking the optional process is not a priority.
  o Proposed mitigation action: Regular communication between EPA regional offices and state air agencies to discuss prioritizing redesignation requests and identifying solutions to challenges/disincentives that may create barriers for states to request redesignation.

EPA Lean Management System (ELMS)

EPA will be using the deployment of a new EPA Lean Management System (ELMS) to achieve the results set forth in the Strategic Plan. As part of ELMS, EPA will be conducting multi-day process improvement events to make significant progress in those priority areas identified in the Strategic Plan, including this one. Visual management will then be used to ensure that improvements from the events are achieved and sustained over time. Poster boards with regularly updated performance data will serve as visual management for monitoring progress towards meeting the targets set forth in the Strategic Plan, while additional poster boards will be used to track the flow of the work that needs to be performed to achieve the targets. Managers and staff will have weekly stand-up huddle meetings in front of their visual management boards to discuss the performance and flow of the process. In addition, National Programs and Regional Offices will hold monthly business reviews to go over both the strategic measures tracked on scorecards, and the implementation plans that track progress on Strategic Plan and priority area projects identified for EPA under President Trump’s Executive Order on a Comprehensive Plan for Reorganizing the Executive Branch. The Administrator will hold quarterly reviews to monitor overall progress on the agency’s Strategic Plan and priority area projects. ELMS is designed to make sure that EPA is regularly monitoring progress towards meeting the targets set forth in the Strategic Plan, and taking immediate action if expected performance is off track.
Summary of Progress – FY 18 Q1

• During the first quarter of FY 2018 as expected, no existing nonattainment areas have been redesignated to attainment. The overall goal is on track.

• Specific Q1 activities included:
  • EPA Regional offices held calls/meetings with their respective state air agencies and discussed planning and redesignation priorities.
  • EPA issued memorandum on “Supplemental Information on the Interstate Transport State Implementation Plan Submission for the 2008 Ozone National Ambient Air Quality Standards under Clean Air Act Section 110(a)(2)(D)(i)(i).”
  • EPA issued Findings of Failure to Submit for 2008 ozone NAAQS nonattainment areas with overdue SIP elements (82 FR 58118; December 11, 2017).
  • EPA continued to operate nationwide and multi-state programs, the acid rain program and the cross-state air pollution rule; national mobile source emissions standards; new source performance standards; and preconstruction permit review program.
### Key Milestones

- **Strategy 1:** EPA will work with air agencies to facilitate submittal of timely and approvable attainment plans (as a means of bringing areas into attainment) and redesignation requests, as appropriate.

<table>
<thead>
<tr>
<th>Key Milestone</th>
<th>Milestone Due Date</th>
<th>Milestone Status</th>
<th>Change from last quarter</th>
<th>Owner</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Regional offices hold calls/meetings with their respective state air agencies and discuss planning and redesignation priorities.</td>
<td>Quarterly</td>
<td>Met</td>
<td>N/A</td>
<td>OAR/OAQPS</td>
<td>Regional offices met or exceeded the milestone for Q1 FY18.</td>
</tr>
<tr>
<td>Improve the efficiency and effectiveness of the SIP/TIP process, including the Agency’s own review process, with a goal of maximizing timely processing of state/tribal-requested implementation plan actions.</td>
<td>Q4 FY18</td>
<td>On-going</td>
<td>N/A</td>
<td>OAR/OAQPS</td>
<td></td>
</tr>
<tr>
<td>Continue to track air quality improvements through collection, analysis, and reporting of monitoring data.</td>
<td>Annual</td>
<td>On-going</td>
<td>N/A</td>
<td>OAR/OAQPS</td>
<td></td>
</tr>
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**Key Milestones**

- **Strategy 2:** Through collaboration with state, local and tribal air agencies, EPA will take actions to improve air quality in nonattainment areas so these areas can expeditiously attain the NAAQS.

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<td>Operate nationwide and multi-state programs, the acid rain program and the cross-state air pollution rule; national mobile source emissions standards; new source performance standards; and preconstruction permit review program.</td>
<td>Quarterly</td>
<td>Met</td>
<td>N/A</td>
<td>OAR/OAQPS</td>
<td>N/A</td>
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<td>Take appropriate oversight actions required by the Clean Air Act (as necessary).</td>
<td>Quarterly</td>
<td>Met</td>
<td>N/A</td>
<td>OAR/OAQPS</td>
<td>EPA issued Findings of Failure to Submit for several 2008 ozone NAAQS nonattainment areas with overdue SIP elements (82 FR 58118; December 11, 2017).</td>
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Key Indicators

1. Number of nonattainment areas, number of nonattainment areas with clean air data,* and number of nonattainment areas with state-submitted redesignation requests.
   
   
   * Clean Air Data is a key step to redesignation to attainment and occurs when the area’s air quality attains the federal standard.

2. Population living in areas designated nonattainment, and population living in nonattainment areas with attaining air quality (1,000s).
   
   Timing: Annual, from October 1, 2017 to present, reported in June of each year. Line graph.

3. Percent of measured air quality improvement in counties not meeting the NAAQS from the 2016 baseline.
   
   Timing: Annual, from January 2017 to present, reported in June of each year. Bar graph.

4. Cumulative percent reduction in number of days with Air Quality Index (AQI) values over 100.
   
   Timing: Annual, from January 2017 to present, reported in June of each year. Bar graph.
Data Accuracy and Reliability

Measurement and Baseline:

- The nonattainment area metric will track the status of the baseline of 166 areas designated nonattainment for non-revoked NAAQS at the end of FY 2017 (9/30/2017). New areas designated nonattainment after 10/1/2017 will not be added to the baseline. The other air quality indicators will rely on data from EPA’s Air Quality System and other information.

Data Sources:

- The EPA Green Book, a public accessible website - [https://www.epa.gov/green-book](https://www.epa.gov/green-book)
- Federal Register notices documenting EPA final action on state redesignation requests.
- Indicator data sources will be noted on charts.

Methodology:

- EPA’s monthly Green Book publication includes a summary of nonattainment areas, taking into account all final redesignation actions published in the Federal Register.
- Prior to publishing a new monthly Green Book report, an EPA contractor runs a quality assurance check.
Contributing Programs

Organizations:
- Office of Air and Radiation (OAR)
  - Office of Air Quality Planning and Standards (OAQPS)
  - Office of Transportation and Air Quality (OTAQ)
  - Office of Atmospheric Programs (OAP)
- Regional offices
- State, local, and tribal air agencies (S/L/T)

Program Activities:
- S/L/T develop State/Tribal Implementation Plans
- EPA develops regulations and guidance, as necessary, to facilitate S/L/T implementation
- EPA provides technical assistance and tools, as necessary, to facilitate S/L/T implementation

Regulations:
- EPA regulations addressing NAAQS and NAAQS implementation include 40 CFR Parts 49 thru 99
- Air quality management and emissions limiting regulations established by other federal and state agencies, as applicable

Policies:
- EPA and S/L/T policies related to NAAQS implementation

Other Federal Activities:
- Transportation conformity – DOT/FHWA
- Fire management – USDA (U.S. Forest Service), DOI (Park Service)
- International pollution management treaties – Department of State
**Stakeholder / Congressional Consultations**

The nonattainment redesignation process is a federal and state partnership. EPA works with states and tribes to establish priorities including redesignations.