

APF Priorities

Sarah Sowell Acting Border 2012 Air Policy Forum Co-Chair (U.S.) EPA Office of Air and Radiation

Environmental Health Workgroup Meeting March 16-17, 2006 Brownsville, TX

The Charge: B2012 Goal 2

Objective 1: By 2012 or sooner, reduce air emissions as much as possible toward attainment of respective national ambient air quality standards, and reduce exposure in the border region . . .

- Interim Objective 1: . . . define baseline and alternative scenarios for emissions reductions along the border, and their impacts on air quality and human exposure.
- Interim Objective 2: . . . define specific emission reductions strategies and air quality and exposure objectives to be achieved by 2012.

Identifying Air Quality Related Priorities for the Border Region

- Process to identify border air quality related priorities began in October 2004 with first APF meeting in Tijuana and continued with second APF meeting in April 2005 in Tucson.
- Over 80 border air quality and health stakeholders worked together to generate and refine a list of broad recommendations (scenarios) based on 4 guiding principles:
 - Relevance to B2012 air quality objectives, including understanding of the impact or risk to environmental health and ability to minimize that risk
 - Relative investment
 - Leveraging potential
 - Achievability

Initial Outcomes: Priority Categories and Thematic Areas for APF Consideration

	Program Management Tools	Clean Efficient Transport	Clean, Efficient Energy Transmission, Generation, & Use	Controlled Area Source Emissions
Training & Cap. Bldg.				
Policies & Strategies				
Comm. & Outreach				

APF Prioritization Process cont.

- Recommendations were sent to APF participants for comment in mid-April 2005.
- Comments were synthesized and further refined by APF co-chairs.
- APF co-chairs convened an *ad hoc* subgroup in November 2005 to identify and prioritize specific actions needed to progress in each of the (following) four main areas:

4 AQ-Related Priority Needs / Issues

- The need for improved information exchange and outreach to address the lack of real-time, high quality air quality monitoring and health surveillance data availability and compatibility.
- The need to support a cross-border approach to addressing air quality management in the various transboundary airsheds throughout the US-Mexico border region.
- The need to reduce particulate matter (PM) emissions through:
 - (a) Reducing emissions from diesel sources
 - (b) Increasing the availability of ultra low sulfur diesel in the border region

4 AQ-Related Priority Needs / Issues cont.

- The request for workshops/training sessions to build capacity related to:
 - emission inventories
 - inspection and maintenance programs
 - financial and market-based mechanisms:
 - revolving funds
 - clean air investment fund (CAIF)
 - Ieveraging NADBank projects and funds
 - supplemental environmental projects (SEPs)
 - emissions trading
 - best management practices regarding:
 - energy efficiency and conservation
 - agricultural practices, including open burning
 - other open burning
 - road dust

Progress to Address Priority Areas

- Workshop to explore ways to reduce truck idling at border crossings held in November 2005
- □ Two of the four priority areas were explored by the APF *ad hoc* subgroup in November 2005.
- The ad hoc subgroup also discussed (a) Binational Air Quality Management in the Border Region and (b) Transportation and Air Quality in the Border Region during a joint session with the Clean Air Act Advisory Committee (CAAAC; the senior-level policy committee that advises EPA on issues related to implementing the 1990 CAA Amendments).
- Additionally, several topics identified as part of the training capacity building priority area were discussed with the CAAAC Innovations Subcommittee.

Next Steps

- □ Results/recommendations to date from the *ad hoc* sub group discussions will be presented at the 2006 NCM.
- The APF co-chairs seek additional input on these two areas as well as on the two remaining areas that have not yet been fully examined.
 - The need for improved information exchange and outreach to address the lack of real-time, high quality air quality monitoring and health surveillance data availability and compatibility.
 - Goal is twofold: (a) to enhance the set of recommendations (i.e., derive implementation-level priorities for the aforementioned areas); and (b) to continue to seek opportunities to advance progress in all four areas.

National AQ Priorities Applicable to the Border Region

- Improve air quality and meet national ambient air quality standards (NAAQS) through regulatory, market-based, and voluntary approaches:
 - Develop emission inventories
 - Operate and maintain air monitoring networks
 - Perform air quality modeling
 - Assist states in development of SIPs that lay out control strategies

National AQ Priorities Applicable to the Border Region

- Reduce emissions from mobile sources (NOx, PM, VOCs, and CO)
- Reduce emissions from stationary sources (SO₂, NOx, and mercury)
- Work with state, tribal, bilateral, and multilateral partners to promote capacity building and tech transfer and address sources of internationally transported air pollution
- Reduce air toxics emissions
 - Characterizing emissions and the risks they pose

National AQ Priorities Applicable to the Border Region

□ Enhance Science and Research Efforts

- Emphasis is on improving emissions estimates, modeling capability, transport, exposure information, and health effects data to support periodic revision and implementation of NAAQS and to understand and characterize environmental outcomes associated with air pollution
- Focus of air toxics research is on developing and improving air quality models and source receptor tools, evaluating risks, characterizing outcomes associated with those risks, and evaluating methods for reducing risks (i.e., pollution prevention options)

Specific Border Region Applications

Support PM and Ozone monitoring in the border region and the development of robust, up-to-date emissions inventories

□ Increase understanding of daily air quality and associated health effects

- Quantify health effects RE: changes in emissions and air quality
- Enhance availability of real-time air quality information (linkages to AirNOW)

Support diesel particulate reduction efforts in the border region

□ Catalyze incentive based emission reduction efforts in the border region

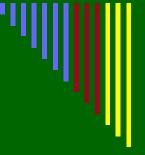
Measuring Program Success

- At the national level, priorities are set based on health and environmental risks.
- Reduction of health effects is the desired outcome.
- Currently, performance measures focus on estimated risk not on health effects.
 - PM and Ozone
 - Percent reduction in population-weighted ambient concentrations
 - Cumulative percent reduction in the number of days with AQI values over 100
 - Air Toxics
 - Percent reduction in toxicity-weighted cancer risk emissions
 - Percent change in toxicity-weighted non-cancer risk

Opportunities for APF / EHWG Linkages

- Need to link emission reduction efforts exposure reduction — health impacts. How can we do this? <u>Example</u>
 - Collecting more health surveillance data and connecting public health effects (surveillance) to infrastructure projects (road paving, speeding of traffic through border crossings)

Information consultation and dissemination RE: air pollution and health effects (important groups to inform/consult, e.g., health care providers and meteorologists)



Sarah N. Sowell Senior Advisor on North American Air Quality

sowell.sarah@epa.gov Tel: 202-564-0145 Fax: 202-564-7739

U.S. Environmental Protection Agency /OAR Ariel Rios Building 1200 Pennsylvania Avenue MC 6101-A Washington, DC 20460