



INDIANA WATERSHED LEADERSHIP ACADEMY - 1ST YEAR REPORT

“Strengthening the capacity of local leaders for successful watershed management”

Community-based watershed groups are playing an increasing role in protecting and restoring water quality. Leading the development of a scientifically-sound watershed management plan that actively involves, engages, and is supported by the community is a daunting task. The Indiana Watershed Leadership Academy was created to increase the capacity of watershed leaders to lead community-based watershed groups in accomplishing the task. Ultimately, these leaders will impact the health and quality of life of communities throughout Indiana.

Building on the past, training for the future

The Academy benefits from years of watershed programs and education by many Indiana agencies, organizations, and dedicated volunteers. Yet it is unique -- the only training in the State that focuses on both watershed science and leadership.

In the first year, 24 emerging watershed leaders participated in this challenging five-month program. They learned together during six days of face-to-face training with overnight stays. They completed distance education modules between sessions. They learned from their peers during networking sessions, emails, and distance education exchanges. They also chose an individual water topic to investigate during the class. Graduation was held at Fort Harrison, with speakers Martha Clark Mettler, Deputy Assistant Commissioner of IDEM and Bob Eddleman, Chair of the State Soil Conservation Board.



Applying skills to improve watershed management

As graduates, these dedicated professional and volunteer watershed leaders are now establishing networks, educating their communities, and helping make changes on the land through watershed planning and improvement actions.

Brent Ladd (right), Coordinator of the Indiana Watershed Leadership Program, presents a Professional Certificate in Watershed Management to John Ulmer, Chair of the Eagle Creek Task Force.

The first class of the Indiana Watershed Leadership Academy learns about biological water sampling, as part of their training on watershed assessment.



Participants in the Indiana Watershed Leadership Academy develop

LEADERSHIP SKILLS

...for building partnerships and developing a vision

Leadership -- the capacity to initiate, guide, and collaborate with others toward identifying and accomplishing mutual purposes -- is needed to protect water quality for the future.

Academy lesson topics for learning leadership skills:

- Stakeholder Involvement
- Strategic Planning and Visioning
- Developing Goals and Objectives

Example Activity: Academy members role-played a town hall planning commission meeting and experienced the complex community dynamics and different points of view in decision making. They also met with their stakeholder groups to identify mutual benefits and what each person and organization brings to the process, as well as the benefits of being involved in the watershed effort.



What participants say:

"I gained techniques to bring peoples' visions together into a unified effort. The Academy has helped me lead my watershed group in developing attainable goals with realistic objectives."

Dr. Shorna Broussard, expert in human dimensions of natural resources and Social Science Director, teaches about effective stakeholder involvement.

WATERSHED SCIENCE SKILLS

...for assessing water quality and watersheds

A science-based understanding of water and watersheds is the foundation for defining watershed problems, interpreting water and landscape inventories, and developing solutions that work.

Academy lesson topics for learning watershed science skills:

- Fish Sampling and Identification
- Inventorying Your Watershed
- Defining Issues & Problems in Your Watershed

Example Activity: Participants used the online Indiana GIS Atlas to calculate watershed area, stream lengths, width of riparian buffers, population density and population change between 1990 and 2000. They then conducted a windshield survey to verify, refine, and extend what they found through desktop tools.



What participants say:

"As a result of the leadership and watershed inventory skills gained from the Academy, my group is now implementing a water quality testing program."

Participants learned about fish sampling from Greg Bright of Commonwealth Biomonitoring, one of many Indiana experts who contributed time to the Academy





Participants in the Indiana Watershed Leadership Academy develop

ORGANIZATION AND COMMUNICATION SKILLS

...for running and sustaining a watershed partnership

The ability to bring people together, organize efforts focused on achieving water quality goals, and sustain an organization over the long term involves a high level of social skills.

Academy lesson topics for learning organization and communication skills:

- Organizing Your Watershed Group
- Running Effective Meetings
- Group Facilitation Skills
- Evaluating Your Efforts
- Sustaining Your Watershed Group Financially
- Implementation & Outreach

What participants say: *“This has been one of the most rewarding experiences. I learned a great deal about how to bring an organization together, and as a result our meetings are shorter and more productive*

Example Activity: Academy members explored funding development for their watershed efforts by creating an activities budget, and then developing a list of ten non-traditional funding sources and activities using resources provided by the Academy. One participant commented that this activity opened up a number of exciting possibilities to help fund his young watershed group.



Dr. Jane Frankenberger, watershed management specialist and Project Director, leads an informal outdoor discussion at the Indiana Watershed Leadership Academy meeting at Camp Tecumseh.

TECHNOLOGY AND GIS SKILLS

...for mapping watersheds and estimating pollution load reductions

The ability to plan and implement water resource management is greatly enhanced with mapping tools and watershed computer modeling for decision making.

Academy lesson topics for learning technical skills:

- Mapping Your Watershed Using GIS
- Estimating Pollutant Load Reductions for Best Management Practices
- GIS and GPS Field Exercises

What participants say: *“The GIS/mapping tools and the load calculation model I learned to use in the Academy are powerful tools for getting people to “see” the watershed and its issues and threats. This has aided us to estimate the best return on our investment of volunteer time and targeting funds when evaluating courses of action.”*

Example Activity: Participants learned to use the watershed assessment tool STEPL to determine the reduction in pollutant loading from the installation of best management practices. They also used the free ArcExplorer GIS software to make a watershed map for presentation to their stakeholders.



Computer-based tools are essential for 21st century watershed management, and Academy participants learned to use geographic information systems (GIS) to assess their watershed. Here, Academy members learn to map their watersheds using ArcExplorer software.

Participants in the Indiana Watershed Leadership Academy develop

POLICY SKILLS

...for working in the regulatory and local planning contexts

An understanding of how local and regulatory policy impact water resources is an important piece of the watershed management puzzle. Communities need leaders who can collaborate and engage others to address water issues.

Academy lessons for learning policy skills

- Understanding the Clean Water Act
- Understanding the Planning Process and Working with Local Officials
- Understanding Drainage Policy and Practice
- Estimating Environmental and Economic Benefits

Example Activity:

Participants reviewed their local land use plan and noted whether it contains natural resource protection provisions. They scheduled a meeting with a member of the Plan Commission to discuss how to protect natural resources and watershed health.

Participants say:

"The Indiana Watershed Leadership Academy has given me the tools to frame the discussion and address specific audiences including local government officials on water policy."

Angie Brown, Watershed Coordinator for the White River Watershed, is working closely with her local planning commission to develop a Master Plan to protect a watershed. The Master Plan will provide guidance on significant conservation, environmental, recreation, and economic aspects to protect and enhance the Prairie Creek Reservoir. She says *"The Indiana Watershed Leadership Academy increased my effectiveness in working with my local Plan Commission by increasing my understanding of the inner-workings of plan commissions, emphasizing practical ways to maintain partnerships, and enhancing my conflict resolution skills."*



THE FUTURE

Watershed leaders trained in the first year of the Indiana Watershed Leadership Academy will use their skills for more effective planning and management in their watershed. We are seeking to build a sustained funding base so that the Academy can continue to strengthen the capacity of local leaders for watershed management, while building a network of skilled alumni leading watershed groups throughout Indiana.

Indiana Watershed



Leadership Program

Indiana Watershed
Leadership Academy

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Steering Committee

The Indiana Watershed Leadership Academy benefits from the dedicated members of the Steering Committee.

Dennis Wichelns, Hanover College, Rivers Institute

Jill Reinhart, USDA Natural Resources Conservation Service

Kent Tracey, IDNR Lake & River Enhancement

Doug Walker, ISDA Division of Soil Conservation

Reggie Korthals, Northwest Indiana Regional Planning Commission

Betty Ratcliff, IDEM Watershed Management Section

Linda Schmidt, IDEM Watershed Management Section

Bob McCormick, Purdue University, Planning With Power

Jennifer Boyle, Indiana Assoc. of Soil and Water Conservation Districts

Lyn Crighton, IDNR Hoosier Riverwatch Program

Don Emmert, Tippecanoe County Soil & Water Conservation District

Jhani Laopus, Veolia Water Indianapolis

Rae Schnapp, Hoosier Environmental Council, Wabash Riverkeeper

Duane McCoy, IDNR Division of Forestry

Janet Ayres, Purdue University

Linda Prokopy, Purdue University

Ron James, Wabash River Heritage Corridor Commission

Angie Brown, White River Watershed Project

Cynthia Beckner, Hancock County Soil & Water Conservation District

Bernie Dahl, Banks of the Wabash

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