

# Presentation to the National Association of Clean Air Agencies

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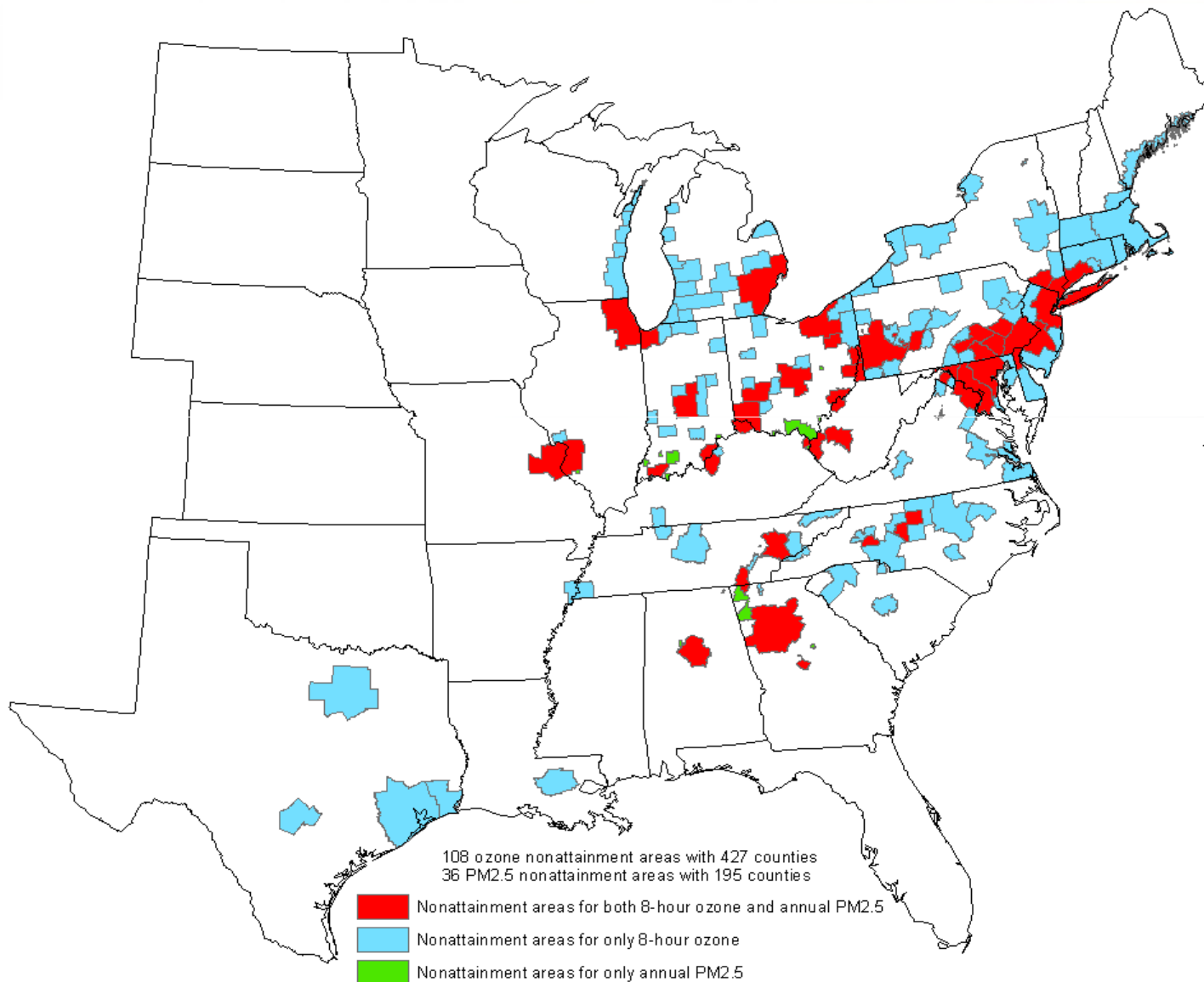


# Overview



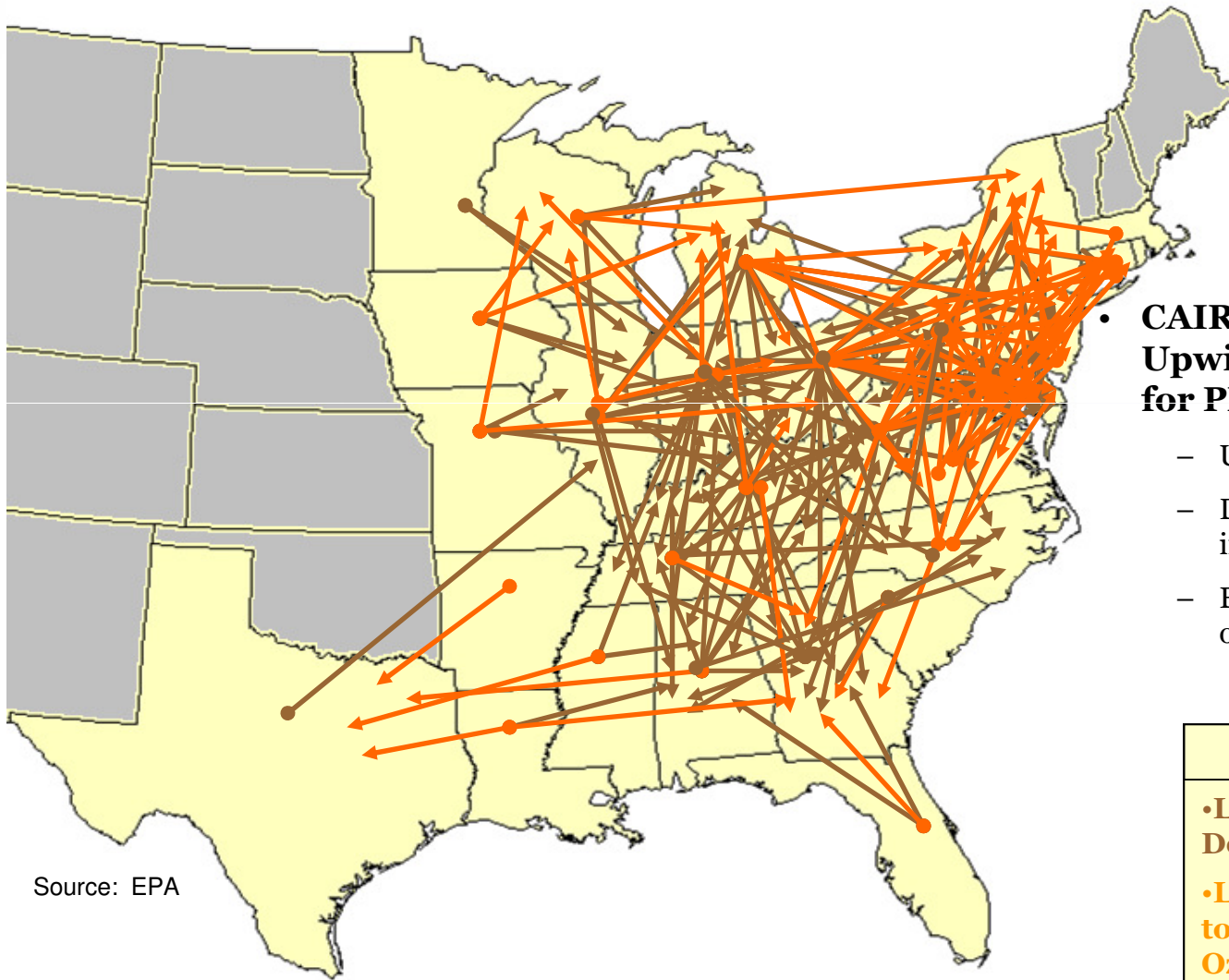
- Transport Rule (CAIR Replacement)
- GHG Reporting Rule
- GHG Endangerment Findings
- Carbon Capture & Storage Task Force
- Congressional Developments

# Pollutant Transport Is A Key Factor In Eastern Air Quality



**Nonattainment  
Areas for Ozone  
and PM2.5**

# Interstate Transport Is Challenging to Address



Source: EPA

- **CAIR Region 2010 Major Upwind-to-Downwind Linkages for PM<sub>2.5</sub> and Ozone**

- Upwind/downwind issues are not neat
- Demonstrations need to show individual source contributions
- Emissions and meteorology change over time

Key to Arrows
•Linkage of Upwind to Downwind for PM <sub>2.5</sub>
•Linkage of Upwind to Downwind for Ozone

# Court Decisions on CAIR Cast Uncertainty Over Needed Reductions



- In July 2008, the DC Circuit Court “vacated” CAIR. In December 2008, the Court modified it’s decision and “remanded” the rules back to EPA for revision
  - Rules are in effect, while EPA promulgates new rules, addressing the courts concerns
  - In EPA’s request for a remand, the Agency stated that it expected to provide replaced rule in about 2 years.
- The Court found EPA had not:
  - Adequately quantified and addressed each upwind state’s significant contribution.
  - Given independent meaning to interfere with maintenance prong of 110(a)(2)(D)
  - Provided adequate assurance that necessary reduction would occur within each state
  - Properly established state emission budgets for NO<sub>x</sub> and SO<sub>2</sub>
  - Properly addressed the timing of the second phase
  - Shown that it had authority to use Title IV SO<sub>2</sub> allowances in the program
  - Adequately justified inclusion of Minnesota for PM

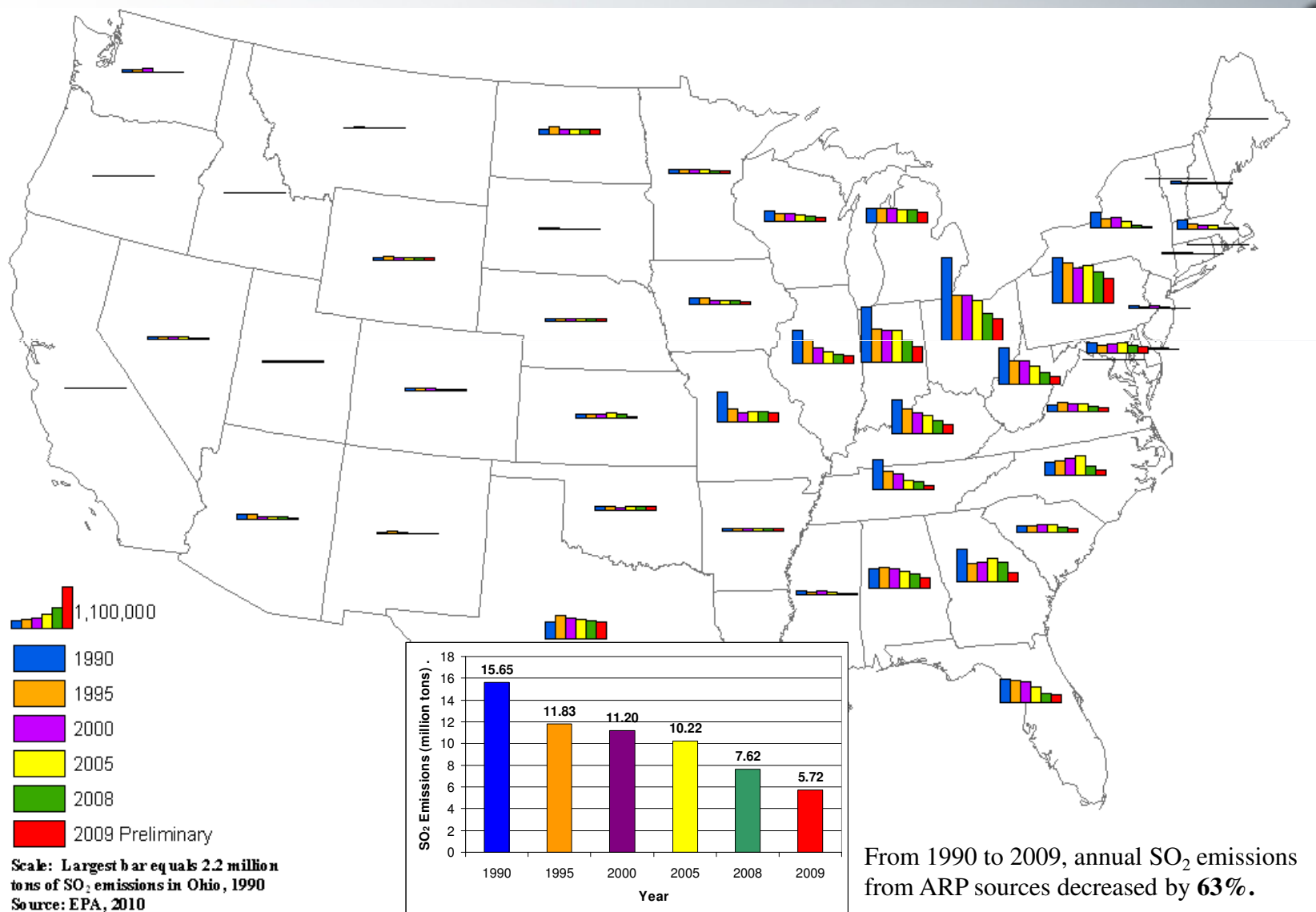
# Status of Regional Reduction Efforts



- CAIR currently remains in place – Regional control programs are operating while EPA develops transport rule to replace CAIR
- EPA is developing a replacement rule
  - Rule is currently at OMB; Expect publication in June
  - Plan to finalize rule by Spring 2011
  - Goals are to achieve significant emissions reductions as soon as practicable and provide a legally defensible approach for assisting in achieving current as well as new NAAQS

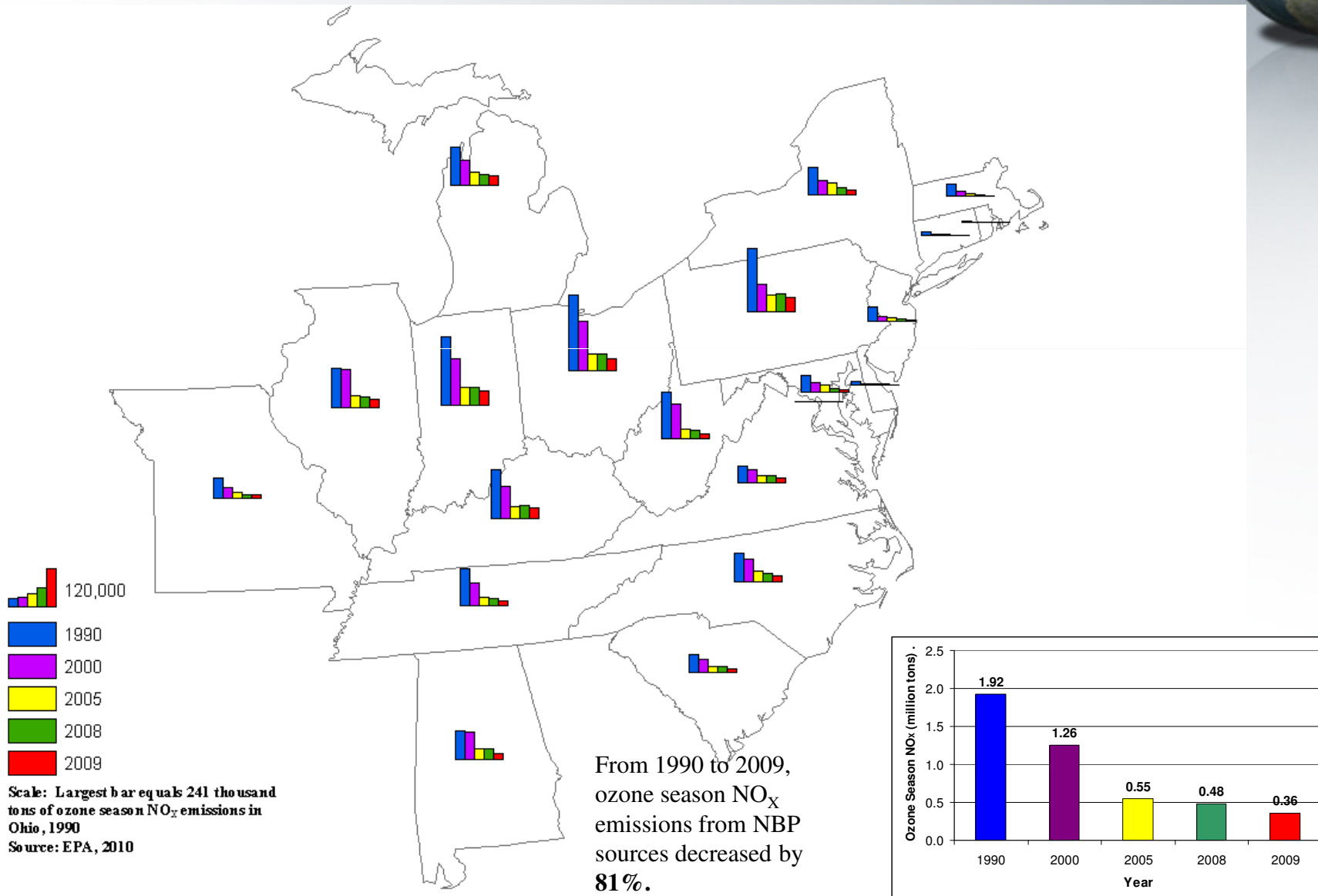


# State-by-State Annual SO<sub>2</sub> Emission Levels for Acid Rain Program Sources, 1990-2009



From 1990 to 2009, annual SO<sub>2</sub> emissions from ARP sources decreased by **63%**.

# State-by-State Ozone Season NO<sub>x</sub> Emission Levels for NO<sub>x</sub> Budget Trading Program Sources, 1990-2009





# The GHG Reporting Program



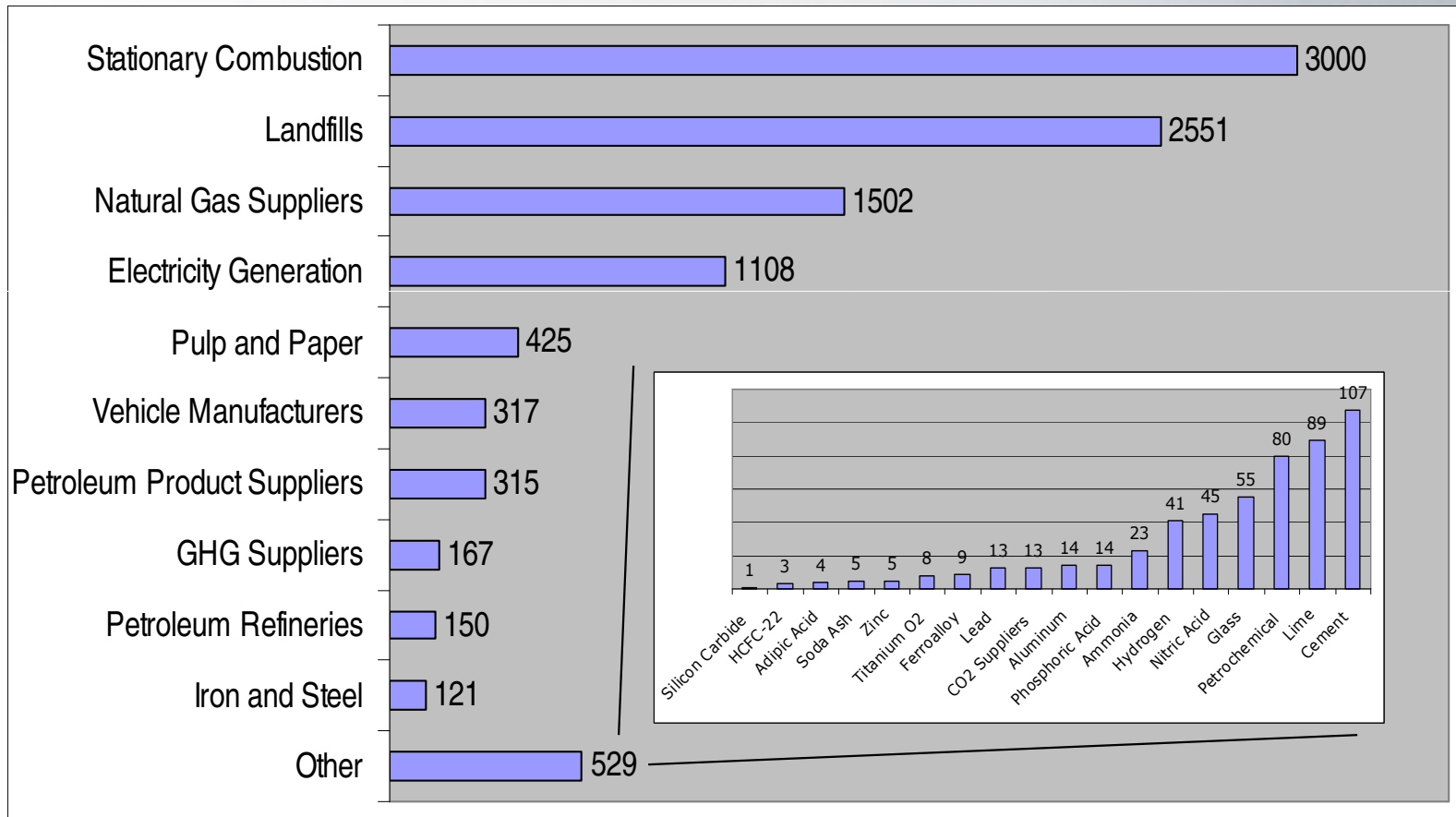
- Final rule published in Federal Register in October 2009
- ~10,000 facilities should be monitoring emissions starting Jan 1, 2010
- First GHG Rule promulgated by the Obama (or any other) Administration

# Key Elements of the Program



- Annual reporting of GHG by:
  - 25 source categories
  - 5 types of suppliers of fuel and industrial GHG
  - Motor vehicle and engine suppliers (except light duty sector)
- 25,000 metric tons or more CO<sub>2</sub>e per year reporting threshold for most sources; capacity-based thresholds where feasible
- Direct reporting to EPA electronically
- EPA verification of emissions data
- Covers 85% of U.S. emissions
- Facilities began collecting data January 2010

# About 10,000 U.S. Facilities Currently in the Program



# Implementation



- Extensive outreach and training for reporters
- Hotline to answer questions: > 2,000 responses
- Coming soon:
  - Query system for FAQs
  - On-line training
  - Plain Language Guide to the Rule

# Building the Data System



- Electronic reporting direct to EPA
- ~1200 data elements reported: total emissions and supporting data used in calculations and for verification
- Close coordination with states through ECOS and one-on-one interaction
- Schedule
  - Reports due March 31, 2011
  - Data available soon thereafter

# Data Publication



- EPA will publish all data that is not CBI
- To establish CBI: we are close to publishing a “notice and comment” to determine which data requires protection
- Substantial interest in data publication by NGOs, states, within EPA, other agencies
- Initiating process to solicit input and ideas for most useful reports and looking for good examples of data dissemination models



# New Coverage in 2010

- EPA is completing several source categories not finalized in October 2009
  - Goal is to have data collection start in 2011
- Currently out for comment:
  - Corporate Parent/NAICS codes
  - Oil & Natural Gas Systems
  - CO<sub>2</sub> Injection and Geologic Sequestration
  - Additional Sources of F Gases
- Sources to be finalized (now at OMB):
  - Magnesium production, methane from underground coal mines, industrial landfills, and wastewater treatment



# Additional Information



- [www.epa.gov/climatechange/emissions/ghgrulemaking.html](http://www.epa.gov/climatechange/emissions/ghgrulemaking.html)
  - Preamble and rule
  - Technical background documents on source categories
  - Comment response documents
  - Link to rulemaking docket
  - Technical assistance materials
  - Training sessions
  - FAQs
  - Contact Us button
  - Final rule vs. Proposed rule

# Endangerment: Background



- April 2, 2007– In *Massachusetts v. EPA*, the Supreme Court found that greenhouse gases are air pollutants covered by the Clean Air Act
- EPA was required to determine whether:
  - GHG emissions from new motor vehicles cause or contribute to air pollution;
  - This air pollution may reasonably be anticipated to endanger public health or welfare
  - Court gave us three options on endangerment: Yes, No, or the science is too uncertain to make a reasoned decision
- Endangerment finding is a prerequisite for using section 202 of the Clean Air Act to regulate GHGs

# Endangerment Findings



- December 7, 2009 – Administrator issued two distinct findings regarding greenhouse gases under section 202(a) of the Clean Air Act
  - **Endangerment Finding:** Current and projected concentrations of the mix of six key greenhouse in the atmosphere threaten the public health and welfare
  - **Cause or Contribute Finding:** Combined emissions of CO<sub>2</sub>, CH<sub>4</sub>, N<sub>2</sub>O, and HFCs from new motor vehicles and motor vehicle engines contribute to the atmospheric concentrations of these key greenhouse gases and hence to the threat of climate change

# The Public Health and Public Welfare Elements of the Endangerment Finding



- **Public health**

“The Administrator has considered how elevated concentrations of the well-mixed greenhouse gases and associated climate change affect public health by evaluating the risks associated with changes in air quality, increases in temperatures, changes in extreme weather events, increases in food- and water-borne pathogens, and changes in aeroallergens.”

“Finally, the Administrator places weight on the fact that certain groups, including children, the elderly, and the poor, are most vulnerable to these climate-related health effects.”

- **Public Welfare**

“The Administrator has considered how elevated concentrations of the well-mixed greenhouse gases and associated climate change affect public welfare by evaluating numerous and far-ranging risks to food production and agriculture, forestry, water resources, sea level rise and coastal areas, energy, infrastructure, and settlements, and ecosystems and wildlife.”

# Endangerment Petitions



- EPA has received 10 administrative petitions for reconsideration of the Endangerment Findings
- Petitions are currently in review
- General information and FAQs available on website at:  
<http://epa.gov/climatechange/endangerment.html>

# Status of Climate Science



- Recent events have created lots of confusion
- As part of development of final finding, we did a comprehensive review of the science
  - 380,000 public comments; 11,000 significant
  - Many raised issues with the science and provided literature
  - Response to comments document addresses all comments thoroughly
- There are very few issues that were not addressed in developing the Final Findings
- Preliminary review of the issues raised by petitioners indicates that the Administrator's foundation remains strong

# CCS Task Force Overview



- On February 3, 2010, the President established an interagency Carbon Capture and Storage (CCS) Task Force, co-chaired by EPA and DOE.
- The Task Force is developing a plan to overcome the barriers to the widespread, cost-effective deployment of CCS.
- Scope includes exploring incentives for commercial CCS adoption and addressing any financial, economic, technological, legal, institutional, social, or other barriers to deployment



# Process



- Six interagency workgroups (+2 supporting groups):
  - Carbon dioxide capture
  - Carbon dioxide storage
  - Carbon dioxide transportation
  - Regulatory and legal
  - CCS deployment drivers and incentives
  - CCS role in Administration's energy and climate change policy and global initiatives
  - Public outreach
  - Federal lands
- Stakeholder meeting held May 6 in Washington DC
- Final report is due in July

# Ongoing Congressional Activity



- House passed American Clean Energy and Security Act of 2009
- Kerry, Graham, and Lieberman proposal
  - EPA is conducting economic analysis
- Continuing to track actions on Clean Air Act and endangerment