



Building Michigan's Leadership in Economic Development Around Products of Green Chemistry: An Action Plan for Michigan Green Chemistry Research, Development and Education

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Executive Directive No. 2007-6

"Promotion of Green Chemistry for Sustainable Economic Development and Protection of Public Health"

- The Directive encourages the research, development, and implementation of Green Chemistry in Michigan.



Methodology



- Michigan Stakeholders Meeting December 2007
- Interviews with leaders in the field of Green Chemistry January / February 2008
- Interviews with 15 key Michigan stakeholders February / March 2008
- Lowell Center for Sustainable Production 15 years experience

Key Ideas from Interviews



Recurring Action Ideas

- State resource assessment / database
- Awards
- Green Chemistry Center / Institute
- Stakeholder Conference

Recurring Collaborative Ideas

- MEDC
- Universities
- Professional associations

Key Ideas from Interviews



Recurring Theme Ideas

- Champions / leaders
- Success stories
- Vision / brand of Green Chemistry for Michigan
- Green Chemistry Program parameters
- Funding from multiple sources

Action Plan Development Phases

- Phase One (1-12 months)
Building Awareness
- Phase Two (12-36 months)
Building the Program
- Phase Three (3-5 years)
Building the Future



Phase One (1-12 months) *Building Awareness*

- Define the parameters of the Green Chemistry Support Program
- Build a resource base of Green Chemistry in the state
- Create a Green Chemistry “brand”



Define the parameters of the Green Chemistry Support Program

Action 1:

A subgroup of the roundtable is established to clarify criteria for defining the activities of Green Chemistry and to provide boundaries for the Support Program so it can be more focused. This will then guide the research, development, application and education efforts.

Build a resource base of Green Chemistry in the state

Action 2:

One of Michigan’s Universities, possibly a sustainability center, is given a grant to conduct research and outreach in order to compile a resource database of Green Chemistry efforts within Michigan, including case studies of success stories. A brochure on this research, “Michigan’s Green Chemistry Future” will be developed. Both will be available in six months.

Create a Green Chemistry “brand”

Action 3:

A subgroup of the roundtable is established to develop Michigan’s Green Chemistry brand. This will include a strategy and tactical plan to achieve the objectives aligned with the brand, a set of metrics to track its progress and measure its success, and an event launching the brand.

Phase Two (12-36 months) *Building the Program*

- Hold a Green Chemistry Research and Education Conference
- Develop an Annual Green Chemistry Awards Program
- Set the groundwork for long term Green Chemistry projects that will benefit Michigan



Hold a Green Chemistry Research and Education Conference

Action 4:

A Green Chemistry Research and Education Conference is held between 12-18 months after the action plan is implemented. A subgroup of the roundtable is established to plan and prepare for the conference.

Develop an Annual Green Chemistry Awards Program

Action 5:

A subgroup of the roundtable is established to work on an annual Green Chemistry Awards Program. The first awards ceremony will be held at the Green Chemistry Research and Education Conference.

Set the groundwork for long term Green Chemistry projects that will benefit Michigan

Action 6:

A subgroup of the roundtable is established to make decisions about longer term directions that will benefit Michigan in Green Chemistry, building and consolidating existing capacity within and outside the State.

Phase Three (3-5 years) *Building the Future*

- Develop opportunities for Green Chemistry within education
- Develop new innovative technology directions
- Establish a Green Chemistry Innovation Center



Develop opportunities for Green Chemistry within education

Action 7:

A subgroup of the roundtable, working with the Michigan Education Association and academic institutions will establish long term education programs that ensure Green Chemistry is incorporated into science and chemistry courses.

Develop new innovative technology directions

Action 8:

A subgroup of the roundtable will be established to develop long term projects that illustrate growth areas of innovative Green Chemistry technologies, and provide economic benefit to Michigan.

Establish a Green Chemistry Innovation Center

Action 9:

A subgroup of the roundtable will be established to develop a Green Chemistry Innovation Center or Centers to serve as the focal point of Green Chemistry activities in Michigan.