

GREEN CHEMISTRY ROUNDTABLE

**Michigan Department of Environmental Quality (DEQ)
Constitution Hall, Katherine Cushman Conference Room
525 West Allegan, Lansing, Michigan 48913
October 22, 2009**

Members in attendance: Mariann Anticoli, Patricia Beattie, Clinton Boyd, Tracey Easthope, Michael Hales, Rebecca Head, Yinlun Huang, Robert Jackson, Dalila Kovacs, Jim Lowry (phone), Stephen Maldonado (phone), Martha Stanbury, Anne Wallin (phone), Guy Williams, Gabe Wing, Cynthia Zwick

DEQ staff in attendance: Frank Ruswick, Bryce Feighner, Marcia Horan, Richard Alexander, Karen Edlin, Jennifer Acevedo, Chris Affeldt

9:00 a.m. – 9:15 a.m. ~ Welcome, Introductions, and Updates

Frank Ruswick, Senior Policy Advisor, Department of Environmental Quality

Discussion:

- Congratulations on a successful Greenup Green Chemistry conference and award program.
- Executive Order 2009-45 will combine the Department of Environmental Quality and the Department of Natural Resources (DNR) into the Department of Natural Resources and Environment. This reorganization provides an opportunity to look at new ways to integrate our activities with the DNR. Both departments are undertaking similar efforts to gain understanding of what products and services people are looking for out of the agency.
- The Department of Community Health had been doing a five year study, with funding by the Centers for Disease Control, on toxic substance releases, mapping releases, and surveillance, but it is no longer funded, so the program is being pared back.
- The Environmental Council of the States (ECOS) has adopted a green chemistry resolution for the Environmental Protection Agency (EPA) to provide resources to states to support green chemistry research and education. As a consequence, ECOS will engage the EPA on green chemistry programs and funding at the state level.
- Michigan Chemistry Council will be working with EPA and the American Chemistry Council on reform of the Toxic Substances Control Act. Earlier this week the Michigan House of Representatives adopted Resolution 170 recognizing October 18-24, 2009, as National Chemistry Week in the state of Michigan.
- A group in Ann Arbor, including the University of Michigan, has begun preliminary discussions about using a part of the former Pfizer campus as a green chemistry research and development center. The Ann Arbor Economic Development Corporation Board is leading the effort and has prepared a draft white paper.

Action Items:

- A copy of the white paper regarding a possible green chemistry research center in Ann Arbor will be submitted to the Roundtable when it has progressed to the appropriate point.
- The Roundtable will consider support of a green chemistry center when more information is provided.

9:15 a.m. – 10:00 a.m. ~ Conference/Awards Year-1 Wrap-up & Year-2 Planning

Jennifer Acevedo & Karen Edlin, OPPCA, DEQ

Discussion:

Green Up Conference

- Overall the conference was a success; thank you to the Roundtable for your support.
- Including speakers, there were 166 people in attendance. The conference feedback shows the overall rating was positive: 90% of responders said they will take action after conference, 93% said topics covered what they expected, and 96% said it related to their job. An overview document has been prepared and is posted to the web.
- Planning is already underway for next year's conference, the DEQ is looking for feedback and support from the Roundtable regarding: location, venue, timing, speakers, and goals.
- Ideas generated for consideration: full conference or targeted workshops, partnering with other organizations to provide for a larger audience, need more advanced notice, better marketing to educators, focus more on specific group (i.e. educators, industry, etc.), need more parallel sessions and shorter sessions coordinated better within specific tracks.

Governor's Green Chemistry Awards

- The first annual awards program was a great success, and although some modifications are needed there are plans to continue this recognition program in 2010.
- The DEQ is currently taking comments from the judging panel on how to improve the awards program and will begin working with Workgroup 2 in early November to make any necessary revisions to the program. A late December release to the public is expected.
- Ideas generated for consideration: Roundtable should remind itself about the purpose of having the awards, need to evaluate the criteria of the previous awards, difficult for small businesses to compete, want a high standard but also to recognize the breadth of innovation, nomination packet should ask for better metrics to improve the data used to judge them, need to fully merge student criteria/award with others.

Action Items:

- Roundtable members interested in joining the steering committee for the 2010 conference and/or helping to plan the 2010 Governor's Green Chemistry Awards should contact Karen Edlin.
- The Roundtable will be provided an opportunity to comment on the draft nomination package prior to public release.

10:00 a.m. – 10:45 a.m. ~ Clearinghouse Development

Chris Affeldt, OPPCA, DEQ

Discussion:

- A recap of the progress made towards building a clearinghouse was provided including the input into the Action Plan, research and interviews, as well as Workgroup 1's development of elements and parameters for the Green Chemistry Program.
- The DEQ intends to issue an RFP to carry out the work of designing, building, and maintaining a resource clearinghouse of green chemistry activity in Michigan.
- The Roundtable's role in the process was brought to discussion with the main points of entry being review of the draft RFP and a Roundtable representative on the selection committee of a winning proposal
- The Roundtable agreed that they will be given the chance to review and comment on the draft RFP with the DEQ maintaining final approval. Reviewing/commenting on the draft RFP will not constitute a conflict of interest for Roundtable members that later wish to submit bids.
- It was questioned whether the RFP will call for a proposal that addresses other parts of the Action Plan, such as creating an educators' network in Michigan. It was decided that

the RFP should include information on maintaining and developing the educator's network, incorporating and building on the capacity already in place at Grand Valley State University.

- It was suggested that we include as many of our goals as possible in the RFP in order to build capacity.

Action Items:

- A draft RFP will be submitted to the Roundtable for review and comment in November.
- The Final RFP will be released to the public in December.
- A Roundtable member will be asked to join the selection committee at a later date. Note: it would be a conflict of interest for a Roundtable member to sit on the selection committee and also to submit a proposal.

10:45 a.m. – 11:00 a.m. ~ Break

11:00 a.m. – 11:45 a.m. ~ Action Plan Status & Next Steps

Marcia Horan, OPPCA, DEQ

Discussion:

Action Plan Review

- It has been 18 months since the Roundtable was formed and 1-year since the Action Plan was finalized. This is an opportunity to review the action plan, and refocus our efforts. The Roundtable is collaborative group, and we should leverage the resources of the Roundtable to achieve our goals.
- *Action 1: Define the Scope and Priorities of the Green Chemistry Program* – work pertaining to the scope and boundaries of the Green Chemistry Program is complete and is posted to the web. Workgroup 1 will accept the task of proposing means and metrics for the Green Chemistry Program, with wrap-up expected in 6 months.
- *Action 2: Build a Resource Clearinghouse for Green Chemistry Activities in the State* – work pertaining to this action item is ongoing; goals have been identified and the DEQ expects to release the Request for Proposal in December.
- *Action 3: Build Support and Commitments from Key Stakeholders to Advance Green Chemistry in Michigan* – for this task we need to leverage groups including the public; reaching out to those involved in the effort as well as those that will be affected. Although a strategic plan has not been developed, the DEQ has provided a grant in support of this effort.
- Ideas generated for consideration: need to identify 'key stakeholders' and their goals, the overall vision of the Green Chemistry Support Program and our message to outside groups Any vision should be mindful of Executive Directive 2006-6 and the Action Plan. How do we measure advancement (hard numbers vs. adoption)? Although it is difficult, explore opportunities to realize tangible results. Think about developing a logic model. Realize that process metrics do often lead to performance metrics, and that there is a need to build a network of stakeholders.
- *Action 4: Build Financial Resources for Long-term Success* – the goal is to look at how we can have some longevity and establish long term success. There is proposed legislation for tax incentives for green chemistry in manufacturing. Although passed in the House, this legislation has not been picked up in the Senate. There is strong support for this legislation from many groups including the business community, the Michigan Economic Development Corporation, and testimony from Treasury.
- Ideas generated for consideration: foundations may be interested in funding projects from the Roundtable, and opportunities exist to tie green chemistry in with discussions on green jobs.
- *Action 5: Convene a Green Chemistry Research and Education Conference* – the first annual conference was completed successfully in September 2009 and in May 2009, Grand Valley State University held an educators' conference. Planning for the 2010

conference will begin in early November.

- *Action 6: Create an Annual Green Chemistry Awards Program* – the first annual Michigan Green Chemistry Governor’s Awards were a success and will be held again in 2010.
- *Action 7: Establish a Green Chemistry Education Network and Opportunities* – the DEQ has issued green chemistry curriculum grants to four Michigan universities as well as for development of an educators’ conference and network.
- Ideas generated for consideration: seed money, even just a little, pays dividends; any future education grant opportunities should also allow for professional training.
- *Action 8: Build on Michigan’s Existing Capacity to Advance Long-term Green Chemistry Direction* – some examples of existing capacity that could be tapped into include the Green Suppliers Network and the Manufacturer’s Extension Partnership. Another avenue of capacity is providing technical assistance. The Retired Engineers Technical Assistance Program was transferred to another department, and we had anticipated having technical assistance and demonstration projects. The DEQ is a small part of this, and we are looking at how industry fits into this.
- *Action 9: Facilitate Research and Commercialization of New Innovative Technologies* – Action 8 directly ties into this and furthers the discussion.
- *Action 10: Establish the Michigan Green Chemistry Program as a Model for Green Chemistry Innovation* - there is already talk of a center, but there may eventually be multiple centers. The DEQ awarded a grant to the Society of Automotive Engineers to host a stakeholder’s workshop on the feasibility of an automotive green chemistry center in Michigan.
- In conclusion the Roundtable agrees that there is a need to track green chemistry actions, identify key Roundtable members responsible for tracking innovations and accomplishments under a specific Action Plan topic and providing updates to the Roundtable, as well as establish guidelines for use of the Roundtable name/logo by members.

Action Items:

- Workgroup Group 1 will convene and design a proposed set of means & metrics for the Green Chemistry Program which will be presented to the Roundtable in January.
- The Green Chemistry Program needs a vision statement developed, potentially by Workgroup 1.
- A future agenda item should allow for a discussion on possible projects that could be funded by interested foundations.
- The DEQ will forward a copy of the Department of Energy Labor & Economic Growth’s green jobs report to the Roundtable.
- The DEQ will develop and forward an Action Plan matrix or survey to the Roundtable.
- Roundtable members will use the Action Plan matrix or survey to provide information to the DEQ on key green chemistry contacts and activities in the state.
- The DEQ will explore opportunities for developing common presentation materials for use by the Roundtable.

11:45 a.m. – 12:00 noon ~ Next Roundtable Meeting Discussion

Discussion:

- Following a quarterly schedule, the next Roundtable meeting will be scheduled for the middle of January, ideally the week of the 18th or 25th.
- One member suggested using Doodle to schedule meetings. It is a web-based meeting scheduling program with more functionality than Meeting Wizard.

Action Items:

A notice will be sent out to schedule a Roundtable meeting to be held during the middle of January, 2010.