

State of Indiana
Water Conservation and Efficiency Program Review
November 21, 2012

The State of Indiana submits the following Water Conservation and Efficiency Program review to the Regional Body and Compact Council pursuant to the requirements set forth in the Agreement Article 300 and Section 3.4.1 of the Great Lakes-St. Lawrence River Basin Sustainable Water Resources Compact (the Compact).

1. Lead agency/agencies:

The lead agency is the Indiana Department of Natural Resources (IDNR). The lead contact person is IDNR Deputy Director Ron McAhron.

2. Water Conservation and Efficiency Goals and Objectives

Indiana's Lake Michigan Basin water conservation and efficiency goals are provided by Section 4.2.1 of the Compact that includes the basin-wide goals as follows:

- a. Ensure the improvement of the waters and water dependent natural resources;
- b. Protect and restore the hydrologic and ecosystem integrity of the Basin;
- c. Retain the quantity of surface water and groundwater in the Basin;
- d. Ensuring sustainable use of waters of the Basin; and
- e. Promoting the efficiency of use and reduce losses and waste of water in the Basin.

The State of Indiana's water conservation and efficiency objectives are consistent with Indiana's Water Management Policy that *"recognizes that Indiana's abundant resources are a public good for all citizens of the State, and promotes the efficient use of this water by encouraging environmentally sound and economically feasible conservation measures to ensure availability for future generations"*.

3. Water Conservation and Efficiency Program Overview.

The following statutory provisions are applicable to the Water Conservation and Efficiency program in the State of Indiana:

- Great Lakes-St. Lawrence River Basin Water Resources Compact (IC 14-25-15)—Interstate agreement on the use of water resources in the Great Lakes-St Lawrence River basin.
- Indiana's legislation enacting and implementing the Compact calls for the Indiana Natural Resources Commission to adopt rules that implement voluntary water conservation and efficiency programs (IC 14-25-15-5).
- Significant Water Withdrawal Facility Registration (IC 14-25-7-15)—Requires an inventory of significant uses of water withdrawn from the surface or ground to be taken and maintained. Section 15 of the act requires that every person who owns a significant water withdrawal facility (SWWF) shall register it within three (3) months after the facility is completed. A "significant water withdrawal facility" is by statutory definition "the water withdrawal facilities of a person that, in the aggregate from all sources and by all methods,

has the capability of withdrawing more than one hundred thousand (100,000) gallons of ground water, surface water, or ground and surface water combined in one (1) day". Owners of a SWWF must also report annual water use within three (3) months after the end of each calendar year. Approved methods of measuring the amount of water withdrawn by a SWWF are specified in the Non-rule Policy Document Information Bulletin #40. Water withdrawals from temporary construction dewatering operations must also be reported in accordance with IC 14-25-7.

- Sale of Water (IC 14-25-2 and Rule 312 IAC 6.3) Conservation planning is required in the application for the sale of water from any Reservoir financed fully or in part by the State.
- Emergency Regulation of Ground Water Rights (IC 14-25-4 and Rule 312 IAC 12) Owners of small capacity water wells are protected against the impacts of high capacity ground-water withdrawal(s) that substantially lower water levels, resulting in the failure of a small capacity well. Restrictions of high capacity pumping can occur when it is believed that discharge exceeds the recharge capability of the source aquifer.
- Emergency Regulation of Surface Water Rights (IC 14-25-5 and Rule 312 IAC 11.5) Freshwater lake owners are protected against the impacts of high capacity pumping that substantially lowers the level of the freshwater lake, resulting in significant environmental harm to the lake or adjacent property. Restriction of high capacity pumping can be required in order to restore lake level.
- Water Shortage Task Force (IC 14-25-14)—Indiana’s Water Shortage Plan provides an effective and systematic plan to assess and manage the State’s water resources during a water shortage or potential water shortage to respond, to the maximum extent practicable, to the needs of its water users while protecting the environment. Indiana’s Water Shortage Plan was updated in 2009.

4. Promotion of Environmentally Sound and Economically Feasible Water Conservation Measures, Consistent with Regional Objectives.

- **Guide programs toward long-term sustainable use.**
 - Statewide registration and water use reporting program under IC 14-25-7-15 of over 3,600 facilities under the water use categories of Energy Production, Industrial, Irrigation, Public Water Supply, Rural and Miscellaneous.
 - Detailed river basin studies for the Indiana portion of the Great Lakes Basin (Lake Michigan Region, St. Joseph River Basin, Maumee River Basin) by the Indiana Department of Natural Resources, Division of Water. These studies provide detailed information regarding the availability, development, protection and projected use of the ground water and surface water resources of each river basin.

- Best Management Practices (BMPs) for each registered water use category have been developed and distributed to all registered SWWFs within the Great Lakes Basin and statewide. The identification of applicable BMPs was completed with the use of industry standards and input from SWWF representatives, area water user groups, environmental groups, private sector water management firms, academia, and area planning commissions.
 - Water Management Planning Frameworks are available for each water use category and can assist water users with their conservation planning efforts, especially those registered as SWWFs. The framework is directed, as a guidance document, at those facilities that may not currently have conservation requirements as part of daily operating procedures and encourages facilities to more readily develop & implement conservation and efficiency programs on a voluntary basis.
 - Provision of a summary of the 2010 BMP checklist survey results to all SWWFs located in the Great Lakes Basin, as well as statewide. The surveys served several purposes, including: 1) gathering data on conservation and efficiency efforts of all Indiana SWWFs; and 2) sharing information on BMPs, water management practices, new technology, and other pertinent topics relevant to conservation and efficiency efforts with end users.
 - A follow up 2011 mini- survey sought to improve communication efficiency and effectiveness with SWWFs via electronic methods, conservation and efficiency educational needs (most common indicated future strategy for SWWFs as indicated by 2010 survey results), and potential voluntary reduction goals and previously achieved reduction percentages. The mailer also included information on the implementation of LSA Document # 11-667(E) regarding the permitting of water withdrawals within the Great Lakes Basin that exceed the established thresholds set forth in IC 14-25-15-7.
 - 2012 water use mailing provided summary results of the previous year's survey to registered SWWFs, both in the Indiana portion of the Great Lakes Basin as well as Statewide, information updating the progress toward permanent rule adoption regarding the permitting of water withdrawals and water conservation and efficiency programming within the Great Lakes Basin pursuant to IC 14-25-15-7.
- **Promote the efficient use and conservation of water.**
 - Implementation of educational mailings to registered SWWFs to communicate the importance of water use efficiency and conservation practices. The educational mailings are ongoing, utilizing the long established correspondence for SWWF annual water use reporting as a vehicle for providing information on conservation and efficiency.
 - Encouraging use of universal water metering programs, including water audits, to identify leaks, waste, and opportunities for water savings in all educational items.

- Indiana's Water Management Policy recognizes that Indiana's abundant water resources are a public good for all citizens of the State, and promotes the efficient use of this water by encouraging environmentally sound and economically feasible conservation measures to ensure availability for future generations.
 - Development of a Statewide Water Management Plan that promotes improvements in water management practices, such as watering lawns, gardens, and farm fields efficiently, using water efficient fixtures in homes and businesses, using drought resistant landscape practices, and using reclaimed or lower quality water for irrigation, industrial, and other appropriate non-potable uses.
 - Suggested Model Ordinance—The Model Conservation Ordinance describes a suite of measures including good water management practices at all times, potential price increases for water during times of shortage, and enforced rationing during periods of extreme water shortage. While some of the measures in the ordinance may not apply in all situations or locations, the purpose of the measures is to encourage wise use of the resource and to minimize the impacts of seasonal or short-term water shortages.
 - Conservation and efficiency programs are mandatory as part of a permit application for any new or increased withdrawals or diversions under the Compact by Emergency Rule LSA Document #11-677(E) which became effective on November 1, 2011. The permanent rule, LSA Document #12-089W, received preliminary adoption by the Natural Resources Commission on November 20, 2012 and will proceed with local public hearings during the promulgation process in 2013.
 - Promotion of water conservation and efficiency utilizing the EPA *Water Sense* and *We're for Water* programming at area water related conferences, seminars, and for the three weeks of the Indiana State Fair.
- **Develop water conservation education programs and information sharing.**
 - Water conservation and efficiency website clearing house—that outlines the historical process of implementation of the Great Lakes and St. Lawrence River Basin Water Resources Compact, corresponding permit rule and conservation and efficiency rule development, and subsequent posting of permanent rules once adopted.
 - Educational and printable material available and made conveniently accessible to public, water users, SWWFs, and various stakeholders on Indiana's water conservation and efficiency clearinghouse website.
 - Significant Water Withdrawal Facility (SWWF) data is accessible from and linked to conservation and efficiency clearinghouse.
 - Website clearinghouse includes links to other conservation programs, including the EPA's Water Sense program.

- Indiana registered SWWFs surveyed on current water conservation and efficiency efforts and water management practices and those that are planned for implementation in the future. Included with the 2010 annual water use report form, the survey received a 54% response rate from facilities within the Great Lakes Basin. (Acquired data accessible from website clearinghouse.)
- Continue to build on the success of surveys and communications associated with annual water use reporting. Use of ongoing process of surveying facilities and building the database to track the implementation of new or revised conservation strategies by SWWFs, as well as the movement of conservation and efficiency strategies and BMPs formerly indicated as ‘planned’ to the ‘current’ category.
- **Improve monitoring and standardize data reporting:**
 - SWWF water use data was first made available online in 2005 that provides annual summaries and withdrawal data for the previous five years. The data is updated annually.
 - Checklists of Best Management Practices developed specifically for each SWWF water use category will allow standardized comparisons of implemented and planned conservation and efficiency efforts.
 - Testing has commenced for on-line submittal of SWWF annual water use information in order to facilitate and standardize data reporting. The online reporting system is targeted to be ready for use with the 2012 water use reporting due by March 31, 2013.

5. The State of Indiana’s timeline for implementation of voluntary Water Conservation and Efficiency Program.

- Indiana has met its obligations under Section 4.2 of the Compact, including development of water conservation and efficiency goals and objectives consistent with the basin wide goals and objectives. The goals and objectives outlined in the Compact have been incorporated by reference within Indiana regulations.
- Public outreach and input regarding development of Indiana’s voluntary Water Conservation and Efficiency Program has been utilized, and feedback from SWWF’s will continue to help shape the program through the coming year(s).
- Irrigation represents the largest number regulated facilities and outreach efforts continue with groups like the Michiana Irrigation Association for outreach and input as the conservation and efficiency program continues to develop and evolve.
- The Department of Natural Resources Commission gave preliminary adoption of LSA Document #12-089W which will implement permitting and water conservation and efficiency programs for facilities regulated under the Compact on November 20, 2012.