

Interagency Pollution Prevention Advisory Team (IPPAT)
Wednesday, April 24, 2002
Meeting Summary

The April 2002 IPPAT meeting occurred Wednesday, April 24, 2002. We discussed changing the meeting day once again to accommodate as many people as possible. We have selected the fourth Thursday of January, April, July, and October for our meeting days. As always, the time will remain 9-11:45 a.m. The following paragraphs summarize the meeting.

E85 Flexible Fuel Vehicles: What Role Do State Agencies Play?

Tim Gerlach, American Lung Association of Minnesota, 651/227-8014

Twin Cities Clean Cities Coalition (TC4), Minnesota E85 Team

Tim Gerlach gave an informative presentation about flexible fuel vehicles and efforts in Minnesota to persuade drivers of flexible fuel vehicles to be aware of the alternative fuel, E85, and to increase use of E85. E85 is 85 percent ethanol and just 15% petroleum, as compared to Minnesota gasoline, which contains only 10 percent ethanol.

The Minnesota E85 Team oversees the E85 pilot market and includes the following members:

Minnesota Corn Growers Association
Minnesota Coalition for Ethanol
MN Dept of Commerce
Minnesota Office of Environmental Assistance
Minnesota Dept of Agriculture
National Ethanol Vehicle Coalition
Ford Motor Company
US Dept of Energy
American Lung Association of Minnesota



The discussion covered the fuel, the vehicles, the reasons for using E85, the need to convince the government that we have a problem, the difficulties associated with providing and marketing E85, and the role that state agencies can and should play.

Using E85 or other blends of ethanol is “the only time alcohol and driving mix.”

Ethanol may be Americans' fuel for the future. Since E85 is 85% ethanol and only 15% petroleum, we could go a long way toward energy independence by using it. Seasonal blends vary in the amounts of ethanol added. Winter E70 contains only 70% ethanol, while the summer blend is 85% ethanol.

Dispensing equipment for E85 is very similar to that of gasoline. E85 is NOT to be confused with methanol fuels. Methanol is largely derived from petroleum and can be corrosive. Dispensing equipment needs proper labeling to prevent people from using it in traditional-fuel vehicles, although minor misfueling does not cause engine damage (as can be the case with other fuels).

Flexible Fuel Vehicles (FFVs) allow any blend of gasoline and/or E85 to be used from one tank. Being flexible can be good or bad. It doesn't help to have a flexible-fuel vehicle if they continue to be fueled with traditional gasoline. There are now 1200+ FFVs in the Minnesota state government fleet and an estimated 80,000 or more are on Minnesota roadways. Two million FFVs are in use in the US.

Why use E85? Think about the 3 E's: the Environment, Economic development and national Energy security benefits. E85 results in 20% less ozone-forming pollutants, 25%-30% less greenhouse gas emissions, 80% less gasoline chemicals entering the environment, and it's renewable-based (We can grow more!). For rural economies, E85 means jobs for farmer and rural communities, and it keeps the local dollars in the local economy. You can get 2.8 gallons of ethanol from a bushel of corn. Tim asked “And, what we think led to Sept. 11?” His point was that US-Mideast energy policy has led to continued political upheavals and severe hatred of America by many in those countries. Why not invest in reducing our dependence on overseas oil imports?

If none of these reasons are enough to make people embrace E85, the Energy Policy Act contributes the force of law to the effort to change behavior and habits – including directing federal and state agencies to purchase alternative fuel vehicles and to use the alternative fuels.

More Stations Coming. Tim also described station building the E85 Team has conducted, which has successfully increased availability of E85. Minnesota now has 70 E85 fueling locations. More are planned. Duluth station is open and went from selling 50 gallons per month to 100 gallons per day in a very short time. The E85 Team has engaged in marketing the product through promotion and consumer education. “If you build it, they don’t just show up”. You need incentives and proper pump pricing. One retailer commented, “Convincing a station owner to sell E85 today is like trying to tell them bottled water was going to be a big seller 20 years ago.” It was difficult. But now whole coolers are devoted to bottled water and it is a very high-margin product for them.

Emissions Mark Wacek asked if any emissions increase. Tim replied that carbon monoxide and other pollutants show decreases, however, oxides of nitrogen may be similar or slightly increased as compared to gasoline on a per mile basis. In general terms, use of E85 reduces ozone-forming tailpipe emissions by about 20% and greenhouse gas emissions (carbon dioxide fuel lifecycle emissions) by 25-30% as compared to conventional gasoline.

Many low-emission vehicles are coming on the market, but if you don't use low-sulfur gasoline in them, you may not be ‘less polluting’ as the vehicles promise. Mark suggested that manufacturers need to make a much larger point of educating people to select the proper fuel.

Clarification: Low-sulfur Blue Planet gasoline does not have more ethanol in it than other Minnesota gasoline, but it is lower in sulfur and benzene. It is significantly ‘cleaner’ than other brands. Each winter and summer, the American Lung Association of Minnesota tests the top-selling Minnesota gasoline brands. The reports can be found at www.CleanAirChoice.org. ALAMN recognizes both E85 and Blue Planet as “Clean Air Choices.” Blue Planet is the only gasoline sold at metro Holiday Station stores. By 2006, all US gasoline will have to meet these standards.

For more: American Lung Association of Minnesota: 651-227-8014 or www.CleanAirChoice.org or www.E85Fuel.com

Greening Government Initiatives: how IPPAT fits

Rolf Nordstrom, Minnesota Planning, 651/297-5228

Anne Hunt, Department of Natural Resources 651/297-4707

Rolf Nordstrom gave a short history of Minnesota's efforts toward sustainability. Governor Carlson initiated the Sustainable Development Initiative, a process that involved a broad representation of agencies and stakeholders looking comprehensively at how Minnesota might move toward economic, environmental and social sustainability. Governor Ventura has featured a Smart Growth Initiative. Meanwhile, several states including Pennsylvania, New Jersey, and Washington have been putting forth broad initiatives of their own. Paul Schmiechen from the Pollution Control Agency and Rolf were talking about how we could invigorate these processes and recapture a spirit of leadership. They began a series of meetings to design a Greening Government initiative that would incorporate aspects of previous initiatives and place them in a new plan for Minnesota government. At the same time Steve Morse, deputy director at the Department of Natural Resources and Ted Mondale, chair of the Metropolitan Council, began discussing an executive order regarding smart growth that would encompass a larger effort.

Rolf and Paul suggested that this effort would build on the good work that the Department of Administration and other agencies had already begun. The partners on the Greening Government Team agree that there are many things the state could be doing more aggressively. Rolf asked IPPAT members how they feel the initiative should develop?

Donna Peterson offered the opinion that the prospect of IPPAT's getting on board with something already moving is much preferable to our making another separate initiative. We should take advantage of the momentum and lend our support.

Bruce Johnson said that he fully supports the idea, but in reality, MnDOT is continually losing staff at the rate of 500 people per year. They are doing only what they absolutely have to do, and they don't have enough resources to do even what they're supposed to do. Prospects for the future are dim. People with science training coming out of college are not taking MnDOT jobs, because they can receive more pay elsewhere.

Lynne Markus added that the Department of Administration is cutting many responsibilities, also. All the things mentioned about greening government are good ideas, but how can we move ahead? She stressed the importance of leadership and a coalition of agencies like IPPAT trying to improve environmental leadership. Lynne wants to communicate with agency leadership to show the good things that agencies are already doing. The irony is that Green Government initiatives help to accomplish what IPPAT has always striven for.

John Thompson commented that the initial up-front investment is the barrier. Steve Bragg noted that they have the same problems in the federal government. They are required to show cost elements and a payback of three years or less. It's easier to accept if the payback is fast.

Paul Schmiechen suggested that the first approach is to get buy-in at the staff and management level. They are still at the executive buy-in stage with the initiative. It would be great if the commissioners asked for the changes.

Mike Taylor suggested that we organize our efforts around priorities. What are the top five things an agency could do at low or no cost? And then they could move on to the next five things that may cost more or be slightly more difficult, and so on. He suggested that a long-range environmental consulting team with administrative buy-in could go into each agency and help identify the first five priority activities to begin the process. Gordy Dormanen suggested that's a good way to structure our efforts. Donna Peterson agreed that we should grab on to the idea.

Lynne Markus suggested that we use this concept to organize our pollution prevention summary reports. Mike Taylor asked if this would go forward without an executive order, and we agreed that there is a lot we can do with the executive order we already have.

Anne Hunt described the Smart Growth executive order. Anne is the Smart Growth Coordinator at the Department of Natural Resources. The Smart Growth executive order involved sixty people from thirteen departments and agencies working for three months crafting the executive order regarding smart growth. The order is organized around five smart growth principles:

1. Stewardship - to manage and sustain Minnesota's resources
2. Efficiency of all activities regarding energy and materials
3. Choice
4. Accountability for all development decisions
5. Prevention - preventing future costs

The team that drafted the order established a smart growth executive sub-cabinet to ensure that all the agencies could work through policy and procedural barriers. Some on the team felt that this sub-cabinet would be another layer of government and others felt it should have a facilitating function. They did not want the sub-cabinet to spend six months trying to figure out how to operate, and the current status is that it is on hold until they receive everyone's feedback. There is broad support from agencies that this needs to happen whoever the governor is.

Donna Peterson again stressed that if we're smart, we can take advantage of coalitions under smart growth and would be mistaken to dismiss the opportunity to work with them. Ray Bissonnette noted that we have an existing structure that we're obligated to continue. Gene Christenson said that # 4 of our IPPAT executive order requires agencies to develop policy statements for pollution prevention if they produce pollution or use significant quantities of resources. All the indices of sustainability are already in our executive order.

Steve Bragg expressed an interest in documenting partnerships between state and federal agencies in Minnesota whenever we revise our executive order. He cited some examples of partnerships already acknowledged in other states in our region. Steve will speak about federal environmental management systems (EMSs) at the October 24 IPPAT meeting.

Highlights of Pollution Prevention Summary Reports

Mike Taylor, Minnesota State Energy Office, Department of Commerce 651/296-6830

The Department of Commerce employs 314 staff members in downtown St. Paul and 38 in Roseville. Policy Activities in the Energy Department include Transportation, Energy, and administration of the Petrofund.

Transportation - The Twin Cities Clean Cities Coalition (TC4), of which the Department is a member, was officially designated by the U.S. Department of Energy on May 31, 2001. The Clean Cities program is comprised of government, private, and non-profit organizations dedicated to promoting alternative transportation fuels. Regulations require the state to purchase E85 vehicles, building the fleet until it includes 12% E85 vehicles. Fuel use is a problem. The Department has especially promoted the use of E85 with funding and informational materials. The use of bio-diesel in diesel fuel applications is an additional target for promotion in the future.

Energy - The Energy Department oversees electrical and natural gas conservation programs. Electricity and Natural gas Conservation Improvement Programs have saved 250 million kWh of electricity, enough to power 31,000 homes, and 1.1 million cubic feet of natural gas, enough to heat 12,000 homes.

Renewables - Ten percent of Minnesota's energy will be renewable under recent Minnesota law. Minnesota now generates 300 megawatts of wind power. By 2015 it will need to be ten times that amount. The Department hopes to accomplish that by a combination of "green" pricing and mandates. The Wind Resource Assessment Program (WRAP) includes new sites in northeastern and southeastern Minnesota. A wind monitoring loan program will help wind developers analyze specific locations for the potential development of wind power. The Solar Resource Assessment Program (SRAP) expanded from four sites in 1999 to eight sites in 2000. The equipment monitors solar resources at specific sites around the state, correlating the information from these sites with satellite-based information, with the goal of maintaining a public statewide database of solar information for promoting solar energy.

The Department continues to promote the use of agricultural manure resources for the production of energy and is investigating the installation of a swine-manure digester to complement the existing dairy-manure digester installed in 1999. Digester technology reduces manure odors, utilizes waste methane gas, and produces energy from manure, a renewable energy source. A 2001 legislative statute was passed giving qualifying new digester installations a \$0.015/kWh incentive for energy production.

Conservation - A March 13, 2001 survey found an estimated 120 computer monitors left on overnight. In July 2001, when energy conservation alerts were issued by Xcel Energy, an e-mail message was sent out to all employees asking them to conserve electricity in their cubicles during the day and after they went home. [Http://www.energystar.gov](http://www.energystar.gov) has software that's free that tells monitors to turn off. The Department of Commerce is looking into replacing all their monitors with LTD screens, which use 80 % less energy. Questions about them are will they be the same quality? Will users like them?

The Department operates the **Energy Information Center**, which serves energy consumers and features a toll-free "hotline" staffed full-time by Energy Information Specialists. The Energy Information Center answers questions, provides advice, and mails publications on energy conservation and renewable energy technologies, which are printed with soy-based inks on recycled paper.

The **Minnesota Petrofund Program**, housed at the Department of Commerce, provides a reimbursement mechanism to help businesses and citizens clean up areas where petroleum leakage has occurred. In conjunction with a project manager at the Minnesota Pollution Control Agency, consultants determine the extent of the contamination and the degree of its threat to human health or the environment. Over the past decade, cleanup costs for approximately 6,000 sites have been reimbursed through the Department's Petrofund Program at a cost of more than \$250 million. These reimbursements are funded by a \$0.02 per gallon fee paid by bulk petroleum distributors. The Weights and Measures Division distributes a pamphlet to educate storage tank owners on the proper maintenance of petroleum storage tanks to prevent damage and leaking in the future.

Printing - All the paper the department uses is 30 % recycled by weight They use 2 million sheets per year. They need to improve by buying all printers that print double-sided or print directly to the copier to be double-sided.

IPPAT Business

MnGREAT! Awards - an awards-review committee will evaluate the award applications transferred from the Governor's Award program and the nominations made through the IPPAT peer nomination process. All interested were invited to serve on the committee.

Baseline setting - we discussed the difficulty of establishing baselines with the current budget crisis. Several people said that agencies don't have enough time to do what they are mandated to do. The Department of Administration is having difficulty administering the environmental codes in the MAPS system with the current demands on their staff. Baseline setting will have to continue to be a goal of IPPAT.

New executive order preparation - the committee that reviewed the executive order - Mike Nevala, Gene Christenson, and Gloria Sonnen - provided draft revisions, which the IPPAT members reviewed at the meeting. Those revisions will be shared with the general membership by e-mail.

Creating a college and university sub-team? - Emily has organized a meeting scheduled for early May with the Minnesota State Colleges and Universities staff, selected representatives from universities and colleges, and OEA staff.

Next Meeting

The next meeting of the IPPAT will be held at the Office of Environmental Assistance from 9 to 11:45 on Thursday, July 25, 2002.

Attendees

Mike Taylor, Department of Commerce 651/296-6830

Mark Wacek, Metropolitan Airports Commission 612/725-6428

Mary Krugerud, Resource Recovery Office, Department of Administration 651/282-6640

Lynne Markus, Resource Recovery Office, Department of Administration 651/296-9084

Ray Bissonnette, Pollution Control Agency 651/297-8588

Bruce Johnson, Department of Transportation 651/284-3768

Wayne Boisman, Department of Corrections 651/717-6570

Steve Bragg, U.S. Army Reserves 612/713-3802

Anne Hunt, Department of Natural Resources 651/297-4707

Paul Schmiechen, Pollution Control Agency 651/296-7795

Gene Christenson, University of Minnesota 612/6265-1590

Tim Gerlach, American Lung Association of Minnesota 651/223-9577

Gordy Dormanen, Iron Range Resources Rehabilitation Board 218/254-7967

John Thompson, Metropolitan Mosquito Control District 651/645-9149

Gloria Sonnen, Department of Administration 651/297-2954

Rolf Nordstrom, Office of Strategic and Long-range Planning 651/297-5228

Mark Snyder, Office of Environmental Assistance 651/215-0222

Mike Liles, Office of Environmental Assistance 651/215-0220

Jon Kolstad, Department of Military Affairs 320-632-7524