AGENDA
AIR QUALITY ADVISORY COMMITTEE*
TUESDAY March 25, 2014
10:00 a.m. - 12:00 noon
East-West Gateway Board Room

I. Call to Order
   -Michael Coulson, Chair, East-West Gateway Council of Governments
   A. Minutes of January 28, 2014 Meeting

II. CMT Transit Oriented Development (TOD) Efforts
    - Kim Cella, Citizens for Modern Transit

III. TravelGreen Program
     - Meredith Klekotka, Trailnet

IV. Update on Lake Michigan Air Directors Consortium (LADCO) Activities
    - Rob Kaleel, Lake Michigan Air Directors Consortium

V. American Fuel Group Report
   - St. Louis Regional Clean Cities Program

VI. Update Activities of the States
    - Missouri Department of Natural Resources
    - Illinois Environmental Protection Agency

VII. Other Business - Next Meeting Date April 29, 2014

VIII. Adjournment

*Please note that this meeting will serve as a part of the Inter-Agency Consultation Process as detailed in the Missouri Transportation Conformity SIP.
MINUTES
AIR QUALITY ADVISORY COMMITTEE
Tuesday, January 28, 2014
East-West Gateway Board Room

Members Present:
Michael Coulson, Chair, East-West Gateway Council of Governments
Joe Winkelmann - Missouri Department of Natural Resources
Mike Henderson - Missouri Department of Transportation
Jeremy Rogus - St. Louis County Health Department
David Bloomberg - Illinois Environmental Protection Agency
Brad McMahon - Federal Highway Administration, MO
Joe Gray - Illinois Department of Transportation, District 8
Christopher Schmidt - Illinois Department of Transportation
Susannah Fuchs - American Lung Association (telephone)

Others Present:
Lachala Kemp - U.S. Environmental Protection Agency Region 7 (telephone)
Bob Randolph - Missouri Department of Natural Resources
Kevin Herdler - St. Louis Regional Clean Cities
Meredith Klekota - Trailnet
Angie Hoecker - Missouri Department of Transportation
Andy Knott - Sierra Club
John Hickey - Sierra Club
Joe Right - RideFinders
Joe Wilson - Citizen

Staff:
David Wilson Carol Lawrence Johnnie Smith

I. Call to Order
   - Michael Coulson, Chair, East-West Gateway Council of Governments

The meeting of the Air Quality Advisory Committee (AQAC) was called to order by Chair Michael Coulson, East-West Gateway Council of Governments (EWG). The minutes of the October 29, 2013 AQAC meeting were approved as circulated. Mr. Coulson announced that Mr. Kaleel was not able to attend the meeting and has been rescheduled for the March 25 AQAC meeting.

II. OneSTL Next Steps
   - David Wilson, East-West Gateway Council of Governments

In 2010, EWG received funding from the U.S. Department of Housing and Urban Development (HUD) through the Partnership for Liveable Communities program to prepare a regional plan for sustainable development. The Partnership is made up of HUD, U.S. Environmental Protection
Agency (USEPA) and U.S. Department of Transportation (DOT). There were also ten local partners involved. The regional plan, now called OneSTL, took two and one half years to complete. By the time plan goals, objectives and strategies identified, more than 50 organizations and agencies had input into the plan. The EWG Board of Directors approved OneSTL in December 2013.

A OneSTL implementation steering committee will be put together over the next few months. It is to be a broad-based, representative committee that can help in planning programs, identifying projects and helping the partners to move forward with implementation over the next few years. Have begun to schedule speaking opportunities with organizations and local governments to introduce the plan and invite them to get involved. Joining the OneSTL Network is one way. The Network allows anybody (Public agency/organization, business, community group or a resident) interested in sustainability to have access to information. Hope to create a dynamic interchange in which people will use the OneSTL website’s comment form to share information on what is going on in their community and learn of data and activities. OneSTL has been asked to co-sponsor or help organize several workshops and conferences this year.

OneSTL is not solely dependent on EWG for implementation. The notion is that no one agency can make this region sustainable and no one local government can. The only way regional plan can be implemented is with many people getting involved, identifying their issues and working on them. Many agencies have a piece of plan and as long as each does their piece, region will move forward. Hope to see the number involved grow.

EWG staff have been refining the OneSTL website (www.OneSTL.org). OneSTL is designed to be a web-based plan. Website is to serve as a consolidated clearinghouse for information. On the website can access each section of the OneSTL document or download the entire document as a pdf. The plan has been structured around nine themes for the future of the St. Louis region. These themes grew out of an extensive community engagement effort to learn the public’s and local governments’ attitudes and concerns. The themes include: collaborative; prosperous; distinctive; inclusive; green; prepared; connected; efficient; and educated. Each theme has several goals associated with it and each goal has at least one objective. For each objective, several strategies were identified and implementing agencies were delineated. Also online is a sustainable solutions toolkit containing information on 100 different sustainability-related topics. The About Us section contains information on the OneSTL partners and associated links. As organizations joins the OneSTL Network information about them will be added.

A key element of OneSTL is how to measure movement toward sustainability at a regional scale. EWG’s Research Department has investigated what indicators can be tracked using existing sources of information. Each theme have six to ten metrics. EWG Research Department will be responsible for tracking and preparing regional snapshots to see if the region is moving in the right direction or not or there is no change. Metrics are to be part of the website and can change over time. The theory is that if we track and report on these metrics, that is going to call attention to these issues and raise level of awareness. Awareness will spur more action toward improved practices.

The Resources section on the website contains over 75 reports, research documents and studies
prepared by the partners over the last three years. For example, St. Louis County developed draft ordinances and codes and prepared a code assessment how-to manual. A consultant hired by Metro, EWG and Great Rivers Greenway evaluated the general economic development potential for all MetroLink stations and performed an in-depth Transit Oriented Development analysis for a representative sample of stations which can serve as a framework for future planning.

III. St. Louis Area Ozone SIP Update: 1997 NAAQS Maintenance Plan and 2008 NAAQS Implementation Rule
- Joe Winkelmann, Missouri Department of Natural Resources

The Missouri Department of Natural Resources (MoDNR) is moving forward with their Maintenance Plan and redesignation request for the 1997 eight-hour ozone National Ambient Air Quality Standard (NAAQS) for Missouri portion of St. Louis area. There has been clean monitoring data since the 2007-2009 time period. With an attainment designation for the 1997 standard, Missouri can focus its efforts on 2008 standard. In November 2011 Missouri submitted a Maintenance Plan and Redesignation Request to USEPA for the 1997 ozone national ambient air quality standard. USEPA did not find the motor vehicle emissions budgets adequate for conformity and did not approve the Plan due to litigation surrounding federal interstate transport regulations (Clean Air Interstate Rule or CAIR) that were relied on in the Plan. The Washington, D.C. U.S. District Court found that until a replacement rule comes out, CAIR shall remain in place. Based on November 2012 USEPA guidance, Maintenance Plans which rely on CAIR can be approved.

MoDNR is revising the Maintenance Plan for the 1997 standard so that 2025 is the end year (ten years after expected 2015 approval by USEPA). In February, the Maintenance Plan and redesignation request are to be posted on the MoDNR website. The Missouri Air Conservation Commission (MACC) will hold a public hearing in March and is to adopt them both in April. Later this year USEPA should approve the Maintenance Plan and designate the Missouri counties in attainment. These actions should occur before the implementation rule for 2008 standard is finalized in August 2014.

In June 2013 USEPA’s proposed implementation rule for the 2008 ozone standard was published. This rule would revoke the 1997 standard for all purposes and delineates how the states are implement this standard. It includes proposed anti-backsliding obligations and transition guidance for moving to the 2008 standard. All anti-backsliding obligations under the Clean Air Act are met if an area is redesignated to attainment of the 1997 standard prior to the standard’s revocation. The final rule is expected to be published in August 2014.

In USEPA’s July 2012 2008 standard area classification rule, the St. Louis area (MO-IL) was classified as a Marginal non-attainment area. Marginal areas have fewer implementation plan requirements as they are closest to attainment. A Marginal State Implementation Plan (SIP) is to have: comprehensive base year emissions inventory; non-attainment New Source Review (NSR) permitting program; emission reporting requirement for major sources; and transportation conformity determination. Missouri prepares an emissions inventory every three years and is working with USEPA on a 2008 inventory. The state has an on-going NSR construction permit program as well
as an emission reporting program for large sources. Transportation Air Quality Conformity is coordinated by EWG. The 2008 eight-hour ozone Marginal SIP will be posted on the MoDNR website for public comment on April 28, 2014. On May 29 the MACC will hold a public hearing on this SIP and adopt it at their July 2014 meeting.

In the July 2012, USEPA revoked the 1997 standard for Conformity Determination purposes only. Non-attainment areas were given one year to conduct Conformity Determination using the 2008 standard. EWG addressed this requirement in their January 2013 Conformity Determination. Since USEPA revoked the 1997 standard for conformity purposes, the revision to the Maintenance Plan for the 1997 standard does not have to establish budgets.

To aid EWG’s future Conformity Determination efforts, MoDNR voluntarily developed an Early Progress Plan for the 2008 standard which contained 2015 motor vehicle emission budgets. In March 2013 the MACC adopted the Early Progress Plan. It was then submitted to USEPA. In a letter to MoDNR dated October 28, 2013, USEPA found the budgets adequate for use in future Conformity Determinations.

Mr. Henderson, MoDOT, asked if there was any indication when USEPA will take action to revise or maintain the 2008 ozone standard. Ms. Kemp, USEPA Region 7, said that in February USEPA is to release for external review a second draft Risk/Exposure Assessment for Ozone and a second draft Policy Assessment. USEPA will then meet with the Clean Air Science Advisory Committee (CASAC) at the end of March. It is possible that there could be a decision late this year.

IV. 2010 One-Hour Sulfur Dioxide National Ambient Air Quality Standard Designation and State Implementation Plan Requirements
- Bob Randolph, Missouri Department of Natural Resources

Sulfur dioxide (SO₂) is produced during the combustion of sulfur-containing fossil fuels such as coal and fuel oil during metal smelting and industrial processes. Sources include industrial boilers, power plants and mobile sources. SO₂ is more of a localized phenomena with highest concentrations generally near large combustion sources. With the lowering of sulfur levels in gasoline and diesel, mobile sources make up a smaller portion of SO₂ emissions.

The SO₂ standard was established in the 1970s and USEPA has reviewed it over the years. In June 2010, USEPA revised the SO₂ standard to be a one-hour standard of 75 parts per billion (ppb). MoDNR’s first task was to develop boundary recommendations based on 2007-2009 data from the monitor network in place at the time the standard was finalized. Missouri recommended that portions of Jackson County, Jefferson County and Greene County be designated as non-attainment.

Mr. Hickey, Sierra Club, asked if the biggest emitter of SO₂ in the greater St. Louis area was the Ameren Labadie power plant (Franklin County). Mr. Randolph, MoDNR, responded yes. Mr. Hickey Sierra Club, then asked if there were any SO₂ monitors located in St. Charles, Franklin or St. Louis Counties. Mr. Randolph, MoDNR, said no and that he will talk about this later.
Mr. Randolph, MoDNR, said that the current monitoring network nationwide was not designed to address the one-hour SO$_2$ standard. Many large SO$_2$ sources in the U.S. are not in first round non-attainment areas. USEPA recognizes there are deficiencies in the existing monitoring networks. The Monitoring Group in the Air Pollution Control Program is reviewing the SO$_2$ network and evaluating future monitoring sites. Based on 2007-2009 monitoring data, in August 2013 USEPA designated a portion of Jackson County (Kansas City area); and portion of Jefferson County (Herculaneum and Festus townships and Missouri portion of Valmeyer and Selma townships) as non-attainment. Attainment Demonstration SIPs are due to USEPA in April 2015. The deadline to attain the standard is October 4, 2018.

There are five required elements for a non-attainment area SIP. A Reasonable Further Progress document is to be prepared. MoDNR is working on an accurate emission inventory of all current SO$_2$ sources within and impacting the non-attainment area. In the Attainment Demonstration, MoDNR staff will conduct computer modeling and work with facilities located within a 10 kilometer (km) buffer (immediate surrounding area) of the violating monitor and those within a 50 km buffer. All sources of SO$_2$ near the non-attainment area were included in an initial evaluation to determine which sources/facilities to explicitly include the computer model. Modeling must be performed using potential or allowable (permanent and enforceable) emission rates. Actual emissions from a facility’s Emissions Inventory Questionnaire (EIQ) can only be used as a screening tool. The modeling can include facility negotiated limits/conditions necessary for it to be in compliance. Any limit identified has to be shown to be necessary to comply with the standard and part of a permanent and enforceable action. MoDNR is working with those largest sources/facilities inside the 50 km buffer, including Ameren Labadie, to verify potential limits and identify what actions are occurring or what plans already made to lower SO$_2$. Begun dialogue on what control options facilities are going to do to reduce impact for future rounds and develop recommendations. Our task is to determine their impact on any receptor within the Jefferson County non-attainment area. At the end of 2013 the Doe Run Company closed their primary lead smelter in Herculaneum. A model assumption was that there will be no smelting operations and that the remaining units at this facility will use natural gas, minimizing SO$_2$ emissions.

Options for controls include incorporating limits into the Missouri SO$_2$ SIP. MoDNR is working on an amendment to the state sulfur rule as many requirements focused on motor fuels and outdated codes. The State could issue construction and/operating permits with emissions limit/condition. Controls can include combination of control equipment, fuel controls, emission rate limits or limits on allowable emissions. If state rule does not work, state could enter into a Consent Judgement/Decree with the source to establish an emission limit/conditions. Another option to reduce impact, would be to identify limits through a modeled attainment demonstration.

In February 2013 USEPA released a “Next Steps” paper describing their strategy for future rounds non-attainment area designations. Emission thresholds will be lower in urban areas and higher in rural areas. The states will have flexibility to rely upon monitoring or modeling data, as appropriate. This allow states to work with affected facilities and citizens in order to develop monitor or model approach. Incentives and time for facilities to reduce emissions early and avoid non-attainment designations in future rounds.
USEPA is taking the approach that in future rounds of non-attainment designations, the states will be looking at all of those larger $SO_2$ sources. MoDNR will begin a dialogue with the larger sources, like Ameren Labadie, to gear them up for future round analysis and to consider emission reduction alternatives. Options under future rounds is for MoDNR to work with individual facilities to develop individual monitor networks to determine where peak concentrations would be in facility or to go with a modeling approach. If a facility wants to establish local monitor network, has to be approved by MoDNR and USEPA. For facilities that are going to use the modeling approach, Missouri would submit designation recommendation during 2017 and submittal deadline addressing facilities using monitoring data would be during 2015-2016. USEPA is to make designations for modeled areas in December 2017 and for monitored areas in December 2020.

Mr. Hickey, Sierra Club, asked if SO$_2$ sources within the buffer zone have been modeled and if sources are shown to be above standard, does that trigger any action. Mr. Randolph, MoDNR, replied that sources in the buffer area have been modeled. Information collected could be used in the future designation round(s). The task now is to determine the impact of sources on first round non-attainment area. MoDNR is working with facilities to get better assessment of what their peak levels are. Anticipate any facility within the 50 km buffer would have a strong potential for some type of emission control strategy. Just because a facility is not within the non-attainment area, does not mean they will not have to do something for the first round. MoDNR will work with facilities. Hopefully, that will be enough to bring that area/facility into attainment for future rounds.

V. American Fuel Group Report  
- Kevin Herdler, St. Louis Regional Clean Cities Program

The St. Louis Regional Clean Cities program (SLCC) along with Kansas, Iowa, Nebraska and Missouri received a grant from the U.S. Department of Energy (DOE) for an Alternative Fuel Implementation project. ICF International has been selected to develop a methodology using MOVES to evaluate the air quality impact/emission reduction of alternative fuel vehicles under different scenarios. There are limited alternative fuel inputs for the MOVES model. The consultant has been asked to develop emission reduction factors for the following American fuels: liquefied natural gas (LNG); compressed natural gas (CNG); electric vehicle and electric plug-in; propane; biodiesel at 20 and 50 percent; and ethanol (E-85). Since these fuels are not in MOVES now, consultant is trying to develop a way so USEPA can substitute them. Consultant is working with USEPA Region 7, Illinois EPA and MoDNR. The beta version of the methodology should be available in the next couple of weeks. Beta version will be reviewed by EWG and other stakeholders. Once review is finished, a webinar on the methodology and how to use it will be put together. Methodology is designed so that any city, county, council of governments or state can plug in their own numbers. Mr. Herdler is also developing and conducting training for code enforcement personnel and first responders about these fuels.

Landscape firms are beginning to utilize propane-fueled mowers. These mowers are cleaner than conventionally fueled mowers (which do not have emission controls) and have a longer maintenance life. In addition, companies have less gasoline fuel loss. Ms. Fuchs, American Lung Association
(ALA), asked about the propane shortage. Mr. Herdler, SLCC, said that it was an extreme situation, particularly in the Midwest. Previously propane cost $1.69 a gallon for home heating and now it is $4.00 a gallon. At a meeting with Amerigas, Mr. Herdler learned that Amerigas is using railcars to bring in propane from Alaska and elsewhere. Hopefully when the cold snap breaks, companies will be able to replenish their supplies and prices will go down. Public CNG stations are at Lambert Airport and in Pontoon Beach. Allied Waste, Progressive and Waste Management are all using propane-powered trash trucks. The Parkway school district has a fleet of CNG buses and is working on a fueling station.

SLCC is working with the Village of Marissa in St. Clair County on a landfill gas recovery project. Waste Management has given the landfill gas to Marissa. Plan to install equipment to capture the gas and send it to the Ameren pipeline. Also liquid carbon dioxide (CO₂) will be collected and sold to another company. It is estimated that the landfill will be in operation until 2060 and gas will be available for 30 years after that. Waste Management has announced that it plans to install similar equipment at its Milan landfill. Aim to provide fuel for their trash trucks in Chicago and St. Louis. SLCC is working with the Coast Guard and several businesses to convert at least three St. Louis-based harbor boats to CNG or LNG.

In 2014 SLCC will be 20 years old. SLCC is planning a celebration for this summer. A round of applause was given for this milestone achievement.

VI. Update Activities of the States
   - David Bloomberg, Illinois Environmental Protection Agency
   - Joe Winkelmann, Missouri Department of Natural Resources

The Illinois Pollution Control Board (IPCB) held its first hearing on the lead rule for Granite City and Chicago. There was enough agreement from all parties that the IPCB canceled future hearings. The rule is expected to proceed to adoption. Illinois EPA has already submitted it to USEPA Region 5 for parallel processing. Mayco Industries in Granite City has received a construction permit to make the changes necessary for it to comply with this lead rule.

Petcoke is a by-product of the petroleum refining process and is stored in the Chicago area and the Metro East. It is a solid material similar to coal and can be a fuel source for power plants. In Chicago, 70-80 foot high petcoke storage piles are located near residential areas. After a windstorm last year blew material onto residences, the City of Chicago has proposed a petcoke management rule. The Illinois EPA proposed an emergency rule to the IPCB which the Board did not accept. Illinois EPA is examining alternatives to address concerns. This could be a multi-state issue.

For the two Illinois SO₂ non-attainment areas, Illinois EPA is talking with culpable sources and seeking either permit limits or regulations. Illinois looking ahead to the outcome of the litigation over the Cross State Air Pollution Rule (CSAPR) now before the U.S. Supreme Court. In the meantime, USEPA is moving forward with a possible transport rule (if ruled against). There have been many discussions on how to model and address that concern. The Ozone Transport Commission (composed of northeast and Mid-Atlantic states) wants a number of Midwest states, including
Illinois, to join the Commission. Illinois has declined and now the Commission is forcibly trying to add these states.

At the January 30 MACC meeting, three rules are up for public hearing. One is an amendment to 10 CSR 10-6.200 Hospital, Medical, Infectious Waste Incinerator rule removing start-up, shutdown and malfunction exemptions from any emission limits. The second is to rescind the outdated 10 CSR 10-5.240 Additional Air Quality Control Measures May be Required When Sources are Clustered in a Small Land Area. It was passed before the federal Clean Air Act was enacted. The last item up for public hearing is to amend 10 CSR 10-6.010 National Ambient Air Quality Standards to incorporate federal standards into the state rules so state rules are consistent.

MoDNR is in the process of preparing an amendment to 10 CSR 1–5.220 to remove Stage II Vapor Recovery systems from this rule. The draft rule amendment has been posted on the Rules in Progress section of the Air Pollution Control Program web page.

VII. Other Business

Mr. Hickey, Missouri Sierra Club, observed that the MACC is a seven member body whose members are nominated by the Governor and approved by the Senate. Currently, the MACC only has four members. One MACC member is from Crystal City but the remainder do not reside in non-attainment areas. Sierra Club thinks that it would be good if at least two of the empty seats were filled by people from the St. Louis area (42 percent of the breathers in the state). Need to look for people who care about clean air and would be effective advocates. Mr. Coulson, EWG, said that Dr. Fishman from St. Louis University has submitted his name. Mr. Winkelmann, MoDNR, added that the MACC has been discussed at AQAC and at other meetings. Information on the MACC can be found at RSMo 643.040. He encouraged everyone to consider possible nominees.

Ms. Klekota, Trailnet, asked if at a future meeting, someone would talk about the connections between air quality and public health and could someone talk on the impact of transportation on PM$_{2.5}$. Mr. Coulson, EWG, said that it is good to keep health involved when discussing air quality, and not just bureaucratic structure. Mr. Bloomberg, Illinois EPA, added that Ms. Funk of Metro East Community Air Project (MECAP) has hosted air quality and public health forums for the last several years. Mr. Winkelmann, MoDNR, said that the preamble section of the National Ambient Air Quality Standard contains a discussion on the health effects/impacts of specific pollutants.

The next meeting of the AQAC will be on March 25, 2014. There being no other business, the meeting of the Air Quality Advisory Committee was adjourned.